#### **IMPORTANT NOTICE**

THIS OFFERING IS AVAILABLE ONLY TO INVESTORS WHO ARE EITHER (1) "QUALIFIED INSTITUTIONAL BUYERS" ("QIBS") (AS DEFINED IN RULE 144A ("RULE 144A") UNDER THE US SECURITIES ACT OF 1933, AS AMENDED (THE "SECURITIES ACT")), OR (2) NON-US PERSONS IN OFFSHORE TRANSACTIONS IN RELIANCE ON REGULATION S UNDER THE SECURITIES ACT ("REGULATION S").

IMPORTANT: You must read the following disclaimer before continuing. The following disclaimer applies to the attached preliminary offering circular dated (the "Offering Circular") following this page, whether received by e-mail or other electronic communication, and you are therefore advised to read this carefully before reading, accessing or making any other use of the Offering Circular. In accessing the Offering Circular, you agree to be bound by the following terms and conditions, including any modifications to them any time you receive any information from Vedanta Resources plc (the "Company") or from us as a result of such access.

None of Barclays Bank PLC, Citigroup Global Markets Limited, J.P. Morgan Securities plc and Standard Chartered Bank as joint global coordinators, joint lead managers and joint bookrunners (the "Joint Global Coordinators, Joint Lead Managers and Joint Bookrunners") or any person who controls any of them or any of their respective affiliates, directors, officers, employees, agents, representatives or advisers accepts any liability whatsoever for any loss howsoever arising from any use of this e-mail or the attached Offering Circular or their respective contents or otherwise arising in connection therewith.

NOTHING IN THIS ELECTRONIC TRANSMISSION CONSTITUTES AN OFFER OF SECURITIES FOR SALE IN ANY JURISDICTION WHERE IT IS UNLAWFUL TO DO SO. THE SECURITIES HAVE NOT BEEN, AND WILL NOT BE REGISTERED UNDER THE SECURITIES ACT, OR WITH ANY OTHER SECURITIES REGULATORY AUTHORITY OF ANY STATE OR OTHER JURISDICTION AND MAY NOT BE OFFERED, SOLD, PLEDGED OR OTHERWISE TRANSFERRED EXCEPT PURSUANT TO AN EXEMPTION FROM, OR IN A TRANSACTION NOT SUBJECT TO, THE REGISTRATION REQUIREMENTS OF THE SECURITIES ACT AND ANY APPLICABLE STATE OR LOCAL SECURITIES LAWS. THE SECURITIES MAY ONLY BE OFFERED, SOLD OR OTHERWISE TRANSFERRED IN THE UNITED STATES OR TO UNITED STATES PERSONS (AS DEFINED IN REGULATION S) THAT ARE QIBS IN RELIANCE ON THE EXEMPTION FROM THE REGISTRATION REQUIREMENTS OF THE SECURITIES ACT PROVIDED BY RULE 144A. ANY INVESTMENT DECISION SHOULD BE MADE ON THE BASIS OF THE FINAL TERMS AND CONDITIONS OF THE SECURITIES AND THE INFORMATION CONTAINED IN THE FINAL OFFERING CIRCULAR.

IF YOU DO NOT AGREE TO THE TERMS CONTAINED IN THIS NOTICE, YOU SHOULD NOT OPEN THE ATTACHED OFFERING CIRCULAR AND SHOULD DELETE THIS E-MAIL. THIS E-MAIL AND ITS ATTACHMENTS ARE PERSONAL TO YOU, ARE CONFIDENTIAL AND MAY ONLY BE READ BY THE ADDRESSEE AND MAY NOT BE REPRODUCED OR REDISTRIBUTED ELECTRONICALLY OR OTHERWISE TO ANY OTHER PERSON.

Confirmation of Your Representation: The attached Offering Circular is being sent at your request and by accepting the e-mail and accessing the attached Offering Circular, you shall be deemed to have represented to the Company, the Joint Global Coordinators, Joint Lead Managers and Joint Bookrunners that (1) you and any customer you represent are either (a) a QIB or (b) not a US person and that the e-mail address that you have given and to which this e-mail has been delivered is not located in the United States of America, its territories, its possessions and other areas subject to its jurisdiction; and its possessions include Puerto Rico, the U.S. Virgin Islands, Guam, American Samoa, Wake Island and the Northern Mariana Islands and, to the extent you purchase the securities described in the attached Offering Circular, you will be doing so in offshore transactions in reliance on Regulation S; and (2) you consent to delivery of the attached Offering Circular and any amendments or supplements thereto by electronic transmission.

You are reminded that the attached Offering Circular has been delivered to you on the basis that you are a person into whose possession the attached Offering Circular may be lawfully delivered in accordance with the laws of the jurisdiction in which you are located. If this is not the case, you must delete this e-mail in which the Offering Circular is attached and destroy any printed copies of the Offering Circular. You may not, nor are you authorised to, deliver or forward the Offering Circular, electronically or otherwise, or disclose the contents of the Offering Circular, to any other person.

The materials relating to the offering do not constitute, and may not be used in connection with, an offer or solicitation in any place where offers or solicitations are not permitted by law and access has been limited so that it shall not constitute a general advertisement or solicitation in the United States or elsewhere. No action has been or will be taken in any jurisdiction by the Company, the Joint Global Coordinators, Joint Lead Managers or Joint Bookrunners that would, or is intended to, permit a public offering of the securities, or possession or distribution of the Offering Circular (in preliminary, proof or final form) or any other offering or publicity material relating to the securities, in any country or jurisdiction where action for that purpose is required. If a jurisdiction requires that the offering be made by a licensed broker or dealer and any of the Joint Global Coordinators, Joint Lead Managers or Joint Bookrunners or any affiliate of any of the Joint Global Coordinators, Joint Lead Managers or Joint Bookrunners is a licensed broker or dealer in that jurisdiction, the offering shall be deemed to be made by such Joint Global Coordinators, Joint Lead Managers or Joint Bookrunners or such affiliate on behalf of the Company in such jurisdiction.

This communication is directed only at persons who (a) are outside the United Kingdom or (b) have professional experience in matters relating to investments falling within Article 19(5) of the Financial Services and Markets Act 2000 (Financial Promotion) Order 2005 (the "Financial Promotion Order") or (c) are persons falling within Article 49(2)(a) to (d) ("high net worth companies, unincorporated associations, etc.") of the Financial Promotion Order (all such persons together being referred to as "relevant persons"). This communication must not be acted on or relied on by persons who are not relevant persons. Any investment or investment activity to which the Offering Circular relates is available only to relevant persons and will be engaged in only with relevant persons.

The attached Offering Circular has been sent to you in an electronic form. You are reminded that documents transmitted via this medium may be altered or changed during the process of electronic transmission and consequently none of the Company, the Joint Global Coordinators, Joint Lead Managers or Joint Bookrunners or any person who controls them or any director, officer, employee or agent of them or affiliate of any such person accepts any liability or responsibility whatsoever in respect of any difference between the Offering Circular distributed to you in electronic format and the hard copy version available to you on request from the Joint Global Coordinators, Joint Lead Managers and Joint Bookrunners.

THE ATTACHED OFFERING CIRCULAR MAY NOT BE DOWNLOADED, FORWARDED OR DISTRIBUTED TO ANY OTHER PERSON AND MAY NOT BE REPRODUCED IN ANY MANNER WHATSOEVER. ANY DOWNLOADING, FORWARDING, DISTRIBUTION OR REPRODUCTION OF THIS ELECTRONIC TRANSMISSION AND THE ATTACHED OFFERING CIRCULAR IN WHOLE OR IN PART IS UNAUTHORISED. FAILURE TO COMPLY WITH THIS DIRECTIVE MAY RESULT IN A VIOLATION OF THE SECURITIES ACT OR THE APPLICABLE LAWS OF OTHER JURISDICTIONS. IF YOU HAVE GAINED ACCESS TO THIS TRANSMISSION CONTRARY TO ANY OF THE FOREGOING RESTRICTIONS, YOU ARE NOT AUTHORISED AND WILL NOT BE ABLE TO PURCHASE ANY OF THE SECURITIES DESCRIBED IN THE ATTACHED OFFERING CIRCULAR.

You are responsible for protecting against viruses and other destructive items. Your use of this e-mail is at your own risk and it is your responsibility to take precautions to ensure that it is free from viruses and other items of a destructive nature.

# VEDANTA RESOURCES PLC

(incorporated with limited liability in England and Wales)

## \$1,000,000,000 6.375% Bonds due 2022

This is an offering of \$1,000,000,000 6.375% bonds due 2022 (the "Bonds") by Vedanta Resources plc ("Vedanta" or the "Company").

The Bonds will bear interest at the rate of 6.375% per annum, payable semi-annually in arrear on January 30 and July 30 of each year, commencing 30 July 2017. Payments on the Bonds will be made without deduction for or on account of taxes of the United Kingdom to the extent described under "Terms and Conditions of the Bonds — Taxation".

The Bonds will mature on 30 July 2022. The Bonds may be redeemed at the option of the Company, in whole, but not in part, at a redemption price equal to the principal amount of the Bonds plus the Applicable Premium (as defined herein) applicable to the Bonds, plus accrued and unpaid interest, if any, to the redemption date. The Bonds may be redeemed at the option of the Company in whole, but not in part, at a redemption price equal to the principal amount of the Bonds, together with accrued and unpaid interest, if any, to the redemption date, in the event of certain changes affecting taxes of the United Kingdom. Upon the occurrence of a Change of Control (as defined herein), the Company must make an offer to purchase all of the Bonds outstanding at a purchase price equal to 101% of their principal amount, plus accrued and unpaid interest, if any, to the purchase date. See "Terms and Conditions of the Bonds — Redemption and Purchase".

#### Issue Price: 100%

The Bonds have not been and will not be registered under the United States Securities Act of 1933, as amended (the "Securities Act") and are being offered in the United States only to qualified institutional buyers ("QIBs") in reliance on Rule 144A ("Rule 144A") under the Securities Act and to non-US persons outside the United States in reliance on Regulation S under the Securities Act ("Regulation S"). The Bonds which are being offered and sold outside the United States to non-US persons (as defined in Regulation S) in reliance on Regulation S (the "Regulation S Bonds") will each be initially represented by an unrestricted global certificate in registered form (the "Unrestricted Global Certificate"). The Bonds which are offered and sold in the United States to QIBs in reliance on Rule 144A (the "Rule 144A Bonds") will bear the Securities Act Legend (as defined in the trust deed to be dated on or about 30 January 2017 (the "Trust Deed")) and will each be initially represented by a restricted global certificate in registered form (the "Restricted Global Certificate" and, together with the Unrestricted Global Certificate, the "Global Certificates"). The Unrestricted Global Certificate will be deposited with a custodian for, and registered in the name of, a nominee of Cede & Co., as nominee of The Depository Trust Company ("DTC") for the accounts of Euroclear Bank S.A./N.V. ("Euroclear") and Clearstream Banking, société anonyme ("Clearstream"), and the Restricted Global Certificate will be deposited with a custodian for, and registered in the name of, Cede & Co., as nominee of DTC, on the Closing Date. Beneficial interests in the Global Certificates will be shown on, and transfers thereof will be effected only through, records maintained by DTC and its account holders. Prospective purchasers are hereby notified that sellers of the Bonds may be relying on the exemption from the provisions of Section 5 of the Securities Act provided by Rule 144A. For a description of these and certain further restrictions on offers, sales and transfers of the Bonds and distribution of this Offering Circular, see "Plan of Distribution" and "Transfer Restrictions". It is expected that delivery of the Bonds will be made against payment through the facilities of DTC on or about 30 January 2017 (the "Closing Date").

The Company intends to apply for the listing of the Bonds on the Singapore Exchange Securities Trading Limited (the "SGX-ST"). The SGX-ST assumes no responsibility for the correctness of any of the statements made or opinions expressed or information contained in this Offering Circular. Admission of the Bonds to the official list of the SGX-ST is not to be taken as an indication of the merits of the offering, the Company or the Bonds. The Bonds will be traded on the SGX-ST in a minimum board lot size of U.S.\$200,000 or its equivalent for so long as the Bonds are listed on the SGX-ST. Currently, there is no public market for the Bonds.

Investing in the Bonds involves risks. For a discussion of certain factors to be considered in connection with an investment in the Bonds, see "Risk Factors" beginning on page 12.

The Company has corporate credit ratings of "B1" (with a stable outlook) from Moody's Investors Service, Inc. ("Moody's") and "B+" (with a stable outlook) from Standard & Poor's Ratings Services, a division of McGraw-Hill Companies, Inc. ("Standard & Poor's"). The Bonds are expected, on the Closing Date, to be rated "B3" by Moody's and "B+" by Standard & Poor's. A rating is not a recommendation to buy, sell or hold securities and may be subject to revision, suspension or withdrawal at any time by the assigning rating organisation.

Joint Global Coordinators, Joint Lead Managers and Joint Bookrunners (in alphabetical order)

Barclays Citigroup J.P. Morgan Standard Chartered Bank

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# NOTICE TO INVESTORS

This Offering Circular does not constitute an offer of, or an invitation by or on behalf of the Company or Barclays Bank PLC, Citigroup Global Markets Limited, J.P. Morgan Securities plc and Standard Chartered Bank as joint global coordinators, joint lead managers and joint bookrunners (collectively, the "Joint Global Coordinators, Joint Lead Managers and Joint Bookrunners") to subscribe for or purchase, any of the Bonds. The distribution of this Offering Circular and the offering of the Bonds in certain jurisdictions may be restricted by law. Persons into whose possession this Offering Circular comes are required by the Company, the Joint Global Coordinators and Joint Lead Managers and the Joint Bookrunners to inform themselves about and observe any such restrictions. This Offering Circular does not constitute, and may not be used for or in connection with, an offer or solicitation by anyone in any jurisdiction in which such offer or solicitation is not authorised or to any person to whom it is unlawful to make such offer or solicitation. For a description of certain further restrictions on offers and sales of the Bonds and distribution of this Offering Circular see "Plan of Distribution" and "Transfer Restrictions".

No person is authorised to give any information or to make any representation not contained in this Offering Circular and any information or representation not so contained must not be relied upon as having been authorised by or on behalf of the Company or the Joint Global Coordinators and Joint Lead Managers or the Joint Bookrunners. The delivery of this Offering Circular or the offering, sale and delivery of the Bonds at any time does not imply that the information contained in this Offering Circular is correct at any time subsequent to its date.

To the fullest extent permitted by law, none of the Joint Global Coordinators and Joint Lead Managers, the Joint Bookrunners, the Trustee, the Principal Agent and the Registrar (each as defined herein) accept any responsibility for the accuracy and completeness of the contents of this Offering Circular or for any statement, made or purported to be made by the Joint Global Coordinators and Joint Lead Managers, the Joint Bookrunners, the Trustee, the Principal Agent or the Registrar or on its or their behalf in connection with the Company or the issue and offering of the Bonds. The Joint Global Coordinators and Joint Lead Managers, the Joint Bookrunners, the Trustee, the Principal Agent and the Registrar accordingly disclaim all and any liability whether arising in tort or contract or otherwise which it might otherwise have in respect of this Offering Circular or any such statement.

This Offering Circular should not be considered as a recommendation by the Company or the Joint Global Coordinators and Joint Lead Managers or the Joint Bookrunners, that any recipient of this Offering Circular should purchase any of the Bonds. Each investor contemplating a purchase of the Bonds should make its own independent investigation of the Company's financial condition and affairs and its own appraisal of the Company's creditworthiness.

Investors may not reproduce or distribute this Offering Circular, in whole or in part, and investors may not disclose any of the contents of this Offering Circular or use any information herein for any purpose other than considering an investment in the Bonds. Investors agree to the foregoing by accepting delivery of this Offering Circular.

If a jurisdiction requires that the offering be made by a licensed broker or dealer and any of the Joint Global Coordinators, Joint Lead Managers or Joint Bookrunners or any affiliate of any of the Joint Global Coordinators, Joint Lead Managers or Joint Bookrunners is a licensed broker or dealer in that jurisdiction, the offering shall be deemed to be made by such Joint Global Coordinators, Joint Lead Managers or Joint Bookrunners or such affiliate on behalf of the Company in such jurisdiction.

Market data and certain industry forecasts (where applicable) used throughout this Offering Circular have been obtained from internal surveys, market research, publicly available information and industry publications. Industry publications generally state that the information that they contain

has been obtained from sources believed to be reliable but that the accuracy and completeness of that information is not guaranteed. Similarly, internal surveys, industry forecasts and market research, while believed to be reliable, have not been independently verified, and none of the Company, the Joint Global Coordinators and Joint Lead Managers or the Joint Bookrunners make any representation as to the accuracy of that information.

#### **STABILISATION**

In connection with this offering, J.P. Morgan Securities plc will act as the stabilising manager (the "Stabilising Manager") and it or any of its affiliates (or persons acting on behalf of the Stabilising Manager), may, to the extent permitted by applicable laws and regulations, over-allot or effect transactions with a view to supporting the market price of the Bonds at a level higher than that which might otherwise prevail for a limited time after the issue date of the Bonds. However, there is no assurance that the Stabilising Manager or any of its affiliates (or persons acting on behalf of the Stabilising Manager) will undertake any stabilising action. Any stabilising action may begin on or after the date on which adequate public disclosure of the terms of the offer of the Bonds is made and, if begun, may be ended at any time, but it must end no later than the earlier of 30 days after the issue date of the Bonds and 60 days after the date of the allotment of the Bonds. Any stabilisation action must be conducted by the Stabilising Manager or any of its affiliates (or persons acting on behalf of the Stabilising Manager) in accordance with all applicable laws and rules.

#### NOTICE TO UK INVESTORS

This Offering Circular is for distribution only to persons who (i) have professional experience in matters relating to investments falling within Article 19(5) the Financial Services and Markets Act 2000 (Financial Promotion) Order 2005, as amended (the "Financial Promotion Order"), (ii) are persons falling within Article 49(2)(a) to (d) ("high net worth companies, unincorporated associations etc.") of the Financial Promotion Order, (iii) are outside the United Kingdom, or (iv) are persons to whom an invitation or inducement to engage in investment activity (within the meaning of section 21 of the Financial Services and Markets Act 2000 (the "FSMA")) in connection with the issue or sale of any securities may otherwise lawfully be communicated or caused to be communicated (all such persons together being referred to as "relevant persons"). This Offering Circular is directed only at relevant persons and must not be acted on or relied on by persons who are not relevant persons. Any investment or investment activity to which this document relates is available only to relevant persons and will be engaged in only with relevant persons.

#### NOTICE TO PROSPECTIVE INVESTORS IN THE UNITED STATES

The Bonds have not been and will not be registered under the Securities Act, or with any securities regulatory authority of any state or other jurisdiction in the United States, and may not be offered, sold, pledged or otherwise transferred except pursuant to an exemption from, or in a transaction not subject to, the registration requirements of the Securities Act and in compliance with any applicable state securities laws.

In connection with the Bonds being offered in the United States to QIBs in reliance on the exemption from registration provided by Rule 144A, this Offering Circular is being furnished in the United States on a confidential basis solely for the purpose of enabling prospective investors to consider the purchase of the Bonds. Its use for any other purpose in the United States is not authorised.

The Bonds have not been approved or disapproved by the United States Securities and Exchange Commission (the "Commission"), any state securities commission in the United States or any other US regulatory authority, nor have any of the foregoing authorities passed upon or endorsed the merits of this offering or the accuracy or adequacy of this Offering Circular. Any representation to the contrary is a criminal offence in the United States.

#### AVAILABLE INFORMATION

For so long as any of the Bonds remain outstanding and are "restricted securities" within the meaning of Rule 144(a)(3) under the Securities Act, the Company will, during any period in which the Company is neither subject to Section 13 or Section 15(d) of the US Securities Exchange Act of 1934 (the "Exchange Act") nor exempt from reporting pursuant to Rule 12g3-2(b) thereunder, provide to any holder or beneficial owner of such restricted securities or to any prospective purchaser of such restricted securities designated by such holder or beneficial owner or to the Trustee (as defined herein) for delivery to such holder, beneficial owner or prospective purchaser, in each case upon the request of such holder, beneficial owner, prospective purchaser or Trustee, the information required to be provided by Rule 144A(d)(4) under the Securities Act.

# **ENFORCEABILITY OF JUDGMENTS**

The Company is incorporated with limited liability under the laws of England and Wales. A substantial number of the Directors (as defined herein) or executive officers of the Company and all or a significant portion of the assets of such persons may be, and a substantial portion of the assets of the Company are, located outside the United States. As a result, it may not be possible for investors to effect service of process within the United States upon the Company or such persons or to enforce against any of them in the United States judgments obtained in US courts, including judgments predicated upon the civil liability provisions of the securities laws of the United States or any state or territory within the United States.

#### SPECIAL NOTE REGARDING FORWARD-LOOKING STATEMENTS

This Offering Circular contains "forward-looking statements" that are based on the Company's current expectations, assumptions, estimates and projections about the Company and its industry. These forward-looking statements are subject to various risks and uncertainties. Generally, these forward-looking statements can be identified by the use of forward-looking terminology such as "anticipate", "believe", "estimate", "expect", "intend", "will", "project", "seek", "should" and similar expressions. These statements include, but not limited to, the discussions of the Company's business strategy and expectations concerning its market position, future operations, margins, profitability, liquidity and capital resources. Such forward-looking statements involve risks and uncertainties, and that, although the Company believes that the assumptions on which such forward-looking statements are based are reasonable, any of those assumptions could prove to be inaccurate and, as a result, the forward-looking statements based on those assumptions could be materially incorrect. Factors which could cause these assumptions to be incorrect include:

- A decline or volatility in the prices or demand for oil and gas, zinc, copper, iron ore or aluminium or an increase in the supply of oil and gas, zinc, copper, iron ore or aluminium;
- Reliance on third party contractors and providers of equipment which may not be readily available and whose costs may increase;

- Decline in demand for iron ore in China, exports which are significant for Vedanta's iron ore business;
- Ability to successfully consummate and integrate strategic acquisitions;
- Regulatory, legislative and judicial developments and future regulatory actions and conditions in Vedanta's operating areas;
- Political or economic instability in the regions which Vedanta operates;
- Terrorist attacks and other acts of violence, natural disasters and other environmental conditions and outbreaks of infectious diseases and other public health concerns in the regions in which Vedanta operates;
- Vedanta's ability to retain its senior management team and hire and retain sufficiently skilled labour to support its operations;
- Vedanta's dependence on obtaining and maintaining mining leases to mining sites;
- General risks related to Vedanta's commercial power business;
- The outcome of any pending or threatened litigation in which Vedanta is involved;
- The continuation of tax holidays, exemptions and deferred tax schemes currently enjoyed by Vedanta;
- Changes in tariffs, royalties, custom duties and government assistance;
- Interruptions in the availability of exploration, production or supply equipment or infrastructure and/or increased costs:
- Construction of pipelines and terminals may take longer than planned, may not work as intended and the cost of construction may be greater than forecast;
- Unavailability or increased costs of raw materials for Vedanta's products;
- Vedanta's economically recoverable lead-zinc ore, copper ore, iron ore, or bauxite reserves being lower than estimated;
- Worldwide economic and business conditions;
- Compliance with extensive environmental and health and safety regulations;
- Currency fluctuations; and
- Ability to maintain good relations with trade unions and avoid strikes and lock-outs.

These and other factors are more fully discussed in "Risk Factors", "Management's Discussion and Analysis of Financial Condition and Results of Operations" and elsewhere in this Offering Circular. In light of these and other uncertainties, you should not conclude that the Company will necessarily achieve any plans, objectives or projected financial results referred to in any of the forward-looking statements. Except as required by law, the Company does not undertake to release revisions of any of these forward-looking statements to reflect future events or circumstances.

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# PRESENTATION OF INFORMATION

#### **Certain Conventions**

The Company conducts its businesses through a consolidated group of companies that it has ownership interests in. See "Business — History and Development" for more information on these companies and their relationships to the Company. Unless otherwise stated in this Offering Circular or unless the context otherwise requires, references in this Offering Circular to the "Company" or "Vedanta" or the "consolidated group of companies" or the "Group", mean Vedanta Resources plc, its consolidated subsidiaries and its predecessors, collectively, including, Cairn India Limited ("Cairn India") and its subsidiaries (together with Cairn India, the "Cairn India Group"), Konkola Copper Mines plc ("KCM"), Vedanta Limited ("Vedanta Limited", and its subsidiaries together with Vedanta Limited, the "Vedanta Limited Group"), Bharat Aluminium Company Limited ("BALCO"), Monte Cello BV ("Monte Cello"), Copper Mines of Tasmania Pty Ltd ("CMT"), Thalanga Copper Mines Pty Ltd ("TCM"), Hindustan Zinc Limited ("HZL"), MALCO Energy Limited ("MEL"), Sesa Resources Limited ("SRL"), Western Cluster Limited ("WCL"), THL Zinc Namibia Holdings Limited and its subsidiaries ("Lisheen"), Talwandi Sabo Power Limited ("TSPL") and Black Mountain Mining Pty Ltd ("Black Mountain Mining").

All references to "Executive Directors" in this Offering Circular are to Messrs. Anil Agarwal, Navin Agarwal and Tom Albanese. All references to "Non-Executive Directors" in this Offering Circular are to Messrs. Geoffrey Green, Aman Mehta, Deepak Parekh, Ravi Rajagopal and Katya (Ekaterina) Zotova. All references to "Directors" in this Offering Circular are to the Executive Directors and Non-Executive Directors of the Company.

All references to "management" are to the Company's Directors, the executive officers and other significant employees of the Company, unless the context otherwise requires, on the date of this Offering Circular, and statements in this Offering Circular as to beliefs, expectations, estimates and opinions of the Company or management are those of the Company's management.

In this Offering Circular, references to "copper business" are to the business of Vedanta comprising the copper operations as further described in "Business — Description of the Businesses — Copper Business"; references to "zinc business" and "zinc-lead" are to the business of Vedanta comprising the zinc operations as further described in "Business — Description of the Businesses — Zinc Business"; references to "aluminium business" are to the business of Vedanta comprising the aluminium operations as further described in "Business — Description of the Businesses — Aluminium Business"; references to "iron ore business" are to the business of Vedanta comprising the iron ore operations as further described in "Business — Description of the Businesses — Iron Ore Business"; references to "commercial power generation business" or "power business" are to the business of Vedanta comprising the power operations as further described in "Business — Description of the Businesses — Commercial Power Generation Business"; and references to "oil and gas business" are to the business of Vedanta comprising the oil and gas operations as further described in "Business — Description of the Businesses — Oil and Gas Business".

In this Offering Circular, references to The London Metal Exchange Limited ("LME") price of copper, zinc or aluminium are to the cash seller and settlement price on the LME for copper, zinc or aluminium for the period indicated. References to "primary market share" in this Offering Circular are to the market that includes sales by producers of metal from copper and zinc, as applicable, and do not include sales by producers of recycled metal or imports.

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#### **Presentation of Financial Information**

The consolidated audited financial statements for the Company as of and for fiscal year ended 31 March 2015 (the "Fiscal year 2015 Financial Statements") and as of and for fiscal year ended 31 March 2016 (the "Fiscal year 2016 Financial Statements" and together with the Fiscal year 2015 Financial Statements, the "Annual Financial Statements"), included elsewhere in this Offering Circular have been prepared in accordance with International Financial Reporting Standards ("IFRS") as adopted by the EU. The consolidated financial information for the Company as of and for fiscal years ended 31 March 2014, 2015 and 2016, included elsewhere in this Offering Circular has been derived from the Annual Financial Statements. The audited consolidated financial statements for the Company as of and for fiscal year ended 31 March 2014 (the "Fiscal year 2014 Financial Statements") are neither included nor incorporated by reference in this Offering Circular. The consolidated financial information for the Company as of and for periods ended 30 September 2015 and 2016, included elsewhere in this Offering Circular has been derived from the Interim Financial Statements prepared in accordance with IAS 34, Interim Financial Reporting.

Certain fiscal year 2014 comparative balance sheet amounts presented in the fiscal year 2015 Financial Statements and in "Summary Consolidated Financial Information" and "Selected Consolidated Financial Information" were reclassified from their previous presentation in the fiscal year 2014 Financial Statements to conform to the presentation of fiscal year 2015 financial information.

Certain comparative financial data for six months ended 30 September 2015 presented in the unaudited condensed consolidated financial statements for the six months ended 30 September 2016 were reclassified from their previous presentation to conform with the presentation of the unaudited condensed consolidated financial statements for the six months ended 30 September 2016.

Rounding adjustments have been made in calculating some of the financial information included in this Offering Circular. As a result, numerical figures shown as totals in some tables may not be exact arithmetic aggregations of the figures that precede them.

References to a particular "fiscal" year are to a financial year ended or ending 31 March of that year in the case of the Company. References to a year other than a "fiscal" year are to the calendar year ended 31 December.

#### **Currencies and Conversions**

In this Offering Circular, references to "US" or the "United States" are to the United States of America, its territories and its possessions. References to "UK" are to the United Kingdom. References to "India" are to the Republic of India. References to "Australia" are to the Commonwealth of Australia. References to "Zambia" are to the Republic of Zambia. References to "South Africa" are to the Republic of South Africa. References to "EU" are to the European Union as established by the Treaty on European Union. References to "\$", "dollars" OR US\$ or "US dollars" are to the legal currency of the United States; references to "GBP" or "£" are to the legal currency of the United Kingdom; references to "Rs.", "Rupees" or "Indian Rupees" are to the legal currency of India; references to "AUD", "Australian dollars" or "A\$" are to the legal currency of Australia; references to "ZAR", "South African Rands" are to the legal currency of South Africa; references to "Zambian Kwacha" or "ZMW" are to the legal currency of Zambia; and references to "€" are to the legal currency of certain nations within the EU. References to "¢" are to US cents and references to "lb" are to the imperial pounds (mass) equivalent to 0.4536 kilogrammes. References to "tonnes" are to metric tonnes, a unit of mass equivalent to 1,000 kilograms or 2,204.6 lb. In respect of Vedanta Limited's iron ore operations, references to "tonnes" are to dry metric tonnes and for wet metric tonnes. References to "m3" are to cubic metres, references to "km" are to kilometres and references to "km2" are to square kilometres.

Unless otherwise indicated, the financial information contained in this Offering Circular has been expressed in US dollars. The exchange rate between Zambian Kwachas and US dollars, and South African Rands and US Dollars are based on the spot rate provided by Bloomberg as of 30 September 2016, which was ZMW 9.9 = \$1.00, and ZAR 13.9 = \$1.00 respectively. The US dollar equivalent information presented in this Offering Circular for Indian Rupees has been calculated based on the exchange rates certified by the Reserve Bank of India ("RBI Reference Rate") as of 30 September 2016, which was Rs. 66.66 = \$1.00.

The exchange rates presented in this Offering Circular for each period may have differed from the exchange rates used in the preparation of financial statements included elsewhere in this Offering Circular. See "Exchange Rates".

#### **Non-IFRS Measures**

This Offering Circular includes the presentation of certain measures that are not defined by IFRS, including Vedanta EBITDA, cash costs per units, and Special Items (each as defined below). These measures have been included for the reasons described below. However, these measures are not measures of financial performance or cash flows under IFRS and may not be comparable to similarly titled measures of other companies because they are not uniformly defined. These measures should not be considered in isolation or as a substitute by investors as an alternative to Vedanta's operating results, operating profit or profit on ordinary activities before taxation, or as an alternative to cash flow from operating, investing or financing activities. Vedanta's management believes this information, along with comparable IFRS measures, is useful to investors because it provides a basis for measuring Vedanta's operating performance. Vedanta's management uses these financial measures, along with the most directly comparable IFRS financial measures, in evaluating Vedanta's operating performance and value creation. Non-IFRS financial measures should not be considered in isolation from, or as a substitute for, financial information presented in compliance with IFRS. Non-IFRS financial measures as reported by Vedanta may not be comparable to similarly titled amounts reported by other companies.

Because of these limitations, the non-IFRS measures should also not be considered as measures of discretionary cash available to Vedanta to invest in the growth of its business or as measures of cash that will be available to Vedanta to meet its obligations. Potential investors should compensate for these limitations by relying primarily on Vedanta's IFRS results and using these non-IFRS measures only supplementally to evaluate Vedanta's performance. Please see "Summary Historical Financial Data", "Selected Historical Financial Data", and the Annual Financial Statements and the related notes included elsewhere in this Offering Circular.

Furthermore, the non-IFRS measures included in this Offering Circular would also be considered a non-GAAP financial measure in the United States of America.

#### **VEDANTA EBITDA**

Vedanta EBITDA is a non-GAAP measure that represents profit or loss for the period before net finance costs, income taxes, depreciation and amortization. EBITDA is widely used by securities analysts, investors and other interested parties to evaluate the profitability of companies. Vedanta EBITDA eliminates potential differences in performance caused by variations in capital structures (affecting net finance costs), tax positions (such as the availability of net operating losses against which to relieve taxable profits), the cost and age of tangible assets (affecting relative depreciation expense) and the extent to which intangible assets are identifiable (affecting relative amortization expense).

Vedanta EBITDA based measures have important limitations as an analytical tool, and you should not consider them in isolation or as substitutes for analysis of the results of operations.

#### Some of these limitations are:

- They do not reflect the impact of significant interest expense or the cash requirements necessary to service interest or principal payments in respect of any borrowings, which could further increase if Vedanta incurs more debt.
- They do not reflect the impact of income tax expense on Vedanta's operating performance.
- They do not reflect the impact of depreciation of assets on Vedanta's performance. The assets of Vedanta's business that are being depreciated will have to be replaced in the future and such depreciation expense may approximate the cost to replace these assets in the future. By excluding this expense from Vedanta EBITDA-based measures, these measures do not reflect our future cash requirements for these replacements.
- They do not reflect Vedanta's cash expenditures or future requirements for capital expenditure or contractual commitments.
- They do not reflect changes in or cash requirements for Vedanta's working capital needs.

Vedanta EBITDA, as defined by Vedanta, represents Vedanta EBITDA before additional specific items that are considered to hinder comparison of the trading performance of Vedanta's businesses either year-on-year or with other businesses. Vedanta EBITDA is the measure used by the Board to assess the trading performance of Vedanta's businesses and is therefore the measure of segment profit that is presented under IFRS. Vedanta EBITDA is also presented on a consolidated basis because management believes it is important to consider Vedanta's profitability on a basis consistent with that of Vedanta's operating segments. When presented on a consolidated basis, Vedanta EBITDA is a non-GAAP measure.

Vedanta EBITDA may not be comparable to similarly titled measures reported by other companies due to potential inconsistencies in the method of calculation. Vedanta has included its Vedanta EBITDA because it believes it is an indicative measure of its operating performance and is used by investors and analysts to evaluate companies in the same industry. Vedanta EBITDA should be considered in addition to, and not as a substitute for, other measures of financial performance and liquidity reported in accordance with IFRS. Vedanta believes that the inclusion of supplementary adjustments applied in its presentation of Vedanta EBITDA are appropriate because Vedanta believes it is a more indicative measure of the its baseline performance as it excludes certain charges that Vedanta's management considers to be outside of its core operating results. In addition, Vedanta EBITDA is among the primary indicators that Vedanta's management uses as a basis for planning and forecasting of future periods.

#### Cash Costs per Unit

Cost of production as reported for Vedanta's metal products includes an off-set for any amounts Vedanta receives upon the sale of the by-products from the refining or smelting processes. The cost of production is divided by the daily average exchange rate for the year to calculate the US dollar cost of production per lb or tonne of metal as reported.

# **Special Items**

Special items are those items that management considers, by virtue of their size or incidence (including but not limited to impairment charges and acquisition and restructuring related costs), should be disclosed separately to ensure that the financial information allows an understanding of the underlying performance of the business in the year, so as to facilitate comparison with prior periods.

Also tax charges related to Special items and certain one-time tax effects are considered Special. Such items are material by nature or amount to the year's result and require separate disclosure in accordance with International Accounting Standards ("IAS") 1 paragraph 97. The determination as to which items should be disclosed separately requires a degree of judgement. Special Items are disclosed in the Annual Financial Statements, please refer to Note 5 in each set of consolidated financial statements for this definition and summary.

#### Net Debt/Capitalisation (%)

Net Debt/Capitalisation (%) is calculated as Vedanta's Debt minus Cash and Cash Equivalents minus Liquid Investments, as a percentage of the total capitalisation of Vedanta. Total capitalisation of Vedanta is calculated as shareholder's equity including non controlling interests and net debt.

# **Interest Coverage Ratio**

Interest coverage ratio is calculated as the number of times Vedanta EBITDA covers the total interest expense of Vedanta.

#### Net Debt over Vedanta EBITDA

Net Debt over Vedanta EBITDA is calculated as Vedanta's Debt minus Cash and Cash Equivalents minus Liquid Investments, divided by Vedanta EBITDA.

#### Debt/Vedanta EBITDA

Debt/Vedanta EBITDA is calculated as Vedanta's total borrowings divided by Vedanta EBITDA.

#### **Revenue Excluding Custom Smelting**

Revenue Excluding Custom Smelting is a non-GAAP measure that represents total revenues excluding revenue generated from custom smelting operations.

## **Vedanta EBITDA Excluding Custom Smelting**

Vedanta EBITDA Excluding Custom Smelting is total Vedanta EBITDA excluding Vedanta EBITDA generated from custom smelting operations.

#### **Vedanta EBITDA Excluding Custom Smelting Margin (%)**

Vedanta EBITDA Excluding Custom Smelting Margin is calculated as Vedanta EBITDA Excluding Custom Smelting as a percentage of Revenue Excluding Custom Smelting.

#### **Vedanta EBITDA** — Copper India Custom Smelting

Vedanta EBITDA generated from custom smelting operations at Vedanta's Copper — India/Australia segment.

#### Vedanta EBITDA — Copper Zambia Custom Smelting

Vedanta EBITDA generated from custom smelting operations at Vedanta's Copper — Zambia segment.

#### Total Vedanta EBITDA — Custom Smelting

Vedanta EBITDA generated from custom smelting operations.

# Vedanta EBITDA — Zinc India Custom Smelting

Vedanta EBITDA generated from custom smelting operations at Vedanta's Zinc — India segment.

#### Basis of Presentation of Reserves and Resources

#### Ore Reserves and Mineral Resources

The reported reserves are defined as being either "Ore Reserves" if reported in accordance with the Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves, 2004 Edition, prepared by the Joint Ore Reserves Committee of the Australasian Institute of Mining and Metallurgy, Australian Institute of Geoscientists and Minerals Council of Australia (the "JORC Code") or "Mineral Reserves" if reported in accordance with the South African Code for Reporting of Exploration Results, Mineral Resources and Mineral Reserves which sets out minimum standards, recommendations and guidelines for public reporting of exploration results, Mineral Resources and Mineral Reserves in South Africa (the "SAMREC Code"). The meanings and definitions are the same. For convenience, Vedanta has standardised the term Ore Reserves. The reported mineral resources are defined as "Mineral Resources" if reported in accordance with the JORC Code (2004) or in accordance with the SAMREC Code.

The reported Ore Reserves of each project, and Mineral Resources for certain projects, are derived following a systematic evaluation of geological data and a series of technical and economic studies by Vedanta's geologists and engineers. The results and procedures used in the majority of these studies have been periodically reviewed by independent consultants.

- The Mineral Resources and Ore Reserves of KCM's Konkola, Nchanga and Nampundwe mines were audited as of 31 March 2016, by SRK Consulting (South Africa) (Pty) Ltd and are reported in accordance with the terms and definitions of the SAMREC Code (2009). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- The Mineral Resources of CMT's copper mines are derived from management estimates as of 31 March 2016 and are reported in accordance with the terms and definitions of the JORC Code (2012). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- The Mineral Resources and Ore Reserves of HZL's mines were audited as of 31 March 2016 by SRK Consulting (UK) Limited and are reported in accordance with the terms and definitions of the JORC Code (2012). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- The Mineral Resources and Ore Reserves of Black Mountain Mining's mines are derived from management estimates as of 31 March 2016 and are reported in accordance with the terms and definitions of the SAMREC Code (2009). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- The Ore Reserves of Skorpion were audited by Axe Valley Mining Consultants Ltd. as of 31 March 2016 and are reported in accordance with the terms and definitions of the JORC Code (2012). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- The Ore Reserves of BALCO's mines were audited by Geo Solutions Private Limited as of 31 March 2016 and are reported in accordance with the terms and definitions of the JORC Code (2012). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.

- The Mineral Resources and Ore Reserves of the iron ore mines of Vedanta Limited and its subsidiary, SRL, were audited as of 31 March 2016 by Roscoe Postle Associates Inc. and are reported in accordance with the terms and definitions of the JORC Code (2012). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- During the year ended 31 March 2016, the Group recognised an impairment charge in respect of the exploratory assets in West Africa (Western Cluster, Liberia) on account of low iron ore prices, geo-political factors and no plans for any substantive expenditure resulting in continued uncertainty in the project. Therefore, the Company did not get certification of reserves and resources for the current period.
- The Ore Reserves of Vedanta Limited's bauxite mines are derived from management estimates as of 31 March 2016. There has been no bauxite mining in these mines during fiscal years 2014, 2015 and 2016.

The estimation of the quantity and quality of the mineral occurrence is defined in two stages. In the first stage, the location, quantity, grade, geological characteristics and continuity of Mineral Resources are interpreted and estimated from specific geological evidence and knowledge. The geological evidence is gathered from exploration, sampling and testing information through appropriate techniques from locations such as outcrops, trenches, pits, workings and drill holes. Mineral Resources are sub-divided, in order of increasing geological confidence, into Inferred, Indicated and Measured categories. See Annex B — "Mineral Resources". Furthermore all Mineral Resources are reported on an exclusive basis where for the avoidance of doubt, the Mineral Resources exclude those Measured and Indicated Mineral Resources which have been modified to derive Ore Reserves. The definitions of the terms relied on for both the SAMREC Code (2009) and the JORC Code (2012) are included in the glossary to this Offering Circular. Furthermore the SAMREC Code (2009) has been recently superseded by the SAMREC Code (2016) which post-dates the effective audit date of 31 March 2016. As such the Mineral Resource and Ore Reserve Statements (the "Statements") for KCM have not been re-assessed in accordance with updated code. The effective date of the audits are 31 March 2016, as such all consultants confirm that they have not reviewed any additional technical information subsequent to this effective date whether with respect to material changes or otherwise.

The Offering Circular references various production expansion projections currently proposed by the Company, and in addition, associated capital expenditures. The Ore Reserve audits as completed by SRK UK or all consultants have been assessed in the context of current production levels and as such any expansion or associated capital expenditures have not been audited by all consultants.

All Mineral Resources and Ore Reserves are reported on a 100% basis and as such do not reflect the quantum which would be attributable to the Company based on its equity interest. This Offering Circular includes technical information, which requires subsequent calculations to derive subtotals, totals and weighted averages. Such calculations may involve a degree of rounding and consequently introduce a margin of error. Where such errors occur, the Company does not consider them to be material.

The SAMREC Code (2016) and the JORC Code (2012) specifies that reporting of Mineral Resources and Ore Reserves must be accompanied by additional supplemental information as stipulated by Table 1 of the JORC Code (2012). The Company intends, at a later date, to include a summary of the appropriate supplemental information on the Company's website to ensure full compliance with the releant reporting Codes.

In the second stage, the "Ore Reserve" is defined. An "Ore Reserve" is the economically mineable part of a Measured and/or Indicated Mineral Resource. It includes diluting materials and allowances for losses which may occur when the material is mined. Appropriate assessments and studies have been carried out, and include consideration of and modification by realistically assumed

mining, metallurgical, economic, marketing, legal, environmental, social and governmental factors. These assessments demonstrate that at the time of reporting that extraction could reasonably be justified. Ore Reserves are sub-divided in order of increasing confidence into Probable Ore Reserves and Proved Ore Reserves.

Although the Company provides certain life of mine estimates on the basis of Ore Reserves and Mineral Resources, investors are cautioned to use the life of mine estimates based solely on Ore Reserves in Annex A — "Life of Mines" as the base case for any assessment of the life of a mine.

SRK SA noted that the geological information at Rampura Agucha, Sindesar Khurd, Rajpura Dariba and Kayad is modelled using commercial geological modelling software and the information at the Zawar Group mines is modelled using a combination of geological modelling software and on paper based sections.

SRK SA noted that the geological information at the Konkola copper mine is modelled using the GEMS Software, the Nchanga open-pit copper mine is modelled on Datamine resource models, the Nchanga underground copper mines are modelled on block and computerised analysis (Dynamic Ore Reserves System II) and the Nampundwe underground pyrite mine is modelled manually on paper based sections.

RPA noted that the geological information at the Codli, Sonshi mines and the A. Narrain open-pit iron ore mine is modelled on Surpac Modelling Software.

In addition to the Ore Reserves, the Company has identified further mineral deposits as either extensions of or additions to its existing operations that are subject to ongoing exploration and evaluation.

# Cautionary Note to United States Investors Concerning Estimates of Measured, Indicated and Inferred Resources for Mining Operations

There are differences in reporting regimes for reserve estimates between the JORC Code (2004) and SAMREC Code on the one hand, each of which are used by Vedanta, and the United States reporting regime under the requirements as adopted by the SEC in its Industry Guide 7 — Description of Property by Issuers Engaged or to be Engaged in Significant Mining Operations ("Industry Guide 7") on the other hand. The principal difference is the absence under Industry Guide 7 of any provision for the reporting of estimates other than proved (measured) or probable (indicated) reserves. There is, therefore, no equivalent for "resources" or "Mineral Resources" under the SEC's Industry Guide 7.

The SEC has applied the following reporting definitions to reserves under Industry Guide 7:

A "reserve" is "that part of a mineral deposit which could be economically and legally extracted or produced at the time of the reserve determination. Reserves are customarily stated in terms of "ore" when dealing with metalliferous minerals; when other materials such as coal, oil, shale, tar, sands, limestones, etc. are involved, an appropriate term such as "recoverable coal" may be substituted."

"Proven (measured) reserves" are "reserves for which:

- (a) quantity is computed from dimensions revealed in outcrops, trenches, workings or drill holes; grade and/or quality are computed from the results of detailed sampling; and
- (b) the sites for inspection, sampling and measurement are spaced so closely and the geologic character is so well defined that size, shape, depth and mineral content of reserves are well-established."

"Probable (indicated) reserves" are "reserves for which quantity and grade and/or quality are computed from information similar to that used for proven (measured) reserves, but the sites for inspection, sampling, and measurement are farther apart or are otherwise less adequately spaced. The degree of assurance, although lower than that for proven (measured) reserves, is high enough to assume continuity between points of observation."

This Offering Circular, including Annex A — "Life of Mines", uses the term "resources", which are comprised of "measured," "indicated" and "inferred" Mineral Resources. United States investors are advised that while such terms are recognised by some investors, the SEC does not recognise them. "Inferred" Mineral Resources have a great amount of uncertainty as to their existence and great uncertainty as to their economic and legal feasibility. It cannot be assumed that all or any part of an "inferred" Mineral Resource will ever be upgraded to a higher category. Under SEC rules, estimates of "inferred" Mineral Resources may not form the basis of feasibility or other economic studies. Investors should not assume that all or any part of "measured" or "indicated" resources will ever be converted into Ore Reserves. Investors are also cautioned not to assume that all or any part of an "inferred" Mineral Resource exists or is economically or legally mineable.

# UNITED STATES INVESTORS ARE ADVISED THAT THE REPORTING OF MINERAL RESOURCES IN THIS OFFERING CIRCULAR IS ACCORDINGLY NOT COMPLIANT WITH INDUSTRY GUIDE 7.

#### Oil, Condensate and Sales-Gas Reserves

Estimates of Proved, Probable, and Possible reserves and Contingent resources of Cairn India have been prepared according to the Petroleum Resources Management System ("PRMS") approved in March 2007 by the Society of Petroleum Engineers, the World Petroleum Council, the American Association of Petroleum Geologists, and the Society of Petroleum Evaluation Engineers. The PRMS standard is a referenced standard in published guidance notes of the London Stock Exchange. The Proved, Probable, and Possible oil, condensate, and sales gas Reserves and the Contingent Resources were independently estimated by DeGolyer and MacNaughton as of 31 March 2016.

The Contingent Resources estimated herein are those volumes of oil or gas that are potentially recoverable from known accumulations but which are not currently considered to be commercially recoverable because development is either pending or is under evaluation or is currently not considered viable under existing technical/commercial conditions. Because of the uncertainty of commerciality and the lack of sufficient exploration drilling, the Resources estimated herein cannot be classified as Reserves. The Resources estimates herein are provided as a means of comparison to other resources and do not provide a means of direct comparison to Reserves.

The Company retained DeGolyer and MacNaughton to conduct independent reviews of the Proved, Probable, and Possible oil, condensate, and sales-gas Reserves and the Contingent Resources as of 31 March 2016.

#### Reserves and Production

In this Offering Circular, unless expressly stated otherwise, references to reserves and production are to total reserves and total production, respectively. For example, total Ore Reserves and total production mean that part of the Ore Reserves from a mine and that part of the production at mines and operations, respectively, that subsidiaries of the Company have an interest in or rights to. The Company does not wholly own certain of its subsidiaries and therefore total reserves and total production include reserves and production, respectively, attributable to third-party interests in controlled subsidiaries. Rounding adjustments have been made in calculating some of the reserves and production information included in this Offering Circular. As a result, numerical figures shown as totals in some tables may not be exact arithmetic aggregations of the figures that precede them.

# Cautionary Note to United States Investors Concerning Estimates of Measured, Indicated and Inferred Resources for Oil and Gas Programmes

There are principal differences between the reporting regimes under the PRMS approved in March 2007 by the Society of Petroleum Engineers, the World Petroleum Council, the American Association of Petroleum Geologists, and the Society of Petroleum Evaluation and in the United States under the requirements as adopted by the SEC in its Industry Guide 4 — Prospectus Relating to Interests in Oil and Gas Programmes and Subpart 1200 of Regulation S-K (together "Industry Guide 4").

Evaluations of oil and gas reserves involve various uncertainties and require exploration and production companies to make extensive judgments as to future events based upon the information available. The crude oil and natural gas reserves data are estimates based primarily on internal technical analyses using standard industry practices. Such estimates reflect Vedanta's best judgment at the time of their preparation, based on geological and geophysical analyses and appraisal work (which are dynamic processes), and may differ from previous estimates. Reserves estimates are subject to various uncertainties, including those relating to the physical characteristics of crude oil and natural gas fields. These physical characteristics are difficult to estimate and, as a result, actual production may be materially different from current estimates of reserves. Factors affecting Vedanta's reserve estimates include: the outcome of new production or drilling activities; assumptions regarding future performance of wells and surface facilities; the results of field reviews; an ability to acquire new reserves from discoveries or extensions of existing fields; an ability to apply improved recovery techniques; and changed economic conditions.

UNITED STATES INVESTORS ARE ADVISED THAT THE REPORTING REGIMES USED IN THIS OFFERING CIRCULAR ARE ACCORDINGLY NOT COMPLIANT WITH INDUSTRY GUIDE 4.

#### **SUMMARY**

This summary highlights information contained elsewhere in this Offering Circular and does not contain all of the information that you should consider before investing in the Bonds. You should read this entire document, including "Risk Factors" and the financial statements included elsewhere in this Offering Circular, before making an investment decision. This Offering Circular includes forward-looking statements that involve risks and uncertainties. See "Forward-Looking Statements" for further information.

#### **Business Overview**

Vedanta is an LSE-listed globally diversified metals and mining, oil and gas and power generation company. Its businesses are principally located in India, one of the fastest growing large economies in the world with a 7.6% increase in real GDP from the fiscal year 2015 to fiscal year 2016, according to the Central Statistical Organization of the GoI's Ministry of Statistics and Programme Implementation. In addition, Vedanta has assets and operations in jurisdictions such as Zambia, Namibia, South Africa and Fujariah and a workforce of 70,000 people worldwide. Vedanta is primarily engaged in oil and gas, zinc, copper, iron ore, aluminium and commercial power generation businesses and is also developing port operation businesses and infrastructure assets. Vedanta has experienced significant growth in recent years through the ramp up of expansion projects for its oil and gas, copper, zinc, aluminium and iron ore businesses. Vedanta believes its experience in operating and expanding its businesses in India will allow it to capitalise on attractive growth opportunities arising from India's large mineral reserves, relatively low cost of operations and large and inexpensive labour and talent pools.

For fiscal years 2014, 2015 and 2016, Vedanta reported total revenue of \$12,945.0 million, \$12,878.7 million and \$10,737.9 million, respectively, and Vedanta EBITDA of \$4,491.2 million, \$3,741.2 million and \$2,336.4 million, respectively. For the six months ended 30 September 2015 and 2016, Vedanta reported total revenue of \$5,699.3 million and \$4,867.8 million, respectively, and EBITDA of \$1,285.7 million and \$1,233.1 million, respectively.

#### **Competitive Strengths**

Vedanta believes it has the following strengths:

- Large, low cost and diversified asset base.
- Attractive commodity mix.
- Ideally positioned to capitalise on India's growth and natural resource potential.
- Well-invested assets driving cash flow growth.
- Strong financial profile.
- Proven track record

#### **Strategy**

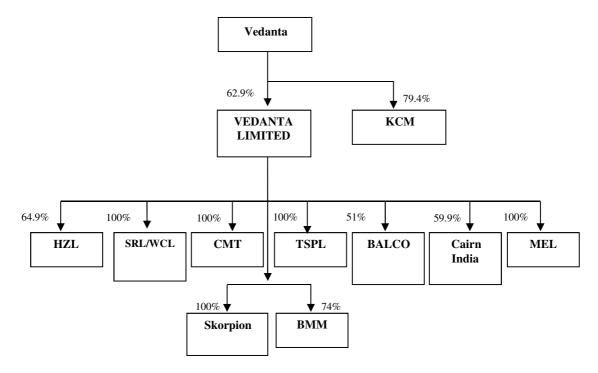
Vedanta has the following key strategic priorities:

- Production growth and asset optimization.
- De-leveraging the balance sheet.
- Simplifying Vedanta structure.

- Creating sustainable value for all stakeholders.
- Identifying next generation resources.

#### Corporate Structure

The following corporate structure shows the subsidiaries of the Company as of 30 September 2016.



# About the Company

The Company was incorporated and registered in England and Wales as a private company limited by shares under the name Angelchange Limited on 22 April 2003 and with registered number 04740415. On 26 June 2003, the Company changed its name to Vedanta Resources Limited. On 20 November 2003, the Company re-registered as a public limited company under the United Kingdom Companies Act 1985 and changed its name to Vedanta Resources plc. The principal legislation under which the Company operates is the Companies Act, 2006 (the "Companies Act").

The registered office of the Company is 5th floor, 6 st Andrew street, London, EC4A 3AE. The head office of the Company is at 16 Berkeley Street, Mayfair, London W1J 8DZ, telephone number +44 (020) 7499-5900. The Company's website address is www.vedantaresources.com. Information on the Company's website does not constitute a part of this Offering Circular.

#### Recent developments

#### Ratings Upgrade

On January 16, 2017, Standard & Poor's raised its foreign currency long-term corporate credit rating on Vedanta to 'B+' from 'B'; the outlook is stable. Standard & Poor's also raised its long-term issue ratings on Vedanta's issued notes (which includes Vedanta's outstanding 2018 Bonds and 2019 Bonds), guaranteed notes and loans to 'B+' from 'B'.

#### Production Release for the three months and nine months ended 31 December 2016

On 16 January 2017, Vedanta announced its unaudited production results for the three months and nine months ended 31 December 2016. The following table presents a summary of the production results for the periods presented. You should read the following information in conjunction with the detailed production release included in Annex D in this Offering Circular.

# **Production Summary (Unaudited)**

(In '000 tonnes, except as stated)

		onths perio		Three months period ended 30 September 2016		Nine months pe		riod
Particulars	FY 2017	FY 2016	% Change YoY	FY 2016	% Change	FY 2017	FY 2016	% Change YoY
	<u>F1 2017</u>	F 1 2010		<u>F1 2010</u>	QoQ	F1 2017	F 1 2010	
OIL AND GAS								
Average Daily Total Gross  Operated Production (boepd) 1	191,230	211,843	(10)%	206,230	(7)%	201,286	214,663	(6)%
Average Daily Gross Operated	171,230	211,043	(10) %	200,230	(1)10	201,200	214,003	(0) /6
Production (boepd)	181,818	202,668	(10)%	196,399	(7)%	191,674	205,909	(7)%
Rajasthan	154,272	170,444	(9)%	167,699	(8)%	162,957	170,258	(4)%
Ravva	18,172	21,703	(16)%	18,823	(3)%	18,874	25,430	(26)%
Cambay	9,375	10,521	(11)%	9,877	(5)%	9,843	10,221	(4)%
Average Daily Working								
Interest Production (boepd).	115,829	128,402	(10)%	125,575	(8)%	122,254	128,991	(5)%
Rajasthan	107,990	119,311	(9)%	117,390	(8)%	114,070	119,180	(4)%
Ravva	4,089	4,883	(16)%	4,235	(3)%	4,247	5,722	(26)%
Cambay	3,750	4,208	(11)%	3,951	(5)%	3,937	4,089	(4)%
Total Oil and Gas (million boe)					_			
Oil & Gas- Gross	16.73	18.65	(10)%	18.07	(7)%	52.71	56.62	(7)%
Oil & Gas-Working Interest	10.66	11.81	(10)%	11.55	(8)%	33.62	35.47	(5)%
Zinc India								
Mined metal content	276	228	21%	192	44%	595	700	(15)%
Refined Zinc — Total	205	206	0%	150	37%	457	605	(24)%
Refined Zinc — Integrated	205	206	0%	149	38%	456	605	(25)%
Refined Zinc — Custom	_	_	0%	1	_	1	_	0%
Refined Lead - Total <sup>2</sup>	39	35	10%	31	26%	94	107	(12)%
Refined Lead — Integrated	39	35	10%	31	26%	94	102	(8)%
Refined Lead — Custom	_	_	0%	_	_	_	5	(100)%
Silver - Total (in mn ounces) <sup>3</sup> .	3.8	3.7	2%	3.5	10%	10.1	9.7	4%
Silver- Integrated (in mn								
ounces)	3.8	3.7	2%	3.5	10%	10.1	9.6	5%
Silver- Custom (in mn ounces)	_	_	0%	_	_	_	0.1	(100)%
Zinc International	33	51	(35)%	39	(17)%	115	184	(38)%
Zinc -Refined —Skorpion	17	13	34%	23	(25)%	64	55	15%
Mined metal content - BMM	15	17	(11)%	16	(5)%	51	48	5%
Mined metal content — Lisheen.	_	21	_	_	_	_	81	_
IRON ORE (in million dry metric tonnes, or as stated)								
Sales	3.7	1.5	_	0.8	_	7.1	2.7	_
Goa	2.7	0.6	_	0.3	_	5.1	0.6	_
Karnataka	1.0	0.9	4%	0.5	_	2.0	2.1	(6)%
Production of Saleable Ore	2.6	1.4	_	1.5	_	7.3	2.4	_
Goa	2.3	0.3	_	0.5	_	5.2	0.3	_
Karnataka	0.4	1.1	(66)%	0.9	(60)%	2.1	2.1	3%
Pig Iron	154	146	5%	192	(20)%	526	466	13%
COPPER — India								
Copper - Cathodes	102	89	15%	97	5%	300	282	6%
Tuticorin Power Plant Sales (MU)	46	40	15%	30	55%	136	334	(59)%

		onths perio December 2		period ended 30 September 2016		Nine months pe		eriod
Particulars	FY 2017	FY 2016	% Change YoY	FY 2016	% Change QoQ	FY 2017	FY 2016	% Change YoY
COPPER — ZAMBIA								
Mined metal	21	32	(33)%	29	(27)%	79	94	(16)%
Copper — Total	37	45	(18)%	47	(20)%	130	136	(5)%
Integrated	21	28	(25)%	28	(23)%	77	89	(14)%
Custom	16	17	(7)%	19	(16)%	53	47	11%
ALUMINUM								
Alumina-Lanjigarh	328	218	50%	292	12%	895	760	18%
Total Aluminum Production	319	234	37%	296	8%	860	698	23%
Jharsuguda-I	132	131	1%	132	0%	393	392	0%
Jharsuguda-II <sup>4</sup>	84	19	_	48	75%	161	57	_
Korba-I	65	65	0%	63	3%	192	192	0%
Korba-II <sup>5</sup>	38	19	102%	52	-27%	115	56	106%
Balco 270 MW Power Sales (MU)	_	41	(100)%	_		_	169	(100)%
Jhasrsuguda 1800 MW (Power Sales MU)	_	_	0%	156	-100%	511	_	0%
POWER (in million units)								
Total Power Sales	3,412	2,146	59%	3030	9%	9453	5780	64%
Jharsuguda 2400 MW	879	1,593	9%	605	45%	2,376	5,413	(4)%
TSPL	1,792	839	_	1,679	0%	4,743	1922	147%
Balco 600 MW	660	368	79%	549	20%	1,817	526	_
MALCO	29	26	12%	25	15%	144	345	(58)%
HZL Wind Power	53	67	(22)%	172	(69)%	373	353	6%
TSPL — availability	77%	85%	_	77%	_	76%	77%	_
Ports — VGCB (in million tonnes) <sup>6</sup>								
Cargo Discharge	0.6	1.8	(65)%	1.3	(49)%	3.5	5.5	(36)%
Cargo Dispatches	0.7	1.9	(65)%	1.5	(56)%	3.6	5.7	(36)%

Three months

# 6. Vizag General Cargo Berth

<sup>1.</sup> Including Internal Gas consumption

<sup>2.</sup> Excluding Captive consumption of 1,731 tonnes in Q3 FY2017 vs 2,051 tonnes in Q3 FY2016, 837 tonnes in Q2 FY2017 and 3,652 tonnes in nine months period FY2017 vs. 5,749 tonnes in nine months period FY2016

<sup>3.</sup> Excluding captive consumption of 463,000 ounces in Q3 FY2017 vs. 344,000 ounces in Q3 FY2016, 139,000 ounces in Q2 FY2017 and 602,000 ounces in nine months period FY 2017 vs. 956,000 ounces in nine months period FY 2016

<sup>4.</sup> Including trial run production of 36 kt in Q3 FY2017, 12 kt in Q3 FY2016, 19 kt in Q2 FY2017, 67 kt in nine months ended FY2017 vs 51 kt in in nine months ended FY 2016

<sup>5.</sup> Including trial run production of 270t in Q3 FY2017, Nil in Q3 FY2016, 28 kt in nine months ended FY2017 vs Nil kt in in nine months ended FY2016

# SUMMARY OF THE OFFERING

The following is a general summary and should not be relied on as a complete description of the Terms and Conditions of the Bonds (the "Conditions"). This summary is derived from, and should be read in conjunction with, the full text of the Conditions and the Trust Deed constituting the Bonds, which prevail to the extent of any inconsistency with the terms set out in this summary. Capitalised terms used herein and not otherwise defined have the respective meanings given to such terms in the relevant Conditions.

Issuer	Vedanta Resources plc.
Issue	\$1,000,000,000 6.375% Bonds due 2022.
Maturity Date	The Bonds will mature on 30 July 2022.
Issue Price	The Bonds will be issued at 100% of their principal amount, plus accrued interest, if any, on the Closing Date.
Interest and Payment Dates	The Bonds will bear interest at the rate of 6.375% per annum. The Bonds will bear interest on and from the Closing Date, payable semi-annually in arrear on January 30 and July 30 of each year, commencing 30 July 2017.
Status of the Bonds	The Bonds constitute senior, unsubordinated, direct, unconditional and (subject to Condition 3(a)) unsecured obligations of the Company and shall at all times rank pari passu and without any preference among themselves. The payment obligations of the Company under the Bonds shall, save for such exceptions as may be provided by applicable legislation and subject to Condition 3(a), at all times rank at least equally with all of its other present and future unsecured and unsubordinated obligations. The Bonds will be structurally subordinated to claims of holders of debt securities and other creditors of subsidiaries of the Company. See "Risk Factors — Risks Relating to the Bonds — The Bonds will be structurally subordinated to the debt issued by the Company's subsidiaries".
Use of Proceeds	The net proceeds from this offering, after deduction of underwriting fees, discounts and commissions and other estimated expenses associated with this offering, are expected to be approximately \$989.0 million. The Company intends to use the net proceeds from this offering primarily to fund the Company's Tender Offers for any and all of its outstanding 2018 Bonds and 2019 Bonds, and to repay other existing indebtedness of the Company. In the event the Tender Offers are not completed for any reason, the Company intends to use the net proceeds from this offering primarily to repay existing debt. The net proceeds from this offering shall be used in accordance with applicable law. See "Use of Proceeds" for further details.
Tender Offers	Concurrently with this offering, Vedanta is conducting conditional Tender Offers for any and all of its outstanding 2018 Bonds and 2019 Bonds. The Tender Offers are conditional upon the closing of this offering.

Optional Redemption	The Bonds may be redeemed at the option of the Company at any time, in whole, but not in part, at a redemption price equal to the principal amount of the Bonds plus the Applicable Premium (as defined in the Conditions) applicable to the Bonds, plus accrued and unpaid interest, if any, to, the redemption date.
Repurchase of Bonds upon a Change of Control Triggering Event	Upon the occurrence of a Change of Control Triggering Event (as defined in the Conditions), the Company must make an offer to purchase all of the Bonds outstanding at a purchase price equal to 101% of their principal amount plus accrued and unpaid interest, if any, to the purchase date.
Redemption for Taxation	The Bonds may be redeemed at the option of the Company at any time in whole, but not in part, at a redemption price equal to the principal amount of the Bonds, together with accrued and unpaid interest, if any, to the redemption date in the event of certain changes affecting taxes of the United Kingdom.
Covenants	The Company has agreed to comply with certain covenants limiting its ability and the ability of certain of its subsidiaries to, among other things, create any security interests over assets, create any restrictions on the ability of certain subsidiaries to pay dividends, incur additional borrowings, distribute proceeds from certain asset sales or sell its ownership interest in certain subsidiaries and has agreed to certain other covenants. See "Terms and Conditions of the Bonds — Covenants".
	These covenants are subject to important exceptions and qualifications. In addition, the Company and certain of its subsidiaries will not be subject to certain covenants which limit their ability to incur additional borrowings and distribute proceeds from certain asset sales, at any time after the Bonds achieve investment grade ratings from any two of Moody's, Standard & Poor's and Fitch. See "Terms and Conditions of the Bonds — Covenant Suspension".
Selling Restrictions	There are restrictions on the offer, sale and/or transfer of the Bonds in certain jurisdictions. For a description of the selling restrictions on offers, sales and transfers of the Bonds, see "Plan of Distribution" and "Transfer Restrictions".
Form and Denomination of the Bonds	The Bonds will be issued in registered form in the denomination of \$200,000 each and in integral multiples of \$1,000 in excess thereof. Upon issue, the Regulation S Bonds will be represented by the Unrestricted Global Certificate and the Rule 144A Bonds will be represented by the Restricted Global Certificate, each in registered form. On the Closing Date, the Unrestricted Global Certificate will be deposited with a custodian for, and registered in the name of Cede &

Cede & Co., as nominee of DTC.

Co., as nominee of DTC for the accounts of Euroclear and Clearstream and the Restricted Global Certificate will be deposited with a custodian for, and registered in the name of

Listing	The Company intends to apply for the listing of the Bonds on the SGX-ST. The Bonds will trade on the SGX-ST in a minimum board lot size of \$200,000 so long as any of the Bonds remain listed on the SGX-ST. The SGX-ST assumes no responsibility for the correctness of any of the statements made, opinions expressed or information contained in this Offering Circular. Admission of the Bonds to the official list of the SGX-ST is not to be taken as an indication of the merits of the offering, the Company or the Bonds.
Further Issues	The Company may from time to time, without the consent of the Bondholders, create and issue further securities either having the same terms and conditions as the Bonds in all respects (or in all respects except for the first payment of interest on them) so that such further issue shall be consolidated and form a single series with the Bonds or upon such terms as the Company may determine at the time of their issue. See "Terms and Conditions of the Bonds — Further Issues".
Governing Law	The Bonds and the Trust Deed, and all non-contractual matters arising from or connected with the Bonds and the Trust Deed, will be governed by and construed in accordance with English law.
Trustee	Citicorp International Limited.
Principal Paying Agent	Citibank, N.A., London Branch.
Registrar and Transfer Agent	Citigroup Global Markets Deutschland AG.
Global Certificates	For as long as the Dands are represented by the Clabel
	For as long as the Bonds are represented by the Global Certificates, payments of principal and interest in respect of the Bonds will be made without presentation or if no further payment is made in respect of the Bonds against presentation and surrender of the Global Certificates to or to the order of the Principal Agent (as defined below) for such purpose. While the Bonds are represented by the Global Certificates, they will be transferable only in accordance with the rules and procedures for the time being of the relevant clearing system. Except as described herein, individual certificates will not be issued in exchange for interests in the Global Certificates.
Rating of the Bonds	Certificates, payments of principal and interest in respect of the Bonds will be made without presentation or if no further payment is made in respect of the Bonds against presentation and surrender of the Global Certificates to or to the order of the Principal Agent (as defined below) for such purpose. While the Bonds are represented by the Global Certificates, they will be transferable only in accordance with the rules and procedures for the time being of the relevant clearing system. Except as described herein, individual certificates will not be

Withholding Tax..... All payments of principal and interest in respect of the Bonds shall be made free and clear of any withholding or deduction for United Kingdom withholding taxes to the extent set forth herein. See "Terms and Conditions of the Bonds — Taxation". Events of Default..... For a description of certain events that will permit the Bonds to become immediately due and payable at their principal amount, together with accrued interest, see "Terms and Conditions of the Bonds — Events of Default". Lock-up Agreement ..... Neither the Company, nor any person acting on its behalf, will, from the date of this Offering Circular until the date 30 days after the date of this Offering Circular, without the prior written consent of the Joint Global Coordinators and Joint Lead Managers and the Joint Bookrunners, issue, offer, sell, contract to sell, pledge or otherwise dispose of (or publicly announce any such issuance, offer, sale or disposal) non-equity-linked debt securities issued or guaranteed (other than guarantees in respect of Indian rupee denominated non-equity linked debt securities) by the Company and having a maturity of more than one year from the date of issue, subject to certain exceptions. See "Plan of Distribution". CUSIP..... Regulation S Bonds: G9328D AM2 Rule 144A Bonds: 92241T AK8

Prospective purchasers should refer to the section entitled "Risk Factors" for a discussion of certain risks involved in investing in the Bonds.

Regulation S Bonds: USG9328DAM23 Rule 144A Bonds: US92241TAK88

ISIN .....

# SUMMARY CONSOLIDATED FINANCIAL INFORMATION

The following tables present the summary historical consolidated financial information for the Company for the periods ended and at the dates indicated below. The summary historical consolidated financial information as of and for fiscal years ended 2015 and 2016 been derived from the audited consolidated financial statements included elsewhere in this Offering Circular. The financial information as of and for fiscal year ended 31 March 2014 has been extracted from the comparative financial information included in the audited consolidated financial statements for fiscal year ended 31 March 2015. The Company's annual consolidated financial statements have been prepared and presented in accordance with IFRS as adopted by the EU. The summary financial information as of and for the six months ended 30 September 2015 and 2016 has been derived from the unaudited condensed consolidated financial statements for the six months ended 30 September 2016 included elsewhere in this Offering Circular. The Company's unaudited condensed consolidated financial statements have been prepared in accordance with IAS 34, Interim Financial Reporting.

You should read the following information in conjunction with "Management's Discussion and Analysis of Financial Condition and Results of Operations" and the financial statements and the notes thereto included elsewhere in this Offering Circular.

The fiscal year 2014 Financial Statements are not included nor incorporated by reference herein. Certain fiscal year 2014 comparative balance sheet amounts presented in the fiscal year 2015 Financial Statements and in this "Summary Consolidated Financial Information" and the "Selected Consolidated Financial Information" were reclassified from their previous presentation in the fiscal year 2014 Financial Statements to conform with the presentation of the fiscal year 2015 financial information as follows:

The presentation of forward premium on the forward covers has been revised to finance costs from other gains and losses and the tax effect of special items has been presented separately from other tax expenses.

#### **Consolidated Income Statement**

				Six Mont	
	Fiscal y	ear Ended 31	March	30 Sept	tember
	2014	2015	2016	2015	2016
			(\$ million)		
Continuing operations					
Revenue	12,945.0	12,878.7	10,737.9	5,699.3	4867.8
Cost of sales	(10,043.2)	(10,463.9)	(9,241.1)	(4,800.7)	(3,900.0)
Gross profit	2,901.8	2,414.8	1,496.8	898.6	967.8
Other operating income	84.0	104.0	101.7	62.8	40.1
Distribution costs	(237.6)	(245.2)	(223.8)	(104.2)	(111.1)
Administrative expenses	(460.1)	(538.1)	(493.5)	(279.4)	(177.0)
Special items	(138.0)	(6,744.2)	(5,210.1)		
Operating profit/(loss)	2,150.1	(5,008.7)	(4,328.9)	577.8	719.8
Investment revenues	687.7	832.6	697.8	372.8	385.6
Finance costs	(1,439.8)	(1,387.2)	(1,280.4)	(639.1)	(652.3)
Other gains and losses (net)	(279.9)	(76.9)	(72.5)	(67.8)	(26.6)
Profit before taxation	1,118.1	(5,640.2)	(4,984.0)	243.7	426.5
Tax credit/(charge) — special items	29.4	2,205.1	1,737.4	(173.8)	_
Tax expense — others	(158.1)	(352.6)	(255.5)	(223.5)	(169.2)
$Profit/(Loss) \ for \ the \ year/period$	989.4	(3,787.7)	<u>(3,502.1)</u>	<u>(153.6)</u>	257.3
Attributable to:					
Equity holders of the parent	(196.0)	(1,798.6)	(1,837.4)	(324.5)	(64.2)
Non-controlling interests	1,185.4	(1,989.1)	(1,664.7)	170.9	321.5
Profit/(loss) for the year/period	989.4	(3,787.7)	(3,502.1)	(153.6)	<u>257.3</u>
VEDANTA EBITDA <sup>(1)</sup>	4,491.2	3,741.2	2,336.4	1,285.7	1,233.1

<sup>(1)</sup> Vedanta defines Vedanta EBITDA as profit for the year before tax expense, other gains and losses (net), finance costs, investment revenue, Special Items, and depreciation and amortisation. The Company's Vedanta EBITDA may not be comparable to similarly titled measures reported by other companies due to potential inconsistencies in the method of calculation. The Company has included its Vedanta EBITDA because the Company believes it is an indicative measure of the Company's operating performance and is used by investors and analysts to evaluate companies in the same industry. The Company's Vedanta EBITDA should be considered in addition to, and not as a substitute for, other measures of financial performance and liquidity reported in accordance with IFRS. The Company believes that the inclusion of supplementary adjustments applied in the Company's presentation of Vedanta EBITDA are appropriate because the Company believes it is a more indicative measure of the Company's baseline performance as it excludes certain charges that the Company's management considers to be outside of its core operating results. In addition, the Company's Vedanta EBITDA is among the primary indicators that the Company's management uses as a basis for planning and forecasting of future periods. The following table reconciles net income to Vedanta EBITDA.

	Fiscal year Ended 31 March			Six Montl 30 Sept	
	2014	2015	2016	2015	2016
			(\$ million)		
Profit/(loss) for the year/period	989.4	(3,787.7)	(3,502.1)	(153.6)	257.3
Adjusted for:					
Net tax expense/(credit)	128.7	(1,852.5)	(1,481.9)	397.3	169.2
Other gains & losses (net)	279.9	76.9	72.5	67.8	26.6
Finance costs	1,439.8	1,387.2	1,280.4	639.1	652.3
Investment revenues	(687.7)	(832.6)	(697.8)	(372.8)	(385.6)
Special Items*	138.0	6,744.2	5,210.1	_	_
Depreciation and amortisation	2,203.1	2,005.7	1,455.2	707.9	513.3
VEDANTA EBITDA	4,491.2	3,741.2	2,336.4	1,285.7	1,233.1

<sup>\*</sup> Special Items are defined in Note 5 to the Annual Financial Statements. Special Items include Impairment of oil & gas assets, Impairment of mining reserves and assets, Voluntary retirement schemes, Provision for receivables, Provision for investment in coal blocks, Acquisition and restructuring related costs, Provision for contractor dispute, Land regularization fees and special tax items.

# **Consolidated Balance Sheet Data**

	As of 31 March			As of 30 September		
	2014	2015	2016	2015	2016	
			(\$ million)			
Cash and cash equivalents	369.4	353.7	428.3	382.3	372.4	
Liquid investments	8,568.5	7,856.1	8,508.2	8,534.4	7,794.9	
Total assets	45,374.3	36,988.9	30,319.3	36,407.4	29,965.7	
Short-term borrowings	(2,437.0)	(3,179.2)	(3,726.6)	(4,113.0)	(4,303.2)	
Medium and long-term borrowings	(12,512.7)	(12,385.6)	(11,949.5)	(11,220.6)	(12,022.4)	
Convertible bonds*	(1,921.5)	(1,103.0)	(587.2)	(1,117.3)	(7.7)	
Total equity	17,974.8	12,257.4	6,852.4	11,143.2	6,952.9	

<sup>\*</sup> Includes the current and non-current portion.

#### Consolidated Cash Flow Data

	Fiscal year Ended 31 March			Six Months Ended 30 September	
	2014	2015	2016	2015	2016
			(\$ million)		
Net cash from operating activities	3,361.0	2,505.8	2,401.7	1,741.0	222.5
Net cash from/(used in) investing					
activities	(5,014.8)	(1,591.7)	(1,862.3)	(1,462.0)	335.9
Net cash (used in) financing activities.	(47.9)	(928.0)	(446.8)	(242.5)	(591.2)
Purchases of property, plant and					
equipment and intangibles	(2,185.3)	(2,289.1)	(872.4)	(553.1)	(504.4)

#### RISK FACTORS

This Offering Circular contains forward-looking statements that involve risks and uncertainties. Vedanta's actual results could differ materially from those anticipated in these forward-looking statements as a result of a number of factors, including those described in the following risk factors and elsewhere in this Offering Circular. You should consider the following risk factors carefully in evaluating Vedanta and its business before investing in the Bonds. If any of the following risks actually occur, Vedanta's business, financial condition and results of operations could suffer, the trading price of the Bonds could decline and you may lose all or part of your investment.

#### Risks Relating to Business

Commodity prices and the copper treatment and refinery charges or TcRc may be volatile, which may have a material adverse effect on Vedanta's revenue, results of operations and financial condition.

Historically, the international commodity prices for oil and gas, zinc, copper, iron ore and aluminium, and the prevailing market TcRc rate for copper have been volatile and subject to wide fluctuations in response to relatively minor changes in the supply of, and demand for, such commodities, market uncertainties, the overall performance of world or regional economies, the related cyclicality in industries Vedanta directly serves and a variety of other factors beyond the control of Vedanta. Commodity prices and the market TcRc rate for copper may continue to be volatile and subject to wide fluctuations in the future for a variety of reasons.

For example, between 31 March 2015 and 31 March 2016, the average LME prices of zinc, copper, lead, silver, dated Brent and aluminium decreased by 15.9%, 20.5%, 12.5%, 16.0%, 44.3% and 15.9% respectively. Historically, international prices for crude oil and natural gas have fluctuated as a result of many macro-economic, geo-political and regional factors. Crude price has declined significantly during the year and substantial or extended declines in international crude oil and gas prices could have an adverse effect on the economics of existing and proposed projects, capex outlay, results of operations and financial condition.

The units of power generated by Vedanta's commercial power generation business are also subject to price volatility. A decline in the prices Vedanta receives for its oil, gas, zinc lead, copper, iron ores or aluminium, or for its power, or in the market TcRc rate for copper would adversely affect Vedanta's revenue and results of operations, and a sustained drop would have a material adverse effect on its revenue, results of operations and financial condition.

Similarly, for the portion of Vedanta's alumina requirements sourced internally, Vedanta's profitability is dependent upon the LME price of aluminium, less the cost of production, which includes the cost of mining bauxite, the refining of bauxite into alumina, transportation of bauxite and alumina and smelting of alumina into aluminium. Further, the units of power generated by Vedanta's commercial power generation business are also subject to price volatility.

The crude oil produced at Block RJ-ON-90/1 (the "Rajasthan Block") is benchmarked to Bonny Light, an international low sulphur crude oil published in Platt's Crude Oil Market Wire on a daily basis. The pricing formula also adjusts for differences in yield and quality.

The implied price realization of crude oil generally lies between 8% to 13% discount to Dated Brent for Rajasthan and 3% to 6% to Dated Brent for Cambay, due to the prevailing oil market conditions. Movements in discount affect Vedanta's revenue realization and any increase in quality differentials may adversely impact Vedanta's revenues and profits.

Vedanta's businesses currently depend upon third party suppliers for a substantial portion of its raw material requirements and their segment results and segment margins depend upon the market prices for such raw materials.

Vedanta sources a majority of its copper concentrate and a substantial proportion of its alumina requirements for its copper and aluminium businesses, respectively and from third parties. For example, in fiscal year 2016, Vedanta sourced approximately 100% of its copper concentrate and 47.5% as of 31 March 2016 of its alumina requirements from third parties. For the portion of Vedanta's aluminium business where the required alumina is sourced internally, profitability is dependent upon the LME price of aluminium less the cost of production, which includes the costs of bauxite mining at BALCO's mines, the refining of bauxite into alumina at Vedanta Limited's refinery and the smelting of alumina into aluminium. For the portion of Vedanta's alumina requirements sourced from third parties, its profitability is dependent upon the LME price of aluminium, less the cost of the sourced alumina and the cost of smelting. During fiscal year 2016, 47% of BALCO's alumina requirement and 47.5% of Vedanta Limited's alumina requirement came from third parties.

As a result, Vedanta EBITDA and segment margins of Vedanta's copper and aluminium businesses depend upon its ability to obtain the required copper concentrate and alumina at prices that are low relative to the market prices of the copper and aluminium products that it sells. The market prices of the copper concentrate and alumina that Vedanta purchases from third parties and the market prices of the copper and aluminium metals that it sells have experienced volatility in the past, and any increases in the market price of the raw material relative to the market prices of the metal that Vedanta sells would adversely affect the segment results and segment margins of Vedanta's copper and aluminium businesses, which could have a material and adverse effect on its business, financial condition, results of operations and prospects.

Vedanta Limited is operating its Sonshi iron ore mine that is leased by the state of Goa to third parties through an ore raising arrangement. Under the contract, Vedanta Limited, as a contractor, is responsible for extracting the ore, which it then purchases back from the relevant third party owners. During fiscal year 2016, approximately 0.2 mmt of Vedanta's crude iron ore production (or approximately 3.9% of its iron ore production) was derived from its operation of third party mines. As part of Vedanta's contract arrangements, it generally pays such third party owners a purchase price per tonne of iron ore, which is linked to the market price of iron ore. This contract expired on 31 March 2015 and was renewed for period of two years. However, there is no assurance that the third party mine owners will further renew the contract on the same or otherwise favorable terms, or at all. There is also no assurance that, where such mine is owned by a third party under a lease, the third party will apply for a renewal of such lease in a timely fashion prior to its expiry, or be successful in obtaining such renewals. Any failure to renew material contracts or significant increases in royalty payments may adversely affect Vedanta's business, financial condition, results of operations and prospects.

The primary raw material for Vedanta's commercial power operations is coal, which is subject to the Government of India's (the "GoI") coal allocation policies. Vedanta also relies on imported sources to meet part of its coal requirements.

In Vedanta's oil and gas business, it had infrastructure and oil sales agreements with the GoI nominated public sector refineries and domestic private sector refineries for expected levels of crude oil production from the Rajasthan block until March 2017. Stoppage of off-take or supply could result if the buyers fail to take delivery of volumes anticipated by these sales agreements. Additionally, two buyers accounted for 78.2% of the total sales of the Oil and gas business in the financial year ended 31 March 2016 and any unforeseen disruption at these buyer's facilities would affect sales volume and therefore revenue generation. Further, Vedanta is subject to the risk of delayed off takes or payment for delivered production volumes or counterparty default. Any of these could have an adverse impact on the crude oil sales and cash flows.

Further, in common with many exploration and production companies, Vedanta and the operators of assets often contract or lease services and equipment from third party providers. Such services and equipment can be scarce and may not be readily available at the times and places required. In addition, the costs of third party services and equipment have increased significantly over recent years and may continue to rise. Scarcity of services and equipment and increased prices may in particular result from any significant increase in regional exploration and development activities, which in turn may be the consequence of increased or continued high hydrocarbon or mineral prices. The scarcity of such services and equipment, as well as their potentially high costs, could delay, restrict or lower the profitability and viability of projects which may have a material adverse effect on Vedanta's businesses, prospects, financial condition or results of operations.

Vedanta's iron ore business is largely dependent on export sales of iron ore to China. As a result, any downturn in the rate of economic growth in China or negative changes in international relations between India and China or negative changes in Chinese regulatory or trade policies relating to the import of iron ore, could have a material adverse effect on its results of operations and financial condition.

Vedanta's iron ore business is largely dependent on export sales of iron ore to China. For instance in fiscal year 2016, 81.3% of sales to external customers for Goa was from exports to customers in China. As a result, the performance and growth of Vedanta's iron ore business is necessarily dependent on the health of the Chinese economy, which may be materially and adversely affected by political instability or regional conflicts, economic slowdown elsewhere in the world or otherwise. In addition, any worsening of international relations between India and China, any negative changes in Chinese regulatory or trade policies relating to the import of iron ore or other limitations, restrictions or negative changes in Vedanta's ability to export iron ore to China, could have a material adverse effect on its business, financial condition, results of operations and prospects.

# Implementation of the Cairn India Merger is conditional upon the receipt (or waiver, where applicable) of various third party approvals which may not be forthcoming.

Although the shareholders of Vedanta Limited, Cairn India and Vedanta and the secured and unsecured creditors of Vedanta Limited have approved the Scheme of Arrangement with requisite majority, the Cairn India Merger remains subject to the Scheme of Arrangement receiving sanctions from the National Company Law Tribunal or NCLT and other regulatory approvals. The consent of the MoPNG and RBI are also required to implement the Cairn India Merger. In September 2015, Vedanta Limited and Cairn India each received a "no-objection" letter from the Bombay Stock Exchange ("BSE") and a "no adverse observation" letter from the NSE. The merger may trigger a repayment event under certain facilities at TSMHL, if no waiver is received. The authorities from which these clearances are being sought have discretion in administering the governing legislation. There can be no assurance that all such consents and approvals will be obtained (or waived, if applicable) or that, if obtained, they will be obtained so as to enable the Cairn India Merger to be completed in the first quarter of fiscal year 2017.

There is no certainty that the PSC relating to Vedanta's group company, Cairn India's participating interest in the Rajasthan Block will be renewed or that any renewal will be on favourable terms, which could have a material adverse effect on Vedanta's businesses, operating results or financial condition.

Cairn India has a 70% participating interest in the Rajasthan Block as of 30 September 2016. The related PSC between the GoI and a consortium consisting of ONGC, Shell India Production Development B.V. ("SIPD") and Cairn India in relation to the Rajasthan Block (the "Rajasthan Block PSC") is due to expire in May 2020.

Consistent with the terms of the PSC, Cairn India has been requesting an extension of the tenure of the Rajasthan Block PSC for a period of up to ten years, i.e., until May 2030. ONGC, Cairn India's joint venture partner in the Rajasthan Block, is technically aligned on the recoverable resources

potential of the Rajasthan Block beyond the PSC period, until the proposed extension period up to 2030. Cairn India has been making regular requests to MoPNG for the extension of the tenure of the Rajasthan Block PSC for the past few years. However, apart from seeking further technical and financial details, the MoPNG has not yet made a final decision in the matter. Cairn India has approached the High Court of Delhi against MoPNG's delay in making their decision on extending Cairn India's tenure of the Rajasthan Block PSC. See Business — Litigation "Writ petition filed in the Delhi High Court by Cairn India Limited relating to extension of tenure of the Production Sharing Contract for the Rajasthan block" for further information. Whilst Vedanta is in continuous dialogue with the GoI and relevant stakeholders, challenges in extending the PSC beyond 2020, or an extension on less favourable terms, could have a material adverse effect on Vedanta's businesses, operating results, financial condition and/or prospects.

Cairn India's PSCs do not permit it to export crude oil, which could restrict its ability to monetise its reserves, and the sale of crude oil by Cairn India is subject to risks that arise from various arrangements with third parties which could have a material adverse effect on Vedanta's and Cairn India's business, operating results or financial condition.

The majority of Cairn India's oil and gas production is sourced from its interests in a limited number of PSCs or concessions. Problems in any one PSC or concession could have a material adverse impact upon Vedanta's businesses and financial condition. More particularly, under the terms of Cairn India's PSCs, it is obliged to sell its entitlement to crude oil in the domestic market until such time as the total availability of the crude oil and condensate from all domestic petroleum production activities meets the total national demand and India achieves self sufficiency. There is currently a mismatch between the demand and the supply for crude oil in India, with the demand outweighing the domestic production of crude oil, and this mismatch is expected to continue in the long term. However, to the extent Cairn India's Indian blocks yield crude oil that is not suitable for processing by refineries in India, it may be difficult to monetize such domestic crude oil reserves and this could have a material adverse effect on the Vedanta's respective businesses, prospects, financial condition or results of operations. Cairn India's application for exporting crude oil was denied by the GoI and Cairn India challenged this decision before the High Court of Delhi, which is still pending in appeal before the division bench of the High Court of Delhi. See Business — Litigation — Writ petition filed in the Delhi High Court by Cairn India Limited relating to export of crude oil from the Rajasthan Block" for further information.

Similarly, Cairn India has infrastructure and oil sales agreements with GoI nominated public sector refineries and domestic private sector refineries for expected levels of crude oil production from the Rajasthan Block until March 2017. Vedanta is subject to the risk of delayed off-takes or payment for delivered production volumes or counterparty default. Stoppage of off-take or supply could result if the buyers fail to take delivery of volumes anticipated by these sales agreements. Additionally, two buyers accounted for approximately 78.2% of the total sales of the Oil and gas business in the financial year ended 31 March 2016. Any unforeseen disruption at these buyer's facilities would affect sales volume and therefore revenue generation. Any of these could have a material adverse effect on Cairn India's business, operating results, financial condition and/or prospects. If the Cairn India Merger is implemented, Vedanta's economic exposure to the impact of this risk occurring will increase proportionately.

Cairn India has entered into agreements with a number of other contractual counterparties in relation to the sale and supply of their respective hydrocarbon production volumes and is, therefore, subject to the risk of delayed off takes or payment for delivered production volumes or counterparty default. In certain cases, the relevant counterparty, either legally or as a result of geographic, infrastructure or other constraints or factors, is in practice the sole potential purchaser of the relevant production output. This is particularly the case for sales of gas which rely upon the availability or construction of transmission and other infrastructure facilities, enabling the supply of gas produced to be supplied to end users. The absence of competitors for the transmission or purchase of gas produced by Vedanta may expose it to offtake and production delays, adverse pricing or other

contractual terms or may restrict the availability of transmission or other necessary infrastructure. Such delays or defaults or adverse pricing or other contractual terms or restricted infrastructure availability could have a material adverse effect on the Vedanta's respective businesses, prospects, financial condition or results of operations.

Vedanta is subject to covenants under its credit facilities including term loans and working capital facilities that limit its flexibility in managing its business.

Vedanta's financing agreements contain certain restrictive covenants and events of default that limit its ability to undertake certain types of transactions or ability to expand, any of which could adversely affect its business. These covenants require Vedanta to maintain certain financial ratios and obtain the prior consent of its lenders for various activities, including, among others,

- any change in its capital structure,
- issue of equity, preferential capital or debentures,
- raising any loans and deposits from the public,
- undertaking any new project,
- effecting any scheme of acquisition, merger, amalgamation or reconstitution,
- implementing a new scheme of expansion or creation of a subsidiary.

Vedanta's future borrowings may also contain similar restrictive provisions. Low commodity prices may adversely impact Vedanta's profitability and therefore its ability to meet the financial covenants and ratios. If Vedanta fails to meet its debt service obligations or covenants (or receive approvals from its lenders to undertake certain transactions) provided under the financing agreements, the relevant lenders could declare Vedanta to be in default under the terms of its agreements, accelerate the maturity of its obligations or take over the financed project or other security made available to the lenders. However no consent is required for this offering. Vedanta cannot assure you that, in the event of any such acceleration, it will have sufficient resources to repay borrowings. In such an event, Vedanta may be forced to renegotiate its financing agreements with its lenders on terms that may not be favorable to Vedanta.

Vedanta depends on the experience and management skill of certain of its key employees. In addition, certain key employees may have claims pending against them from prior employment which, if adversely determined, may impact Vedanta's reputation.

Vedanta's efforts to continue its growth will place significant demands on its management and other resources, and Vedanta will be required to continue to improve operational, financial and other internal controls, both in and outside India across all locations. Vedanta's ability to maintain and grow its existing business and integrate new businesses will depend on its ability to maintain the necessary management resources and on its ability to attract, train and retain personnel with skills that enable it to keep pace with growing demands and evolving industry standards. Vedanta is in particular dependent to a large degree on the continued service and performance of the senior management team of Vedanta and other key team members in its business units. These key personnel possess technical and business capabilities that are difficult to replace. The loss or diminution in the services of Vedanta's executive management or other key team members, or its failure otherwise to maintain the necessary management and other resources and grow its business, could have a material adverse effect on its business, results of operations, financial condition and prospects. In addition, as Vedanta's business develops and expands, Vedanta believes that its future success will depend on its ability to attract and retain highly skilled and qualified personnel, which is not guaranteed.

Mining, metal refining, metal smelting and fabrication operations and oil and gas extraction, require a skilled and experienced labour force. If Vedanta experiences a shortage of skilled and experienced labour, its labour productivity could decrease and costs could increase, Vedanta's operations may be interrupted or it may be unable to maintain its current production or increase its production as otherwise planned, which could have a material adverse effect on Vedanta's results of operations, financial condition and business prospects.

In addition, certain key employees of Vedanta may have claims pending against them from their prior employment. None of these claims relate to any activity by any of these employees in their engagement with Vedanta. While these claims have no impact on Vedanta, an adverse outcome of these claims against any of the key employees may impact Vedanta's reputation.

Material changes in the regulations that govern Vedanta and its businesses, or the interpretation of recent legislation, could have a material adverse effect on its business, financial condition and result of operations.

Mining in India is subject to a complex and comprehensive set of laws and regulatory requirements. See "Business — Indian Regulatory Matters — Mining Laws". These laws and regulatory requirements are subject to change. For example, the Indian Mines (Amendment) Bill, 2011 ("Mines Bill") proposes several amendments to the Mines Act, 1952, including significant enhancement to the monetary penalties and terms of imprisonment for violations under the Mines Act, 1952. The Indian Ministry of Mines has also prepared the Mines and Minerals (Development and Regulations) Bill, 2011 ("Mining Bill") which provides that with respect to which minerals vest, the holder of a mining lease or prospecting licence shall be liable to pay reasonable compensation to the stakeholders holding occupation, usufruct or traditional rights of the surface of the land over which the licence and lease has been granted, as mutually agreed (failing which the relevant State government will determine compensation payable). If Vedanta is affected, directly or indirectly, by the application or interpretation of any such statute, as and when notified, including any enforcement proceedings initiated under it and any adverse publicity that may be generated due to prosecution, it may have a material adverse effect on its business, financial condition and result of operations.

In addition, Cairn India is subject to complex and comprehensive oil and gas regulations in India. New or changed regulations could require changes to the manner in which Cairn India conducts its business, and result in an increase in compliance costs, which could have a material adverse effect on Vedanta's business, financial condition and results of operation.

For example, upon the expiry of oil and gas licences, contractors are generally required, under the terms of relevant licences or local law, to dismantle and remove equipment, cap or seal wells and generally make good production sites. There can, however, be no assurance that Vedanta will not in the future incur decommissioning charges in excess of those currently provided for, since local or national governments may require decommissioning to be carried out in circumstances where there is no express obligation to do so, particularly in case of future oil and gas licence renewals.

The costs, liabilities and requirements associated with complying with existing and future laws and regulations, within India or in other jurisdictions may also be substantial and time-consuming and may delay the commencement or continuation of exploration, oil and gas, mining or production activities, which could also have a material adverse effect on Vedanta's results of operation and financial condition.

Vedanta's operations are subject to extensive governmental, health and safety and environmental regulations, which require it to obtain and comply with the terms of various approvals, licenses and permits. Any failure to obtain, renew or comply with the terms of such approvals, licenses and permits in a timely manner may have a material adverse effect on its results of operations and financial condition.

Numerous governmental permits, approvals and leases are required for Vedanta's operations as the industries in which it operates and seeks to operate are subject to numerous laws and extensive regulation by national, state and local authorities in jurisdictions including India, Zambia, Namibia, South Africa and Fujariah and any other jurisdictions where Vedanta may operate in the future. Vedanta's operations are also subject to laws and regulations relating to employment, the protection of the health and safety of employees as well as the environment, including conservation and climate change. For instance, Vedanta is required to obtain various environmental and labour-related approvals in connection with its operations in India, including clearances from the Ministry of Environment and Forest (the "MoEF"), GoI and from the relevant Pollution Control Boards in the various states in India in which Vedanta operates, and registration under the Factories Act, 1948 of India (the "Factories Act") in order to establish and operate its facilities. Certain of such approvals are valid for stipulated periods of time and require periodic renewals, such as the consents to operate under the Air (Prevention and Control of Pollution) Act, 1981 of India (the "Air Act"), and the Water (Prevention and Control of Pollution) Act, 1974 of India (the "Water Act") from the relevant Pollution Control Boards, which are generally granted for a period of one year. See "Business - Indian Regulatory Matters" for more information.

Further, Vedanta's exploration, oil and gas and mining activities depend on the grant, renewal or continuance in force of various exploration and production licenses and contracts and other regulatory approvals that are valid for a specific period of time. In addition, such licenses and contracts contain various obligations and restrictions, including restrictions on assignment or any other form of transfer of a mining lease or on the employment of a person who is not an Indian national. For instance, in connection with Vedanta's mining operations in India, mining leases are typically granted for a period of 20 to 30 years and stipulate conditions including approved limits on extraction. Similarly, in connection with Vedanta's oil and natural gas operations in India, Cairn India is required to enter into a PSC and obtain an exploration licence, which typically extends seven or eight years, following the award of a block before it can commence exploration activities, and, if exploration is successful, Cairn India is then required to procure a petroleum mining lease from the relevant government authority, which typically extends for 20 years, in order to conduct extraction operations for oil and natural gas.

Government approval is also required, generally, for the continuation of mining as well as oil and gas exploration and production activities in India and other jurisdictions, and such approval can be revoked for a variety of circumstances by the GoI, Indian courts or other authorities. Any general suspension of mining activities by the government of a jurisdiction containing mining operations of Vedanta could have the effect of closing or limiting production from its operations.

For example, revenue from Vedanta's iron ore business declined from \$1,688.9 million in fiscal year 2012 (pre ban period) to \$341.8 million in fiscal year 2016 due to suspension of mining activities in Goa by the State of Goa and Karnataka. The suspension orders were withdrawn by the state government in 2015 and operations have recommenced. However, Vedanta may be subject to increased royalty payments and/or other penalties, if the recommendations of the audit committee which was appointed in 2014, are implemented. Such an outcome or any other adverse outcome could result in a material adverse effect on Vedanta's financial condition and results of operations. For further details see "Business — Iron ore Business".

Similarily, Vedanta's iron ore mining operations in Karnataka were suspended due to the suspension order issued by the Supreme Court of India in 2011 and the subsequent expiry of the forest clearance in 2013. Mining operations in Karnataka recommenced only in February 2015. See "Business — Iron Ore Business" for further details.

Furthermore, regulation of greenhouse gas emissions in the jurisdictions of Vedanta's major customers and in relation to international shipping could also have an adverse effect on the demand for Vedanta's products. Vedanta's smelting and mineral processing operations are energy intensive and depend heavily on fossil fuels. Increasing regulation of climate change issues such as greenhouse gas emissions, including the progressive introduction of carbon emissions trading mechanisms and tighter emission reduction targets, may raise energy costs and costs of production over the next decade.

Failure by Vedanta to comply with applicable laws, regulations or recognised international standards, or to obtain or renew the necessary permits, approvals and leases may result in the loss of the right to operate its facilities or continue its operations, the imposition of significant administrative liabilities, or costly compliance procedures, or other enforcement measures that could have the effect of closing or limiting production from its operations. If Vedanta were to fail to meet environmental requirements or to have a major accident or disaster, it may also be subject to administrative, civil and criminal proceedings by governmental authorities, as well as civil proceedings by environmental groups and other individuals, which could result in substantial fines, penalties and damages against it as well as orders that could limit or halt or even cause closure of its operations, any of which could have a material adverse effect on its business, results of operations and financial condition. For example, the closure of the Tuticorin plant, pursuant to an order of TNPCB for alleged release of pollutants. See "Business Litigation — "Writ petitions filed against Vedanta alleging violation of certain air, water and hazardous waste management regulations at Vedanta's Tuticorin plant" For further details." Similarily, in 2015, Zambian villagers filed a class action suit against KCM in Zambia, for alleged release of pollutants and causing environment damage. See Business Litigation "Class actions against KCM on behalf of Zambian nationals" for further details.

# Vedanta is exposed to the political, legal, regulatory and social risks of the countries in which it operates.

Vedanta has operations in India, Zambia, Namibia, South Africa and Fujariah. Vedanta is exposed to the political, economic, legal, regulatory and social risks of the countries in which it operates or intends to operate. These risks potentially include expropriation (including "creeping" expropriation) and nationalisation of property, instability in political, economic or financial systems, uncertainty arising from underdeveloped legal and regulatory systems, corruption, civil strife or labour unrest, acts of war, armed conflict, terrorism, outbreaks of infectious diseases, prohibitions, limitations or price controls on hydrocarbon exports and limitations or the imposition of tariffs or duties on imports of certain goods.

For example, the Ebola epidemic in Liberia resulted in stoppage of drilling and exploration work for iron ore during fiscal year 2015. Vedanta Limited evacuated staff in Liberia owing to the ebola risk in 2015. In consideration of the suspension of exploration in Liberia, low iron ore prices, geo-political factors and no plans for any substantive expenditure resulting in continued uncertainty in the project, an impairment charge of \$227.5 million has been recognised for Vedanta in fiscal year 2016.

Countries in which Vedanta has operations or intends to have operations have transportation, telecommunications and financial services infrastructures that may present logistical challenges not associated with doing business in more developed locales. Furthermore, Vedanta may have difficulty ascertaining its legal obligations and enforcing any rights it may have. Political, legal and commercial instability or community disputes in the countries and territories in which Vedanta operates could affect the viability of its operations. Some of Vedanta's current and potential operations are located in or near communities that may regard such operations as having a detrimental effect on their environmental, economic or social circumstances.

The consequences of community reaction could also have a material adverse impact on the cost, profitability, ability to finance or even the viability of an operation. Such events could lead to disputes with national or local governments or with local communities and give rise to material reputational damage. If Vedanta's operations are delayed or shut down as a result of political and community instability, its revenue growth may be constrained and the long-term value of its business could be adversely impacted.

Once Vedanta has established operations in a particular country, it may be expensive and logistically burdensome to discontinue such operations should economic, political, physical or other conditions subsequently deteriorate. All of these factors could have a material adverse effect on Vedanta's businesses, results of operations, financial condition or prospects.

# If Vedanta's planned expansions and new projects are delayed, Vedanta's results of operation and financial condition may be materially and adversely affected.

Vedanta and its subsidiaries have, over the past few years initiated or may implement expansion plans for its existing operations and planned greenfield projects, which may involve significant capital expenditure. Although several of these initiatives have been completed, substantial work remains. The timing, implementation and cost of such expansions are subject to a number of risks, including the failure to obtain necessary leases, licences, permits, consents and approvals, or funding for the expansions.

For example, Vedanta does not currently have all of the leases, licences, permits, consents and approvals that are or will be required for its planned expansions and new projects. There can be no assurance that Vedanta or its subsidiaries will be able to obtain or renew all necessary leases, licenses, permits, consents and approvals in a timely manner. For example, as environmental approvals were challenged before the NGT, the expansion plans of Vedanta's aluminia refinery at Lanjigarh were affected. The matter is still pending before the Tribunal, however the grant of the clearances and approvals haven't been stayed by the Tribunal. In addition, MoEF has rejected Vedanta's forest clearance application in 2010 and 2014 and mining operations in Niyamgiri Hills have been suspended. See Business — Litigation — "Proceedings against Vedanta relating to Niyamgiri mining project and expansion plans of refinery in Lanjigarh". Vedanta is currently in discussions with government authorities to access bauxite once an adequate supply of bauxite has been secured.

Similarily, Vedanta is currently undertaking exploration programs in its Rajasthan and other oil blocks and any delays in this exploration program or shortfall in achieving the necessary output levels could materially and adversely affect Vedanta's operations and financial condition. In addition to ongoing exploration activities, Vedanta's zinc operations operated by its subsidiary, HZL has finalised plans for the next phase of development growth, which will involve the sinking of underground shafts and developing underground mines. Any delays in the execution of the expansion plans or any shortfall in achievement of the expansion objectives may adversely affect Vedanta's business, financial condition and results of operations. See 'Business — Zinc Business' for further details.

Furthermore, the GoI is contemplating a proposal to demarcate certain forest areas in India, based on the permissibility of using such land for mining purposes. The identification of designated areas where mining activities will, or will not, be permitted will be based on mapping forest and coal reserves as well as field-level studies. While this proposal remains in discussion, the MoEF has denied the grant of environmental and forest diversion clearances applied for in certain areas identified as restricted areas. In the event the proposal is implemented, Vedanta's current and any future mining activities and related expansion plans and new projects may be affected, which would adversely affect Vedanta's business prospects and results of operations or otherwise hinder its borrowing capabilities.

Any delay in completing planned expansions, revocation of existing clearances, failure to obtain or renew regulatory approvals, non-compliance with applicable regulations or conditions stipulated in

the approvals obtained, suspension of current projects, or cost overruns or operational difficulties once the projects are commissioned may have a material adverse effect on Vedanta's business, results of operations or financial condition. Any delay in completing planned expansions could have a material adverse effect on Vedanta's credit rating, which may increase its borrowing costs.

Vedanta may fail to realise the financial flexibility, margin benefits, cost savings and other objectives anticipated from, or may incur unanticipated costs associated with the Cairn India Merger.

There is no assurance that the Cairn India Merger will achieve the financial flexibility, cost savings and other objectives Vedanta anticipates. These expected objectives may not develop or may be materially lower than anticipated and other assumptions (including the value of the recoverable assets) upon which the Vedanta has determined the terms of the Cairn India Merger may prove to be incorrect. As such, the financial flexibility, cost savings and other objectives anticipated by Vedanta to result from the Cairn India Merger may not be achieved as expected, or at all, or may be delayed, which could have a material adverse effect on the Vedanta's business, operating results, financial condition and/or prospects.

# Vedanta's future expansions and acquisitions and its ability to refinance its existing indebtedness are dependent upon its ability to obtain funding.

Vedanta will require capital for, among other purposes, refinancing its existing indebtedness, expanding its operations, making acquisitions, managing acquired assets, acquiring new equipment, maintaining the condition of its existing equipment and maintaining compliance with environmental laws and regulations. To the extent that cash generated internally and cash available under Vedanta's existing credit facilities may not be sufficient to fund Vedanta's capital requirements. Vedanta may require additional debt or equity financing, which may not be available on favourable terms, or at all. Future debt financing, if available, may result in increased finance charges, increased financial leverage, decreased income available to fund further acquisitions and expansions and the imposition of restrictive covenants on Vedanta's businesses and operations.

#### The reorganization of 2013 may not result in expected benefits.

At the time of announcing the reorganization in 2013, Vedanta estimated tax efficiencies arising from the transaction. The expected efficiencies may not be realized or may be materially lower than estimated and the extent to which any of the other benefits will actually be achieved, if at all, or the timing of any such benefits, cannot be predicted with certainty. If Vedanta Limited is prevented from taking advantage of the anticipated tax efficiencies, there could be a material adverse effect on Vedanta's business, financial condition or results of operations. Further, subsequent to the effectiveness of the Amalgamation and Re-organization Scheme, a special leave petition challenging the orders of the High Court of Bombay at Goa was filed before the Supreme Court of India by the Commissioner of Income Tax, Goa and the Ministry of Corporate Affairs in July 2013 and April 2014, respectively. Further, a creditor and a shareholder challenged the Amalgamation and Re-organization Scheme in the High Court of Madras in September 2013. These petitions are pending for hearing and admission. See "Business — Litigation — The Amalgamation and Re-organization Scheme has been challenged by the Indian tax authorities and others" for further information.

There is no assurance that the special leave petitions will be determined in Vedanta Limited's favor, and accordingly, there is no assurance that the Courts will negate the effectiveness of the reorganisation. In such circumstance, Vedanta may not be able to achieve financial, operational, strategic and other potential benefits from the consolidation pursuant to the reorganisation.

Third party interests in the Vedanta's subsidiary companies and restrictions due to stock exchange listings of the Vedanta's subsidiary companies will restrict the Vedanta's ability to deal freely with its subsidiaries which may have a material adverse effect on its results of operations and financial condition.

Vedanta does not wholly own any of its operating subsidiaries, although it holds majority stakes in all of its subsidiary businesses. Although Vedanta has direct or indirect management control of Vedanta Limited, BALCO, HZL, KCM, Black Mountain Mining and Cairn India, each of these companies has other shareholders who, in some cases, hold substantial interests. As a result of the non-controlling interests in the Vedanta's subsidiaries and affiliates and the Indian stock exchanges and/or NYSE listings of Vedanta Limited, HZL and Cairn India, these subsidiaries may be subject to additional legal or regulatory requirements, or Vedanta may be prevented from taking certain courses of action without the prior approval of a particular or a specified percentage of shareholders and/or regulatory bodies (under shareholders' agreements, relationship agreements or by operation of law). The existence of minority or other interests in, and stock exchange listings of, Vedanta's subsidiaries may limit its ability to increase its equity interests in these subsidiaries, combine similar operations, utilise synergies that may exist between the operations of different subsidiaries, move funds among the different parts of its businesses or reorganise the structure of Vedanta's business in a tax efficient manner, which may have a material adverse effect on its results of operations and financial condition.

The Oil and Natural Gas Corporation Limited ("ONGC") amongst others is Vedanta's joint operation partner with respect to all operating assets of Vedanta's oil and gas business, and Vedanta Limited operates all of its oil and gas assets except KG-ONN-2003/1. Accordingly, any mismanagement of an oil and gas asset by Vedanta Limited may give rise to liabilities to its joint operation partners in respect of such asset. There is also a risk that other parties with interests in Vedanta's assets may elect not to participate in certain activities relating to those assets which require such party's consent. In such circumstances, it may not be possible for such activities to be undertaken by Vedanta alone or in conjunction with other participants at the desired time or at all. In addition, other joint operation partners may default in their obligations to fund capital or other funding obligations in relation to the assets. In certain circumstances, Vedanta may be required under the terms of the relevant operating agreement to contribute all or part of any such funding shortfall, which could adversely impact Vedanta's business, financial condition or results of operations.

#### Vedanta is exposed to competitive pressures in the various businesses in which it operates.

The mines and minerals, commercial power generation, and oil and gas industries are highly competitive. Vedanta will continue to compete with other industry participants in the search for and acquisition of mineral and oil and gas assets and licences. Competitors include companies with, in many cases, greater financial resources, local contacts, staff and facilities than those of Vedanta.

Competition for exploration and production licences as well as for other investment or acquisition opportunities may increase in the future. This may lead to increased costs in the carrying out of Vedanta's activities, reduced available growth opportunities and may have a material adverse effect on its businesses, financial condition, results of operations and prospects.

# Currency fluctuations among the Indian Rupee and other currencies and the US dollar could have a material adverse effect on Vedanta's results of operations.

Although substantially all of Vedanta's revenue is tied to commodity prices that are typically priced by reference to the US dollar, most of its expenses are incurred and paid in Indian Rupees and, to a lesser extent, in South African Rands, Zambian Kwachas, Euros, Namibian dollars and Liberian dollars. In addition, in fiscal year 2016 63.1%, of Vedanta's revenue from sales within India was derived from commodities that was sold to customers within India. The exchange rates between the Indian Rupee and the US dollar and between other currencies and the US dollar have changed substantially in recent years and may fluctuate substantially in the future. See "Management's Discussion and Analysis of Financial Condition and Result of Operations for Vedanta — Exchange Rate Risk" for further details. Vedanta's results of operations or financial condition could be adversely affected if the US dollar depreciates against the Indian Rupee or other currencies. Vedanta seeks to mitigate the impact of short-term movements in currency on its businesses by hedging its short-term exposures progressively based on their maturity. However, large or prolonged movements in exchange rates may have a material adverse effect on Vedanta's results of operations and financial condition.

#### Any business acquisitions by Vedanta entail significant risks.

Vedanta may continue to pursue acquisitions to expand its business. There can be no assurance that Vedanta will be able to identify suitable acquisition, strategic investment or joint venture opportunities, obtain the financing necessary to complete and support such acquisitions, investments or joint ventures, integrate such businesses, investments or joint ventures or that any business acquired will be profitable. If Vedanta's Indian subsidiaries attempt to acquire non-Indian companies, they may not be able to satisfy certain Indian regulatory requirements for such acquisitions and may need to obtain prior approval of the RBI, which they may not be able to obtain. The funding of such acquisitions by Vedanta may require certain approvals from regulatory authorities in India.

In addition, acquisitions and investments involve a number of risks, including possible adverse effects on Vedanta's operating results, diversion of management's attention, loss of goodwill on account of change in ownership, failure to retain key personnel, risks associated with unanticipated events or liabilities, including environmental liabilities, and difficulties in the assimilation of the operations, technologies, systems, services and products of the acquired businesses or investments. Any failure to achieve successful integration of such acquisitions or investments could have a material adverse effect on Vedanta's business, results of operations or financial condition.

have a material adverse effect on Vedanta's results of operations, financial condition and business prospects.

#### Vedanta's insurance coverage may prove inadequate to satisfy future claims against it.

Vedanta maintains insurance which it believes is typical in the respective industries in which it operates and in amounts which it believes to be commercially appropriate. Nevertheless, Vedanta may become subject to liabilities, including liabilities for pollution or other hazards, against which it has not insured adequately or at all, or cannot insure. Vedanta's insurance policies contain certain customary exclusions and limitations on coverage which may result in its claims not being honoured to the full extent of the losses or damages it has suffered. In addition, Vedanta's operating entities in India can only seek insurance from domestic insurance companies or foreign insurance companies operating in joint ventures with Indian companies and these insurance policies may not continue to be available at economically acceptable premiums. The occurrence of a significant adverse event, the risks of which are not fully covered or honoured by such insurers, could have a material adverse effect on Vedanta's results of operations or financial condition.

# Defects in title or loss of any leasehold interests in Vedanta's properties could limit its ability to conduct operations on such properties or result in significant unanticipated costs.

Vedanta's ability to mine the land on which it has been granted mining lease rights and to make use of its other industrial and office premises is dependent on its acquisition of surface rights. Surface rights and title to land are required to be negotiated separately with landowners, although there is no guarantee that these rights will be granted. Any delay outside of the ordinary course of business in obtaining or inability to obtain or any challenge to its title or leasehold rights to surface rights could negatively affect its financial condition and results of operations.

In addition, there may be certain irregularities in title in relation to some of Vedanta's owned and leased properties. For example, some of the agreements for such arrangements may not have been duly executed and/or adequately stamped or registered in the land records of the local authorities or the lease deeds may have expired and not yet been renewed. Since registration of land title in India is not centralised and has not been fully computerised, the title to land may be defective as a result of a failure on Vedanta's part, or on the part of a prior transferee, to obtain the consent of all such persons or duly complete stamping and registration requirements. The uncertainty of title to land may impede the processes of acquisition, independent verification and transfer of title, and any disputes in respect of land title that Vedanta may become party to may take several years and considerable expense to resolve if they become the subject of court proceedings. Further, certain of these properties may not

have been constructed or developed in accordance with local planning and building laws and other statutory requirements, or it may be alleged that such irregularities exist in the construction and development of the built up properties. For example BALCO has 1,804.67 acres of government land out of which 1,751 acres is situated in forest land which was given on lease by the state government. The lease deed has not been executed as on date as a petition was filed in the Supreme Court against BALCO in relation to the alleged encroachment of land on which the Korba smelter is situated. Any such dispute, proceedings or irregularities may have an impact on the operations of Vedanta. See "Business — Litigation — BALCO is involved in litigation in relation to the illegal felling of trees situated on forest land" for further details.

#### **Operating Risks**

Vedanta's oil and gas business is substantially dependent upon its Rajasthan oil and gas fields, and any interruption in the operations at those fields could have a material adverse effect on Vedanta's results of operations and financial condition.

Vedanta's results of operations have been and are expected to continue to be substantially dependent on the reserves, production and the cost of production at certain of its key assets, and any interruption in the operations, exploration and development activities at those assets for any reason could have a material adverse effect on the results of operations and financial condition. For example, the Rajasthan block produced 92.6% of Vedanta's average daily net operated production from the oil and gas business in fiscal year 2016 and 93.3% for the six months ended 30 September 2016 and oil and gas from the Rajasthan block constituted 93.9% of Vedanta's net aggregate proved plus probable oil and gas reserves and 2C resources on a barrel of oil equivalent basis as of 31 March 2016. Vedanta's ongoing capital expenditure program has focused on development and exploration activities across all the assets with approximately 94% of the capital expenditure for fiscal year 2016 having been invested in the Rajasthan block. Vedanta's results of operations have been and are expected to continue to be substantially dependent on the reserves and production of the Rajasthan Block, and any interruption in the operations or exploration and development activities at those oil and gas fields for any reason could have a material adverse effect on Vedanta's results of operations and financial condition.

Vedanta's oil and gas operations may be subject to operating risks which may have a material adverse effect on the financial condition or results of operations of Vedanta.

Vedanta has in place operating and maintenance procedures to maintain the integrity of its production facilities but there is a risk that unplanned events, inadequate application of these procedures or higher levels of corrosion than expected could cause disruption to production, which would have an adverse impact on oil sales, which ultimately could materially and adversely affect the financial condition and/or operating results of Vedanta.

The waxy nature of the crude oil requires Vedanta to use hot water injection as the recovery technique at these fields and ensure that the crude oil is transported through the main 24 inch insulated oil pipeline which maintain the required temperature of the crude oil. If the temperature of the injection water is not maintained at the required level, the required injection rate may not be able to be maintained, therefore the overall field production rate and ultimate recovery may be adversely impacted. Similarly, if the specialised heating system does not perform as expected and/or there are problems associated with the performance of the heating stations and/or there are problems supplying fuel to the power generation systems at these heating stations, the temperature of the crude oil may not be maintained at the required temperature, which would have an adverse impact on the rates at which oil can be transported through the pipeline network. Any reduction in its crude oil production and/or estimates of ultimate recovery may have a material adverse effect on Vedanta's business, results of operations and financial condition.

Currently, the power generation and heating requirements are being supplied by a power plant that has been installed and commissioned at the MPT. The power plant has been designed to use

associated natural gas from the Mangala field supplemented as required by natural gas from the Raageshwari Deep gas field which is located in the Rajasthan Block approximately 80 km from the MPT. Further, this has been augmented by alternative energy source in form of grid power supply of 14 MW capacity. Sustained failure of power systems due to unavailability of fuel supply and/or grid power availability could lead to operations disruption, having a material adverse effect on our results of operations and financial condition.

Vedanta is using hot water injection to maintain reservoir pressure and to optimize crude oil recovery at the Mangala, Bhagyam and Aishwariya fields. The source water for these fields is being, and will continue to be, provided from water production wells drilled in the Thumbli saline aquifer in the Barmer basin and connected to the Mangala processing terminal (the "MPT").

Extraction of saline water also requires the approval of the relevant authority. There can be no assurance that the estimated impact of the expected water extraction from the Thumbli groundwater flow is accurate. A failure to extract and transport the required amount of water during the production life of the existing and currently planned developments, or an inaccurate prediction of the impact on the groundwater flow of our activities, or revocation of the authorities' approval to extract saline water, may require us to access alternative water sources resulting in increased capital expenditure. In addition, there can be no assurance that the local community will not seek to hold Cairn India responsible for any invasion of the fresh water supply by saline groundwater from the aquifer, even though Vedanta has the appropriate consents and approvals.

In addition, there can be no assurance that the local community will not seek to hold Cairn India responsible for any invasion of the fresh water supply by saline groundwater from the aquifer. Although the appropriate authority has given its consent for the extraction of saline groundwater from Thumbli, it is possible that we will be perceived by the local Barmer community to be directly or indirectly responsible for any shortage of fresh water or deterioration in water quality. In such an event, local authorities, who have given permission to use the saline groundwater, may require us to access alternative water sources, which could impose additional cost and logistical/operational challenges, thereby having a material adverse effect on our business, operating results and financial condition.

The field development plans for the Northern Fields assume, or are expected to assume, the use of enhanced oil recovery orEOR techniques to extract an additional incremental percentage of the estimated oil in place in the reservoirs. EOR screening studies of the Northern Fields have concluded that polymer flooding or alkaline surfactant polymer or ASP flooding, two common EOR techniques, are the preferred EOR options. Risks associated with the project include inadequate processing of produced fluids thereby impacting performance of surface facilities and continuous sourcing of polymer for ongoing operations. Further, if the polymer is not maintained at the correct temperature in the reservoir and the desired viscosity, then it may degrade and not function correctly, thereby reducing the incremental amount of crude oil that is expected to be recovered. There is also a risk that the polymer handling facilities at the surface may perform at lower efficiency than designed, which may lead to degradation of the polymer and ultimately its higher consumption. All of these factors could have a material adverse effect on Vedanta's business, results of operations, financial condition or prospects.

The MPT facilities, which are designed to separate oil, gas, and water in the produced fluid, may not function as designed over the producing life of the fields whose production is processed at the MPT facilities. This may result in the crude oil not meeting pipeline export specifications, which may mean that any such crude oil either cannot be sold or will be sold at a significant discount to the agreed crude oil sales price, which could have a material adverse effect on Vedanta's business, operating results and financial condition.

If the Cairn India Merger is implemented, the portion of Vedanta's operating profit contributed by Cairn India will increase significantly and any interruption in Cairn India's operations could have a material adverse effect on Vedanta's businesses, operating results, financial condition and/or prospects

If the Cairn India Merger is implemented Vedanta's economic percentage interest in its oil and gas busines would increase from 37.3% to 50.1%. Cairn India provided 24.4% of Vedanta's EBITDA in the financial year ended 31 March 2016 and any interruption in Cairn India's operations could have a material adverse effect on Vedanta's businesses, operating results, financial condition and/or prospects. If the Cairn India Merger is implemented, Vedanta's economic exposure to the impact of this risk on Cairn India will increase proportionately and its effective interest in Vedanta Limited and its existing subsidiaries (other than Cairn India) could decrease.

#### Future production from Vedanta's assets may vary from the forecast.

Vedanta estimates the annual metal production and the mine life through a detailed mine plan for both open pit and underground mines and the oil and gas production rates and field life through the field development plans. These mine plans and field development plans are prepared based on Vedanta's estimates of future mine and field performance. Future performance is subject to a number of risks including geological conditions being more complex than originally predicted, ore grade being different from estimates, future producer or injector well performance, plant operating efficiencies being less than originally forecast, inadequate power, water or utility supplies, and other constraints. Vedanta's zinc and lead mining operations in India are currently transitioning from open pit mining operations to underground mining operations. Difficulties in managing this transition may result in challenges in achieving stated business milestones. Any material fall in production from the current production level or from the estimates due to some or all of the risks detailed above may adversely impact Vedanta's business, financial condition or results of operations.

Plateau production rates from the Rajasthan fields may be less than forecast. The estimates of production rates and field life contained in the field development plans for the Mangala, Bhagyam, Aishwariya, Raageshwari, Saraswati, NI and NE fields which were submitted to, and approved by, the Rajasthan Block PSC management committee are based on Vedanta's estimates of future field performance. Where any estimates of future production rates are in excess of the existing approved field plateau production rates, the consent of the joint venture partner, the appropriate regulatory authorities and the GoI will be required before any of the fields can be produced at these enhanced estimates of future production rates. In the event consent of the joint venture partner is delayed or not obtained, production would be limited to the rate set out in the FDP, which would have a detrimental impact on Vedanta's operating results. Future field performance is subject to a number of risks that are beyond the control of Vedanta. See "— Industry Risks — There are uncertainties inherent in estimating Vedanta's Ore Reserves and Mineral Resources and oil, condensate and sales-gas reserves, and if the actual amounts of such reserves and resources are less than estimated, its results of operations and financial condition may be materially and adversely affected".

Vedanta's zinc business is substantially dependent upon its Rampura Agucha lead-zinc mine, and any interruption in the operations at that mine could have a material adverse effect on Vedanta's results of operations and financial condition.

In addition to ongoing exploration activities, HZL has finalised plans for the next phase of development growth, which will involve the sinking of underground shafts and developing underground mines. The plan comprises developing a 3.75 mtpa underground mine at Rampura Agucha, expanding the Sindesar Khurd mine from 2.0 mtpa to 4.50 mtpa, expanding the Zawar Group mines from 1.2 mtpa to 4.0 mtpa, expanding the Rajpura Dariba mine from 0.6 mtpa to 1.2 mtpa and developing the Kayad mine to 1.0 mtpa.

The Rampura Agucha lead-zinc mine produced 73.3% of HZL's total mined metal in zinc and lead concentrate produced in fiscal year 2016 and its zinc and lead metal content constituted 64.4%

of the aggregate Proved and Probable Ore Reserves of HZL as of 31 March 2016. Vedanta's India zinc business provided 42.6% of its Vedanta EBITDA in fiscal year 2016. Vedanta's results of operations have been and are expected to continue to be substantially dependent on the Ore Reserves and low cost of production of the Rampura Agucha mine, and any interruption in the operations at that mine for any reason could have a material adverse effect on Vedanta's results of operations and financial condition.

There are uncertainties inherent in estimating Vedanta's Ore Reserves and Mineral Resources and oil, condensate and sales-gas reserves, and if the actual amounts of such reserves and resources are less than estimated, its results of operations and financial condition may be materially and adversely affected.

There are uncertainties inherent in estimating the quantity of Ore Reserves and Mineral Resources and in projecting future rates of production, including factors beyond the control of Vedanta. Estimating the amount of Ore Reserves and Mineral Resources is a subjective process, and the accuracy of any estimate is a function of the quality of available data and engineering and geological interpretation and judgment. Estimates of different Competent Persons/Experts may vary, and results of exploration, mining and production subsequent to the date of an estimate may lead to revision of estimates. For example, fluctuations in the market price of ore and other commodities, reduced recovery rates or increased production costs due to inflation or other factors may render Proven and Probable Ore Reserves containing relatively lower grades of mineralisation uneconomic to exploit and may ultimately result in a restatement of Ore Reserves. If the assumptions upon which estimates of Ore Reserves or Resources have been based prove to be incorrect, or if Ore Reserve estimates differ materially from mineral quantities or grades that Vedanta may actually recover, estimates of mine or field life may prove inaccurate and market price fluctuations and changes in operating and capital costs may render certain Ore Reserves, mineral deposits or oil and gas deposits uneconomical to extract.

For example, there are differences between Cairn India's estimates of its reserves and resources and the estimates of DeGolyer and McNaughton, independent petroleum engineering consultants, due to their different methodologies. Please see "Business — Description of the Businesses — Oil and Gas Business — DeGolyer and MacNaughton's Estimates of Reserves and Contingent Resources" for further details.

This Offering Circular, including Annex A — "Life of Mines" and Annex B — "Mineral Resources", uses the term "resources," which are comprised of "measured," "indicated" and "inferred" Mineral Resources. See Annex B — "Mineral Resources". United States investors are advised that while such terms are recognised by some investors, the SEC does not recognise them. There is a great amount of uncertainty as to the existence of "inferred" Mineral Resources and uncertainty as to their technical, economic and legal feasibility. It cannot be assumed that all or any part of an "inferred" Mineral Resource will ever be upgraded to a higher category. Under SEC rules, estimates of "inferred" Mineral Resources may not form the basis of feasibility or other economic studies. Investors should not assume that all or any part of "measured" or "indicated" Mineral Resources will ever be converted into Ore Reserves and are also cautioned not to assume that all or any part of an "inferred" Mineral Resource exists or is economically or legally mineable. See "Presentation of Information — Basis of Presentation of Reserves and Resources — Cautionary Note to United States Investors Concerning Estimates of Measured, Indicated and Inferred Resources for Mining Operations".

As a result, the Ore Reserves and Mineral Resources data contained in this Offering Circular are subject to material assumptions and uncertainties. In the event that any of these assumptions and estimates turns out to be incorrect, Vedanta may need to revise its estimates downwards and this may adversely affect its business plans and the total value of its asset base, which could increase its costs and decrease profitability. If this occurs, Vedanta's results of operations and financial condition may be materially and adversely affected.

In addition, Annex B — "Mineral Resources" contains management's life of mine estimates based on Mineral Resource plus Ore Reserves and current production rates. The reporting methodology for Mineral Resources differs from that of Ore Reserves under international reporting codes as certain factors (termed "Modifying Factors", such as mining losses and dilution) are included in the reporting of Ore Reserves, whereas Mineral Resources are reported on an in-situ basis. Accordingly, the two numbers are not added together under international reporting codes such as JORC (2012) and SAMREC (2009). Consequently, considerable caution should be exercised when considering life of mine estimates based on Mineral Resource plus Ore Reserves. Life of mine estimates which include Mineral Resources have been undertaken by the Company and have not been subject to review by the Independent Consultants named in the Offering Circular. See "Presentation of Information — Basis of Presentation of Reserves and Resources — Cautionary Note to United States Investors Concerning Estimates of Measured, Indicated and Inferred Resources for Mining Operations".

Although Vedanta provides certain life of mine estimates on the basis of Ore Reserves and Mineral Resources, investors are cautioned to use the life of mine estimates based solely on Ore Reserves in Annex A — "Life of Mines" as the base case for any assessment of the life of a mine.

#### Litigation

In addition to the risks discussed in this section, please see "Business Litigation" for additional details regarding litigation matters involving Vedanta.

Vedanta is involved in several litigation matters, both civil and criminal in nature, which could together have a material adverse effect on its business, results of operations, financial condition and prospects.

Vedanta is involved in several legal and regulatory proceedings, including criminal matters, property disputes, labour disputes, alleged violations of environmental and tax laws, alleged violation of the provisions of the Indian Takeover Code, and alleged price manipulation of Vedanta Limited's equity shares on the Indian stock exchanges. Claims on account of disputes concerning sales tax, income tax, excise tax and electricity duty amounted to \$3,976.0 million, of which \$25.2 million was recorded as current liabilities, as of 30 September 2016. Other claims amounted to \$1,046.5 million as of 30 September 2016, of which \$32.4 million was recorded as current liabilities.

Further, certain Subsidiaries of Vedanta are eligible for certain tax exemptions, incentives and benefits under local tax legislations, owing their nature of business operations. Whilst the respective Subsidiaries of Vedanta claim for such tax benefits, incentives and exemptions, as applicable, the tax authorities in several cases dispute and disallow such claims, which typically leads to tax litigation between respective Subsidiary of Vedanta and the tax authorities ("Disputes"). We cannot assure that we will able to successfully defend such Disputes, and any disallowance of claim amount in the final outcome of a Dispute may adversely affect our financial performance and position.

Cairn India has received a tax demand from the Indian tax authorities for not withholding tax on payments made while acquiring a subsidiary which, if payable, could have a material adverse effect on Cairn India's businesses, operating results, financial condition and/or prospects.

In March 2014, Cairn India received a notice from the Tax Authorities alleging failure by Cairn India to withhold tax on the consideration paid to Cairn UK Holdings Limited ("CUKHL"), its then holding company, in the financial year ended 31 March 2007 in connection with a purchase of shares. The relevant purchase of shares relates to the acquisition of the shares of CIHL, a 100% subsidiary as of 30 September 2016 of Cairn India, from CUKHL during the financial year ended 31 March 2007, which was part of a group reorganisation by the then ultimate parent company, Cairn Energy plc ("Cairn Energy").

Based upon the retrospective amendment(s) made in the year 2012 by inserting explanation 5 of section 9(1)(i) of the Income Tax Act 1961 of India (the "Income Tax Act"), the Tax Authorities, by an order dated 11 March 2015, have raised a demand of approximately INR 204,947 million (US\$3,074.5 million) (comprising tax of approximately INR 102,474 million (US\$1,537.3 million) and interest of an equivalent amount) for not withholding tax on the consideration paid to CUKHL in connection with the acquisition of shares of CIHL. The Tax Authorities have stated in the order that a short term capital gain of INR 245,035 million (US\$3,676 million) accrued to CUKHL on the transfer of the shares of CIHL to Cairn India in the financial year ended 31 March 2007, on which tax should have been withheld by Cairn India. The Company understands that a tax demand has also been raised by the Tax Authorities on CUKHL with respect to taxability of alleged capital gain earned by CUKHL.

On 27 March 2015, Vedanta filed a Notice of Claim against the GoI under the UK-India bilateral investment treaty (the "BIT") in order to protect its legal position and Shareholder interests. The Company is of the opinion that it has a good case to defend as per provisions of BIT, the benefit of which would ultimately accrue to Cairn India.

The directors of Cairn India are of the opinion that there should be no liability on Cairn India on account of not withholding the taxes in the financial year ended 31 March 2007 based on provisions of law prevailing at the time of transaction as the aforesaid retrospective amendment has cast an obligation on Cairn India to deduct tax by having to predict and anticipate that the retrospective amendment will be made by legislature on a future date. Cairn India has approached the Honourable Delhi High Court against the order referred to above and has also filed an appeal before the Commissioner of Income Tax (Appeals) to defend its position. The next hearing date is scheduled on 23 January 2017. In the event that these liabilities materialise as a result of legal proceedings being determined against Cairn India, Cairn India's financial condition may be adversely affected.

The GoI has disputed Vedanta Limited's exercise of the call option to purchase its remaining 29.5% ownership interest in HZL.

Arbitration is on-going in relation to a dispute between the GoI and Vedanta Limited, with respect to Vedanta Limited's exercise of its second call option to acquire the remaining shares in HZL held by the GoI, pursuant to the shareholders' agreement between the parties. The GoI has refused to

act upon the second call option, stating that Vedanta Limited's second call option violates the provisions of the Indian Companies Act, 1956, by restricting the right of the GoI to transfer its shares. The next date of hearing by the arbitral tribunal is on 25 February 2017. In a related proceeding, the Supreme Court on 19 January 2016 ordered the status quo be maintained with respect to the proposed disinvestment of government interest in HZL until further orders are passed by the court. See "Business — Litigation —Vedanta Limited's call option to purchase the remaining 29.5% ownership interest in HZL" for further details.

The arbitral proceedings might not result in a favourable outcome for Vedanta Limited. In such an event, Vedanta Limited may be delayed in its purchase of, or may be unable to purchase, the GoI's remaining 29.5% interest in HZL or may be required to pay a purchase price in excess of the market value or fair value of those shares, which may have a material adverse effect on Vedanta's operational flexibility, results of operations and financial condition.

### The GoI has disputed Vedanta Limited's exercise of the call option to purchase its remaining 49.0% ownership interest in BALCO.

There are certain proceedings that are currently ongoing with respect to the exercise of a call option to acquire the remaining shares of BALCO held by the GoI, in accordance with the terms of the shareholders' agreement between the GoI and us. The amount claimed under this proceeding is presently unquantifiable. The arbitration tribunal formed under the directions of the High Court of Delhi declared an award rejecting BALCO's claim regarding the exercise of the option on 25 January 2011. According to the award, certain clauses of the shareholders' agreement were held to be void, ineffective and inoperative as being in violation of sub section (2) of Section 111A of the Companies Act, 1956. Vedanta Limited filed an application before the High Court of Delhi to set aside this award under Section 34 of the Arbitration and Conciliation Act, 1996. The application is scheduled for hearing on 10 July 2017.

# The Securities and Exchange Board of India has brought proceedings alleging that Vedanta has violated regulations prohibiting fraudulent and unfair trading practices.

In 2001, SEBI brought certain proceedings relating to alleged violations by Vedanta Limited of regulations prohibiting fraudulent and unfair trading practices. See "Business — Litigation — Appeal proceedings in the High Court of Bombay brought by SEBI to overrule a decision by the Securities Appellate Tribunal of India that Vedanta Limited has not violated regulations prohibiting fraudulent and unfair trading practices."

In addition to the civil proceedings, SEBI also initiated criminal proceedings in 2001 before the Court of the Metropolitan Magistrate, Mumbai, against Vedanta Limited, Vedanta's Executive Chairman, Mr. Anil Agarwal, Vedanta Limited's Director of Finance, Mr. Tarun Jain, and the chief financial officer of MEL at the time of the alleged price manipulation. When SEBI's order was overturned in October 2001, Vedanta Limited filed a petition before the High Court of Bombay to defend those criminal proceedings on the grounds that the Securities Appellate Tribunal of India had overruled SEBI's order on price manipulation. An order has been passed by the High Court of Bombay in Vedanta Limited's (then Sterlite) favour, granting an interim stay of the criminal proceedings.

If any of the above matters are held against Vedanta Limited, it may be prohibited from accessing the Indian capital market for a specified period of time and/or may become liable to pay penalties. If Vedanta Limited and the individuals named in the criminal proceedings do not prevail, Vedanta's business and operations may be materially and adversely affected.

# The GoI may allege a breach of a covenant by Vedanta and seek to exercise a put or call right with respect to shares of HZL, which may result in substantial litigation and serious financial harm to Vedanta's business, results of operations, financial condition and prospects.

Under the terms of the shareholders' agreement between the GoI and erstwhile SIIL, Vedanta Limited agreed that it would ensure that HZL would implement a 1 mmtpa greenfield zinc smelter plant at Kapasan in the state of Rajasthan (the "Kapasan Project"), within 5 years from 11 April 2002.

In 2003, HZL notified the GoI that the Kapasan Project would not be undertaken and that a report of an independent expert may not be required. While Vedanta Limited has not received any notice of breach under the provisions of the shareholders' agreement between the GoI and Vedanta with respect to HZL, the GoI may claim that Vedanta Limited has breached the covenant related to the Kapasan Project as mentioned in the shareholders' agreement triggering an event of default. The GoI, under the terms of the shareholders' agreement, may become entitled to the right, which is exercisable at any time within 90 days from the day it became aware of such event of default, to either sell any or all of the shares of HZL held by the GoI to Vedanta Limited at a price equivalent to 150.0% of the market value of such shares, or purchase any or all of the shares of HZL held by us at a price equivalent to 50.0% of the market value of such shares.

If the GoI were to assert that an event of default occurred under the shareholders' agreement and seek to exercise a put or call right with respect to shares of HZL, Vedanta Limited may face expensive and time-consuming litigation over the matter, uncertainty as to the future of Vedanta Limited's zinc business, an inability to enforce Vedanta's call option to acquire the GoI's remaining 29.5% ownership interest in HZL and the possibility of serious financial harm if HZL were unsuccessful in litigation, any of which may have a material adverse effect on Vedanta's business, results of operations, financial condition and prospects. See 'Material Contracts-HZL call option' for further details.

#### Tax Risks

Vedanta may be liable for additional taxes if the tax holidays, exemptions and tax deferral schemes which it currently benefits from expire without renewal, or if tax laws change.

Vedanta currently benefits from significant tax holidays, exemptions and tax deferral schemes, which apply for limited periods. For example, HZL's captive power plant at Dariba, Chanderiya, and Zawar benefits from tax exemptions on the profits generated from transfers of power to HZL's other units, which are expected to generate substantial savings. Vedanta Limited also have wind mills located in states such as Gujarat, Karnataka, Tamil Nadu, Maharashtra and Rajasthan and melting and casting plants at Pantnagar which are also eligible for tax exemption. New captive power plants will not be eligible for such tax exemptions if the capitalization is effected after 31 March 2017.

There can be no assurance that these and other tax holidays or exemptions will be renewed when they expire or that any application Vedanta makes for new tax holidays or exemptions will be successful. The expiry or loss of existing tax holidays, exemptions and tax deferral schemes or the failure to obtain new tax holidays, exemptions or tax deferral schemes will likely increase Vedanta's tax obligations, which could have a material adverse effect on its results of operation or financial condition.

In addition, Vedanta Limited is subject to a Minimum Alternate Tax which sets a minimum amount of tax that must be paid each year based on Vedanta Limited's book profits. The base Minimum Alternate Tax rate is currently 21.34%. The Minimum Alternate Tax prevents Vedanta Limited from taking full advantage of any tax holidays, exemptions or tax deferral schemes that may be available to Vedanta Limited.

Vedanta/its other non-Indian subsidiaries could be considered as Indian tax residents and be taxable in India on their global profits if their 'place of effective management' is in India in the relevant year.

Changes in tax laws could also result in additional taxes payable by Vedanta. Vedanta pays royalties and cess in relation to our oil and gas business, to the state governments and the central government in India at rates determined by the respective governments, linked to the volume/value of oil that Vedanta produces. Any adverse changes in these fiscal terms may have an adverse effect on Vedanta's costs, results of operations and financial condition. Cess earlier being levied on volume was adversely affecting the net realization in a declining oil price scenario. In the recent budget, levy of cess was made ad valorem basis which will have an adverse impact on Vedanta with increase in prices.

#### **Industry Risks**

If Vedanta cannot secure additional Ore Reserves of copper, zinc, bauxite and iron ore that can be mined at competitive costs or cannot mine ore existing Ore Reserves at competitive costs, its profitability and operating margins could decline.

If Vedanta's existing copper, zinc and bauxite Ore Reserves cannot be mined at competitive costs or if Vedanta cannot secure additional reserves that can be mined at competitive costs, Vedanta may become more dependent upon third parties for copper concentrate, zinc concentrate and alumina. If Vedanta's existing iron Ore Reserves cannot be mined at competitive costs, the Vedanta iron ore business may become unprofitable. Because Vedanta's Ore Reserves decline as it mines the ore, Vedanta's future segment results and segment margins depend upon its ability to access Ore Reserves with geological characteristics that allow mining at competitive costs. Replacement reserves may not be available when required or, if available, may not be of a quality capable of being mined at costs comparable to the existing or exhausted mines.

Vedanta may not be able to accurately assess the geological characteristics of any Ore Reserves that it acquires, which may adversely affect its results of operations and financial condition. Because the value of Ore Reserves depends on that part of its mineral deposits that are economically and legally exploitable at the time of the reserve calculation, a decrease in metal prices may result in a reduction in the value of Ore Reserves that Vedanta obtains as less of the mineral deposits contained therein would be economically exploitable at the lower prices. Exhaustion of reserves at particular mines may also have an adverse effect on Vedanta's operating results that is disproportionate to the percentage of overall production represented by such mines. Further, with the depletion of reserves, Vedanta may face higher unit extraction costs per mine.

Vedanta's ability to obtain additional reserves in the future could be limited by restrictions under Vedanta's existing or future debt agreements, competition from its competitors, lack of suitable acquisition candidates, government regulatory and licencing restrictions, difficulties in obtaining mining leases and surface rights or the inability to acquire such properties on commercially reasonable terms, or at all. In addition, Vedanta is subject to various government limitations on its ability to mine. To increase production from Vedanta's existing copper, bauxite, lead-zinc and iron ore mines, it must apply for governmental approvals which it may not be able to obtain in a timely manner, or at all.

Changes in tariffs, royalties, customs duties and government assistance may reduce the domestic premium that Vedanta receives, which would adversely affect its profitability and results of operations.

Copper, zinc and aluminium are sold in the Indian market at a premium to the international market prices of these metals due to tariffs payable on the import of such metals. Between March 2003 and February 2011, basic customs duties on imported copper, zinc, lead and aluminium decreased cumulatively from 25.0% to 5.0%, and have remained at 5.0% since February 2011. With effect from 1 March 2016 basic custom duty on imported aluminium increased to 7.5%. The GoI may reduce customs duties further in the future, although the timing and extent of such reductions cannot be predicted. As Vedanta sells the majority of the commodities it produces in India, any further reduction in Indian tariffs on imports will decrease the premiums it receives in respect of those sales. Vedanta's profitability depends in part on the continuation of import duties, any reduction of which would have a material adverse effect on its results of operations and financial condition.

Vedanta pays royalties to the state governments of Chhattisgarh, Rajasthan, Goa and Karnataka based on the extraction of bauxite, lead-zinc and Iron ore. Most significant of these is the royalty that HZL is required to pay to the state government of Rajasthan, where all of HZL's mines are located, at a rate of 10.0%, with effect from 1 September 2014 (the rate was 8.4% from 13 August 2009 to 31 August 2014) of the zinc LME price payable on the zinc metal contained in the concentrate produced, 14.5% (the rate was 12.7% from 13 August 2009 to 31 August 2014) of the lead LME price payable on the lead metal contained in the concentrate produced and at a rate of 7.0% of silver LME price

chargeable on silver-metal produced. Any upward revision to the royalty rates being charged currently may adversely affect Vedanta Limited's profitability. Additionally, the Department of Mines and Geology of the State of Rajasthan has raised additional demands for payment through several show cause notices to HZL for mining minerals associated with lead and zinc such as cadmium and silver.

Similarly, Cairn India pays royalties and cess to the state governments and the Central government in India at rates determined by the respective governments, linked to the volume or value of oil produced. Any adverse changes in these fiscal terms may adversely affect its profitability. Cess earlier being levied on volume was adversely affecting the net realization in a declining oil price scenario. In the recent budget, levy of cess was made on an ad valorem basis. Vedanta also pays royalties to the government from Vedanta's Zinc International business. In Vedanta's iron ore business, it pays royalty on iron ore to the state governments of Goa at 15% of the average price declared periodically by the Indian Bureau of Mines and in Karnataka, royalty/Special Purpose Vehicle contribution at 15% is borne by buyer. Export duty on export of iron ore was paid at the rate of 30% ad valorem on the FOB value of exports with effect from 30 December 2011 (the rate being 20% prior to 30 December 2011) and the GoI had reduced the rate of export duty on iron ore fines of less than 58 grade from 30% to 10% which is effective from 1 June 2015. The duty was further reduced to nil duty effective 1 March 2016, on exports of iron ore less than 58 grade. In April 2014, the Supreme Court of India ordered to create the Iron Ore Goa Permanent Fund, wherein all lease holders have to contribute 10% of sales value to this fund. Changes in tax laws could also result in additional taxes payable by us.

Towards end of fiscal year 2015, the MMDRA is notified which brings greater transparency in granting of mineral concessions through an e-auction process. It also removes certain uncertainties relating to automatic renewals of mine leases for future periods. However for existing mining leases, it notifies an amount not exceeding royalty, to be contributed to District Mineral Foundation or DMF for the benefit of people affected by mining and an additional amount equivalent to 2% of royalty to National Mineral Exploration Trust. DMF contribution has now been notified at 30% of the base royalty rate in September 2015. Indian exports of copper, alumina, aluminium and zinc receive assistance premiums from the GoI, which have been reduced since fiscal year 2002 and may be further reduced in the future. Any reduction in these premiums will decrease the revenue Vedanta receives from export sales and may have a material adverse effect on its results of operations or financial condition.

### There are general risks relating to the operation of Vedanta's commercial power generation business.

Vedanta has been building and managing captive power plants in India since 1997, some of which sell their surplus power on the market to third parties. In addition to these captive power plants, Vedanta also owns and operates several commercial power plants, the largest of which is Vedanta Limited's 2,400 MW thermal coal-based power plant in Jharsuguda.

Operating power plants on a stand-alone basis involves many operational risks which are unique to the commercial power generation business as compared to Vedanta's other businesses, including the following:

• Dependence on third parties. Third parties must be hired for the construction, delivery and commissioning of power facilities, the supply and testing of equipment and transmission and the distribution of any electricity Vedanta generates and there are associated risks. For instance, contractors hired may not be able to complete construction and installation on time, within budget, or to the specifications in the contracts with them, or such contractors may otherwise cause delays in meeting project milestones or achieving commercial operation by the scheduled completion date, which could in turn cause forecast budgets to be exceeded or result in delayed payment by customers, invoke liquidated damages or penalty clauses or performance guarantees or result in termination of contracts. In addition, as a result of increased industrial development in India in recent years, the demand for

contractors with specialist design, engineering and project management skills and services has increased, resulting in a shortage of and increasing costs of services of such contractors. There can be no assurance that such skilled and experienced contractors will continue to be available at reasonable rates, and Vedanta may be exposed to risks relating to the cost and quality of their services, equipment and supplies.

- Dependence on coal. Vedanta may not receive the coal block allocations that it expects or, may not be allowed to use such allocations for its commercial power generation business. Any coal block allocations that Vedanta receives may not be sufficient for its planned operations and Vedanta may not be successful in procuring sufficient supply of coal at economically attractive prices, or at all. Additionally, the coal block allocation letters contain certain restrictive covenants which Vedanta is subject to, including specified end use and submission of mining plans within a certain specified period.
- Power purchase agreements. The power purchase agreements ("PPAs") and other agreements that Vedanta has entered into, or may enter into, may require it to guarantee certain minimum performance standards, such as plant availability and generation capacity, to the power purchasers. If Vedanta's facilities do not meet the required performance standards, the power purchasers may not reimburse Vedanta for any increased costs arising as a result of its plants' failure to operate within the agreed norms, which may in turn have a material adverse effect on Vedanta's results of operations and financial condition.
- Regulatory compliance. Power generation in India is a comprehensively regulated industry. See "Business Indian Regulatory Matters Power Sector" for more details. In particular, national and State regulatory bodies and other statutory and government mandated authorities may from time to time impose minimum performance standards upon Indian power generation facilities (including Vedanta's facilities). Failure to meet these requirements could expose facility operators to the risk of financial penalties, the quantum of which will depend on the severity of non-compliance and, in severe cases of non-compliance, involve plant shut downs.

Any of the above results could have a material and adverse effect on Vedanta's business, financial condition and results of operations.

Vedanta's metals and mining operations are subject to operating risks common to the industries in which they operate that could result in decreased production, increased cost of production and increased cost of or disruptions in transportation, which could adversely affect its business, results of operations and financial condition.

The success of each of Vedanta's businesses is subject to operating conditions and events common to the industry in which it operates which are beyond its control that could, among other things, increase its mining, transportation or production costs, disrupt or halt operations at its mines and production facilities permanently or for varying lengths of time, or interrupt the transportation of Vedanta's products to its customers. These conditions and events include:

• Disruptions in mining, drilling and production due to equipment failures, unexpected maintenance problems and other interruptions. All of Vedanta's operations are vulnerable to disruptions. Metal processing plants are especially vulnerable to interruptions, particularly where an event causes a stoppage which necessitates a shut down in operations. Stoppages in certain types of Vedanta's smelters, even if lasting only a few hours, can cause the contents of furnaces or cells to solidify, resulting in a plant closure for a significant period and necessitating expensive repairs, any of which could materially and adversely affect its results of operations or financial condition. Drilling may involve unprofitable efforts, not only with respect to dry wells, but also with respect to wells that are productive but do not produce sufficient net revenues to return a profit after drilling, operating and other costs.

- Availability of raw materials for energy requirements. Any shortage of or increase in the prices of the raw materials needed to satisfy Vedanta's energy requirements may interrupt its operations or increase its cost of production. Vedanta is particularly dependent on coal which is used in many of its captive power plants. Vedanta's aluminium business, which has high energy consumption due to the energy intensive nature of aluminium smelting, is significantly dependent on receiving allocations from Coal India, the government owned coal monopoly in India.
- Availability of water. The mining operations of Vedanta's zinc and aluminium businesses and its captive power plants depend upon the supply of a significant amount of water. There is no assurance that the water required for these operations will continue to be available for Vedanta in sufficient quantities or that the cost of water will not increase.
- Disruptions to or increased costs of transport services. Vedanta depends upon seaborne freight, inland water transport, rail, trucking, overland conveyor and other systems to transport bauxite, alumina, zinc concentrate, copper concentrate, iron ore, oil, natural gas, metallurgical coke, pig iron, coking coal and other supplies to its operations and to deliver its products to customers. Any disruption to or increase in the cost of these transport services, including as a result of fuel cost increases, interruptions that decrease the availability of these transport services or increases in demand for transport services from Vedanta's competitors or from other businesses, or any failure of these transport services to be expanded in a timely manner to support an expansion of Vedanta's operations, could have a material adverse effect on its business, results of operations and financial condition.
- Accidents at mines, smelters, refineries, cargo terminals and related facilities, including as a result of the occurrence of natural disasters. Any accidents or explosions, including as a result of the occurrence of natural disasters, causing personal injury, property damage or environmental damage at or to Vedanta's mines, smelters, refineries, cargo terminals and related facilities may result in significant losses, expensive litigation, imposition of penalties and sanctions or suspension or revocation of permits and licences. Injuries to and deaths of workers at Vedanta's mines and facilities have occurred in the past and may occur in the future.
- Strikes and industrial actions or disputes. The majority of Vedanta's workforce is unionised. Strikes and industrial actions or disputes have occurred in the past and may occur in the future, which may lead to business interruptions and halts in production for Vedanta.

The occurrence of any one or more of these conditions or events could have a material adverse effect on Vedanta's business, results of operations and financial condition.

Oil and gas exploration and production operations by Cairn India or operators of assets in which it has an interest will involve risks normally incidental to such activities, such as natural disasters and geological uncertainties, over which Vedanta has no control.

Oil and gas exploration and production operations by Cairn India or operators of assets in which it has an interest will involve risks normally incidental to such activities, including blowouts, oil spills, gas leaks, explosions, fires, equipment damage or failure, natural disasters, unexploded ordinance, geological uncertainties, unusual or unexpected rock formations and abnormal pressures. Offshore operations are also subject to natural disasters as well as to hazards inherent in marine operations and damage to pipelines, platforms, facilities and sub-sea facilities from trawlers, anchors and vessels. Cairn India's producing fields are located in areas that can be subject to extreme weather conditions, flooding, earthquake and other natural disasters.

Additionally, Cairn India or the operators of assets in which it has an interest may face interruptions or delays in the availability of equipment or infrastructure, including seismic survey vessels, rigs, pipelines and storage tanks, on which oil and gas exploration and production activities are dependent. Such interruptions or delays could result in disruptions to exploration activities, production, oil and gas off-take arrangements, increased costs, and may have a material adverse effect on Vedanta's businesses, prospects, financial condition or results of operations.

The occurrence of any of these events could result in environmental damage, injury to persons and loss of life, production delays, failure to produce oil or gas in commercial quantities or an inability to exploit fully discovered reserves.

Consequent delays to seismic, drilling or production activities and declines from normal field operating conditions can be expected to lead to increased costs or adversely affect revenue and cash flow levels to varying degrees. The majority of Cairn India's oil and gas production is sourced from its interests in a limited number of PSCs or concessions. Problems in any one PSC or concession could have a material adverse impact upon Vedanta's businesses and financial condition.

#### Oil and gas exploration activities are capital intensive and inherently uncertain in their outcome.

Oil and gas exploration activities are capital intensive and inherently uncertain in their outcome. There is a risk that Vedanta or the operators of assets in which it has an interest will undertake exploration activities and incur significant costs in so doing with no assurance that such expenditure will result in the discovery of hydrocarbons, whether or not in commercially viable quantities.

#### There are particular risks and hazards associated with underground mining.

In addition to ongoing exploration activities, Vedanta's zinc group company, HZL has finalised plans for the next phase of development growth, which will involve the sinking of underground shafts and developing underground mines. The plan comprises developing a 3.75 mtpa underground mine at Rampura Agucha, expanding the Sindesar Khurd mine from 2.0 mtpa to 4.50 mtpa, expanding the Zawar Group mines from 1.2 mtpa to 4.0 mtpa, expanding the Rajpura Dariba mine from 0.6 mtpa to 1.2 mtpa and developing the Kayad mine to 1 mpta.

Hazards associated with Vedanta's underground mining operations include underground fires and explosions, including those caused by flammable gas, cave-ins or ground falls, discharges of gases and toxic chemicals, flooding, sinkhole formation and ground subsidence and other accidents and conditions resulting from drilling and removing and processing material from an underground mine. If any of these hazards or accidents result in significant injury to employees and damage to equipment or other property, Vedanta may experience unexpected production delays, increased production costs, and increased capital expenditures to repair or replace equipment or property, as well as claims from affected employees and environmental and other authorities for any alleged breaches of applicable laws or regulations. Disruptions to mining, delays and costs on account of such hazards or accidents could have a material adverse effect on Vedanta's business, financial condition and results of operations.

#### The results of appraising discoveries and estimating Ore Reserves are uncertain.

The results of appraising discoveries are uncertain, which may result in reductions in projected reserves and production declines and may involve unprofitable efforts, not only from dry wells, but also from wells that are productive but uneconomic to develop. Furthermore, as Vedanta's Ore Reserves decline as it mines the ore, Vedanta's future segment results and segment margins depend upon its ability to access Ore Reserves with geological characteristics that allow mining at competitive costs and replacement reserves may not be available when required. Appraisal and development

activities may be subject to delays in obtaining governmental approvals or consents, shut-ins of connected wells, insufficient storage or transportation capacity or exhaustion and depletion of reserves or other geological and mechanical conditions all of which may result in a material increase of Vedanta's costs of operations or delay anticipated revenues.

Adverse changes in general economic, political and market conditions in the Middle East and North Africa region may affect global conditions.

Wars, acts of terrorism and uncertain political or economic prospects or instability in the Middle East and North Africa or MENA may adversely impact global financial markets and an increase in the price of crude oil. Recent protests in North Africa and the Middle East may continue and broaden across the MENA region and lead to significant political uncertainties in a number of countries.

#### Risks Relating to Investments in India

A substantial portion of Vedanta's assets and operations are located in India and Vedanta is subject to regulatory, economic, social and political uncertainties in India.

A substantial portion of Vedanta's assets and employees are located in India, and Vedanta intends to continue to develop and expand its facilities in India. Consequently, Vedanta's financial performance will be affected by changes in exchange rates and controls, interest rates, commodity prices, subsidies and controls, changes in government policies, including taxation policies, social and civil unrest and other political, social and economic developments in or affecting India.

The GoI exercises significant influence over many aspects of the Indian economy. Since 1991, successive Indian governments have pursued policies of economic liberalisation, including by significantly relaxing restrictions on the private sector. Nevertheless, the role of the Indian Central and State governments in the Indian economy as producers, consumers and regulators has remained significant and these liberalisation policies might not continue. The rate of economic liberalisation could change, and specific laws and policies affecting natural resources companies, foreign investments, currency exchange rates and other matters affecting investment in India could change as well. For instance, recently, the GoI and the RBI has declared that ₹500 and ₹1,000 denominations of bank notes have ceased to be legal tender. Pursuant to this currency demonetisation, these high denomination notes have no value and cannot be used for transactions or exchange purposes with effect from 9 November 2016. These notes are currently being replaced with a new series of bank notes. In an effort to monitor replacement of demonetised notes, the GoI has specified restrictive limits for exchange and withdrawal of currency all over India. The process of demonetisation and replacement of these high denomination notes is likely to reduce the liquidity in the Indian economy which has significant reliance on cash. These factors may result in reduction of purchasing power, and alteration in consumption patterns of the economy in general. While the comprehensive and long-term impact of this currency demonetisation measure cannot be ascertained at the moment, it is possible that there will be a slowdown in the economic activities in India, at least in the short term, given the demonetization impacts a majority quantity of the cash currency in circulation. Such a slowdown can adversely affect the Indian economy, in turn affecting the operations of Vedanta's business in India.

As the domestic Indian market constitutes a significant source of Vedanta's revenue, a downturn in the rate of economic growth in India will be detrimental to Vedanta's results of operations.

In fiscal year 2016, 63.1% of Vedanta's revenue was derived from commodities that were sold within India. The performance and growth of Vedanta's businesses are necessarily dependent on the health of the Indian economy which may be materially and adversely affected by political instability or regional conflicts, economic slowdown elsewhere in the world. The Indian economy also remains largely driven by the performance of the agriculture sector which depends on the quality of the monsoon which is difficult to predict. The Indian economy has grown significantly over the past few years. Past slowdowns in the Indian economy have harmed manufacturing industries, including

companies engaged in the copper, zinc, aluminium and iron ore sectors, as well as customers of manufacturing industries due to a reduction in demand for industrial production. Any slowdown in the Indian economy could have a material adverse effect on demand for the commodities that Vedanta produces and, as a result, on its financial condition and results of operations.

Terrorist attacks and other acts of violence involving India or neighbouring countries could adversely affect Vedanta's operations directly, or may result in a more general loss of customer confidence and reduced investment in these countries that reduces demand for Vedanta's products, which would have a material adverse effect on Vedanta's business, results of operations, financial condition and cash flows.

Terrorist attacks and other acts of violence or war involving India or other neighbouring countries may adversely affect the Indian markets and the worldwide financial markets. The occurrence of any of these events may result in a loss of business confidence, which could potentially lead to economic recession and generally have a material adverse effect on Vedanta's businesses, results of operations, financial condition and cash flows. In addition, any deterioration in international relations may result in investor concern regarding regional stability which could adversely affect the price of the Bonds.

South Asia has also experienced instances of civil unrest and hostilities among neighbouring countries from time to time, especially between India and Pakistan. Such activity or terrorist attacks could adversely affect the Indian economy by disrupting communications and making travel more difficult. Resulting political tensions could create a greater perception that investments in Indian companies involve a high degree of risk. Furthermore, if India were to become engaged in armed hostilities, particularly hostilities that were protracted or involved the threat or use of nuclear weapons, Vedanta might not be able to continue its operations.

### If natural disasters or environmental conditions in India, including floods and earthquakes, affect Vedanta's mining and production facilities, its revenues could decline.

Vedanta's mines and production facilities are spread across India, and Vedanta's sales force is spread throughout the country. Natural calamities such as floods, rains, heavy downpours (such as heavy downpours in Tuticorin in 2008 which caused the closure of Vedanta's Tuticorin facilities for two to three days, as well as the rains in Mumbai and other parts of the State of Maharashtra in 2005 and other states in 2006) and earthquakes could disrupt Vedanta's mining and production activities and distribution chains and damage Vedanta's storage facilities. Unusually heavy rains during the monsoon season in 2006 and 2013 in the states of Rajasthan and Gujarat triggered floods and caused destruction in these states. The area in which the Mangala field is located experienced flooding which directly affected existing well-sites and roads. Other regions in India have also experienced floods, earthquakes, tsunamis and droughts in recent years.

Substantially all of Vedanta's facilities and employees are located in India and could be affected by natural disasters. For example, the pipeline to transport crude oil from the northern fields of the Rajasthan block to Salaya, and thereafter to the Bhogat terminal in Gujarat, passes near Bhuj, which was the epicenter of an earthquake measuring 6.9 on the richter scale in 2001 and that resulted in the deaths of approximately 30,000 people as well as damage to the infrastructure in the region. Although Vedanta's Rajasthan block crude oil production plans assume that the proposed pipeline will withstand damage from fire, earthquakes, floods, storms and similar events, the pipeline might not withstand damage from such events. In addition, if there were a drought or general water shortage in India or any part of India where Vedanta's operations are located, the GoI or local, State or other authorities may restrict water supplies to Vedanta and other industrial operations in order to maintain water supplies for drinking and other public necessities, which would cause Vedanta to reduce or cease operations. Vedanta's business and operating activities could be disrupted if it does not respond, or are perceived not to respond, in an appropriate manner to any major crisis or if it is not able to restore or replace critical operational capacity.

If India's inflation worsens or the prices of coal, oil or other raw materials continue to rise, Vedanta may not be able to pass the resulting increased costs to its customers and this may have a material adverse effect on Vedanta's profitability or cause Vedanta to suffer operating losses.

India has experienced wholesale price inflation in recent years compared to historical levels due to higher demand than supply. In addition, international prices of crude oil and natural gas have recently experienced significant volatility. Inflation, increased transportation costs and an increase in energy prices generally, which may be caused by a rise in the price of oil, or an increase in the price of thermal coking coal in particular, could cause Vedanta's costs for raw material inputs required for production of Vedanta's products to increase, which may have a material adverse effect on its results of operations and financial condition if Vedanta cannot pass these added costs on to customers.

#### Stringent labour laws in India may adversely affect Vedanta's profitability.

India has stringent labour legislation that protects the interests of workers, including legislation that sets forth detailed procedures for industrial dispute resolution and employee compensation for injury or death sustained in the course of employment, and imposes financial obligations on employers upon employee layoffs. This may make it difficult for Vedanta to maintain flexible human resource policies, discharge employees or downsize, which may have a material adverse effect on Vedanta's business, financial condition and results of operations.

Restrictions on foreign investment in India may prevent Vedanta from making future acquisitions or investments in India, which may have a material adverse effect on Vedanta's results of operations, financial condition and cash flows.

India regulates ownership of Indian companies by foreigners, as well as external commercial borrowing by Indian companies, although restrictions on foreign investment and external commercial borrowing have been relaxed significantly in recent years. These regulations and restrictions may apply to acquisitions by Vedanta, or other members of Vedanta who are not resident in India, of shares in Indian companies or the provision of funding by Vedanta or any other non-Indian resident entity to Indian companies within Vedanta. There can be no assurance that Vedanta will be able to obtain any required approvals for future acquisitions or investments in India, or that Vedanta will be able to obtain such approvals on satisfactory terms.

# A slowdown in economic growth in India and other countries in which Vedanta operates could cause its business to suffer.

The Indian securities market and the Indian economy are influenced by economic and market conditions in other countries. Although economic conditions are different in each country, investors' reactions to developments in one country can have adverse effect on the securities of companies in other countries, including India. A loss of investor confidence in the financial systems of other emerging markets may cause volatility in Indian financial markets and, indirectly, in the Indian economy in general. Any worldwide financial instability could also have a negative impact on the Indian economy, including the movement of exchange rates and interest rates in India. Any slowdown in the Indian economy, or future volatility in global commodity prices, could adversely affect the growth of Vedanta's India business.

The Indian economy and financial markets are also significantly influenced by worldwide economic, financial and market conditions. Any financial turmoil, especially in the United States, United Kingdom, Europe or China, may have a negative impact on the Indian economy. Although economic conditions differ in each country, investors' reactions to any significant developments in one country can have adverse effects on the financial and market conditions in other countries. A loss in investor confidence in the financial systems, particularly in other emerging markets, may cause increased volatility in Indian financial markets.

For instance, on 23 June 2016, the United Kingdom held a referendum on its membership of the European Union and voted to leave (Brexit). There is significant uncertainty at this stage as to the impact of Brexit on general economic conditions in the United Kingdom and the European Union and any consequential impact on global financial markets. For example, Brexit could give rise to increased volatility in foreign exchange rate movements and the value of equity and debt investments. A lack of clarity over the process for managing the exit and uncertainties surrounding the economic impact could lead to a further slowdown and instability in financial markets. This and any prolonged financial crisis may have an adverse impact on the Indian economy, thereby resulting in a material adverse effect on Vedanta's business, financial condition and results of operations.

# Vedanta may be affected by competition law in India and any adverse application or interpretation of the Competition Act could adversely affect its business.

The Competition Act, 2002, as amended (the "Competition Act"), regulates practices having an appreciable adverse effect on competition in the relevant market in India. Under the Competition Act, any formal or informal arrangement, understanding or action in concert, which causes or is likely to cause an appreciable adverse effect on competition is considered void and results in the imposition of substantial monetary penalties. Further, any agreement among competitors which, directly or indirectly, involves the determination of purchase or sale prices, limits or controls production, supply, markets, technical development, investment or provision of services, shares the market or source of production or provision of services by way of allocation of geographical area, type of goods or services or number of clients in the relevant market or, directly or indirectly, results in bid-rigging or collusive bidding is presumed to have an appreciable adverse effect on competition. The Competition Act also prohibits abuse of a dominant position by any enterprise. The Competition Commission of India (the "CCI"), has extra-territorial powers and can investigate any agreements, abusive conduct or combination occurring outside India if such agreement, conduct or combination has an appreciable adverse effect on competition in India. The Indian operations of Vedanta are currently not subject to any outstanding proceedings under the Competition Act. However, if the Indian operation of Vedanta is affected, directly or indirectly, by the application or interpretation of any provision of the Competition Act, or any enforcement proceedings initiated by the CCI, or any adverse publicity that may be generated due to scrutiny or prosecution by the CCI or if any prohibition or substantial penalties are levied under the Competition Act, it would adversely affect Vedanta's business, cash flows and results of operation.

#### Risks Relating to the Bonds

As a holding company, the Company's financial condition is entirely dependent on the financial condition, including cash available for distribution, and operating results of its subsidiaries.

The Company's results of operations and financial condition are entirely dependent on the financial condition and operating results of its subsidiaries. The Company's ability to pay interest and principal on the Bonds will depend upon the level of distributions, interest payments and loan repayments, if any, received from its operating subsidiaries and associated undertakings, any amounts received on asset disposals and the level of cash balances. Certain of the Company's operating subsidiaries and associated undertakings are and may, from time to time, be subject to restrictions on their ability to make distributions and loans including as a result of restrictive covenants in loan agreements, foreign exchange and other regulatory restrictions and agreements with the other shareholders of such subsidiaries or associated undertakings. The Company's net leverage ratios described in this Offering Circular, including Net Debt/Capitalisation and Net Debt over Vedanta EBITDA, are reported on a consolidated basis and do not take into account such restrictions on the Company's ability to access cash at its subsidiaries or the Company's economic percentage holding in its subsidiaries and should therefore not be exclusively relied upon as measures of the Company's ability to repay debt. See "Management's Discussion and Analysis of Financial Condition and Result of Operations for Vedanta — Liquidity and Capital Resources".

In addition, all dividends paid by Indian companies are currently subject to dividend distribution tax at a rate of 17.3% (including a surcharge of 12.0% and education cess at the rate of 3%) which is payable by the company paying the dividend. The credit of dividend distribution tax paid by the Indian company may not be available for the credit under the Indo-UK Double Taxation Avoidance Agreement. There can be no assurance that the GoI will not further increase the surcharges or dividend taxes it imposes or reintroduce withholding tax on dividends declared, distributed or paid. There can be no assurance that such restrictions and taxes will not have a material adverse effect on Vedanta's results of operations or financial condition or on Vedanta's ability to make payments of interest and principal on the Bonds.

#### The Bonds will be structurally subordinated to the debt held by the Company's subsidiaries.

The Company's operations are principally conducted through its subsidiaries. Accordingly, the Company is, and after this offering will continue to be, dependent on its subsidiaries' operations and cash flows to service its indebtedness, including the Bonds. The Bonds will be structurally subordinated to the claims of all holders of debt securities and other creditors, including trade creditors, of its subsidiaries, and to all of its secured creditors. In the event of an insolvency, bankruptcy, liquidation, reorganisation, dissolution or winding-up of the business of any subsidiary of the Company, creditors of such subsidiary will generally have the right to be paid in full before any distribution is made to the Company.

In this regard, it should be noted that the subsidiaries of the Company, including Vedanta Limited, BALCO, HZL, TSPL, TSMHL, VGCB, FGF and KCM have raised debt in the past, which is currently outstanding and repayable over the term of the Bonds. Moreover, some of this debt is secured by a first charge on assets and properties of the respective companies and/or a first charge on current assets including stocks and book debts, which may affect Vedanta's ability to pay the holders of the bond (the "Bondholders"). As of 30 September 2016, Vedanta had total debt of \$16,333.3 million of which \$12,186.4 million existed at the Company's subsidiaries.

#### The Company may not be able to repurchase the Bonds upon a change of control.

The Company will agree in the Conditions that it will timely repay all borrowings, or obtain consents as necessary under, or terminate, agreements or instruments that would otherwise prohibit a change of control offer required to be made pursuant to the Trust Deed. Notwithstanding this agreement, if the Company is unable to repay (or cause to be repaid) all of the borrowings, if any, that would prohibit the repurchase of the Bonds or if the Company is unable to obtain the requisite consents of the holders of such borrowings, or terminate any agreements or instruments that would otherwise prohibit a change of control offer, the Company would continue to be prohibited from purchasing the Bonds. In that case, the Company's failure to purchase the tendered Bonds would constitute an event of default under the Conditions.

Certain of the events constituting a change of control under the Bonds will also constitute an event of default under certain other debt instruments. Future debt of the Company may also: (i) prohibit it from purchasing the Bonds in the event of the occurrence of a change of control; (ii) provide that the occurrence of a change of control is a default; or (iii) require repurchase of such debt upon the occurrence of a change of control. Moreover, the exercise by the Bondholders of their right to require the Company to purchase the Bonds could cause a default under other borrowings, even if the change of control itself does not, due to the financial effect of the purchase on the Company. The Company's ability to pay cash to the Bondholders following the occurrence of a change of control may be limited by its then existing financial resources. There can be no assurance that sufficient funds will be available when necessary to make the required purchase of the Bonds.

#### There is no existing market for the Bonds.

There can be no assurance regarding the future development of a market for the Bonds, or the ability of Bondholders to sell their Bonds, or the price at which such holders may be able to sell their Bonds. If a market for the Bonds were to develop, the Bonds could trade at prices that may be higher or lower than the initial issue price depending on many factors, including prevailing interest rates, Vedanta's operating results, the market for similar securities, and the rating of the Bonds or the Company given by rating agencies.

The Bonds will be a new issue of securities with no existing trading market. The Company, through its listing agent, will apply to list the Bonds on the official list of the SGX-ST. However, the Company can not make any assurances that the Bonds will ultimately be listed on the exchange or that a liquid trading market will develop for the Bonds.

#### The market price of the Bonds may be volatile.

The market price of the Bonds could be subject to wide fluctuations in response to numerous factors, many of which are beyond the control of Vedanta. These factors include, among other things, actual or anticipated variations in operating results, earnings releases by Vedanta and its competitors, changes in financial estimates by securities analysts, market conditions in the industry and the general state of the securities markets, governmental legislation or regulation, currency and exchange rate fluctuations, interest rates, the rating of the Bonds or Vedanta given by the rating agencies, as well as general economic and market conditions, such as recessions.

#### The Bonds may not be a suitable investment for all investors.

Each potential investor in the Bonds must determine the suitability of that investment in light of its own circumstances. In particular, each potential investor should:

- have sufficient knowledge and experience to make a meaningful evaluation of the Bonds, the merits and risks of investing in the Bonds and the information contained in this Offering Circular;
- have access to, and knowledge of, appropriate analytical tools to evaluate, in the context of its particular financial situation, an investment in the Bonds and the impact such investment will have on its overall investment portfolio;
- have sufficient financial resources and liquidity to bear all of the risk of an investment in the Bonds, including where the currency for principal or interest payments is different from the potential investor's currency;
- understand thoroughly the terms of the Bonds and be familiar with the behaviour of any relevant financial markets; and
- be able to evaluate (either alone or with the help of a financial adviser) possible scenarios for economic, interest rate and other factors that may affect its investment and its ability to bear the applicable risks.

A potential investor should not invest in the Bonds, which are complex financial instruments, unless it has the expertise (either alone or with a financial adviser) to evaluate how the Bonds will perform under changing conditions, the resulting effects on the value of the Bonds and the impact this investment will have on the potential investor's overall investment portfolio.

#### Early redemption may adversely affect the Bondholders' return on the Bonds.

The Bonds may be redeemed only in full and not in part, at the option of the Company at any time. This feature of the Bonds may limit their market value. During the period when the Company may elect to redeem the Bonds, the market value of the Bonds generally will not rise substantially above the price at which they can be redeemed. The Company may be expected to exercise its option to redeem the Bonds when its cost of borrowing is lower than the interest rate on the Bonds.

Further, in the event that the Company would be obliged to pay additional amounts in respect of any Bonds due to any withholding or deduction for or on account of, any present or future taxes, duties, assessments or governmental charges of whatever nature imposed, levied, collected, withheld or assessed by or on behalf of the United Kingdom or any authority therein or thereof having power to tax, the Company may redeem in whole, but not in part, the Bonds in accordance with the Conditions. In either of these circumstances, an investor may not be able to reinvest the redemption proceeds in a comparable security with an effective rate equal to that of the Bonds.

#### Risks relating to change of law.

The Conditions of the Bonds will be based on English law as of the date of this Offering Circular. No assurance can be given as to the impact of any possible judicial decision or change to English law or any administrative practice thereof after the date of this Offering Circular.

#### Developments in other markets may adversely affect the market price of the Bonds.

The market price of the Bonds may be adversely affected by declines in the international financial markets and world economic conditions. Global financial markets, to varying degrees, are influenced by economic and market conditions in other markets. Although economic conditions are different in each country, investors' reactions to developments in one country can affect the securities markets and the securities of issuers in other countries. If adverse developments occur in the international financial markets in the future, the market price of the Bonds could be adversely affected.

#### No voting rights.

Bondholders do not have any right to vote at any shareholders' meetings of the Company. Consequently, Bondholders cannot influence any decisions by the Board or any decisions by shareholders concerning the Company's capital structure, including the declaration of dividends in respect of the Company's ordinary shares.

### Bondholders are bound by decisions of defined majorities in respect of any modification, waivers and substitution.

The Conditions of the Bonds contain provisions for calling meetings of Bondholders to consider matters affecting their interests generally. These provisions permit defined majorities to bind all Bondholders, including Bondholders who did not attend and vote at the relevant meeting and Bondholders who voted in a manner contrary to the majority.

#### Interest rate risks.

The Bonds are fixed interest rate securities. Subsequent changes in market interest rates may adversely affect the value of the Bonds.

A downgrade in Vedanta's credit ratings or the ratings assigned to the Bonds may adversely affect Vedanta's ability to access capital.

Vedanta's current Issuer rating is "B+" with a stable outlook by S&P and "B1" with a stable outlook by Moody's. Currently, the long term debt rating by Moody's is "B3". A downgrade may adversely affect Vedanta's ability to access capital and would likely result in more stringent covenants and higher interest rates under the terms of any new indebtedness.

In addition, the Bonds are expected, on the Closing Date, to be rated "B3" by Moody's, "B+" by S&P. These ratings of the Bonds may be reviewed and changed at any time by one or more of these agencies, and they may be lowered or withdrawn entirely in the future. A suspension, reduction or withdrawal at any time of the ratings assigned to the Bonds may adversely affect the market price of the Bonds.

#### Credit ratings may not reflect all risks.

One or more independent credit rating agencies may assign credit ratings to the Bonds or the Company's senior unsecured indebtedness. The ratings may not reflect the potential impact of all risks related to structure, market, additional factors discussed above, and other factors that may affect the value of the Bonds. A credit rating is not a recommendation to buy, sell or hold Bonds and may be revised or withdrawn by the rating agency at any time.

#### The Trustee may not take action on behalf of the Bondholders.

The Conditions and the terms of the Trust Deed provide that, in certain circumstances, the Trustee may take action on behalf of the Bondholders, but only if the Trustee is indemnified and/or secured (including by way of payment in advance) to its satisfaction. It may not, depending on the particular circumstances at the relevant time, be possible for the Trustee to take certain actions in relation to the Bonds and accordingly, in such circumstances, the Trustee will be unable to take such actions, notwithstanding the provision for an indemnity and/or security to it and, as a result and if possible, it will be up to the Bondholders to take such action directly.

Holders of Bonds held through DTC, Euroclear and Clearstream, Luxembourg must rely on procedures of those clearing systems to effect transfers of Bonds, receive payments in respect of Bonds and vote at meetings of Bondholders.

Bonds will be represented on issue by one or more Global Certificates that may be deposited with a common depositary for Euroclear and Clearstream, Luxembourg or may be deposited with a nominee for DTC (each as defined under "Summary of Provisions Relating to the Bonds While in Global Form"). Except in the circumstances described in each Global Certificate, investors will not be entitled to receive Bonds in definitive form. Each of DTC, Euroclear and Clearstream, Luxembourg and their respective direct and indirect participants will maintain records of the beneficial interests in each Global Certificate held through it. While the Bonds are represented by a Global Certificate, investors will be able to trade their beneficial interests only through the relevant clearing systems and their respective participants.

While the Bonds are represented by Global Certificates, the Company will discharge its payment obligation under the Bonds by making payments through the relevant clearing systems. A holder of a beneficial interest in a Global Certificate must rely on the procedures of the relevant clearing system and its participants to receive payments under the Bonds. The Company has no responsibility or liability for the records relating to, or payments made in respect of, beneficial interests in any Global Certificate. Holders of beneficial interests in a Global Certificate will not have a direct right to vote in respect of the Notes so represented. Instead, such holders will be permitted to act only to the extent that they are enabled by the relevant clearing system and its participants to appoint appropriate proxies. If definitive Notes are issued, holders should be aware that definitive Notes that have a denomination that is not an integral multiple of the minimum specified denomination may be illiquid and difficult to trade.

#### **USE OF PROCEEDS**

The net proceeds from this offering, after deduction of underwriting fees, discounts and commissions and other estimated expenses associated with this offering, are expected to be approximately \$989.0 million. The Company intends to use the net proceeds from this offering primarily:

- to fund the Company's Tender Offers for any and all of its outstanding US\$750,000,000 9.50% Bonds due 2018 ("2018 Bonds") and US\$1,200,000,000 6.00% Bonds due 2019 ("2019 Bonds") and
- to repay other existing indebtedness of the Company.

In the event the Tender Offers are not completed for any reason, Vedanta intends to use the net proceeds from this offering primarily to repay existing debt. The net proceeds from this offering shall be used in accordance with applicable law.

#### RATIO OF EARNINGS TO FIXED CHARGES

The following table sets forth the Company's ratio of earnings to fixed charges for the periods indicated.

				Six Month	s Ended
	Fiscal year Ended 31 March			30 September	
	2014	2015	2016	2015	2016
			(\$ million)		
EARNINGS/(LOSS)					
Profit/(loss) before taxation (excluding share in consolidated profit of					
associate)	1,118.1	(5,640.2)	(4,984.0)	243.7	426.5
Add: Fixed charges	1,523.2	1,520.3	1,356.0	680.1	714.5
Less: Capitalisation of borrowing					
costs <sup>(1)</sup>	(83.4)	(133.1)	(75.6)	(41.0)	(62.2)
Total Earnings/(Loss)	2,557.9	(4,523.0)	(3,703.6)	882.8	1,078.8
FIXED CHARGES <sup>(2)</sup>					
Total interest cost	1,494.6	1,474.3	1,352.7	672.7	704.7
Unwinding of discount on provisions	21.8	36.8	13.5	7.4	9.1
Interest on defined benefit					
arrangements	6.8	9.2	10.4		0.7
Gain on buyback of convertible bond			(20.6)		
Total Fixed Charges	1,523.2	1,520.3	1,356.0	680.1	714.5
Ratio of Earnings to Fixed Charges	1.7	_	_	1.3	1.5

<sup>(1)</sup> Amortization/depreciation on interest capitalized in prior years has not been added back to the earnings/(loss)

<sup>(2)</sup> The interest element of operating lease rentals is immaterial and has not been included in fixed charges.

#### CAPITALISATION AND INDEBTEDNESS

The following table sets out the consolidated cash and cash equivalents, capitalisation and indebtedness of the Company as of 30 September 2016:

- 1. on a historical basis; and
- 2. The "as adjusted" data set forth below gives effect to the issuance of the Bonds after deduction of underwriting fees, discounts and commissions and other estimated expenses associated with this offering and the concurrent repurchase of the outstanding any and all 2018 Bonds and 2019 Bonds through the Tender Offers and repayment of the Company's other existing indebtedness. See "Use of Proceeds" for further details.

This table should be read in conjunction with "Management's Discussion and Analysis of Financial Condition and Results of Operations", "Use of Proceeds" and the Interim Financial Statements as at 30 September 2016 prepared in accordance with IAS 34, the related notes and other financial information contained elsewhere in this Offering Circular.

	Actual	
	(unaudited)	As Adjusted
	(\$ m	illion)
Cash and Cash Equivalents	8,167.3	8,314.4 <sup>(1)</sup>
Share Capital	30.1	30.1
Share premium	201.5	201.5
Treasury shares	(557.9)	(557.9)
Share based payment reserve	26.0	26.0
Convertible bond reserve	0.4	0.4
Hedging reserve	(91.4)	(91.4)
Other reserves	7.0	7.0
Retained earnings	(490.0)	(490.0)
Equity attributable to equity holders of the parent	(874.3)	(874.3)
Non-Controlling interests	7,827.2	7,827.2
Total Equity	6,952.9	6,952.9
Term loans — secured — (repayable < 1 year)	373.2	373.2
Term loans — unsecured — (repayable < 1 year)	_	_
Term loans — secured — (repayable > 1 year)	6,365.8	6,365.8
Term loans — unsecured — (repayable > 1 year)	539.3	539.3
Other borrowings and indebtedness — secured — (repayable < 1 year)	1,369.8	1,369.8
Other borrowings and indebtedness — unsecured — (repayable < 1		
year)	2,560.2	2,560.2
Other borrowings and indebtedness — secured — (repayable > 1 year)	1,797.1	1,797.1
Other borrowings and indebtedness — unsecured — (repayable > 1		
year)	3,320.2	2,524.3
Convertible bonds — (repayable < 1 year)	7.7	7.7
Convertible bonds — (repayable > 1 year)	_	_
Bonds offered hereby		1,000.0
Total Indebtedness	16,333.3	16,537.4
Total Capitalisation	23,286.2	23,490.3

<sup>(1)</sup> Reflects the balance net proceeds after deducting \$841.9 million to be used to pay for the purchase of the 2018 Bonds and the 2019 Bonds in the Tender Offers (without giving effect to the 2018 Bonds and 2019 Bonds that remain subject to guaranteed delivery procedures as of the date of this Offering Circular). The Company will use the balance net proceeds in the manner specified under "Use of Proceeds" section.

#### **EXCHANGE RATES**

Substantially all of Vedanta's revenue is denominated or paid with reference to US dollars and most of Vedanta's expenses are incurred and paid in Indian Rupees, South African Rand and Zambian Kwacha. The Company reports its financial results in US dollars. The exchange rates among the Indian Rupee and the US dollar have changed substantially in recent years and may fluctuate substantially in the future. The results of the Company's operations are affected as the Indian Rupee appreciates or depreciates against the US dollar and, as a result, any such appreciation or depreciation may affect the market price of the Bonds.

The following table sets forth, for the periods indicated, information concerning the exchange rates between Indian Rupees and US dollars based on the RBI Reference Rate for the periods indicated:

	Period End	Average <sup>(1)</sup>	High	Low
Fiscal Year:				
2012	51.16	47.95	54.24	43.95
2013	54.39	54.45	57.22	50.56
2014	60.10	60.50	68.36	53.74
2015	62.59	61.15	63.75	58.43
2016	66.33	65.46	68.78	62.16
Six months ended 30 September 2015	65.74	64.23	66.74	62.16
Six months ended 30 September 2016	66.66	66.95	68.01	66.24
Month:				
June 2016	67.62	67.30	68.01	66.63
July 2016	67.03	67.21	67.50	66.91
August 2016	66.98	66.94	67.19	66.74
September 2016	66.66	66.74	67.06	66.36
October 2016	66.86	66.75	66.89	66.53
November 2016	68.53	67.63	68.72	66.43
December 2016	67.95	67.90	68.37	67.43
January 2017 (through 13 January 2017)	68.23	68.08	68.23	67.79

Although the Company has translated selected Indian Rupee amounts in this Offering Circular into US dollars for convenience, this does not mean that the Indian Rupee amounts referred to represent US dollar amounts could have been or could be converted to US dollars at any particular rate, the rates stated above, or at all.

<sup>(1)</sup> Represents the average of the RBI Reference Rate on the last day of each month during the period for all fiscal years presented and the average of the RBI Reference Rates for all days during the period for all months presented.

The following table sets forth, for the periods indicated, information concerning the exchange rates between South African Rand and US dollars based on the Noon Buying Rate in New York City for cable transfers in South African Rand as certified by the Federal Reserve Bank of New York:

	$\underline{Period\ End^{(1)}}$	Average <sup>(1)(2)</sup>	High	Low
Fiscal Year:				
2012	7.66	7.41	8.55	6.57
2013	9.18	8.55	9.32	7.63
2014	10.53	10.11	11.25	8.90
2015	12.14	11.06	12.47	10.30
2016	14.71	13.75	16.88	11.72
Six months ended 30 September 2015	13.82	12.54	13.97	11.72
Six months ended 30 September 2016	13.72	14.52	15.88	13.31
Month:				
June 2016	14.78	15.05	15.60	14.43
July 2016	13.89	14.39	14.79	13.89
August 2016	14.70	13.79	14.70	13.31
September 2016	13.72	14.01	14.68	13.48
October 2016	13.49	13.93	14.36	13.49
November 2016	14.08	13.95	14.38	13.34
December 2016	13.70	13.85	14.10	13.52
January 2017 (through 6 January 2017)	13.72	13.67	13.78	13.56

Although the Company has translated selected South African Rand amounts in this Offering Circular into US dollars for convenience, this does not mean that the South African Rand amounts referred to represent US dollar amounts or have been, could have been or could be converted to US dollars at any particular rate, the rates stated above, or at all. Unless otherwise stated herein, all translations in this Offering Circular from South African Rand to US dollars are based on the Noon Buying Rate on 30 September 2016 which was Rand 1 = \$13.72.

<sup>(1)</sup> The Noon Buying Rate at each period end and the average Noon Buying Rate for each period may have differed from the exchange rates used in the preparation of financial statements included elsewhere in this Offering Circular.

<sup>(2)</sup> Represents the average of the Noon Buying Rates on the last day of each month during the period for all fiscal years presented and the average of the Noon Buying Rates for all days during the period for all months presented.

The following table sets forth, for the periods indicated, information concerning the exchange rates between Zambian Kwachas and US dollars based on the spot rates provided by Bloomberg:

	Period End(1)	Average <sup>(1)(2)</sup>	High	Low
Fiscal Year:				
2011	4,710	4,833	5,260	4,590
2012	5,280	4,973	5,345	4,695
2013	5,366	5,169	5,420	4,725
2014	6,386	6160	7,042	5,467
2015	11,000	8,653	14,250	6,377
2016	9,875	10,335	11,390	9,260
Six months ended 30 September 2015	12,050	8,006	12,330	7,060
Six months ended 30 September 2016	10,050	10,071	11,005	9,260
Month:				
June 2016	10,400	10,686	11,005	10,071
July 2016	10,250	9,938	10,500	9,450
August 2016	9,530	10,006	10,500	9,530
September 2016	10,050	9,961	10,232	9,650
October 2016	9,600	9,885	10,050	9,600
November 2016	9,865	9,826	9,930	9,660
December 2016	9,938	10,297	11,390	9,260
January 2017 (through 13 January 2017)	9,930	10,014	10,150	9,920

Although the Company has translated selected Zambian kwacha amounts in this Offering Circular into US dollars for convenience, this does not mean that the Zambian kwacha amounts referred to represent US dollar amounts or have been, could have been or could be converted to US dollars at any particular rate, the rates stated above, or at all. Unless otherwise stated herein, all translations in this Offering Circular from Zambian kwachas to US dollars are based on the spot rates provided by Bloomberg on 30 September 2016, which was ZMW 10,050 per \$1.00.

<sup>(1)</sup> The last price at each period end and the average last price for each period may have differed from the exchange rates used in the preparation of financial statements included elsewhere in this Offering Circular.

<sup>(2)</sup> Represents the average of the last price on the last day of each month during the period for all fiscal years presented and the average of the last price for all days during the period for all months presented.

#### SELECTED CONSOLIDATED FINANCIAL INFORMATION

The following tables present the summary historical consolidated financial information for the Company for the periods ended and at the dates indicated below. The summary historical consolidated financial information as of and for fiscal years ended 2015 and 2016 been derived from the audited consolidated financial statements included elsewhere in this Offering Circular. The financial information as of and for fiscal year ended 31 March 2014 has been extracted from the comparative financial information included in the audited consolidated financial statements for fiscal year ended 31 March 2015. The Company's annual consolidated financial statements have been prepared and presented in accordance with IFRS as adopted by the EU. The summary financial information as of and for the six months ended 30 September 2015 and 2016 has been derived from the unaudited condensed consolidated financial statements for the six months ended 30 September 2016 included elsewhere in this Offering Circular. The Company's unaudited condensed consolidated financial statements have been prepared in accordance with IAS 34, Interim Financial Reporting.

You should read the following information in conjunction with "Management's Discussion and Analysis of Financial Condition and Results of Operations", the Financial Statements and the notes thereto included elsewhere in this Offering Circular.

#### **Consolidated Income Statement**

			Six months ended		
	Fiscal year Ended 31 March			30 Sept	tember
	2014	2015	2016	2015	2016
			(\$ million)		
Continuing operations					
Revenue	12,945.0	12,878.7	10,737.9	5,699.3	4,867.8
Cost of sales	(10,043.2)	(10,463.9)	(9,241.1)	(4,800.7)	(3,900.0)
Gross profit	2,901.8	2,414.8	1,496.8	898.6	967.8
Other operating income	84.0	104.0	101.7	62.8	40.1
Distribution costs	(237.6)	(245.2)	(223.8)	(104.2)	(111.1)
Administrative expenses	(460.1)	(538.1)	(493.5)	(279.4)	(177.0)
Special Items	(138.0)	(6,744.2)	(5,210.1)		
Operating profit/(loss)	2,150.1	(5,008.7)	(4,328.9)	577.8	719.8
Investment revenue	687.7	832.6	697.8	372.8	385.6
Finance costs	(1,439.8)	(1,387.2)	(1,280.4)	(639.1)	(652.3)
Other gains and (losses) (net)	(279.9)	(76.9)	(72.5)	(67.8)	(26.6)
Profit/(Loss) before taxation	1,118.1	(5,640.2)	(4,984.0)	243.7	426.5
Net tax credit/(expense)	(128.7)	1,852.5	1,481.9	(397.3)	(169.2)
Profit/(Loss) for the year/					
period	989.4	(3,787.7)	(3,502.1)	(153.6)	257.3
Attributable to:					
Equity holders of the parent	(196.0)	(1,798.6)	(1,837.4)	(324.5)	(64.2)
Non-controlling interests	1,185.4	(1,989.1)	(1,664.7)	170.9	321.5
Profit/(Loss) for the year/					
(period)	989.4	(3,787.7)	(3,502.1)	(153.6)	257.3
Basic earnings per ordinary					
share	(71.7)	(654.5)	(665.8)	(117.7)	23.2
Diluted earnings per ordinary					
share	(71.7)	(654.5)	(665.8)	(117.7)	23.2

#### **Consolidated Balance Sheet**

	As of 31 March			Six month	
	2014	2015	2016	2015	2016
			(\$ million)		
ASSETS					
NON-CURRENT ASSETS					
Goodwill	16.6	16.6	16.6	16.6	16.6
Intangible assets	108.6	101.9	92.2	94.6	89.7
Property, plant and equipment	31,043.5	23,352.0	16,647.8	22,490.4	16,699.8
Financial asset investments	1.7	4.2	6.5	6.4	7.1
Non-current tax assets	_	394.0	361.7	351.5	381.6
Other non-current assets	132.1	156.0	237.9	183.5	283.3
Financial instruments					
(derivatives)	16.2	0.2	0.8	1.9	0.6
Deferred tax assets	1,223.7	1,252.6	1,255.4	1,132.3	1,250.8
	32,542.4	<u>25,277.5</u>	18,618.9	24,277.2	18,729.5
CURRENT ASSETS					
Inventories	1,742.5	1,605.7	1,365.8	1,541.1	1,550.1
Trade and other receivables	1,739.9	1,839.2	1,344.3	1,624.5	1,516.4
Financial instruments	1,737.7	1,037.2	1,5 1 1.5	1,021.5	1,510.1
(derivatives)	54.0	16.6	18.3	13.1	2.4
Current tax assets	357.6	40.1	35.5	34.8	0.0
Liquid investments	8,568.5	7,856.1	8,508.2	8,534.4	7,794.9
Cash and cash equivalents	369.4	353.7	428.3	382.3	372.4
	12,831.9	11,711.4	11,700.4	12,130.2	11,236.2
TOTAL ASSETS	45,374.3	36,988.9	30,319.3	36,407.4	29,965.7
LIABILITIES CURRENT LIABILITIES					
Short term borrowings	(2,437.0)	(3,179.2)	(3,726.6)	(4,113.0)	(4,303.2)
Convertible bonds	(1,921.5)		(587.2)	(1,110.4)	(7.7)
Trade and other payables	(4,690.0)	(4,730.0)	(5,876.1)	(5,249.3)	(5,343.0)
Financial instruments (derivatives)	(118.7)	(45.7)	(67.7)	(28.5)	(53.9)
Retirement benefits	(4.8)	(12.7)	(4.9)	(6.7)	(7.1)
Provisions	(88.7)	(140.8)	(132.1)	(155.0)	(117.4)
Current tax liabilities	(29.3)	(74.2)	(17.0)	(92.8)	(46.2)
NET CURRENT ACCETS	(9,290.0)	(8,182.6)	(10,411.6)	(10,755.7)	(9,878.5)
NET CURRENT ASSETS	3,541.9	3,528.8	1,288.8	1,374.5	1,357.7

	As of 31 March			~	30 September	
	2014	2015	2016	2015	2016	
			(\$ million)			
NON-CURRENT LIABILITIES						
Medium and long term						
borrowings	(12,512.7)	(12,385.6)	(11,949.5)	(11,220.6)	(12,022.4)	
Convertible bonds	_	(1,103.0)	_	(6.9)	_	
Trade and other payables	(203.3)	(194.3)	(223.5)	(321.1)	(79.9)	
Financial instruments						
(derivatives)	(27.4)	(0.1)	(1.2)	(0.2)	(3.2)	
Deferred tax liabilities	(4,960.1)	(2,588.7)	(620.2)	(2,703.6)	(637.4)	
Retirement benefits	(58.1)	(61.9)	(61.6)	(63.4)	(59.2)	
Provisions	(336.0)	(203.4)	(187.4)	(180.8)	(320.3)	
Non-equity non-controlling						
interests	(11.9)	(11.9)	(11.9)	(11.9)	(11.9)	
	(18,109.5)	(16,548.9)	(13,055.3)	(14,508.5)	(13,134.3)	
TOTAL LIABILITIES	(27,399.5)	(24,731.5)	(23,466.9)	(25,264.2)	(23,012.8)	
NET ASSETS	17,974.8	12,257.4	6,852.4	11,143.2	6,952.9	
EQUITY						
Share capital	29.8	30.0	30.1	30.0	30.1	
Share premium	198.5	198.5	201.5	198.5	201.5	
Treasury shares	(556.9)	(556.9)	(557.2)	(556.9)	(557.9)	
Share based payment reserve	46.9	27.4	29.9	27.3	26.0	
Convertible bond reserve	80.1	38.4	6.0	24.1	0.4	
Hedging reserve	(50.4)	(74.7)	(87.7)	(87.4)	(91.4)	
Other reserves	471.6	339.9	(1.4)	64.8	7.0	
Retained earnings	3,790.8	1,600.5	(334.0)	1,165.3	(490.0)	
Equity attributable to equity						

4,010.4

13,964.4

17,974.8

1,603.1

10,654.3

12,257.4

(712.8)

7,565.2

6,852.4

(874.3)

7,827.2

6,952.9

865.7

10,277.5

11,143.2

holders of the parent .....

Non-controlling interests.....

TOTAL EQUITY .....

#### **Consolidated Cash Flow Statement**

_	Fiscal year Ended 31 March				Six Months Ended 30 September	
_	2014	2015	2016	2015	2016	
			(\$ million)			
Operating activities						
Profit/(Loss) before taxation	1,118.1	(5,640.2)	(4,984.0)	243.7	426.5	
Adjustments for:						
Depreciation and amortization	2,203.1	2,005.7	1,455.2	707.9	513.3	
Investment revenue	(687.7)	(832.6)	(697.8)	(372.8)	(385.6)	
Finance costs	1,439.8	1,387.2	1,280.4	639.1	652.3	
Other gains and (losses) (net)	279.9	76.9	72.5	67.8	26.6	
(Profit)/Loss on disposal of						
property plant and equipment	4.4	4.6	1.5	(0.3)	(0.7)	
Write-off of unsuccessful						
exploration costs	10.8	128.7	4.5	2.3	0.5	
Share based payment charge	32.9	28.6	15.6	6.2	7.0	
Impairment of mining reserves						
and Oil and gas assets	81.6	6,694.4	5,187.0	_	_	
Other non-cash items	48.3	40.8	2.7	4.3		
Operating cash flows before						
movements in working	4 521 0	2 004 1	2 225 (	1 200 2	1 220 0	
capital	4,531.2	3,894.1	2,337.6	<u>1,298.2</u>	<u>1,239.9</u>	
(Increase)/decrease in inventories.	75.0	40.0	163.7	(0.3)	(187.3)	
(Increase)/decrease in						
receivables	(123.4)	(134.5)	343.3	125.4	(214.8)	
Increase in payables	678.8	225.2	657.4	904.4	241.0	
Cash generated from						
operations	5,161.6	4,024.8	3,502.0	2,327.7	1,078.8	
Dividends received	1.0	0.3	0.3	0.8	0.6	
Interest income received	337.8	587.7	633.1	242.3	248.5	
Interest paid	(1,115.3)	(1,334.0)	(1,268.4)	(581.3)	(698.9)	
Income taxes paid	(861.6)	(601.7)	(354.7)	(137.2)	(323.7)	
Dividends paid	(162.5)	(171.3)	(110.6)	(111.3)	(82.8)	
Net cash inflow from operating						
activities	3,361.0	2,505.8	2,401.7	1,741.0	222.5	

	Fiscal	year Ended 31	Six Months Ended 30 September		
	2014	2015	2016	2015	2016
			(\$ million)		
Cash flows from investing activities					
Purchases of property, plant and equipment and intangibles	(2,185.3)	(2,289.1)	(872.4)	(553.1)	(504.4)
Proceeds on disposal of property, plant and equipment	9.3	25.7	10.0	2.6	7.0
Sale/(purchase) of liquid investments*	(2,857.0)	671.7	(999.9)	(911.5)	833.3
Sale of financial asset	10.2				
investments	18.2				
Net cash used in investing activities	<u>(5,014.8)</u>	<u>(1,591.7)</u>	<u>(1,862.3)</u>	<u>(1,462.0)</u>	335.9
Cash flows from financing activities					
Issue of ordinary shares	0.0	0.2	0.1	0.0	0.0
Purchase of shares under DSBP scheme	_	_	(0.9)	_	(0.8)
Dividends paid to non-controlling interests of subsidiaries	(345.9)	(340.4)	(325.5)	(166.1)	(677.6)
in subsidiaries/share buyback by subsidiary	_	(819.1)	_	_	_
(Decrease)/Increase in short-term borrowings*	(2,832.7)	(818.8)	(1,022.1)	(568.5)	923.7
Repayment of convertible bond	_	_	_	_	(579.9)
Proceeds from long-term borrowings	5,429.7	3,748.1	2,383.2	1,294.5	395.7
Repayment of long-term borrowings	(2,299.0)	(2,698.0)	(958.0)	(802.4)	(652.3)
Buyback of convertible bond			(523.6)		
Net cash from/(used in) financing activities	(47.9)	(928.0)	(446.8)	(242.5)	(591.2)

\* Proceeds from redemption/purchase of liquid investments as well as proceeds from and repayment of short term borrowings have been presented on a net basis.

(13.9)

(1.8)

369.4

353.7

92.6

(18.0)

353.7

428.3

36.5

(7.9)

353.7

382.3

(32.8)

(23.1)

428.3

372.4

(1,701.7)

(129.1)

2,200.2

369.4

Net increase/(decrease) in cash and cash equivalents.....

Effect of foreign exchange rate

Cash and cash equivalents at

Cash and cash equivalents at end of year .....

changes .....

beginning of year .....

## Consolidated Business Segments Data

	Fiscal	year Ended 31	Six Months Ended 30 September		
	2014	2015	2016	2015	2016
			(\$ million)		
External revenues:					
Oil and gas	3,092.8	2,397.5	1,322.3	755.3	585.9
Zinc					
— India	2,181.7	2,357.0	2,111.0	1,150.5	871.2
— International	661.4	586.9	391.5	244.5	170.0
Copper					
— India/Australia	3,399.8	3,682.7	3,196.8	1,696.2	1,393.3
— Zambia	964.5	883.5	966.7	520.0	382.4
Iron ore	266.4	311.4	341.8	131.6	217.1
Aluminium	1,782.1	2,078.1	1,692.3	849.4	863.3
Power	579.4	552.8	691.7	338.1	375.4
Others	16.9	28.8	23.8	13.7	9.2
Total	12,945.0	12,878.7	10,737.9	5,699.3	4,867.8
Vedanta EBITDA (1)					
Oil and gas	2,347.0	1,476.8	570.4	373.8	273.9
Zinc					
— India	1,145.0	1,192.5	995.0	581.8	456.1
— International	213.4	180.8	68.1	56.6	88.4
Copper					
— India/Australia	197.9	281.0	336.6	170.4	126.3
— Zambia	156.3	(3.8)	(17.9)	(24.3)	17.2
Iron ore	(24.2)	31.4	73.4	7.2	71.7
Aluminium	287.3	415.5	106.7	21.7	102.1
Power	168.4	153.8	196.3	93.0	107.9
Others	0.1	13.2	7.8	5.5	(10.5)
Total	4,491.2	3,741.2	2,336.4	1,285.7	1,233.1
Other Data and Ratios					
Net Debt/Capitalisation(%)	30.6%	40.8%	51.7%	40.3%	54.0%
Interest Coverage Ratio (Times)	7.2	6.6	3.9	5.1	3.6
Net Debt/Vedanta EBITDA(1)					
(Times)	1.8	2.3	3.1	2.6	3.6
Debt/Vedanta EBITDA <sup>(1)</sup> (Times).	3.8	4.5	7.0	5.6	7.2

Six Months Ended

<sup>(1)</sup> Vedanta defines Vedanta EBITDA as profit for the year before tax expense, other gains and losses (net), finance costs, investment revenue, Special Items, and depreciation and amortisation. The Company's Vedanta EBITDA may not be comparable to similarly titled measures reported by other companies due to potential inconsistencies in the method of calculation. The Company has included its Vedanta EBITDA because the Company believes it is an indicative measure of its operating performance and is used by investors and analysts to evaluate companies in the same industry. The Company's Vedanta EBITDA should be considered in addition to, and not as a substitute for, other measures of financial performance and liquidity reported in accordance with IFRS. The Company believes that the inclusion of supplementary adjustments applied in its presentation of Vedanta EBITDA are appropriate because the Company believes it is a more indicative measure of its baseline performance as it excludes certain charges that the Company's management considers to be outside of its core operating results. In addition, the Company's Vedanta EBITDA is among the primary indicators that its management uses as a basis for planning and forecasting of future periods. The following table reconciles profit for the year on a consolidated basis to Vedanta EBITDA.

	Fiscal year Ended 31 March			30 September		
	2014	2015	2016	2015	2016	
			(\$ million)			
Profit/(Loss) for the year	989.4	(3,787.7)	(3,502.1)	(153.6)	257.3	
Adjusted for:						
Net tax expense/credit	128.7	(1,852.5)	(1,481.9)	397.3	169.2	
Other gains & losses (net)	279.9	76.9	72.5	67.8	26.6	
Finance costs	1,439.8	1,387.2	1,280.4	639.1	652.3	
Investment revenue	(687.7)	(832.6)	(697.8)	(372.8)	(385.6)	
Depreciation and amortization	2,203.1	2,005.7	1,455.2	707.9	513.3	
Special items <sup>(1)</sup>	(138.0)	(6,744.2)	(5,210.1)	_	_	
Vedanta EBITDA	4,491.2	3,741.2	2,336.4	1,285.7	1,233.1	

Six Months Ended

<sup>(1)</sup> Special Items are defined in Note 5 to the Annual Financial Statements. Special Items include Impairment of oil & gas assets, Impairment of mining reserves and assets, Voluntary retirement schemes, Provision for receivables, Provision for investment in coal blocks, Acquisition and restructuring related costs, Provision for contractor dispute, Land regularization fees and special tax items.

# MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS

The following discussion of the financial condition and results of operations of Vedanta should be read in conjunction with the Annual Financial Statements herein and with the information relating to the business of Vedanta included elsewhere in this Offering Circular. This discussion involves forward-looking statements that reflect the current view of management and involve risks and uncertainties. The actual results of Vedanta could differ materially from those contained in any forward-looking statements as a result of factors discussed below and elsewhere in this Offering Circular, particularly in "Risk Factors." Investors should read the whole of this Offering Circular and not rely just on summarised information.

The Annual Financial Statements for Vedanta have been prepared in accordance with IFRS as adopted by the EU and the Interim financial statements have been prepared in accordance with IAS 34.

#### Introduction

#### Overview

Vedanta is an LSE-listed globally diversified metals and mining, oil and gas and power generation company. Its businesses are principally located in India, one of the fastest growing large economies in the world with a 7.6% increase in real GDP from the fiscal year 2015 to fiscal year 2016, according to the Central Statistical Organization of the GoI's Ministry of Statistics and Programme Implementation. In addition, Vedanta has assets and operations in jurisdictions such as Zambia, Namibia, South Africa and Fujariah and a workforce of 70,000 people worldwide. Vedanta is primarily engaged in oil and gas, zinc, copper, iron ore, aluminium and commercial power generation businesses and is also developing port operation businesses and infrastructure assets. Vedanta has experienced significant growth in recent years through the ramp up of expansion projects for its oil and gas, copper, zinc, aluminium and iron ore businesses.

On 14 June 2015, Vedanta announced an all-share proposed merger of Cairn India with Vedanta Limited to be implemented by way of a scheme of arrangement under Indian law (the "Cairn India Merger"). Thereafter on 22 July 2016, Vedanta Limited and Cairn India announced the revised terms to the merger. As per the revised terms, on completion the non-controlling shareholders of Cairn India will receive for each equity share held in Cairn India, one equity share in Vedanta Limited of face value Rs.1 each, and four 7.5% Redeemable Preference Shares in Vedanta Limited with a face value of Rs.10 each. No shares will be issued to Vedanta Limited or any of its subsidiaries for their shareholding in Cairn India. NSE and BSE have provided their 'No Objection' to the proposed merger and shareholders of Vedanta Limited, Cairn India, and Vedanta and the secured and unsecured creditors of Vedanta Limited have approved the Scheme with requisite majority. The Scheme is now subject to the approval of the NCLT and other regulators.

Vedanta Limited has equity interests in Cairn India of 59.9% as of 30 September 2016 and the Company's economic percentage holding in Cairn India is 37.6% as of 30 September 2016. Following the implementation of the merger with Cairn India, the Vedanta's ownership in Vedanta Limited is expected to decrease to 50.1% from its 62.9% shareholding as of 30 September 2016, and Vedanta's economic percentage holding in Cairn India is expected to increase to 50.1% from 37.6% as of 30 September 2016.

Vedanta believes its experience in operating and expanding its businesses in India will allow it to capitalise on attractive growth opportunities arising from India's large mineral reserves, relatively low cost of operations and large and inexpensive labour and talent pools.

Vedanta has the ability to manage and increase the dividend payments from the operating subsidiaries it controls when there are sufficient distributable reserves. For fiscal year 2016, Cairn India declared a dividend of Rs.5,625 million (US\$84.4 million), HZL declared a dividend of Rs.117,464 million (US\$1,762.1 million), and Vedanta Limited declared a dividend of Rs.10,377.5 million (US\$155.7 million) (all of which exclude taxes on dividends).

Vedanta's Operating loss decreased from \$5,008.7 million in fiscal year 2015 to \$4,328.9 million in fiscal year 2016. Revenue and operating profit before special items decreased from \$12,878.7 million and \$1,735.5 million, respectively, in fiscal year 2015, to \$10,737.9 million and \$881.2 million, respectively, in fiscal year 2016, as a result of lower Brent prices, lower LME prices and decrease in premia across the metal businesses.

Vedanta's revenue and operating profit before special items decreased from \$12,945.0 million and \$2,288.1 million, respectively, in fiscal year 2014 to \$12,878.7 million and \$1,735.5 million in fiscal year 2015, as a result of lower commodity prices, lower volumes and consequently higher unit costs across a number of businesses, including Zinc India, oil and gas and Copper Zambia. Vedanta EBITDA decreased from \$4,491.2 million in fiscal year 2014 to \$3,741.2 million in fiscal year 2015 and \$2,336.4 million in fiscal year 2016. Operating profit decreased from \$2,150.1 million in fiscal year 2014 to operating loss of \$5,008.7 million in fiscal year 2015 primarily driven by impairment of assets at oil & gas business in a low price scenario.

The following table sets out the Vedanta EBITDA for each of Vedanta's business segments as set out in Note 3 to the Annual Financial Statements and in Note 3 to the Interim Release as a percentage of Vedanta EBITDA on a consolidated basis.

	Year Ended 31 March			Six Months Ended 30 September		
	2014	2015	2016	2015	2016	
Vedanta EBITDA <sup>(1)</sup> :						
Oil and gas business	2,347.0	1,476.8	570.4	373.8	273.9	
Zinc						
— India	1,145.0	1,192.5	995.0	581.8	456.1	
— International	213.4	180.8	68.1	56.6	88.4	
Copper						
— India/Australia	197.9	281.0	336.6	170.4	126.3	
— Zambia	156.3	(3.8)	(17.9)	(24.3)	17.2	
Iron ore	(24.2)	31.4	73.4	7.2	71.7	
Aluminium	287.3	415.5	106.7	21.7	102.1	
Commercial power generation	168.4	153.8	196.3	93.0	107.9	
Other	0.1	13.2	7.8	5.5	(10.5)	
Total	4,491.2	3,741.2	2,336.4	1,285.7	1,233.1	

<sup>(1)</sup> Vedanta defines Vedanta EBITDA as profit for the year before tax expense, other gains and losses (net), finance costs, investment revenue, Special Items, and depreciation and amortisation. Vedanta EBITDA may not be comparable to similarly titled measures reported by other companies due to potential inconsistencies in the method of calculation. Vedanta EBITDA has been included because Vedanta believes it is an indicative measure of its operating performance and is used by investors and analysts to evaluate companies in the industry. Vedanta EBITDA should be considered in addition to, and not as a substitute for, other measures of financial performance and liquidity reported in accordance with IFRS. Vedanta believes that the inclusion of supplementary adjustments applied in its presentation of Vedanta EBITDA

are appropriate because it believes it is a more indicative measure of its baseline performance as it excludes certain charges that its management considers to be outside of its core. Vedanta EBITDA is among the primary indicators that its management uses as a basis for planning and forecasting of future periods. The following table reconciles profit for the year to Vedanta EBITDA:

_	Fiscal	Year Ended 31	March	Six Mont.	
_	2014	2015	2016	2015	2016
			(\$ million)		
Profit for the year	989.4	(3,787.7)	(3,502.1)	(153.6)	257.3
Adjusted for:					
Tax expense	128.7	(1,852.5)	(1,481.9)	397.3	169.2
Other gains & losses (net)	279.9	76.9	72.5	67.8	26.6
Finance costs	1,439.8	1,387.2	1,280.4	639.1	652.3
Investment revenue	(687.7)	(832.6)	(697.8)	(372.8)	(385.6)
Special Items <sup>(1)</sup>	138.0	6,744.2	5,210.1	_	_
Depreciation and amortization	2,203.1	2,005.7	1,455.2	707.9	513.3
Vedanta EBITDA	4,491.2	3,741.2	2,336.4	1,285.70	1,233.10

## Oil and gas

Vedanta's oil and gas business is owned and operated by Cairn India, one of the largest independent oil and gas exploration and production companies and the largest sector producer of crude oil in India. It has a market capitalisation of approximately Rs.375.2 billion (\$5.6 billion) as of 30 September 2016. Cairn India Group has a diversified asset base with eight blocks: one in Rajasthan, two on the west coast of India, four on the east coast of India, and one in South Africa.

Revenue from Vedanta's oil and gas business decreased from \$3,092.8 million in fiscal year 2014 to \$1,322.3 million in fiscal year 2016 mainly due to a decrease in Brent prices and lower volumes. Gross oil and gas production was 79.8 mboe, 77.3 mboe and 74.6 mboe, and working interest production was 50.1 mboe, 48.4 mboe and 46.9 mboe, respectively in the fiscal years 2014, 2015 and 2016. Reduction was primarily due to natural decline which was partially offset by encouraging results from EOR projects, continued reservoir management and the maximization of liquid handling capacity,

#### Zinc

Vedanta's zinc business is divided into two segments, namely (i) the fully integrated India zinc business, comprising HZL's mining and production operations, and (ii) the international zinc business, also referred to as "Zinc International," comprising mainly mining operations in Namibia, South Africa and Ireland. Vedanta's zinc mining operations in Ireland are no longer in operation due to the mine's closure in December, 2015.

Vedanta's total zinc and lead production decreased marginally from 996,687 tonnes in fiscal year 2014 to 985,886 tonnes in fiscal year 2016. However, revenue of Vedanta's zinc business decreased from \$2,843.1 million in fiscal year 2014 to \$2,502.5 million in fiscal year 2016, mainly because of a decrease in LME prices of zinc and lead. The LME price for zinc decreased from \$1,909 per tonne in fiscal year 2014 \$1,829 per tonne in fiscal year 2016. The LME price for Lead increased from \$1,768 per tonne in fiscal year 2014 compared to Zinc LME \$2,092 per tonne in fiscal year 2016. The

<sup>(1)</sup> Special Items are defined in Note 5 to the Annual Financial Statements. Special Items include non-cash impairment charges relating to the oil and gas business, the iron ore business relating to the Liberian assets, the Bellary assets in the iron ore business, the copper mine of Tasmania and the voluntary retirement scheme across the businesses.

production at Skorpion, decreased from 364 thousand tonnes in fiscal year 2014 to 226 thousand tonnes fiscal year 2016 and the planned closure of the Lisheen mine in November 2015. Production at the Lisheen mine decreased from 172 thousand tonnes in fiscal year 2014 to 81 thousand tonnes fiscal year 2016, due to its closure in 2015.

#### India Zinc Business

Vedanta's fully integrated India zinc business is owned and operated by HZL. As of 30 September 2016, Vedanta controls HZL through its 62.9% ownership interest in Vedanta Limited, which owns 64.9% of the share capital in HZL. The remainder of HZL is owned by GoI (29.5%) and institutional and public shareholders (5.6%). HZL's business includes five zinc-lead mines, one rock phosphate mine, four hydro metallurgical zinc smelters, two lead smelters, one zinc-lead smelter, seven sulphuric acid plants, one silver refinery and six captive power plants in the State of Rajasthan in northwest India. Additionally, HZL has processing and refining facilities for zinc at Haridwar and for zinc, lead and silver at Pantnagar, both in the State of Uttarakhand in northern India.

Vedanta's India zinc total metal production increased from 871,763 tonnes in fiscal year 2014 to 903,857 tonnes in fiscal year 2016 due to enhanced smelter efficiencies. Revenue of Vedanta's India zinc business decreased from \$2,181.7 million in fiscal year 2014 to \$2,111.0 million in fiscal year 2016 due to decrease in LME prices of zinc and lead, partly offset by an increase in production.

#### International Zinc Business

As of 30 September 2016, Vedanta's international zinc business comprises (i) 100% ownership by Vedanta Limited of Skorpion, which owns the Skorpion mine and refinery in Namibia, (ii) 74% stake ownership by Vedanta Limited in Black Mountain Mining, which owns the Black Mountain mine and the Gamsberg project, in South Africa, and (iii) 100% ownership by Vedanta Limited of Lisheen, which owns the Lisheen mine in Ireland. The mine in Ireland is no longer in operation due to its closure in December 2015.

Vedanta's international zinc total metal production decreased from 363,566 tonnes in fiscal year 2014 to 225,966 tonnes in fiscal year 2016 due to the closure of Lisheen mine in December 2015 and maintenance shutdown and partial industrial action at Skorpion. Revenue from the international zinc business was \$391.5 million in fiscal year 2016, a decrease of \$269.9 million, or 40.8%, from \$661.4 million in fiscal year 2014.

#### Copper

#### Overview

Vedanta's copper business comprises three major operations divided into two segments, namely (i) the India and Australia copper business, comprising Vedanta Limited's custom smelting operations in India and CMT's mining operations in Australia, which is currently suspended and is under care and maintenance since July 2014, and (ii) the Zambia copper business, comprising KCM's mining and smelting operations in Zambia. Vedanta's primary products in these business segments are copper cathodes and copper rods.

Vedanta's total copper cathode production has increased from 471,452 tonnes in fiscal year 2014 to 565,720 tonnes in fiscal year 2016, representing a compound annual growth rate ("CAGR") of 9.5%, and its total copper rod production increased from 123,053 tonnes in fiscal year 2014 to 210,799 tonnes in fiscal year 2016. Revenue of Vedanta's total copper business decreased from \$4,364.3 million in fiscal year 2014 to \$4,163.5 million in fiscal year 2016, due to decrease in copper prices, partially offset by increase in production.

In India, Vedanta Limited is one of only two custom copper smelters with a primary market share of 36% by sales volume in fiscal year 2016, according to the International Copper Promotion Council, India. Vedanta Limited's copper operations include a smelter, refinery, phosphoric acid plant, sulphuric acid plant, copper rod plant and three captive power plants at Tuticorin in southern India, a refinery and two copper rod plants at Silvassa in western India, a precious metal refinery that produces gold and silver, a doré anode plant, and a copper rod plant at Fujairah in the UAE. As of 30 September 2016, Vedanta owns 62.9% of the Copper India business through its holding in Vedanta Limited.

Vedanta Limited's wholly owned subsidiary, CMT, owns a copper mine in Tasmania, Australia, which is suspended and is under care and maintenance since July 2014.

#### Zambia Copper Business

KCM is largely an integrated copper producer with various facilities at Konkola, Nchanga, Nkana and Nampundwe, Zambia including mines, concentrators, smelters, acid plants, a tailings leach plant ("TLP") and a refinery. As of 30 September 2016, Vedanta owned 79.4% of the share capital of KCM. The remaining 20.6% was owned by ZCCM Investments Holdings Plc, a Lusaka and Euronext listed company which is 77.53% owned by the Zambian Government and 22.47% publicly held.

#### Iron Ore

Vedanta's iron ore business is owned and operated by Vedanta Limited, India's largest exporter of iron ore in the private sector by volume since 2003, according to the Federation of Indian Mineral Industries.

Vedanta also owns iron ore assets in Liberia, comprising WCL. The Ebola epidemic in Liberia resulted in stoppage of drilling and exploration work for iron ore during fiscal year 2015 and the staff had to be evacuated. In consideration of the suspension of exploration in Liberia, low iron ore prices, geo-political factors and no plans for any substantive expenditure resulting in continued uncertainty in the project, an impairment charge of \$227.5 million was recognized in fiscal year 2016. Vedanta Limited is in discussions with the government to extend the Mineral Development Agreement to make this project more sustainable.

Vedanta's total saleable iron ore production was 1.5 million dmt in fiscal year 2014, 0.6 million dmt in fiscal year 2015 and 5.2 million dmt in fiscal year 2016. Revenue increased from \$266.4 million in fiscal year 2014 to \$341.8 million in fiscal year 2016 due to the recommencement of mining operations in Goa.

#### Aluminium

Vedanta's aluminium business is in Chhattisgarh and Odisha. Vedanta operate the business in the state of Chhattisgarh through BALCO, and aluminium operations in Odisha is a division of Vedanta Limited. Vedanta's primary products in this business segment are aluminium ingots, wire rods, billet and rolled products.

BALCO's operations include two bauxite mines, three captive power plants and refining, smelting and fabrication facilities in central India. Vedanta Limited's operations include an aluminium smelter and two captive power plants at Jharsuguda and an alumina refinery and a captive power plant at Lanjigarh in the State of Odisha in eastern India.

Mining operations in Niyamgiri Hills have been on hold since 20 October 2010, because the environmental approval was rendered non-operational by the MoEF. On 20 November 2015, the MOEF granted environmental clearance for the expansion of the alumina refinery up to 4 MTPA and

environmental clearance up to 6 MTPA will be received as an amendment to existing environmental clearance after the completion of the land acquisition of the balance area of 666.03 HA. Further, consent to establish 6 MTPA and consent to operate 2 MTPA have also been obtained. However the environmental clearance for the expansion of the alumina refinery at Lanjigarh was challenged by an individual, Prafulla Samantra, before the National Green Tribunal, where the MoEF, the Odisha State Pollution Control Board and Vedanta Limited have been made parties, in November 2015. For more information on these proceedings, see "Risk Factors — Litigation — Petitions have been filed in the Supreme Court of India and the High Court of Odisha to seek the cessation of construction of Vedanta's Vedanta Limited's refinery in Lanjigarh, and related mining operations in Niyamgiri Hills, which are currently suspended".

As of 30 September 2016, Vedanta controls BALCO through its 62.9% ownership interest in Vedanta Limited. Vedanta Limited owns a 51.0% ownership interest in BALCO. The remainder is owned by the GoI. Vedanta has a 62.9% ownership interest in Vedanta's aluminium operations in the state of Odisha, which is a division of Vedanta Limited.

Vedanta's total aluminium ingot production increased from 794,287 tonnes of aluminium in fiscal year 2014 to 923,343 tonnes in fiscal year 2016, representing a CAGR of 7.8%. Revenues from Vedanta's aluminium business decreased from \$1,782.1 million in fiscal year 2014 to \$1,692.3 million in fiscal year 2016 due to a decrease in LME prices of aluminium, partially offset by growth in aluminium production.

#### Commercial Power Generation

Vedanta's commercial power generation business in India is comprised of the operations of Vedanta Limited, TSPL, MEL and wind power plants operated by HZL.

Vedanta owns and operates several commercial power plants, namely Vedanta Limited's 600 MW coal-based thermal power plant in Jharsuguda, MEL's 106.5 MW coal-based thermal power plant in Mettur Dam, HZL's wind power plants in Gujarat, Karnataka, Maharashtra, Tamil Nadu and Rajasthan aggregating 274.2 MW, BALCO's 600 MW coal-based thermal power plant and TSPL's 1,980 MW coal-based thermal power plant at Talwandi Sabo.

The three units of 600 MW each of coal-based thermal power plants in Jharsuguda have been converted from commercial power plants to captive power plants from 1 April 2016 and is now part of the aluminium business.

Sales of units of power increased from 9,374 million units in fiscal year 2014 to 12,121 million units of power in fiscal year 2016, representing a CAGR of 13.7%. The increase in sales drove revenue from Vedanta's commercial power generation business from \$579.4 million in fiscal year 2014 to \$691.7 million in fiscal year 2016, partially offset by a decrease in power sale realisations.

#### Factors Affecting Vedanta's Results of Operations

Vedanta's results of operations are primarily affected by commodity prices, costs of production and efficiency, production output and mix, government policy in India and Zambia and exchange rates. Each of these key factors is discussed below.

Generally, the metals Vedanta sells in India are sold at a premium to the LME market price due to a number of factors, including the customs duties levied on imports by the GoI, the costs to transport metals to India and regional market conditions. See "— Indian Government Policy". As a result, Vedanta endeavours to sell as large a quantity of its products as possible in India.

Vedanta has historically engaged in hedging strategies to a limited extent to partially mitigate its exposure to fluctuations in commodity prices, as further described in "Market Risk Disclosure — Commodity Price Risk".

## Commodity Prices

Vedanta's results of operations are significantly affected by the commodity prices of the natural resources that Vedanta produces, which are based on LME prices and other benchmark prices and by the TcRc of Vedanta's copper business. The TcRc of copper, the commodity prices of the metals produced and the benchmark price of oil, gas and iron ore can fluctuate significantly, including as a result of changes in the supply of and demand for oil, gas, zinc, copper, iron ore and aluminium. While natural resource producers are unable to influence the commodity or benchmark prices directly, events such as changes in copper smelting or commodity production capacities, temporary price reductions or other attempts to capture market share by individual natural resources producers, including by Vedanta, may have an effect on market prices.

Moreover, the prices realised by Vedanta can, to some extent, be affected by the particular terms Vedanta is able to negotiate for the contractual arrangements it enters into with buyers. Price variations and market cycles, including recent volatility of LME prices, the copper TcRc and the benchmark price for crude oil and iron ore, have historically influenced, and are expected to continue to influence, Vedanta's financial performance. During fiscal year 2016, the decline in commodity prices adversely impacted the revenue and operating profit of Vedanta.

## Crude oil and natural gas

Movements in the price of crude oil significantly affected Cairn India's results of operations and declines in crude oil prices adversely affected the revenues and profits of Vedanta. International prices for oil were very volatile in last three years and fluctuated widely in response to changes in many factors. Lower oil prices reduced the economic viability of projects planned or in development.

The following table sets out the price of Dated Brent, an international benchmark oil blend, according to Platts, McGraw Hill Financial ("Platts"), as of 31 March 2014, 2015 and 2016, and the six months ended 30 September 2015 and 2016:

_	As of 31 March			As of 30 September	
-	2014	2015	2016	2015	2016
			(\$ per barrel)		
Dated Brent	107.6	85.4	47.5	56.0	45.8

#### Zinc

The revenue of Vedanta's zinc business fluctuates based on the volume of sales and the LME price of zinc and lead and LBMA price for silver. Vedanta's India zinc business is fully integrated, so its profitability is dependent upon the difference between the LME price of zinc, lead and silver and the cost of production, which includes the costs of mining and smelting.

The following table sets out the daily average zinc, lead and silver LME prices for each of fiscal years 2014, 2015 and 2016, and the six months ended 30 September 2015 and 2016:

	Year Ended 31 March			Six Months Ended 30 September	
_	2014	2015	2016	2015	2016
		(\$ per tonne, ex	cept for silver v	vhich is \$/ounce	)
Zinc LME	1,909	2,177	1,829	2,013	2,089
Lead LME	2,092	2,021	1,768	1,824	1,797
Silver LBMA	21.4	18.1	15.2	15.6	18.2

## Copper

The revenue of the copper India business fluctuates based on the volume of sales and the LME price of copper. Vedanta's copper India business is custom smelting and refining. As a result, Vedanta Limited's profitability is significantly dependent upon the market rate of the TcRc. Vedanta Limited purchases copper concentrate at an LME-linked copper price for the relevant quotation period less a TcRc that it negotiates with its suppliers but which is influenced by the prevailing market rate for the TcRc. The market rate for the TcRc is significantly dependent upon the availability of copper concentrate, worldwide copper smelting capacity and transportation costs. The TcRc that Vedanta Limited is able to negotiate is also substantially influenced by the TcRc terms established by certain large Japanese custom smelters. The profitability of Vedanta's copper India business is thus dependent upon the amount by which the TcRc Vedanta Limited is able to negotiate exceeds its smelting and refining costs. The profitability of Vedanta's copper India operations is also affected by the prices it receives upon the sale of by-products, such as sulphuric acid and precious metals, which are generated during the copper smelting and refining process. The prices Vedanta receives for by-products can vary significantly, including as a result of changes in supply and demand and local market factors in the location the by-product is produced. See "Risk Factors — Business Risks — Vedanta's businesses currently depend upon third party suppliers for a substantial portion of its raw material requirements and their operating results and operating margins depend upon the market prices for such raw materials".

The following table sets out the average TcRc that Vedanta's Copper India business realised for each of fiscal years 2014, 2015 and 2016, and the six months ended 30 September 2015 and 2016:

				Six Mont	hs Ended
_	Year Ended 31 March			30 September	
_	2014	2015	2016	2015	2016
		(	(US cents per lb	<b>o</b> )	
Copper TcRc	16.6	21.4	24.1	24.1	21.7

The LME price of copper significantly affects the revenues and profitability of KCM's copper business as it is fully integrated.

The following table sets out the daily average copper LME price for each of fiscal years 2014, 2015 and 2016, and the six months ended 30 September 2015 and 2016:

				Six Mont	hs Ended	
_	Year Ended 31 March			30 September		
_	2014	2015	2016	2015	2016	
			(\$ per tonne)			
Copper LME	7,103	6,558	5,211	5,639	4,751	

#### Aluminium

The revenue of Vedanta's aluminium business fluctuates based on the volume of sales and the LME price of aluminium. In fiscal year 2016, 47% of BALCO's alumina requirement and 47.5% of Vedanta Limited's alumina requirement came from third parties, with the rest supplied by Vedanta's alumina refinery at Lanjigarh. For the portion of Vedanta's aluminium business where the required alumina is sourced internally, profitability is dependent upon the LME price of aluminium less the cost of production, which includes the costs of bauxite mining at BALCO's mines, the refining of bauxite into alumina at Vedanta's aluminium refinery and the smelting of alumina into aluminium. For the portion of the aluminium business where alumina is sourced from third parties, profitability is

dependent upon the LME price of aluminium less the cost of the sourced alumina and the cost of smelting. See "Risk Factors — Business Risks — Vedanta's businesses currently depend upon third party suppliers for a substantial portion of its raw material requirements, and their operating results and operating margins depend upon the market prices for such raw materials".

The following table sets out the daily average aluminium LME prices for each of fiscal years 2014, 2015 and 2016, and the six months ended 30 September 2015 and 2016:

				Six Mont	ths Ended	
-	Year Ended 31 March			30 Sep	30 September	
_	2014	2015	2016	2015	2016	
			(\$ per tonne)			
Aluminium LME	1,773	1,890	1,590	1,675	1,596	

#### Iron ore

The revenue of the iron ore business fluctuates based on the volume of sales and the market price of iron ore. Vedanta sells iron ore under long-term price contracts as well as under ruling spot prices. The prices for iron ore are significantly dependent upon the global and regional imbalances between the demand for and supply of iron ore, worldwide steel-making capacity and transportation costs. Long-term contract prices fluctuate based on the expected supply of and demand for iron ore and the expected steelmaking capacity for a period exceeding one year or more, whereas spot prices fluctuate based on short term imbalances between demand and supply. Every quarter, Vale, Rio Tinto plc ("Rio Tinto") and BHP Billiton negotiate with major steel manufacturers and set a benchmark price upon which the rest of the world bases its pricing.

## Production Costs and Efficiency

The results of operations of Vedanta are, to a significant degree, dependent upon its ability to efficiently run its operations and maintain low costs of production. Efficiencies relating to recovery of metal from ore, process improvements, by-product management and increasing productivity help drive costs down. Costs associated with mining and metal production include energy costs, ore extraction and processing costs at the captive mines, labour costs and other manufacturing expenses.

The cost of production also includes the cost of alumina for Vedanta's aluminium business. It does not include the cost of copper concentrate for Vedanta's copper business, though such cost is included in its cost of sales.

In the oil and gas business, production costs consist of expenditure incurred towards the production of crude oil and natural gas including statutory levies, such as cess, royalties and production payments payable pursuant to the PSCs as well as operational expenditures such as costs relating to repairs on, and maintenance of, facilities, power generation and fuel for such facilities, water injection, insurance, and storage, transportation and freight of crude oil and natural gas, among others.

Energy cost is the most significant component of the cost of production of Vedanta's metal production businesses. Most of Vedanta's power requirements are met by captive power plants which are primarily coal-fueled. Thermal coal, diesel fuel and fuel oil, which are used to operate Vedanta's power plants, and metallurgical coke, which is used in the zinc smelting process, are currently sourced from a combination of long-term and spot contracts. The aluminium business has high energy consumption due to the power-intensive nature of aluminium smelting. Coal is sourced from linkage coal, import and domestic purchase. Any change in coal prices or the mix of coal that is utilised, primarily whether the coal is sourced locally or imported, can affect the cost of generating power.

For the zinc and iron ore businesses and the portions of the copper and aluminium businesses where ore is sourced from Vedanta's own mines, ore extraction and processing costs affect the cost of production. In the zinc and iron ore businesses, the ore extraction and processing costs to produce concentrates are generally a small percentage of the overall cost of production.

In the aluminium business, the bauxite ore extraction cost is not significant, but the refining cost to produce alumina from bauxite ore represents approximately one-third of the cost of production of aluminium. In addition, a significant cost of production in the zinc business is the royalty that HZL pays on the lead-zinc ore that is mined. The royalty is a function of the LME prices of zinc and lead. See "— Indian Government Policy — Taxes and royalties". In the iron ore business, the principal activities are ore extraction, processing and sales. The cost of transporting ore from the mines to the port and the ore extraction cost account for a majority of the total cost of production for Vedanta Limited.

In the commercial power generation business, production costs are mainly coal costs, and the coal is sourced domestically.

Labour costs are principally a function of the number of employees and increases in compensation from time to time. Improvements in labour productivity in recent years have resulted in a decrease in the per-unit labour costs. The majority of BALCO's mining operations, a substantial portion of HZL's and Vedanta's iron ore mining operations and Cairn India's oil and gas operations and a limited number of functions at Vedanta's copper, zinc and aluminium smelting operations are outsourced to third-party contractors.

Other manufacturing expenses include, among other things, additional materials and consumables that are used in the production processes and routine maintenance to sustain ongoing operations. None of these represents a significant portion of Vedanta's costs of production.

Cost of production as reported for Vedanta's metal products includes an offset for any amounts Vedanta receives upon the sale of the by-products from the refining or smelting processes. The cost of production is divided by the daily average exchange rate for the year to calculate the US dollar cost of production per lb or tonne of metal as reported.

Production costs and costs per unit are also significantly affected by changes in production volumes and variable costs. Therefore, Vedanta's production levels and variable costs are key factors in determining its overall cost competitiveness.

Costs of production for each of fiscal years 2014, 2015 and 2016, and the six months ended 30 September 2015 and 2016 are reflected in the following table:

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_	Year Ended 31 March			six Months Ended 30 September		
_	2014	2015	2016	2015	2016	
Oil and Gas (Opex) (\$ per boe)	4.1	6.2	6.5	6.1	6.0	
Zinc business (India) (\$ per tonne) <sup>(1)(2)</sup>	985	1,093	1,045	1052	1131	
Zinc business (International) (\$ per tonne)	1,167	1,393	1,431	1439	1331	
Iron Ore <sup>(3)</sup>	40.9	134.9	24.6	7.2	15.6	
Copper India business (US cents per lb) <sup>(4)</sup>	9.7	4.2	3.2	2.4	5.6	
Copper Zambia business (US cents per lb) <sup>(1)</sup>	334.0	329.1	261.0	239.6	196.4	
Aluminium business (\$ per tonne) <sup>(5)</sup>	1,658	1,755	1,572	1,639	1,473	

#### Production Volume and Mix

Production volume has a substantial effect on Vedanta's results of operations. Vedanta is generally able to sell all of the products it produces, so its revenue generally fluctuates as a result of changes in production volume. Production volume is dependent on production capacity, which has increased in recent years across all of Vedanta's businesses. For Vedanta's mining operations, production volume is also dependent upon the quality and consistency of the ore. Per unit production costs are also significantly affected by changes in production volume in that higher volumes of production generally reduce the per unit production costs. Therefore, production levels are a key factor in determining Vedanta's overall cost competitiveness. Vedanta has benefited from significant economies of scale as it has generally increased production volumes in recent years.

<sup>(1)</sup> Cash costs per unit for mining, smelting and refining operations (net of by-products).

Includes royalties \$161 per tonne, \$225 per tonne, \$241 per tonne, \$264 per tonne and \$279 per tonne in fiscal years 2014, 2015 and 2016, and the six months ended 30 September 2015 and 2016 respectively.

<sup>(3)</sup> Cost of production for iron ore recorded was at \$ 15.6 per tonne for the six months ended September 30, 2016 compared to \$ 24.6 per tonne in fiscal year 2016. This was primarily due to production recommencement of production in Goa after obtaining necessary approvals during the year and the implementation of a rigorous plan focusing on operational efficiency and reduction is commercial spend reduction expenditures. As part of the Company's cost reduction initiatives, logistics contracts have been optimized across transportation routes, modes and rates. Iron ore sourcing from nearby mines has been maximized to reduce freight cost. Also, a change in the blend and mix of coking coal has contributed to better improved cost efficiency. Cost of production \$15.6 per tonne for six months ended September 30, 2016 can't be compared with comparative prior period i.e. \$7.2 per tonne for six months ended September 30, 2015 due to continued mining ban in Goa and \$7.2 per tonne pertains to only Karnataka business for six months ended September 30, 2015.

<sup>(4)</sup> Cash costs per unit for smelting and refining operations (net of by-products).

<sup>(5)</sup> Cash costs per unit (net of by-products)

The following table summarises the production volumes for Vedanta's primary products in each of fiscal years 2014, 2015 and 2016, and the six months ended 30 September 2015 and 2016:

		Yea	r Ended 31 M	Six Months Ended 30 September		
	Product	2014	2015	2016	2015	2016
			(Tonnes	unless otherwi	se stated)	
Segment						
Oil and gas	Oil & Gas —	79.8	77.3	74.6	38.0	36.0
business						
	Oil & Gas —	50.1	48.4	46.9	23.7	23.0
	Working Interest (mboe)					
Zinc business						
— HZL	Zinc	749,167	733,803	758,938	398,274	252,079
	Lead <sup>(1)</sup>	122,596	127,143	144,919	71,101	55,228
	Silver (m.oz) <sup>(2)</sup>	11.24	10.53	13.65	6.01	6.29
— Skorpion	Zinc	124,924	102,188	82,029	42,495	46,770
— Black Mountain	Zinc in	28,999	27,022	29,272	30,825	35,287
Mining						
	Lead in Concentrate	37,574	32,142	34,114	0	0
— Lisheen	Zinc in Concentrate	151,021	130,897	71,825	60,044	0
	Lead in Concentrate	21,048	19,265	8,726	0	0
Copper business	Concentrate					
<ul><li>Vedanta Limited</li></ul>	Copper	294,434	362,372	384,047	192,775	197,785
— KCM	* *	177,018	168,923	181,673	90,046	91,585
	11	-		565,720		289,370
— Vedanta Limited	Total copper	<b>471,452</b> 123,053	<b>531,295</b> 170,338	210,799	<b>282,821</b> 103,037	109,035
Iron ore business		1.5	0.6	5.2	1.0	4.7
	million tonnes)	1.3	0.0	3.2	1.0	4.7
Aluminium business						
— BALCO		252,035	323,921	331,618	163,988	202,830
— Vedanta Limited		524,060	976,915	970,893	541,150	566,935
	Aluminium	542,252	553,338	591,725	299,958	338,172
	Total aluminium	794,287	877,259	923,343	463,946	541,002
Commercial power generation business	Power sold (million units)	9,374	9,859	12,121	5,789	6,039

<sup>(1)</sup> Excludes lead contained in lead with a high content of silver (high silver lead) produced from the pyrometallurgical lead-zinc smelter for captive use, which was 7,262 tonnes, 7,755 tonnes, 6,657 tonnes, 3,451 tonnes and 3,698 tonnes in fiscal years 2014, 2015 and 2016, and in the six months ended 30 September 2015 and 2016, respectively.

<sup>(2)</sup> Excludes silver contained in lead with high content of silver (high silver lead) produced from pyrometallurgical zinc-lead smelter for captive use which was 1.35 moz, 1.42 moz, 1.22 moz, 0.67 moz and 0.35 moz in fiscal years 2014, 2015 and 2016, and in the six months ended 30 September 2015 and 2016, respectively.

Periodically, Vedanta's facilities are shut down for planned and unplanned repairs and maintenance which temporarily reduces production volume. In addition, the mix of products Vedanta produces can have a substantial impact on its results of operations as it has different margins in each of its segments, and within each segment its margins vary between the lower margins of primary metals and the higher margins of value-added products such as copper rods and aluminium rolled products. For example, copper cathodes are converted in the copper rod plant into copper rods, a value-added product which has a higher margin than copper cathodes. As copper rods have higher margins, Vedanta endeavors to sell as large a percentage of copper rods as possible. As the production volume of its various products fluctuates primarily based on market demand and production capacity for such products, the percentage of revenue from those products will also fluctuate between higher and lower margin products, which will in turn cause Vedanta's operating profit and operating margins fluctuations.

## **Indian Government Policy**

## India customs duties

Vedanta sells its products in India at a premium to the LME price, due in part to the customs duties payable on imported products. Profitability is affected by the levels of customs duties as Vedanta prices its products sold in India generally on an import-parity basis.

Vedanta also pays a premium on certain raw materials that it imports or which are sourced locally but which are priced on an import-parity basis as a result of customs duties, with copper concentrate, coal, petroleum products, alumina, carbon and caustic soda being the primary examples.

Vedanta is liable to pay an additional surcharge, presently at the rate of 3% of the total customs duty payable, as well as an additional customs duty ("CVD") of 12.5% (for the period from 18 March 2012 to 28 February 2015, the CVD was 12%) of the assessable value and basic custom duty, which is levied on imports in India.

As Vedanta sells the majority of the commodities it produces in India, Vedanta's profitability is dependent to a certain extent on the continuation of import duties and any reduction may have a material adverse effect on its results of operations and financial condition.

The following changes became effective from 1 March 2011:

- The import duty on certain raw materials, such as gypsum, used in the production of aluminium was reduced from 5% to 2.5%.
- A 1% excise duty was imposed on fly ash.
- The import duty on copper concentrate and rock phosphate was increased from 2% to 2.5%.

Further, on 1 March 2011, the GoI announced an exemption from import duty on copper concentrate up to an amount equivalent to the customs duty leviable on the value of gold and silver contained in such copper concentrate.

## India export duties

The GoI levies duty on the export from India of certain products mentioned under the second schedule of the Customs Tariff Act 1975, including iron ore and concentrates, at a specified rate (ad valorem on the Free on Board or FOB value of exports).

Effective from 30 December 2011, the GoI raised export duty on iron ore fines and lumps from 20% to 30%, ad valorem on the FOB value of exports. Effective from 30 April 2015, the export duty on iron ore fines with Fe content less than 58% is 10%. With effect from 1 March 2016, the export duty on iron ore lumps (below 58% Fe content) has been reduced from 30% to nil and iron ore fines (below 58% Fe content) has been reduced from 10% to nil.

## Indian export incentives

The GoI provides a variety of export incentives to Indian companies. Indian exports of copper, zinc and aluminium receive assistance premia from the GoI, which have been progressively reduced since 2002, consistent with similar reduction in custom duties. Export incentives do not outweigh the Indian market price premia. Accordingly, notwithstanding the export incentives, Vedanta endeavours to sell as large a quantity of its products as possible domestically.

In fiscal years 2014, 2015 and 2016, exports accounted for 18.5%, 26.9% and 25.0%, respectively, of Vedanta's India zinc business revenue. The following table sets out the export assistance premiums, as a percentage of the FOB value of exports, on zinc concentrate, zinc ingots and lead concentrate for the periods indicated:

	9 October, 2012 to	21 September, 2013 to	22 November, 2014 to	15 November 2016 to			
	20 September, 2013	21 November, 2014	14 November, 2016	date			
		(Percentage of FOB value of exports)					
Zinc concentrate	1.50%	1.30%	1.00%	Nil			
Zinc ingots	2.00%	1.70%	1.90%	1.50%			
Lead concentrate .	1.50%	1.30%	1.00%	Nil			

In fiscal years 2014, 2015 and 2016, exports accounted for 48.4%, 41.8% and 38.0%, respectively, of Vedanta's Indian copper business revenue. The export assistance premiums, as a percentage of the FOB value of exports, on copper cathode and copper rods for the periods between 1 October 2011 and 31 March 2015 was 2.0% each. The copper cathods are however subject to a cap of 8,000 per tonne and the FOB value for copper rods is applicable to exports to Czech Republic only.

Further, with effect from 1 April 2015, the New Merchandise Exports from India Scheme was introduced in place of Market linked focus product scheme. In the new scheme, no export incentive has been notified for copper products.

In fiscal years 2014, 2015 and 2016, exports accounted for 28.7%, 33.7% and 39.7%, respectively, of Vedanta's aluminium business revenue. The following table sets out the export assistance premiums, as a percentage of the FOB value of exports, on aluminium ingots, aluminium rods and aluminium rolled products for the periods indicated:

	1 October 2011 to	13 September	22 November 2014				
	12 September	2013 to March 31,	April 1, 2014 to	to 14 November	15 November 2016		
	2013	2014	21 November 2014	2016	to date		
Aluminium ingots	2.0%	1.7%	1.7%	1.9%	1.0%		
Aluminium	2.070		1.7 70	1.9 //			
rods Aluminium	2.0%	1.7%	1.7%	1.9%	1.0%		
billets	2.0%	1.7%	1.7%	1.9%	1.0%		
Aluminium rolled							
products	3.0%	3.0%	1.9%	1.9%	1.5%		

The GoI may further reduce export incentives in the future, which may have a material adverse effect on Vedanta's results of operations and financial condition.

## Taxes and royalties

Income tax on Indian companies is presently charged at a statutory rate of 30%, plus an applicable surcharge of 12% on the tax and has an additional tax by way of higher and secondary education cess of 3%, on the tax including surcharge, which results in an effective statutory tax rate of 34.6%. Vedanta effective tax rate is lower than the statutory rate, benefiting from tax incentives on infrastructure projects in specific locations. Vedanta has in the past had an effective tax rate lower than the statutory rate, benefiting from tax incentives on infrastructure projects in specific locations.

Profits of companies in India are subject to either regular income tax or a minimum alternate tax ("MAT"), whichever is greater. MAT rates are currently 21.3%. The excess of amounts paid as MAT over the regular income tax amount during the year may be carried forward and applied towards regular income taxes payable in any of the succeeding ten years subject to certain conditions.

The tax rates imposed on us in respect of dividends paid in prior periods have varied. According to the Finance Act, 2014, dividend distribution tax is to be levied on gross distributable surplus amount instead of amount paid net of taxes. This has resulted in an increase in the dividend distribution tax of more than 20% from 17.0% in the earlier year. Further, the Finance Act 2015 has increased the surcharge from 10% to 12%, which resulted in effective tax rate of 20.4% with effect from fiscal year 2016. This tax is payable by the company declaring distributing or paying the dividends. Dividends from Vedanta's subsidiaries to Vedanta are also subject to this tax, although Vedanta does not pay income tax in India upon the receipt of any such dividends. The Income Tax Act provides that if a company receives a dividend from any of its Indian subsidiaries during the year and such subsidiary has paid a tax on its dividends, then the dividend distributed by the parent company to the extent of dividend received from the Indian subsidiary shall not be subject to dividend tax.

Service tax is applicable at 14% with effect from 1 June 2015. Further, an additional 'Swacch Bharat Cess" at 0.5% with effect from 14 November 2015 and "Krishi Kalyan Cess" at 0.5% with effect from 1 June 2016 on the value of taxable services has been made applicable. Accordingly, the effective service tax rate is payable at 15%.

Vedanta pays service tax in India as a service provider and service recipient.

Service Provider: Vedanta pay service tax as a service provider in the range of 12.36% to 15.0% under the following categories:

- Business Support Services;
- Oil Transfer Service:
- Port Service; and
- Management Consultant Service.

Service Recipient: Vedanta pay service tax as a service recipient under following categories:

• Foreign Service Providers: Indian subsidiaries are responsible for paying service tax directly to tax authorities in the case of foreign service providers who do not have any permanent establishment in India. In the case of service providers having a permanent establishment in India, they are responsible for recovering the applicable service taxes and paying them to tax authorities. Indian subsidiaries are also paying service tax the as recipient of services on the Company overheads payable to Vedanta;

- Service tax on fees payable to directors of company: Vedanta is paying service tax on the fees payable to non-executive/independent directors of Indian companies. The fee includes director sitting fees and/or any commission payable to the directors;
- Other services: In case of services received from any goods transport agency and payments towards any sponsorship, Vedanta is responsible for paying service tax directly to tax authorities as per the applicable rates; and
- Domestic Service Providers: In case of certain services received from non-company domestic service providers, liability of payment of service tax has been placed on the recipient of services with effect from 1 July 2012 under Notification No. 30/2012-Service Tax dated 20 June 2012 as per the applicable rates.

Vedanta currently pays an excise duty of 12.5% with effect from 1 March 2015 (for the period from 17 March 2012 to 28 February 2015, the excise duty was 12% and an additional charge of 3.0% on the excise duty based) on all of Vedanta's domestic production intended for domestic sale. Vedanta charges the excise duty and additional charge to its domestic customers. Vedanta Limited pays excise duty on metallurgical coke at the rate 6.0% and on pig iron of 12.5%. HZL pays excise duty on silver at the rate of 8.5% effective from 1 March 2016 (8.0% prior to that) and an additional charge of 3.0% on the excise duty has been eliminated with effect from 1 March 2015. Goods procured for the purposes of "Petroleum Operations" and which are exempt from customs duty are also exempt from excise duty under notification 12/2012-Central Excise dated 17 March 2012, Sr. No 336 provided conditions as provided have been satisfied, all goods supplied under international competitive bidding and are exempt from customs duty.

Vedanta is also subject to government royalties. It pays royalties to the State Governments of Chhattisgarh, Rajasthan, Goa and Karnataka in India based on its extraction of bauxite, lead-zinc ore and iron ore. Most significant of these is the royalty that HZL is currently required to pay to the State of Rajasthan, where all of HZL's mines are located, at a rate of 10% with effect from 1 September 2014 (the rate was 8.4% from 13 August 2009 to 31 August 2014) of the zinc LME price payable on the zinc metal contained in the concentrate produced, 14.5% (the rate was 12.7% from 13 August 2009 to 31 August 2014) of the lead LME price payable on the lead metal contained in the concentrate produced and at a rate of 7.0% of silver LME price chargeable on silver-metal produced. In addition, a further amount of royalty effective from January 12, 2015, for DMF at 30% of base royalty and NMET at 2% of base royalty, has been notified. The royalties paid by BALCO on the extraction of bauxite are not material to Vedanta's results of operations. Vedanta Limited pays royalties at 15% of pit mouth value (PMV) declared by Indian Bureau of Mines on monthly basis for its iron ore business.

Royalty is also payable at Cairn India to the state government of Rajasthan, Andhra Pradesh and Gujarat for the extraction of crude oil and natural gas. Cairn India also pays cess to the GoI. Generally in respect of oil and gas operations, royalty and cess payments are made by the joint operation partners in proportion to their participating interest and are cost recoverable.

For the Rajasthan block, entire royalty payments are made by ONGC at the rate of 20% of well-head value for crude oil and 10% of well-head value for natural gas and are cost recoverable. Until February 2016, cess is paid at the rate of Rs. 4500/MT for crude oil; pursuant to amendments in the Finance Act 2016, cess is paid at the rate of 20% ad-valorem from March 2016 onwards. National Calamity Contingent Duty (NCCD) is paid at the rate of Rs. 50/MT. Sales tax payments are made at the rate of 2% (central sales tax) on sale of both crude oil and natural gas.

For the Block PKGM-1 (the "Ravva Block"), royalty is Rs. 481/MT and cess is fixed at Rs. 900/MT on crude oil. Royalty on natural gas is 10% of well-head value of gas. Sales tax payments stand at 2% (central sales tax) or 5% (value added tax) on crude oil and 14.5% on natural gas.

For the Cambay block, the entire royalty and cess payments are made by ONGC and are not cost recoverable. Vedanta only participate in the payment of NCCD at the rate of Rs. 50/MT. Sales tax payments (central sales tax) are made at a rate of 2% on crude oil and 15% (value added tax) on natural gas.

For all the above blocks, education surcharge was paid at 3% of applicable cess value, which has been discontinued as per Ministry of Finance circular with effect from December 2013.

Royalties in Zinc International business are as follows:

- 3.0% of sale value of the products for Skorpion;
- 7.0% of turnover for BMM. The royalty rate applied on the turnover is 0.5% if the adjusted earnings before interest and tax ("adjusted EBIT") is negative, and in the event the adjusted EBIT is positive, the royalty rate applied on the turnover is 0.5% plus the rate computed at 100/9 times the adjusted EBIT upon turnover. In any event, the maximum royalty rate is capped at 7.0%; and
- 3.5% of turnover for Lisheen. The turnover is identified as gross revenue less smelter deductions, treatment charges, freight and marine insurance charges on a semi-annual basis.

There are several tax incentives available to companies operating in India, including the following:

- profits from newly established units in special economic zones and specified geographic locations are entitled to a tax holiday for a specified period;
- profits from newly constructed power plants (including for captive use) benefit from a tax holiday for a specified period;
- profits from newly constructed industrial undertakings engaged in production of oil and gas benefit from a tax holiday for a specified period;
- renewable energy devices being windmills installed on or before 31 March 2012 are eligible for accelerated depreciation at 80%. However, units that have opted for generation based incentive are not eligible for the said accelerated depreciation; and
- there are tax benefits on investments in mutual funds for holdings beyond 12 months and tax exemption on interest on specified public sector bonds subject to certain conditions.

Vedanta has benefited from these tax incentives. Such benefits have resulted in lower effective tax rates in some of its operating subsidiaries such as Cairn India, Vedanta Limited, BALCO, and HZL. Vedanta Limited, BALCO, and HZL have considerable investments in captive power plants enjoying tax exemptions, and HZL has also benefited from establishing wind energy generating projects. HZL also benefits from a tax holiday exemption with respect to its zinc processing and refining unit at Haridwar and its zinc, lead and silver processing and refining unit in Pantnagar in the State of Uttarakhand in northern India. In addition, a large part of Vedanta Limited's, Cairn India's and HZL's investments of their surplus cash is in tax-efficient or tax-exempt instruments. The commercial power business also enjoys a tax exemption on their independent power plants for ten years from the commencement of their operations. The Vizag port is also subject to favourable tax treatment.

KCM's results of operations are significantly impacted by a number of Zambian and foreign governmental policies, including fiscal and economic policy, industrial policy, infrastructure spending policy, mining policy, direct and indirect taxes and export-import policy. Such governments may at any time effect a change in any of these policies, which may adversely affect KCM's results of operations.

KCM signed a Development Agreement with the Zambian Government in 2000 (the "Development Agreement"). The Development Agreement was subsequently amended in 2004. The Development Agreement provided for legislative and taxation certainty for an agreed period. The existence of the Development Agreement was provided for by the Mines and Minerals Act 1995 which was repealed on 1 April 2008. The Zambia Government enacted the Income Tax (Amendment) Act 2015 effective from July 1, 2015 which made changes to the tax regime in Zambia. Under this Act, where an entity is carrying on both mining and mineral processing, the income earned from the two activities shall qualify to be taxed as income arising from mining operations at 30%. Amendment also clarified that for the period prior to July 1, 2015

- (a) custom smelting will be treated as a separate and distinct business activity as compared to the integrated operations. Loss from custom smelting and the integrated operations can be offset against the income from respective source only,
- (b) The loss from custom smelting can be carried forward for a period of five subsequent years and there is no restriction on the amount which can be set off in a particular year.

The loss from integrated operations cannot be carried forward beyond ten subsequent years after the year in which the loss is incurred. The set off of loss in a particular year is allowed up to a maximum of fifty percent of the income of that year.

In addition, Amendments to The Zambia's Mines & Mineral Development Act 2015 were formalized on 6 June 2016 which provides for a 'sliding scale' royalty rate with effect from 1 June 2016. Accordingly, there is a 4% royalty at a copper LME of < US\$4,500 per tonne, 5% royalty at a copper LME between US\$4,500 and US\$6,000 per tonne and 6% royalty at a copper LME >US\$6,000 per tonne as against the rates prescribed earlier at 9% for open pits and 6% for underground mining operations.

KCM has been, and expects to continue to be, positively impacted by a 10% duty imposed by the Zambian Government on the export of copper concentrate from Zambia. This duty has increased the domestic supply of copper concentrate and has reduced the price of copper concentrate purchased by KCM in the domestic market. There can be no assurance that the Zambian Government will not reduce or eliminate this duty in the future.

## Exchange Rates

Vedanta's financial statements are presented in US dollars. However, its operating costs are influenced by the currencies of those countries where Vedanta's mines, fields and plants are located. A majority of its mines, fields and plants are located in India and, hence, the Indian Rupee is the currency in which most of its costs are incurred and whose fluctuation against the US dollar may have a significant impact on its financial results. When the Indian Rupee depreciates against the US dollar, Vedanta's financial results can improve as its costs of production become lower relative to the price it can obtain for its products in the global marketplace, especially as compared to competitors with costs of production that are denominated in a currency that has not depreciated against the US dollar. Conversely, when the Indian Rupee appreciates against the US dollar, Vedanta's financial results can be negatively impacted. Vedanta also has capital expenditure and services denominated in currencies

other than the Indian Rupee. For example, KCM's functional currency is the US dollar with its cost base having a mix of the Zambian Kwacha and the US dollar. See "Risk Factors — Currency fluctuations among the Indian Rupee and other currencies and the US dollar could have a material adverse effect on Vedanta's results of operations" for additional information.

Vedanta's borrowings are predominantly denominated in US dollars while a large portion of its cash and liquid investments are held in other currencies, mainly in Indian Rupees. Some financial assets and liabilities of its subsidiaries are not held in the functional currency of such subsidiaries. As a result, Vedanta is exposed to movements in the functional currency of those entities.

Vedanta's exposure to various currencies means that currency fluctuations may have a large impact on Vedanta financial results. It is subject to currency risks affecting the underlying cost bases in its operating subsidiaries, and also the translation of the cost of production, income statement and balance sheet (including non-US dollar denominated borrowings) in the consolidated financial statements, where the functional currency is not the US dollar.

#### **Results of Operations**

#### Overview

The following table sets out Vedanta's historical operating results as a percentage of revenue for each of fiscal years 2014, 2015 and 2016, and the six months ended 30 September 2015 and 2016:

	Year Ended 31 March		Six Months Ended 30 September		
	2014	2015	2016	2015	2016
			(\$ million)		
Revenue	12,945.0	12,878.7	10,737.9	5,699.3	4,867.8
Cost of sales	(10,043.2)	(10,463.9)	(9,241.1)	(4,800.7)	(3,900.0)
Gross profit	2,901.8	2,414.8	1,496.8	898.6	967.8
Other operating income	84.0	104.0	101.7	62.8	40.1
Distribution costs	(237.6)	(245.2)	(223.8)	(104.2)	(111.1)
Administrative expenses	(460.1)	(538.1)	(493.5)	(279.4)	(177.0)
Special Items	(138.0)	(6,744.2)	(5,210.1)		
Operating profit/(loss)	2,150.1	(5,008.7)	(4,328.9)	577.8	719.8
Investment revenue	687.7	832.6	697.8	372.8	385.6
Finance costs	(1,439.8)	(1,387.2)	(1,280.4)	(639.1)	(652.3)
Other gains and losses (net)	(279.9)	(76.9)	(72.5)	(67.8)	(26.6)
Profit/(loss) before taxation	1,118.1	(5,640.2)	(4,984.0)	243.7	426.5
Tax credit — special items	29.4	2,205.1	1,737.4	(173.8)	
Tax expense — others	(158.1)	(352.6)	(255.5)	(223.5)	(169.2)
Profit/(Loss) for the year	989.4	(3,787.7)	(3,502.1)	(153.6)	257.3

## Revenue by Geographic Location

Vedanta's operations are located in India, Zambia, Namibia, South Africa and Fujariah. The primary markets for its products are India, China, Far East Asia (others) and the Middle East. Vedanta endeavors to sell as large a quantity of its products as possible in India due to the Indian market premium that it receives on sales in India. The following table sets out Vedanta's revenue from each of its primary markets in each of fiscal years 2014, 2015 and 2016:

	Year Ended 31 March						
	2014	<b>%</b>	2015		2016	%	
	(\$ in millions, except percentages)						
India	8,234.1	63.6%	7,872.0	61.1%	6,773.9	63.1%	
China	1,742.0	13.5%	1,314.2	10.2%	527.9	4.9%	
Far East Asia							
others <sup>(1)</sup>	1,003.2	7.7%	1,168.4	9.1%	902.5	8.4%	
Middle East	724.2	5.6%	1,143.7	8.9%	1,075.1	10.0%	
Europe	537.0	4.1%	643.3	5.0%	345.3	3.2%	
Africa	213.0	1.6%	192.3	1.5%	91.1	0.8%	
Asia (others) <sup>(2)</sup>	83.8	0.6%	118.9	0.9%	725.3	6.8%	
UK	19.1	0.1%	2.2	0.0%	103.9	1.0%	
Others <sup>(3)</sup>	388.6	3.0%	423.7	3.3%	192.9	1.8%	
Total	12,945.0	<u>100.0%</u>	12,878.7	100.0%	10,737.9	<u>100.0%</u>	

<sup>(1)</sup> Far East Asia others includes a number of countries, primarily Korea, Thailand, Singapore and Mauritius.

## Results of Operations: Six Months Ended 30 September 2016 compared to Six Months Ended 30 September 2015

## Revenue

Vedanta's revenue was \$4,867.8 million in the six months ended 30 September 2016, a decrease of \$831.5 million, or 14.6% from \$5,699.3 million in the six months ended 30 September 2015. This decrease was primarily due to lower Brent prices and Copper prices, a reduction in premia across the metal businesses and lower volumes at Zinc India. This decrease was partially offset by the commissioning of a power unit at TSPL and the ramp up of projects at BALCO and Jharsuguda. Vedanta's copper, oil and gas, zinc, iron ore, aluminium and power businesses contributed 36.5%, 12.0%, 21.4%, 4.5%, 17.8% and 7.8%, respectively, to its revenue in the six months ended 30 September 2016.

## Oil and Gas

Revenue from the oil and gas business was \$585.9 million in the six months ended 30 September 2016, a decrease of \$169.4 million or 22.4%, from \$755.3 million in the six months ended 30 September 2015. This decrease was primarily due to weaker crude prices and slightly lower average gross production. Specifically:

• The average Brent price was US\$45.8 per bbl in the six months ended 30 September 2016, compared with US\$56 per bbl during six months ended 30 September 2015.

<sup>(2)</sup> Asia (others) includes Sri Lanka, Bangladesh, Nepal and Pakistan.

<sup>(3)</sup> Others include the United States, Australia, New Zealand and a number of countries that are not classified in the other available categories.

• Average gross production for the six months ended 30 September 2016 was 196,629 barrels of oil equivalent/day (boepd), a decrease of 5% compared to the six months ended 30 September 2015. Rajasthan block production was at an average rate of 167,323 boepd, due to increased volumes from Mangala EOR and the expected performance from Bhagyam and Aishwariya.

## Zinc (India)

Revenue from the zinc business was \$871.2 million in the six months ended 30 September 2016, a decrease of \$279.3 million, or 24.3%, from \$1,150.5 million in the six months ended 30 September 2015. This decrease in revenue is primarily due to lower volumes as per mine plan. This was partially offset by higher silver and zinc prices and the weak rupee. Specifically:

- Zinc and lead integrated production were lower at 37% and 17% respectively in the six months ended 30 September 2016, in line with mined metal production.
- During the six months ended 30 September 2016, mined metal production was 318,358 tonnes, a reduction of 33% compared to the six months ended 30 September 2015, primarily due to lower production from the Rampura Agucha open cast mine as per mine plan.
- Integrated refined silver metal production increased by 6% in the six months ended 30 September 2016, despite lower mined metal volumes from Rampura Agucha open cast. This was due to significantly higher production from Sindesar Khurd mine.
- LME zinc prices averaged US\$2,089 per tonne during the six months ended 30 September 2016, compared to US\$2,013 per tonne in the six months ended 30 September 2015. Average price of silver increased by 17% in the six months ended 30 September 2016 partly due to supportive European and Japan central bank policies.

Average prices for lead weakened by 2% in the six months ended 30 September 2016 due to subdued Chinese consumption and high levels of scrap in secondary markets.

## Zinc (International)

Revenue from the international zinc business was \$170.0 million in the six months ended 30 September 2016, a decrease of \$74.5 million or 30.5%, from \$244.5 million in the six months ended 30 September 2015. The decrease in revenue was primarily due to decrease in production due to closure of Lisheen mine in November 2015. This was partially offset by increase in production at Black Mountain Mining and Skoprion. Specifically:

- Mined metal output during the six months ended 30 September 2016 was 38% lower compared to the six months ended 30 September 2015, due mainly to closure of the Lisheen mine in Ireland in November 2015 after 17 years in operation.
- Skorpion in Namibia, production increased by 10% in the six months ended 30 September 2016 compared to the six months ended 30 September 2015, mainly on account of higher feed grades and better recoveries.
- Production at BMM was 14% higher, mainly on account of a 25% increase in lead grade, in conjunction with a 3% increase in mine volume in the six months ended 30 September 2016, supported by the change in mining methodology from cut-and-fill to the more productive long hole mining.
- During six month ended 30 September 2016, unit costs of production decreased by 7% to US\$1,331 per tonne as compared to US\$1,439 per tonne in the six month ended 30 September 2015. Excluding Lisheen, unit cost of production decreased by 16% from

US\$1,592/per tonne to US\$1,331 per tonne in the six months ended 30 September 2016. Lower costs were primarily driven by better realised Treatment Charges and Refinery Charges (TcRc), local currency depreciation, continued focus on labour and equipment productivity improvements, and other cost optimisation initiatives.

## Copper (India)

Revenue from the copper business in India and Australia was US\$1,393.3 million in the six months ended 30 September 2016, a decrease of US\$302.9 million, or 17.9% from US\$1,696.2 million in the six months ended 30 September 2015. This decrease was primarily due to decrease in copper prices partially offset by increase in copper production. Specifically:

- Average LME copper prices fell 16% in the six months ended 30 September 2016 primarily due to higher copper inventories and higher production levels from China.
- During the six months ended 30 September 2016, copper cathode production at Tuticorin increased to 198,000 tonnes, despite the thirteen days unplanned outage due to boiler leakage.

#### Copper (Zambia)

Revenue from KCM in Zambia was US\$382.4 million in the six months ended 30 September 2016, a decrease of US\$137.6 million, or 26.5%, from US\$520.0 million in the six months ended 30 September 2015. This decrease was primarily due to lower copper prices and lower sales volume. Specifically:

• Average LME copper prices fell by 16% in the six months ended 30 September 2016 primarily due to higher copper inventories and higher production levels from China.

In six month ended 30 September 2016, mined metal production of 58,000 tonnes reduced by 7% year-on-year, due to lower production from the Nchanga underground mine which was placed under care and maintenance in the third quarter of fiscal year 2016, equipment constraints at Konkola and low production at the Tailings Leach Plant. Custom volumes at 36,000 tonnes was 22% higher on a year on year basis due to higher concentrate availability and improved grades in the six months ended 30 September 2016.

### Iron ore

Revenue from the iron ore business was \$217.1 million in the six months ended 30 September 2016, an increase of \$85.5 million, or 64.9%, from \$131.6 million in the six months ended 30 September 2015. The sale of iron ore in the six months ended 30 September 2016 was 3.4 million tonnes, an increase of 2.2 million tonnes, or 65.0%, from 1.2 million tonnes in the six months ended 30 September 2015.

In August 2015, production recommenced in Goa after obtaining approvals to produce 5.5 million tonnes per annum of saleable ore. During the six months ended 30 September 2016, production of saleable ore was 4.7 million tonnes with sales of 3.4 million tonnes. Production and sales were primarily impacted by extended monsoons.

#### Aluminium

Revenue from the aluminium business was US\$863.3 million in the six months ended 30 September 2016, an increase of US\$13.9 million, or 1.6%, from US\$849.4 million in the six months ended 30 September 2015. This increase was primarily due to increase in aluminium production, partially offset by decrease in aluminium prices and premium. Specifically:

• Total aluminium production was increased from 463,946 tonnes in the six months ended 30 September 2015 to 541,002 tonnes in the six months ended 30 September 2016, due to commissioning of pots at the first line of the 1.25 mtpa Jharsuguda and 325 ktpa BALCO aluminium smelters.

However, the first line at the 1.25 mtpa Jharsuguda smelter was impacted by a power outage in early August 2016, following which 168 pots out of the total 336 pots were taken out of production. While 54 pots have commenced production, the remaining pots are being rectified. Similarly the 325 ktpa BALCO smelter was commissioned, with all 336 pots operational in August 2016. However, a technical issue in September 2016 took 167 pots out of production. Rectification work is in progress and these pots are expected to commence production by the fourth quarter of fiscal year 2017. In the six months ended 30 September 2016, the Lanjigarh alumina refinery produced 566,935 tonnes, at 4.7% on a year on year basis, in line with the expectation of 1.4 million tonnes full-year production in fiscal year 2017.

Average LME prices for aluminium for the year fell to US\$1,596 per tonne, a 5% decrease
on the previous year's average price level of US\$1,675 per tonne. World-wide, supply
continues to outpace demand, which puts increasing pressure on aluminium prices and
premium.

Aluminium Ingot Benchmark Main Japanese Port or MJP premium during the six months ended 30 September 2016 was lower at US\$86 per tonne compared to US\$139 per tonne during the six months ended 30 September 2015.

#### Commercial Power Generation

Revenue from the commercial power generation business was \$375.4 million in the six months ended 30 September 2016, an increase of \$37.3 million, or 11.0% from \$338.1 million in the six months ended 30 September 2015 primarily due to increase in power sold, partially offset by decrease in average power sale prices. Specifically:

- Power sales were higher at 6,039 million units in the six months ended 30 September 2016, compared to 5,789 million units in the six months ended 30 September 2015, due to the commissioning of additional units at TSPL and BALCO over the past year. Jharsuguda 600MW power plant operated at a lower Plant Load Factor (PLF) of 62% in 6 months ended 30 September 2016 as compared to a PLF of 69% in 6 months ended 30 September 2015 due to power evacuation constraints.
- MEL power plant operated at a lower PLF of 28% in the six months ended 30 September 2016, compared to a PLF 77% in in the six months ended 30 September 2015, due to lower offtake from Telangana State Electricity Board (TSEB).
- Average power sale prices excluding TSPL were lower in in the six months ended 30 September 2016 at US Cent 4.36/unit compared with US Cent 4.86/unit in the six months ended 30 September 2015, primarily due to lower power realisation rates on account of a weak power market.

## Operating profit

Vedanta's operating profit was \$719.8 million in the six months ended 30 September 2016, an increase of \$142.0 million, or 24.6%, from \$577.8 million in the six months ended 30 September 2015. Operating margin increased to 14.8% in the six months ended 30 September 2016 from 10.1% in the six months ended 30 September 2015 due to reduced cost and higher production partially offset by decrease in commodity prices.

Contributing factors to Vedanta's consolidated operating profit were as follows:

• Fall in prices, lower premia and higher discounts resulted in an overall adverse net price hit of \$190 million which was offset by softened input commodity prices including imported alumina and coal by \$57 million in the six months ended 30 September 2016

Operating profit was significantly affected by the downturn in commodity prices across Vedanta's businesses during six months ended 30 September 2016 compared to six months ended 30 September 2015. The combined fall in prices, lower premia and higher discounts resulted in an overall adverse net price hit of US\$190 million. Oil & Gas average Brent price was reduced to US\$46 per bbl from US\$56 per bbl, average aluminium LME prices were down to US\$1,596 per tonne from US\$1,675 per tonne, average copper LME prices were down to US\$4,751 per tonne from US\$5,639 per tonne during six months ended 30 September 2016 compared from 30 September 2015. The total fall in commodity prices decreased operating profit by US\$144 million, with a further impact of US\$21 million due to lower premia mainly in aluminium and higher quality discount to Brent prices at the Oil & Gas business.

- During six months ended 30 September 2016, Vedanta concentrated on ramping up volumes at Iron Ore business, commercial operation of power units and stabilisation of aluminium pots. However, at Zinc India, zinc metal production was lower, in line with mine plan. The above factors collectively impacted US\$100 million to operating profit before special items which was offset by various cost savings and marketing initiatives which amounted to \$64 million, in the six months ended 30 September 2016
- Weaker operating currencies against US\$ net of translation increased operating profit by \$109 million in the six months ended 30 September 2016 and lower amortization on account of impairment losses in Oil & Gas and depreciation of Nchanga underground assets increase operating profit by \$195 million, in the six months ended 30 September 2016.

## Oil and gas

• The Vedanta EBITDA for the oil and gas business was US\$273.9 million in the six months ended 30 September 2016, a decrease of \$99.9 million, or 26.7%, from US\$373.8 million in the six months ended 30 September 2015. This decrease was attributable to weaker crude oil prices.

#### Zinc (India)

• The Vedanta EBITDA for the India zinc business was US\$456.1 million in the six months ended 30 September 2016, a decrease of \$125.7 million, or 21.6%, from US\$581.8 million in the six months ended 30 September 2015. This decrease was attributable to lower volumes and regulatory headwind, including clean energy cess. This was partially offset by higher silver and zinc prices and the weak rupee.

## Zinc (International)

• The Vedanta EBITDA for the international zinc business was US\$88.4 million in the six months ended 30 September 2016, an increase of US\$31.8 million, or 56.2%, from US\$56.6 million in the six months ended 30 September 2015. This increase was attributable to lower cost of production, higher contribution from increased grade and recovery and exceptional insurance and royalty refunds. Depreciation and amortization was lower at 50% due to the Lisheen mine closure which was partially offset by an increase in the Skorpion asset base over a short mine life

## Copper (India)

• The Vedanta EBITDA for the India and Australia copper business was \$126.3 million in the six months ended 30 September 2016, a decrease of \$44.1 million, or 25.9%, from \$170.4 million in the six months ended 30 September 2015. This decrease was attributable to lower TcRc and lower by-product Credits, which was partially, offset by improved operational efficiencies.

## Copper (Zambia)

KCM's Vedanta EBITDA was \$17.2 million in the six months ended 30 September 2016, compared to loss of \$24.3 million in the six months ended 30 September 2015. Vedanta EBITDA has improved primarily on account of lower cost of production and gain on Kwacha-denominated VAT receivable, which was offset by lower copper prices and higher power costs.

#### Iron ore

• The Vedanta EBITDA for the iron ore business was \$71.7 million in the six months ended 30 September 2016, an increase of \$64.5 million from \$7.2 million in the six months ended 30 September 2015. The increase was primarily attributable to resumption of mining operations in Goa, in August 2015.

#### Aluminium

• The Vedanta EBITDA for the aluminium business was \$102.1 million in the six months ended 30 September 2016, an increase of \$80.4 million, from \$21.7 million in the six months ended 30 September 2015. The increase was primarily attributable to higher volumes, input commodity deflation, rupee depreciation and cost saving initiatives offset by one-off charge of renewable power obligations.

## Commercial power generation

• The Vedanta EBITDA for the commercial power generation business was \$107.9 million in the six months ended 30 September 2016, a increase of \$14.9 million, or 16.0%, from \$93.0 million in the six months ended 30 September 2015. The increase was primarily due to commissioning of additional units at the TSPL and BALCO power plants.

## Investment revenue, finance costs and other gains/(losses)

• Vedanta's investment revenue was \$385.6 million in the six months ended 30 September 2016, an increase of \$12.8 million, or 3.4%, from \$372.8 million in the six months ended 30 September 2015, which was primarily the result of higher MTM gains on investment, accruing in a falling interest rate environment in India largely offset by lower investment

corpus due to a special dividend of \$1.8 billion paid by zinc India in the beginning of 6 months ended 30 September 2015. The average post tax return on investment of Vedanta was 8.8% in six months ended 30 September 2016 in comparison to 7.4% in six months ended 30 September 2015.

- Vedanta's finance costs were US\$652.3 million in the six months ended 30 September 2016, an increase of \$13.2 million, or 2%, from US\$639.1 million in the six months ended 30 September 2015. The increase was primarily attributable to capitalization of new capacities in the aluminium and power businesses and an increase in INR-denominated borrowings in the borrowing mix. This was largely offset by the increased aluminium capacities of Jharsuguda-II smelter. The average borrowing cost of Vedanta was 7.5% in six months ended 30 September 2016 in comparison to 7.3% in six months ended 30 September 2015.
- Other gains and losses in the six months ended 30 September 2016 include a loss of \$26.6 million, compared to a loss of US\$67.8 million in the six months ended 30 September 2015.
   This was primarily due to impact of MTM on foreign currency borrowings, primarily at Vedanta's Indian businesses and the restatement of MAT credit at the oil & gas business.

Income tax expense and non-controlling interests

- Income tax expense was \$169.2 million in the six months ended 30 September 2016, a decrease of \$228.1 million, or 57.4%, from \$397.3 million in the six months ended 30 September 2015, primarily due to lower deferred tax expense at Cairn India and due to restoration of deferred tax liabilities as a result of change in tax legislation in Copper Zambia. The effective tax rate for the six months ended 30 September 2016 was 39.7%, compared to 163% in the six months ended 30 September 2015.
- The profits attributable to non-controlling interests in the six months ended 30 September 2016 increased to \$321.5 million from \$170.9 million in the six months ended 30 September 2015. The profits attributable to non-controlling interests as a percentage of total profits increased to 124.9% in the six months ended 30 September 2016 from 846.0% in the six months ended 30 September 2015.

## Results of Operations: Fiscal Year 2016 compared to Fiscal Year 2015

## Revenue

Vedanta's revenue was \$10,737.9 million in fiscal year 2016, a decrease of \$2,140.8 million, or 16.62%, from \$12,878.7 million in fiscal year 2015. The decrease was primarily driven by lower LME, lower Brent prices, premia and currency movement was 21.9% year-on-year, which was partly offset by improved operational performance at Zinc India, ramp up in power units, cost savings and marketing initiatives across the businesses of 5.3% resulting in an overall revenue reduction by 16.6% year-on-year. Vedanta's copper business contributed 38.8%, oil and gas 12.3%, zinc 23.3%, iron ore 3.2%, aluminium 15.8% and power 6.4% to the total revenue in fiscal year 2016.

#### Oil and Gas

Revenue from the oil and gas business was \$1,322.3 million in fiscal year 2016, a decrease of \$1,075.2 million, or 44.8%, from \$2,397.5 million in fiscal year 2015. The decrease in revenue was primarily contributed by the significant fall in average Brent prices realization partially offset by higher entitlement interest sales volumes and higher average exchange rate. Specifically:

• The daily average Brent oil price realization decreased from \$75.8 per boe, in fiscal year year 2015 to \$40.9 per boe, in fiscal year 2016, a significant decrease of 46.2%.

- Entitlement interest sales increased from 87,560 boepd in fiscal year 2015 to 90,788 boepd in fiscal year year 2016, an increase of 3,228 boepd or 3.7%.
- Average exchange rate increased by 7% from Rs. 61.1 per \$1.0 in fiscal year 2015 to Rs. 65.5 per \$1.0 in fiscal year 2016.

#### Zinc (India)

Revenue from the zinc business was \$2,111.0 million in fiscal year 2016, a decrease of \$246.0 million, or 10.4%, from \$2357.0 million in fiscal year 2015. This decrease was primarily driven by lower LME prices of zinc and lead and LBMA price for silver and premia, as well as statutory headwinds like clean energy cess on coal and renewable power obligations, amongst others in fiscal year 2016. The decrease was partially offset by increased integrated metal volumes and higher silver production. Specifically:

- Zinc ingot production increased from 733,803 tonnes in fiscal year 2015 to 758,938 tonnes in fiscal year 2016, an increase of 3.4%. Production during the second half of fiscal year 2016 was lower than the first half of year, due mainly to reduced output from Rampura Agucha open pit, particularly in fourth quarter of fiscal year 2016 as per the mine plan. This was partially offset by record production from all the underground mines, and in particular the Sindesar Khurd and Kayad mines, which also resulted in higher lead and silver volumes. Zinc ingot sales also increased in line with the higher production, from 735,783 tonnes in fiscal year 2015 to 760,400 tonnes in fiscal year 2016, an increase of 3.3%.
- Zinc ingot sales in the domestic market increased from 483,361 tonnes in fiscal year 2015 to 525,763 tonnes in fiscal year 2016, an increase of 8.8%. The domestic sales as a percentage of total sales slightly increased from 65.7% in fiscal year 2015 to 69.1% in fiscal year 2016. Vedanta endeavor to sell large quantities of Vedanta's products domestically, where an Indian market premium is received. The export sales also decreased from 252,422 tonnes of zinc in fiscal year 2015 to 234,637 tonnes of zinc in fiscal year 2016, a decrease of 7.0%.
- The daily average zinc cash settlement price on the LME decreased from \$2,177 per tonne in fiscal year 2015 to \$1,829 per tonne in fiscal year 2016, a decrease of 16.0%.
- Lead ingot production increased from 127,143 tonnes in fiscal year 2015 to 144,919 tonnes in fiscal year 2016, an increase of 14.0% in line with mined metal production. Lead ingot sales increased from 128,752 tonnes in fiscal year 2015 to 145,417 tonnes in fiscal year 2016, an increase of 12.9%, due to increase in production.
- The daily average lead cash settlement price on the LME decreased from \$2,021 per tonne in fiscal year 2015 to \$1,768 per tonne in fiscal year 2016, a decrease of 12.5%.
- Silver ingot production increased from 327,508 kilograms in fiscal year 2015 to 424,578 kilograms in fiscal year 2016, an increase of 29.6% on account of higher production from Sindesar Khurd mine. Sale of silver ingots increased from 327,230 kilograms in fiscal year 2015 to 425,685 kilograms in fiscal year 2016, an increase of 30.1% in line with silver production.
- The daily average silver London Bullion Market Association prices decreased from \$18.1 per ounce in fiscal year 2015 to \$15.2 per ounce in fiscal year 2016, a decrease of 16.0%.

## Zinc (International)

Revenue from the international zinc business was \$391.5 million in the fiscal year 2016, a decrease of \$195.4 million, or 33.3%, from \$586.9 million in the fiscal year 2015. The decrease in revenue was primarily due to the closure of the Lisheen mine in Ireland in December 2015 after 17 years in operation, maintenance shutdown and partial industrial action at Skorpion and lower commodity prices. This was partially offset by higher volumes from Black Mountain Mines. Specifically:

- Production of refined zinc metal at Skorpion registered a decrease from 102,188 tonnes in fiscal year 2015 to 82,029 tonnes in fiscal year 2016, a decrease of 20,159 tonnes or 19.7%. This was mainly due to the temporary industrial action during second quarter, the planned refinery maintenance extended shutdown in third quarter of fiscal year 2016, a slower than anticipated ramp-up post the shutdown, and a decline in the mine grade. During fourth quarter of fiscal year 2016 Skorpion production volumes were back to normal, following a planned maintenance shutdown in the third quarter, and it recorded 27,000 tonnes in the fourth quarter.
- Production of zinc metal in concentrate from the Lisheen and BMM mines decreased from 157,919 tonnes in fiscal year 2015 to 101,097 tonnes in fiscal year 2016, a fall of 36.0%. Production of lead metal in concentrate also decreased from 51,407 tonnes to 42,840 tons, a decrease of 8,566 tonnes or 16.7%. This decrease was primarily due to the planned closure of the Lisheen mine in December 2015 whereas BMM mined metal production is higher by 7.1% due to better ore grades and change in mining methods.
- The daily average zinc cash settlement price on the LME decreased from \$2,177 per tonne in fiscal year 2015 to \$1,829 per tonne in fiscal year 2016, a decrease of 15.9%.
- The daily average lead cash settlement price on the LME decreased from \$2,021 per tonne in fiscal year 2015 to \$1,768 per tonne in fiscal year 2016, a decrease of 12.5%.

## Copper (India/Australia)

Revenue from the copper business in India and Australia was \$3,196.8 million in the fiscal year 2016, a decrease of \$485.9 million, or 13.2%, from \$3,682.7 million in the fiscal year 2015. This decrease was primarily due to lower LME realisation for the period, partially offset by increased volume and higher TcRc. Specifically:

- Copper cathode production increased from 362,373 tonnes in fiscal year 2015 to 384,047 tonnes in fiscal year 2016, an increase of 6.0%. In fiscal year 2016, production was at record level, despite a few unplanned outages during the year that included 3-days stoppage on account of flood incident due to heavy rains. The smelter is now producing at a normalized plant capacity level. The fiscal year 2015 production was lower due to the biennial 23-days planned maintenance shutdown in quarter one of fiscal year 2015, therefore the year on year performance is not comparable. Copper cathode sales decreased from 190,872 tonnes in fiscal year 2015 to 166,957 tonnes in fiscal year 2016, a decrease of 12.5%, due to higher rod production.
- Production of copper rods increased from 170,338 tonnes in fiscal year 2015 to 210,799 tonnes in fiscal year 2016, an increase of 23.8%, reflecting the increase in the cathode production and higher market demand. Copper rod sales increased from 170,742 tonnes in fiscal year 2015 to 210,285 tonnes in fiscal year 2016, an increase of 23.2% in line with the increase in production.

• Sales of copper in the Indian market increased from 194,747 tonnes in fiscal year 2015 to 238,916 tonnes in fiscal year 2016, an increase of 22.7%, and the exports decreased from 166,868 tonnes in fiscal year 2015 to 138,326 tonnes in fiscal year 2016, a decrease of 17.1%. Domestic sales as a percentage of total sales increased from 53.9% in fiscal year 2015 to 63.3% in fiscal year 2016.

## Copper (Zambia)

Revenue from KCM in Zambia was \$966.7 million in fiscal year 2016, an increase of \$83.2 million, or 9.4%, from \$883.5 million in fiscal year 2015. This increase was mainly due to increased volume, improvements in external customer base and with a partial offset from lower metal prices. Specifically,

- 1. Copper mined metal production increased from 116,242 tonnes in fiscal year 2015 to 122,968 tonnes in fiscal year 2016, an increase of 5.8% mainly in konkola deep underground mine.
- 2. Copper sales increased from 163,222 tonnes in fiscal year 2015 to 183,845 tonnes in fiscal year 2016, an increase of 12.6%.
- 3. The daily average copper LME price decreased from \$6,558 per tonne in fiscal year 2015 to \$5,211 per tonne in fiscal year 2016, a decrease of approximately 20.5%.

#### Iron ore

Revenue from the iron ore business was \$341.8 million in fiscal year 2016, an increase of \$30.4 million, or 9.8%, from \$311.4 million in fiscal year 2015. The increase was primarily due to resumption of mining in Goa, higher volumes of sales from Karnataka in the comparable period and increase in pig iron production offset by decrease in realization price of pig iron. Specifically:

- Saleable iron ore production increased from 0.6 million tonnes in the fiscal year 2015 to 5.2 million tonnes in fiscal year 2016, a sharp increase of 4.6 million tonnes due to a removal of mining ban in the state of Goa during fiscal year 2016. At Karnataka, production recommenced on February 28, 2015, and in Goa it started slowly from August 2015 following receipt of all requisite clearances and approvals.
- The production of pig iron was higher by 9.6% from 604,860 tonnes to 662,955 tonnes whereas, metallurgical coke was reduced from 499,919 to 485,794, or by 3% from fiscal year 2015 to fiscal year 2016, respectively. During the year, production of pig iron ramped up to a record production level with available rated capacity of 772,000 tonnes. Reduction in metallurgical coke production was mainly due to breakdown in plant.

## Aluminium

Revenue from the aluminium business was \$1,692.3 million in fiscal year 2016, a decrease of \$385.8 million, or 18.6%, from \$2,078.1 million in fiscal year 2015. This decrease was primarily due to lower average LME prices of aluminium and premium on metal partially offset by increased volume in fiscal year 2016 compared to fiscal year 2015. Specifically:

- Aluminium production increased from 877,259 tonnes in fiscal year 2015 to 923,343 tonnes in fiscal year 2016, an increase of 5.3%. Production of value added products marginally decreased from 53.4% in fiscal year 2015 to 52.8% in fiscal year 2016.
- Aluminium sales increased from 877,549 tonnes in fiscal year 2015 to 926,950 tonnes in fiscal year 2016, an increase of 5.6% in line with the increase in production from new smelter in Korba and Jharsuguda. Sales of aluminium ingots increased from 405,300 tonnes

in fiscal year 2015 to 429,335 tonnes in fiscal year 2016, an increase of 8.1%. Wire rod sales increased from 310,446 tonnes in fiscal year 2015 to 357,203 tonnes in fiscal year 2016, and rolled product sales decreased from 46,165 tonnes in fiscal year 2015 to 20,660 tonnes in fiscal year 2016, a decrease of 55.2%, due to temporary suspension of high-cost rolled product facility at BALCO. Billets sales decreased from 115,639 tonnes in fiscal year 2015 to 110,859 tonnes in fiscal year 2016, representing a decrease of 4.1%. Hot metal sales during fiscal year 2016 were 8,892 tons.

- Aluminium sales in the domestic Indian market increased from 519,920 tonnes in fiscal year 2015 to 635,192 tonnes in fiscal year 2016, an increase of 22.2%. Domestic sales increased in fiscal year 2016 due to improved domestic demand and improved market share. Aluminium exports decreased from 357,629 tonnes in fiscal year 2015 to 291,758 tonnes in fiscal year 2016. Domestic sales as a percentage of total sales increased from 59.2% in fiscal year 2015 to 68.5% in fiscal year 2016.
- The daily average aluminium cash settlement price on the LME decreased from \$1,890 per tonne in fiscal year 2015 to \$1,590 per tonne in fiscal year 2016, a decrease of 15.9%.

#### Commercial Power Generation

Revenue from the commercial power generation business was \$691.7 million in the fiscal year 2016, an increase of \$138.9 million, or 25.1% from \$552.8 million in the fiscal year 2015 primarily due to the commencement of additional units at TSPL and BALCO during the year. With these units, entire 9,000 MW of power capacity became operational as of March 2016. Specifically:

- At the Talwandi Sabo power plant, the second 660MW unit commenced commercial production in December 2015. The two operating units operated at 80% availability and supplied 2,792 million units to the Punjab State Electricity Board or PSEB. TSPL's Power Purchase Agreement with PSEB compensates according to the availability of the plant. The third 660MW unit was synchronised in March 2016 and started commercial production from September 2016.
- The Jharsugada 2,400MW power plant operated at a lower Plant Load Factor (PLF) of 39% during fiscal year 2016, due to a weak power market and power evacuation constraints for open access power sales. During fiscal year 2017, power from one 600MW unit is being supplied to the grid and the remaining 1,800MW (3X600MW) will supply power to the Jharsuguda-II smelter with sales of surplus power on the open market. Accordingly, capacity utilisation is expected to increase significantly.
- At BALCO, the first 300MW IPP unit of the 1200MW power plant commercial production in July 2015.
- The average power realization decreased from Rs. 3.25 per unit in fiscal year 2015 to Rs. 2.91 per unit in fiscal year 2016, a decrease of 10.4% (excluding power from TSPL 1980 MW power plant). The decrease is on account of a drop in spot rates from Rs. 3.04 per unit in fiscal year 2015 to Rs. 2.46 per unit in fiscal year 2016 due to the reduced deficit in supply and demand in the nation.
- Cost of generation at the power business (excluding power from the TSPL 1980 MW power plant) increased from Rs. 2.14 per unit in fiscal years 2015 to Rs. 2.15 in fiscal year 2016, marginal increase of 0.5%.

## Operating profit

Vedanta's operating loss was \$4,328.9 million in fiscal year 2016, a decrease of \$679.8 million, or 13.6%, from an operating loss of \$5,008.7 million in fiscal year 2015. Vedanta's operating profit before special items was \$881.2 million in fiscal year 2016, an decrease of \$854.3 million or 49.2%, from an operating profit before special items of \$1,735.5 million in fiscal year 2015. The special items primarily relates to assets impairment of \$5,187 million in fiscal year 2016, this largely relates to the Oil & gas business which was adversely impacted by the lower Brent price. The reduction in operating profit excluding impairment was primarily due to lower sales realization in the oil and gas business which was impacted by the significant fall in average oil prices, decrease in the average LME prices of zinc and other metals, which were partially offset by the Iron Ore business which was ramped up in August 2015 after obtaining all necessary approvals from the state government, strong operational performance at Zinc India and ramp-up in power units. Operating margin before special item decreased to 8.2% in fiscal year 2016 from 13.5% in fiscal year 2015 primarily due to lower Brent and metal prices.

Contributing factors to Vedanta's consolidated operating profit were as follows:

- Cost of sales including special items decreased from \$17,208.1 million in fiscal year 2015 to \$14,451.2 million in fiscal year 2016, a decrease of \$2,756.9 million, or 16.0%. The decrease is primarily due to lower impairment charge of \$1,507.4 million. Cost of sales excluding impairment for fiscal year 2016 was \$9,241.1 million, a decrease of \$1,222.8 million, or 11.7%. Vedanta deployed several measures to optimize cost spends. These included clean-sheet-costing for negotiations, alternate material, new source of supply, tightening efficiency in logistics and quality control. The decrease was also due to softened key input commodity prices including alumina, coal and others; and fuel costs across Vedanta's business in fiscal year 2016 as compared to fiscal year 2015.
- Other operating income decreased from \$104.0 million in fiscal year 2015 to \$101.7 million in fiscal year 2016, an decrease of \$2.3 million, or 2.2%.
- Distribution expenses decreased from \$245.2 million in fiscal year 2015 to \$223.8 million in fiscal year 2016, a decrease of \$21.4 million, or 8.7%, Distribution expense as a percentage of revenue increased from 1.9% in fiscal year 2015 to 2.1% in fiscal year 2016 due to lower revenue in fiscal year 2016.
- Administration expenses decreased from \$538.1 million in fiscal year 2015 to \$493.5 million in fiscal year 2016, a decrease of \$44.6 million, or 8.3% as a percentage of revenue. Administration expenses as a percentage of revenue increased from 4.2% in fiscal year 2015 to 4.6% in fiscal year 2016 due to lower revenue in fiscal year 2016.

#### Oil and Gas

The Vedanta EBITDA for the oil and gas business was \$570.4 million in fiscal year 2016, a decrease of \$906.4 million, or 61.4%, from \$1,476.8 million in fiscal year 2015. The decrease in Vedanta EBITDA is driven by weaker crude and marginal decrease in volume which has been offset by decrease in unit cost. Crude price in fiscal year 2016 was \$47.5 in comparison to \$85.4 in fiscal year 2016. Rajasthan operating cost has been reduced from \$5.8 per barrel in fiscal year 2015 to \$5.2 per barrel in fiscal year 2016.

## Zinc (India)

The Vedanta EBITDA for the India zinc business was \$995.0 million in fiscal year 2016, a decrease of \$197.5 million, or 16.6%, from \$1,192.5 million in fiscal year 2015. Operating profit was negatively affected by lower zinc, lead and silver prices, and premia as well as statutory headwinds in fiscal year 2016. However, these were partially offset by higher volumes, lower cost of production

and rupee depreciation. The cost of production of zinc including royalty decreased (net of by-product revenue) from \$1,093 per tonne in fiscal year 2015 to \$1,045 per tonne in fiscal year 2016 and cost of production excluding royalty decreased from \$868 per tonne in fiscal year 2015 to \$804 per tonne in fiscal year 2016 mainly due to higher volume of integrated production, better smelter efficiencies, reduced coal and commodity prices, higher by-product credit and cost reduction initiatives. Cost of production of lead including royalty (net of by-product revenue) decreased from \$1,076 per tonne in fiscal year 2015 to \$1,031 per tonne in fiscal year 2016. Decrease in depreciation by \$13.3 million in fiscal year 2016 as compared to fiscal year 2015 partially offset the impact of lower operating profit.

#### Zinc (International)

The Vedanta EBITDA for the international zinc business was \$68.1 million in fiscal year 2016, a decrease of \$112.7 million, or 62.3%, from \$180.8 million in fiscal year 2015. The decrease in revenue was primarily due to lower commodity prices as well as lower volumes.

#### Copper (India/Australia)

The Vedanta EBITDA for the India and Australia copper business was \$336.6 million in fiscal year 2016, an increase of \$55.6 million, or 19.8%, from \$281.0 million in fiscal year 2015. The increase in operating profit was primarily due to an increase in volume in fiscal year 2016 as production in fiscal year 2015 was impacted by lower volumes on account of planned maintenance shutdown, and higher TcRc rates in line with the market conditions. In particular:

- TcRc rates increased from an average of 21.4 ¢/lb realized in fiscal year 2015 to an average of 24.1 ¢/lb realized in fiscal year 2016.
- Cost of production net of by-product and free copper revenue, which consists of cost of smelting and refining costs, decreased from 4.2 ¢/lb in fiscal year 2015 to 3.2 ¢/lb in fiscal year 2016, primarily due to higher volumes, lower input commodity costs (fuel and power) and higher average realization on the sale of sulphuric acid, a by-product, from Rs. 2,779 per tonne in fiscal year 2015 to Rs. 3,019 per tonne in fiscal year 2016.

#### Copper (Zambia)

KCM's Vedanta EBITDA loss was \$(17.9) million in fiscal year 2016, an increase in loss by \$(14.1) million, compared to \$(3.8) million in fiscal year 2015. The increase in loss was was mainly due to lower metal prices with a partial offset from increased volume. Excluding the impact of Kwacha depreciation on VAT receivable, Vedanta EBITDA was \$44 million in fiscal year 2016.

#### Iron ore

The Vedanta EBITDA for the iron ore business was \$73.4 million in fiscal year 2016, an increase of \$42.0 million from \$31.4 million in fiscal year 2015. The increase was primarily due to the recommencement of the Goa operations and volume ramp-up.

#### Aluminium

The Vedanta EBITDA for the aluminium business was \$106.7 million in fiscal year 2016, a decrease of \$308.8 million, or 74.3%, from \$415.5 million in fiscal year 2015. This was primarily as a result of lower sales realization due to a decrease in average LME prices of aluminium and lower premium.

## Commercial power generation

The Vedanta EBITDA for the commercial power generation business was \$196.3 million in fiscal year 2016, an increase of \$42.5 million, or 27.6%, from \$153.8 million in fiscal year 2015. The increase in segment result was primarily as a result of sales from commissioned additional units at TSPL and BALCO.

Investment revenue, finance costs and other gains/(losses)

Vedanta's investment revenue was \$697.8 million in fiscal year 2016, a decrease of \$134.8 million, or 16.2%, from \$832.6 million in fiscal year 2015 mainly at Zinc India and Cairn India. Primarily due to significant mark-to-market (MTM) gains accruing in fiscal year 2015 in a falling interest rate environment in India where most of Vedanta's cash and investments reside. The average post tax return on investment of Vedanta was 7.2% (9.3% in fiscal year 2015)

Vedanta's finance costs were \$1,280.4 million in fiscal year 2016, a decrease of \$107 million, or 8%, from \$1,387.2 million in fiscal year 2015. This was due to benefit of lower cost refinancing, the previous year impact of unamortized costs written off and using cash to repay convertible bonds in the copper business during second half of fiscal year 2015.

Other gains/(losses) in fiscal year 2016 was \$(72.5) million, compared to \$(76.9) million in fiscal year 2015. This includes the impact of foreign exchange losses on foreign currency borrowings, primarily at Vedanta's Indian rupee denominated businesses resulting in a loss in fiscal year 2016 was \$72.5 million against fiscal year 2015 \$76.9 million.

Income tax expense and non-controlling interests

Income tax expense — others was \$255.5 million in fiscal year 2016, a decrease of \$97.1 million, or 27.5%, from \$352.6 million in fiscal year 2015. The effective tax rate for fiscal year 2016 after excluding special item was 113.0%, compared to 31.9% in fiscal year 2015 driven by significantly higher dividend distribution tax (DDT) owing to the special dividend declared by Zinc India in March 2016. Excluding incremental DDT, the effective tax rate was 33% during fiscal year 2016. This is driven by a lower tax rate in Zinc India due to tax efficient investment income partly offset by higher ETR in Cairn India driven by lower deferred tax liability creation given significantly lower exploration and development spend.

Income tax credit special items in fiscal year 2016 were \$1,737.4 million compared to fiscal year 2015 \$2,205.1 million. Tax special items include a credit of \$1,903.3 million relating to the corresponding non-cash impairment charge. In addition, the tax special items in fiscal year 2016 of \$173.8 million charge arose in Copper Zambia on restoration of deferred tax liabilities on mining operations at 30%, mineral processing activities at 35%, and changes in legislation restricting the use of past losses.

The loss attributable to non-controlling interests in fiscal year 2016 was \$(1,664.7) million in comparison to fiscal year 2015 \$(19,89.1) million. The profits attributable to non-controlling interests without special items in fiscal year 2015 was \$363.5 million in comparison to fiscal year 2015 \$826.1 million.

# Results of Operations: Fiscal Year 2015 compared to Fiscal Year 2014

#### Revenue

Vedanta's revenue was \$12,878.7 million in fiscal year 2015, a decrease of \$66.3 million, or 0.5%, from \$12,945.0 million in fiscal year 2014. This was primarily due the fall in Oil & Gas revenue as a result of lower Brent prices, lower volume from KCM which had been partially offset by increased revenue in zinc, iron ore, copper and Aluminum business. Vedanta's copper, zinc, iron ore, aluminium, power and oil and gas businesses contributed 35.5%, 22.9%, 2.4%, 16.1%, 4.3% and 18.6%, respectively, to its revenue in fiscal year 2015.

## Oil and gas

Vedanta's oil and gas business is comprised of Cairn India. Revenue from the oil and gas business was \$2,397.5 million in fiscal year 2015, a decrease of \$695.3 million, or 22.5%, from \$3,092.8 million in fiscal year 2014. The decrease in revenue was primarily contributed by the significant fall in average Brent oil prices and with lower entitlement interest sales volumes which was partially offset by depreciation of the Rupee against the US dollar. Specifically:

- The daily average Brent oil price realization decreased from \$94.5 per boe, in fiscal year 2014 to \$75.8 per boe, in fiscal year 2015, a significant decrease of 19.7%.
- Entitlement interest sales decreased from 89,708 boepd in fiscal year 2014 to 87,560 boepd in fiscal year 2015, a decrease of 2,148 boepd or 2.4%. The fall was mainly on account of lower exploration and development spend.
- Average exchange rate increased by 0.7% to 60.9 in fiscal year 2015 from 60.5 in fiscal year 2014.

## Zinc (India)

- Revenue from the India zinc business was \$2,357.0 million in fiscal year 2015, an increase of \$175.3 million, or 8.0%, from \$2,181.7 million in fiscal year 2014. This increase was primarily driven by higher daily average LME prices of zinc and higher lead production, offset by lower production of zinc and silver and lower daily average LME prices of lead and silver. Specifically, zinc ingot production decreased from 749,167 tonnes in fiscal year 2014 to 733,803 tonnes in fiscal year 2015, a decrease of 2.1%, due to lower mined metal production and smelter shutdown. This is in line with the mine plan at Rampura Agucha mine, of lower mined metal production in the first half of the year as more waste was excavated than ore. Zinc ingot sales also decreased in line with the lower production, from 750,766 tonnes in fiscal year 2014 to 735,783 tonnes in fiscal year 2015, a decrease of 2.0%.
- Zinc ingot sales in the domestic market decreased from 557,158 tonnes in fiscal year 2014 to 483,361 tonnes in fiscal year 2015, a decrease of 13.2%. Domestic sales as a percentage of total sales decreased from 74.2% in fiscal year 2014 to 65.7% in fiscal year 2015. Vedanta endeavors to sell large quantities of products domestically, where a higher Indian market premium is received. As a result of reduction in production being sold in the domestic market, export sales increased from 193,607 tonnes of zinc in fiscal year 2014 to 252,422 tonnes of zinc in fiscal year 2015, an increase of 30.4%.
- The daily average zinc cash settlement price on the LME increased from \$1,909 per tonne in fiscal year 2014 to \$2,177 per tonne in fiscal year 2015, an increase of 14.0%.

- Lead ingot production increased from 122,596 tonnes in fiscal year 2014 to 127,143 tonnes in fiscal year 2015, an increase of 3.7% in line with mined metal production. Lead ingot sales increased from 121,120 tonnes in fiscal year 2014 to 128,752 tonnes in fiscal year 2015, an increase of 6.3%, due to increase in production.
- Silver ingot production decreased from 349,620 kilograms in fiscal year 2014 to 327,508 kilograms in fiscal year 2015 a decrease of 6.3% on account of fall in integrated production driven by reduced output from Zawar mine. Sale of silver ingots decreased from 351,825 kilograms in fiscal year 2014 to 327,230 kilograms in fiscal year 2015, a decrease of 7.0% on account of the fall in the integrated production.
- The daily average lead cash settlement price on the LME decreased from \$2,092 per tonne in fiscal year 2014 to \$2,021 per tonne in fiscal year 2015, a decrease of 3.4%.
- The daily average silver London Bullion Market Association prices decreased from \$21.4 per ounce in fiscal year 2014 to \$18.1 per ounce in fiscal year 2015, a decrease of 15.2%.

# Zinc (International)

Revenue from the international zinc business decreased to \$586.9 million in fiscal year 2015 from \$661.4 million in fiscal year 2014. The decrease in revenue was primarily due to lower volumes in all the units combined with fall in daily average lead LME prices offset by the increase in zinc LME and silver prices. Specifically:

- Production of refined zinc metal at Skorpion registered a decrease from 124,924 tonnes in fiscal year 2014 to 102,188 tonnes in fiscal year 2015, a decrease of 22,736 tonnes or 18.2%. This was mainly due to an unplanned disruption due to a fire incident in the cell house resulting in a shutdown of the refinery for a period of 23 days during January 2015, followed by a gradual ramp-up.
- Production of zinc metal in concentrate from the Lisheen and BMM mines decreased from 180,020 tonnes in fiscal year 2014 to 157,919 tonnes in fiscal year 2015, a fall of 12.3%. Production of lead metal in concentrate also decreased from 58,622 tonnes to 51,407 tons, a decrease of 7,215 tonnes or 12.3%. This decrease was primarily due to the phase wise closure of the Lisheen mine which is near the end of its life, is expected to end production in mid fiscal year 2016 and in BMM due to lower ore grades and change in mining methods.
- The daily average zinc cash settlement price on the LME increased from \$1,909 per tonne in fiscal year 2014 to \$2,177 per tonne in fiscal year 2015, an increase of 14.0%.
- The daily average Lead cash settlement price on the LME decreased from \$2,092 per tonne in fiscal year 2014 to \$2,021 per tonne in fiscal year 2015, a decrease of 3.4%.

# Copper (India/Australia)

Revenue from the copper business in India and Australia was \$3,682.7 million in fiscal year 2015, an increase of \$282.9 million, or 8.3%, from \$3,399.8 million in fiscal year 2014. This increase was primarily due to the increase in production of cathodes higher LME TcRc and higher sales in Fujairah. Specifically:

• Copper cathode production increased from 294,434 tonnes in fiscal year 2014 to 362,373 tonnes in fiscal year 2015, an increase of 23.1%. The production in fiscal year 2014 was lower on account of temporary closure of the smelter in first quarter of fiscal year 2014. Copper cathode sales increased from 173,430 tonnes in fiscal year 2014 to 190,872 tonnes in fiscal year 2015, an increase of 10.1%, due to higher production.

- Production of copper rods increased from 123,053 tonnes in fiscal year 2014 to 170,338 tonnes in fiscal year 2015, an increase of 38.4%, reflecting the increase in the cathode production and higher market demand. Copper rod sales increased from 122,745 tonnes in fiscal year 2014 to 170,742 tonnes in fiscal year 2015, an increase of 39.1% in line with the increase in production.
- Sales of copper in the Indian market increased from 143,849 tonnes in fiscal year 2014 to 194,747 tonnes in fiscal year 2015, an increase of 35.4%, and exports also increased from 152,326 tonnes in fiscal year 2014 to 166,868 tonnes in fiscal year 2015, an increase of 9.5%. Domestic sales as a percentage of total sales increased from 48.6% in fiscal year 2014 to 53.9% in fiscal year 2015.

# Copper (Zambia)

Revenue from KCM in Zambia was \$883.5 million in fiscal year 2015, a decrease of \$81.0 million, or 8.4%, from \$964.5 million in fiscal year 2014. This decrease was primarily due to decrease in production, offset by an increase in the daily average copper LME price during fiscal year 2015 as compared to fiscal year 2014. Specifically,

- Copper mined metal production decreased from 128,482 tonnes in fiscal year 2014 to 116,242 tonnes in fiscal year 2015, a decrease of 9.5%,
- Copper sales decreased from 177,192 tonnes in fiscal year 2014 to 163,222 tonnes in fiscal year 2015, a decrease of 7.9%.
- The daily average copper cash settlement price on the LME decreased from \$7,103 per tonne in fiscal year 2014 to \$6,558 per tonne in fiscal year 2015, a decrease of 7.7%.

#### Iron ore

- Revenue from the iron ore business was \$311.4 million in fiscal year 2015, an increase of \$45.0 million, or 16.9%, from \$266.4 million in fiscal year 2014. The increase was primarily due to higher volumes of sales from Karnataka in the comparable period and increase in pig iron and metallurgical coke production. Iron ore production decreased from 1.5 million tonnes in fiscal year 2014 to 0.6 million tonnes in fiscal year 2015, a decrease of 0.9 million tonnes or 60% due to a mining ban in the states of Karnataka and Goa during fiscal year 2014. At Karnataka, production recommenced on 28 February 2015, following receipt of all requisite clearances and approvals, at an annual capacity of 2.29 mtpa.
- The production of pig iron and metallurgical coke was higher by 11.3% and 22.6% at 604,860 tonnes and 499,919 tonnes, respectively in the fiscal year 2015. The increase is primarily due to the full year operations of new pig iron capacity which is now fully ramped up and further de-bottlenecking of the pig iron plant which resulted in an increase in capacity from 625,000 tonnes to 700,000 tonnes.

#### Aluminium

Revenue from the aluminium business was \$2,078.1 million in fiscal year 2015, an increase of \$296.0 million, or 16.6%, from \$1,782.1 million in fiscal year 2014. This increase was primarily due to an increase in production from BALCO's new smelter and an increase in the daily average LME prices of aluminium and premium on metal, offset by higher purchased alumina prices. Specifically:

• Aluminium production increased from 794,289 tonnes in fiscal year 2014 to 877,259 tonnes in fiscal year 2015, an increase of 10.4%. Production of value added products decreased from 57.7% in fiscal year 2014 to 53.4% in fiscal year 2015.

- Aluminium sales increased from 792,971 tonnes in fiscal year 2014 to 877,549 tonnes in fiscal year 2015, an increase of 10.7% in line with the increase in production from new smelter in Korba. Sales of aluminium ingots increased from 335,241 tonnes in fiscal year 2014 to 405,300 tonnes in fiscal year 2015, an increase of 28.0%. Wire rod sales were flat from 286,146 tonnes in fiscal year 2014 to 310,446 tonnes in fiscal year 2015, and rolled product sales decreased from 50,504 tonnes in fiscal year 2014 to 46,165 tonnes in fiscal year 2015, a decrease of 8.6%, reflecting the market conditions. Billets sales decreased from 121,080 tonnes in fiscal year 2014 to 115,639 tonnes in fiscal year 2015, representing a decrease of 4.5%.
- Aluminium sales in the domestic market decreased from 545,514 tonnes in fiscal year 2014 to 519,920 tonnes in fiscal year 2015, a decrease of 4.7%. Domestic sales decreased in fiscal year 2015 due to the substitution of aluminium ingots with lower priced imported aluminium scrap. Aluminium exports increased from 247,456 tonnes in fiscal year 2014 to 357,629 tonnes in fiscal year 2015. Domestic sales as a percentage of total sales decreased from 68.8% in fiscal year 2014 to 59.2% in fiscal year 2015.
- The daily average aluminium cash settlement price on the LME increased from \$1,773 per tonne in fiscal year 2014 to \$1,890 per tonne in fiscal year 2015, an increase of 6.6%.

# Commercial power generation

Revenue from the power business was \$552.8 million in fiscal year 2015, an increase of \$26.6 million, or 4.6%, from \$579.4 million in fiscal year 2014 primarily due to an increase in the volume of power sold from 9,374 million units during fiscal year 2014 to 9,859 million units in fiscal year 2015. The Jharsuguda 600 MW power plant operated at a lower Plant Load Factor (PLF) of 39% during fiscal year 2015 due to lower market demand and transmission constraints for some regions. Specifically:

- Power sales increased from 9,374 million units in fiscal year 2014 to 9,859 million units in fiscal year 2015, an increase of 5.2%. This was primarily due to the commencement of operations at the 660 MW TSPL commercial power plant during 2015. This was partially offset by reduction in power sales from Jharsuguda 600 MW and BALCO 270 MW. Whereas, excluding the trial runs, the net power sold increased from 9,374 million units (excluding the power generated under trial runs (Nil)) in fiscal year 2014 to 9,585 million units in fiscal year 2015, an increase of 2.3%.
- The average power realization decreased from Rs. 3.54 per unit in fiscal year 2014 to Rs. 3.12 per unit in fiscal year 2015, a decrease of 11.9% (excluding power from the 660 MW TSPL commercial power plant).
- Cost of generation at the power business decreased from Rs. 2.23 per unit in fiscal years 2014 to Rs. 2.14 in fiscal year 2015, a decrease of 4.0% on account of lower coal costs.

## Operating profit

Vedanta's operating loss was \$5,008.7 million in fiscal year 2015, in comparison to operating profit of \$2,150.1 million in fiscal year 2014. Vedanta's operating profit without special items was \$1,735.5 million in fiscal year 2015, a decrease of \$552.6 million, or 24.2%, from \$2,288.1 million in fiscal year 2014. This decrease excluding Special Items was attributable to higher depreciation and amortisation charges associated with the acquisitions of Cairn India and the international zinc businesses. Operating margin before Special Item decreased to 13.5% in fiscal year 2015 from 17.7% in fiscal year 2014 largely because of increased operating costs, including higher coal and other commodity-linked costs.

Contributing factors to Vedanta's consolidated operating profit were as follows:

- Cost of sales including special items increased from \$10,181.2 million in fiscal year 2014 to \$17,208.1 million in fiscal year 2015, an increase of \$7,026.9 million, or 69.0%. The increase is primarily due to impairment charge of \$6,642.1 million (\$4,504.1 million net of tax) pertaining to oil and gas business.
- Cost of sales excluding special items increased from \$10,043.2 million in fiscal year 2014 to \$10,463.9 million in fiscal year 2015, an increase of \$420.7 million, or 4.2%. The increase was due to higher power and fuel costs across the business and higher exploration cost in oil and gas business in fiscal year 2015 as compared to fiscal year 2014.
- Other operating income increased from \$84.0 million in fiscal year 2014 to \$104.0 million in fiscal year 2015, an increase of \$20.0 million, or 23.8%.
- Distribution expenses increased from \$237.6 million in fiscal year 2014 to \$245.2 million in fiscal year 2015, a increase of \$7.6 million, or 3.2%, distribution expense as a percentage of revenue decreased from 1.8% in fiscal year 2014 to 1.9% in fiscal year 2015.
- Administration expenses increased from \$460.1 million in fiscal year 2014 to \$538.1 million in fiscal year 2015, a increase of \$78.0 million, or 16.9% As a percentage of revenue, administration expenses increased from 3.6% in fiscal year 2014 to 4.2% in fiscal year 2015.

# Oil and gas

• The Vedanta EBITDA for the oil and gas business was \$1,476.8 million in fiscal year 2015, an decrease of \$870.2 million or 37.1% from \$2,347.0 million in fiscal year 2014. The decrease was primarily due to weaker crude prices and higher processing and well maintenance cost.

# Zinc (India)

• The Vedanta EBITDA for the India zinc business was \$1,192.5 million in fiscal year 2015, an increase of \$47.5 million, or 4.1%, from \$1,145.0 million in fiscal year 2014. The increase in operating profit in fiscal year 2015 was primarily due to the higher average LME prices of zinc, increase in lead sales volume and Rupee depreciation offset by reduction in zinc and silver sales volume and lower daily average LME prices of lead and lower daily average silver London Bullion Market Association prices. Operating profit was negatively affected by increase in the cost of production of zinc (net of by-product revenue) from \$985 per tonne in fiscal year 2014 to \$1,093 per tonne in fiscal year 2015 and cost of production of lead (net of by-product revenue) from \$1,051 per tonne in fiscal year 2014 to \$1,074 per tonne in fiscal year 2015. The decrease in operating margin was also due to lower daily average LME prices of lead, lower daily average silver London Bullion Market Association prices and higher cost of production in fiscal year 2015.

# Zinc (International)

• The Vedanta EBITDA for the international zinc business was \$180.8 million in fiscal year 2015, a decrease of \$32.6 million, or 15.3%, from \$213.4 million in fiscal year 2014, due to lower production by 14.3% and higher cost by 19.4%, partially offset by higher zinc prices.

# Copper (India/Australia)

- The Vedanta EBITDA for the copper business in India and Australia was \$281.0 million in fiscal year 2015, an increase of \$83.1 million, or 42.0%, from \$197.9 million in fiscal year 2014. The increase in operating Vedanta EBITDA was primarily driven by higher volumes, with improved operational efficiencies, higher treatment and refining charges and lower cost of production. In particular:
- TcRc rates increased from an average of 16.6 ¢/lb realized in fiscal year 2014 to an average of 21.4 ¢/lb realized in fiscal year 2015.
- Cost of production net of by-product and free copper revenue, which consists of cost of smelting and refining costs, decreased from 9.7 ¢/lb in fiscal year 2014 to 4.2 ¢/lb in fiscal year 2015, primarily due to higher average realization on the sale of sulphuric acid, a by-product, from Rs. 1,278 per tonne in fiscal year 2014 to Rs. 2,779 per tonne in fiscal year 2015.

# Copper (Zambia)

• KCM's Vedanta EBITDA loss was \$3.8 million in fiscal year 2015, a decrease of \$160.1 million, or 102.4%, from EBITDA profit of \$156.3 million in fiscal year 2014. The decrease was primarily attributable to lower volumes, higher unit costs and lower metal prices. Higher unit cost of production (cash cost excludes royalty, logistics, depreciation and sustaining capex), which was \$11.7 per lb in fiscal year 2015, up 8.1% compared with \$10.8 per lb in fiscal year 2014, due to higher pre-stripping cost, wages and higher power costs.

#### Iron ore

• The Vedanta EBITDA for the iron ore business was \$31.4 million in fiscal year 2015, in comparison to loss of \$(24.2) million in fiscal year 2014. The increase is primarily due to the increase in sales from Karnataka through e-auction and increased production of pig iron and metallurgical coke.

# Aluminium

• The Vedanta EBITDA for the aluminium business was \$415.5 million in fiscal year 2015, an increase of \$128.2 million, or 44.6%, from \$287.3 million in fiscal year 2014. This increase was primarily due to higher sales realization due to an increase in average LME prices of aluminium, higher volumes and premium and depreciation of the Indian Rupee against the US dollar contributed to the increase in operating profit which was partially offset by higher purchased alumina prices and higher e-auction coal prices.

#### Commercial Power Generation

• The Vedanta EBITDA for the commercial power generation business was \$153.8 million in fiscal year 2015, a decrease of \$14.6 million, or 8.7%, from \$168.4 million in fiscal year 2014. The decrease was primarily due to lower demand and tariff which was partially offset by additional sales from the 660 MW TSPL commercial power plant which was commissioned during 2015 and lower depreciation on account of revised estimates of useful life.

## Investment revenue, finance costs and other gains/(losses)

• Vedanta's investment revenue was \$832.6 million in fiscal year 2015, an increase of \$144.9 million, or 21.1%, from \$687.7 million in fiscal year 2014, mainly at zinc India and Cairn India driven by higher treasury income on account of mark to market gains accruing in a falling interest rate environment in India where most of Vedanta's cash and investments reside.

- Vedanta's finance costs were \$1,387.2 million in fiscal year 2015, a decrease of \$552.6 million, or 3.7%, from \$1,439.8 million in fiscal year 2014. This was on account of translation loss on foreign currency borrowings as Rupee depreciation against the US dollar in fiscal year 2015 and due to refinancing at lower interest rates.
- Other gains/(losses) in fiscal year 2015 were a loss of \$(76.9) million compared to a loss of \$(279.9) million in fiscal year 2014, include the impact of mark to market on foreign currency borrowings, primarily at the Indian businesses and dollar denominated cash deposits at the oil & gas business.

Income tax expense and non-controlling interests

- Income tax expense others was \$352.6 million in fiscal year 2015 in comparison to \$158.1 million in fiscal year 2014. Income tax credit (special items) was \$2,205.1 million in fiscal year 2015, in comparison to \$29.4 million, in fiscal year 2014. The effective tax rate excluding special items for fiscal year 2015 was 31.9% compared to 12.6% in fiscal year 2014. The effective rate in fiscal year 2014 was lower primarily as a result of a tax credit of \$175.9 million which arose on the restructuring of the Indian subsidiary Vedanta Limited. Tax charge with special items includes non-cash impairment charge and other special items.
- The loss attributable to non-controlling interests (including special items) in fiscal year 2015 was \$(1,988.1) million from profit of \$1,185.4 million in fiscal year 2014. The profit attributable to non-controlling interest without special items was \$826.1 million in fiscal year 2015 compared to \$1,221.0 million in fiscal year 2014. The profits attributable to non-controlling interests (without special items) as a percentage of profit for the year decreased to 109.9% in fiscal year 2015 from 111.2% in fiscal year 2014.

# Liquidity and Capital Resources

# Capital Resources

Overview

As of 30 September 2016, Vedanta's cash and cash equivalents and liquid investments were \$8,167.3 million, the majority of which were denominated in Indian Rupees. Of this, \$372.4 million was cash and cash equivalents and \$7,794.9 million was liquid investments. Liquid investments consist of investments in mutual funds and bank deposits with maturities of more than 90 days. Vedanta's investment policy is to invest in funds and banks with a low credit risk and high credit ratings.

Vedanta funds its operations primarily with its current cash and liquid investments, together with cash flows from operations and borrowings under working capital and term loan facilities from banks and/or other financial institutions, and Vedanta expects that these sources will continue to be its principal sources of cash in the next few years. The Company believes that its current working capital is sufficient for its present capital requirements.

Vedanta's principal financing requirements include:

- repayment of debts maturing during the year;
- capital expenditures towards the maintenance, upgrading and expansion of capacity in existing businesses;
- consolidation of ownership in various subsidiaries;

- acquisitions of complementary businesses that Vedanta determines to be attractive opportunities; and
- working capital.

Vedanta evaluates its funding requirements regularly in light of its cash flow from its operating activities, the progress of its capital expenditure projects, acquisition initiatives and market conditions. To the extent it does not generate sufficient cash flow from operating activities, Vedanta may rely on other debt or equity financing activities, subject to market conditions. More specifically, Vedanta has from time to time considered, and may pursue in the future, equity offerings or additional listings by its partially owned but controlled subsidiaries. For example, Vedanta has in the past considered public equity offerings of KCM and Vedanta Limited.

The following table sets out selected cash flow data and the cash and cash equivalents for each of fiscal years 2014, 2015 and 2016, and the six months ended 30 September 2015 and 2016:

	Year ended 31 March			Six months ended 30 September		
	2014	2015	2016	2015	2016	
			(\$ million)			
Net cash from operating activities	3,361.0	2,505.8	2,401.7	1,741.0	222.5	
Net cash from/(used in) investing activities	(5,014.8)	(1,591.7)	(1,862.3)	(1,462.0)	335.9	
Net cash (used in) financing activities	(47.9)	(928.0)	(446.8)	(242.5)	(591.2)	
Net increase/(decrease) in cash and cash equivalents	(1,701.7)	(13.9)	92.6	36.5	(32.8)	
Effect of foreign exchange rate changes	(129.1)	(1.8)	(18.0)	(7.9)	(23.1)	
Cash and cash equivalents at beginning of year	2,200.2	369.4	353.7	353.7	428.3	
Cash and cash equivalents at end of year	369.4	353.7	428.3	382.3	372.4	

# Net Cash From Operating Activities

Net cash from operating activities was \$2,401.7 million in fiscal year 2016, primarily comprised of profit before tax of \$4,984.0 million and the add back for impairment of mining reserves and oil and gas assets of \$5,187 million and depreciation and amortisation of \$1,455.2 million, less \$1,268.4 million in interest paid and \$354.7 million in income tax paid. Movement in working capital was primarily comprised of a \$657.4 million increase in payables.

Net cash from operating activities was \$2,505.8 million in fiscal year 2015, primarily comprised of loss before tax of \$5,640.2 million and the add-back for impairment of mining reserves and oil and gas assets of \$6,694.4 million and depreciation and amortisation of \$2,005.7 million, less \$1,334.0 million in interest paid and \$601.7 million in income tax paid. Movement in working capital was primarily comprised of a \$225.2 million increase in payables.

Net cash from operating activities was \$3,361.0 million in fiscal year 2014, primarily comprised of profit before tax of \$1,181.1 million and the add-back for depreciation and amortisation of \$2,203.1 million, less \$1,115.3 million in interest paid and \$861.6 million in income tax paid. Movement in working capital was primarily comprised of a \$678.8 million increase in payables.

Net cash from operating activities was \$222.5 million in six months ended 30 September 2016, primarily comprised of profit before tax of \$426.5 million and the add-back depreciation and amortisation of \$513.2 million, less \$698.9 million in interest paid and \$323.7 million in income tax paid. Movement in working capital was primarily comprised of a \$241.0 million increase in payables.

Net cash from operating activities was \$1,741.0 million in six months ended 30 September 2015, primarily comprised of profit before tax of \$243.7 million and the add-back depreciation and amortisation of \$707.9 million, less \$581.3 million in interest paid and \$137.2 million in income tax paid. Movement in working capital was primarily comprised of a \$904.4 million increase in payables.

# Net Cash Used in Investing Activities

Net cash used in investing activities was \$1,862.3 million in fiscal year 2016, primarily on account of purchases of property, plant and equipment amounting to \$872.4 million and net purchases of liquid investments amounting to \$999.9 million.

Net cash used in investing activities was \$1,591.7 million in fiscal year 2015, primarily on account of purchases of property, plant and equipment amounting to \$2,289.1 million.

Net cash used in investing activities was \$5,014.8 million in fiscal year 2014, primarily on account of purchases of property, plant and equipment amounting to \$2,185.3 million and purchases of liquid investments amounting to \$2,857.0 million.

Net cash from investing activities was \$335.9 million in six months ended 30 September 2016, primarily on account of net proceed from redemption of liquid investments amounting to \$833.3 million offset by purchase of property, plant and equipment and intangibles of 504.4 million.

Net cash used in investing activities was \$1,462.0 million in six months ended 30 September 2015, primarily on account of purchases of property, plant and equipment amounting to \$553.1 million and net purchases of liquid investments amounting to \$911.5 million.

# Net Cash From or Used in Financing Activities

Net cash used in financing activities was \$446.8 million in fiscal year 2016, primarily as a result of a decrease in short-term borrowings of \$1,022.1 million and repayment of long-term borrowings by \$958.0 million.

Net cash used in financing activities was \$928.0 million in fiscal year 2015, primarily as a result of repayment of long-term borrowings of \$2,698.0 million and a decrease in short term borrowings by \$818.8 million.

Net cash used in financing activities was \$47.9 million in fiscal year 2014, primarily as a result of a decrease in short-term borrowings by \$2,832.7 million and repayment of long-term borrowings of \$2,299.0 million.

Net cash used in financing activities was \$591.2 million in six months ended 30 September 2016, primarily as a result of payment of dividend to non-controlling interests of subsidiaries \$677.6 million, net repayment of long-term borrowings by \$256.6 million, repayment of convertible bond \$579.9 million, offset by net additions to short-term borrowings of \$923.7 million.

Net cash used in financing activities was \$242.5 million in six months ended 30 September 2015, primarily as a result of decrease in short-term borrowings of \$568.5 million and repayment of long-term borrowings by \$802.4 million.

# **Borrowings**

Vedanta had undrawn committed borrowing facilities of \$1,087.3 million available to it as of 31 March 2016.

Vedanta taps both the Indian and offshore markets for its long-term funding needs. In addition, it has sizeable imports and exports and can therefore access both import and export credits, based on cost effectiveness, both in Indian Rupees and in foreign currencies, to finance its short-term working capital requirements. Vedanta has in place both secured and unsecured borrowings, with its secured borrowings being generally Indian Rupee denominated bonds.

Vedanta has tapped different segments of borrowing resources, including banks and capital markets, both in India and overseas. The Company currently has corporate credit ratings of "B+" with a stable outlook by S&P and "B1" with a stable outlook by Moody's. Vedanta has not had, and does not currently expect to have, material difficulty in gaining access to short-term and long-term financing sufficient to meet its current requirements.

The following table shows total borrowings of Vedanta as of 31 March 2014, 2015 and 2016, and as of six months ended 30 September 2015 and 2016:

	As of 31 March			As of 30 September		
	2014	2015	2016	2015	2016	
			(\$ million)			
Bank loans	10,916.2	11,474.9	11,587.9	11,241.1	12,978.1	
Bonds	4,017.9	4,075.4	4,074.6	4,078.6	3,334.2	
Convertible bonds	1,921.5	1,103.0	587.2	1,117.3	7.7	
Other loans	15.6	14.5	13.6	13.9	13.3	
Total	16,871.2	16,667.8	16,263.3	16,450.9	16,333.3	
Borrowings are repayable:						
Within one year (shown as						
current liabilities)	4,358.5	3,179.2	4,313.8	5,223.4	4,310.9	
More than one year	12,512.7	13,488.6	11,949.5	11,227.5	12,022.4	
Total borrowings	16,871.2	16,667.8	16,263.3	16,450.9	16,333.3	
Less: payable within one year	4,358.5	3,179.2	4,313.8	5,223.4	4,310.9	
Medium and long-term						
borrowings	12,512.7	13,488.6	11,949.5	11,227.5	12,022.4	

As at 31 March 2016, Vedanta had access to funding facilities (both fund based and non-fund based) of \$18,140.7 million, of which \$1,087.3 million of fund based and \$716.2 million of non-fund based, was not yet drawn.

Funding Facilities	<b>Total Facility</b>	Drawn	Undrawn
		(\$ million)	
Less than one year	6,104.2	4,310.0	1,794.2
One to two years	2,642.7	2,642.7	_
Two to five years and above	9,393.8	9,384.5	9.3
Total	18,140.7	16,337.2	1,803.5

A summary of the principal loans held by Vedanta and its group companies as of 31 March 2016 is contained in Note 24 to the Company's consolidated financial statements.

Vedanta and its subsidiaries have various finance facilities that contain various financial covenants. The lending banks of Vedanta Resources plc have consented to certain changes requested by the Company to its covenants under the terms of the relevant debt facilities effective from 31 March 2016 until the period ending 30 September 2018. The Company is in compliance with its covenants relating to all facilities for the testing period ended 30 September 2016. These covenants require Vedanta to maintain certain financial ratios and seek the prior permission of the relevant banks and financial institutions for various activities including, amongst others any changes in its capital structure, issue of equity, preferential capital or debentures, raising any loans, undertaking any new project, effecting any scheme of acquisition, merger, amalgamation or reconstruction, implementing a new scheme of expansion or creation of a subsidiary.

# **Project Capital Expenditures**

The following table shows the capital expenditures for Vedanta in fiscal years 2014, 2015 and 2016 and the six months ended 30 September 2015 and 2016:

				Six Mont	hs Ended
_	Yea	ar Ended 31 M	arch	30 Sep	tember
_	2014	2015	2016	2015	2016
			(\$ million)		
Expansion capital expenditure	1,425	1531	566	432	374

In fiscal year 2014, significant capital expenditure was incurred on development and exploration activities at Cairn India, HZL's underground mine expansion project, TSPL's 1,980 MW coal-based thermal power plant at Talwandi Sabo , BALCO Korba-II 325 ktpa smelter & 1200 MW coal based thermal power plant in the state of Chhattisgarh.

In fiscal year 2015, significant capital expenditure was incurred on development and exploration activities at Cairn India , HZL's underground mine expansion project, TSPL's 1,980 MW coal-based thermal power plant at Talwandi Sabo, and BALCO Korba-II 325 ktpa smelter & 1200 MW coal based thermal power plant in the state of Chhattisgarh.

In fiscal year 2016, capital expenditure was incurred on development and exploration activities at Cairn India ,HZL's underground mine expansion project, ramp up of aluminum & power capacities at Vedanta Limited, BALCO & TSPL.

In six months ended 30th September 2016, capital expenditure was incurred on ramp up of Vedanta Limited's 1.25mtpa Jharsuguda Smelter and BALCO Korba-II 325 ktpa smelter, HZL's underground mine expansion project and TSPL's 1,980 MW coal-based thermal power plant at Talwandi Sabo.

The following table sets out details regarding Vedanta's capital expenditure as of 30 September 2016, for projects in progress and capex with flexibility.

Capex in Progresss	Capacity	Status as of 30 September 2016	Estimated Cost	Amount Spent up to Fiscal year 2016	Total Amount Spent Through 30 September 2016	Amount Unused as of 30 September 2016
				(\$	million)	
Aluminium						
BALCO — Korba II Smelter and Korba Power Plant <sup>(1)</sup>	325 ktpa - Smelter — 1,200 MW- Power Plant	Smelter: 168 pots capitalised, further ramp up in progress Power: All 4 units operational	1,872	1,889	55	(72)
Jharsuguda Smelter	1.25 mtpa	168 pots capitalized, further ramp up in progress	2,920	2,568	110	242
Power						
TSPL	1,980 MW	All 3 units commissioned	2,150	2,054	63	33
Zinc						
HZL — Mines Expansion		Phase wise by 2019	1,500	790	105	605
ZI — Gamsberg  Mining and Milling  project		Fiscal year 2019	400	21	12	367
ZI — Skorpion Pit extension <sup>(2)</sup>		Current estimate subject to Board approval	120	_	_	120
Oil & gas						
Cairn India			1,378	1,278	21	79
Total Capex			10,340	8,600	366	1,446 <sup>(3)</sup>
CAPEX FLEXIBILITY						
Copper						
Smelter at Tuticorin	400 ktpa	Environment clearance awaited	367	132	_	235
Aluminium						
Vedanta Limited — Lanjigarh Refinery (Phase II)	4.0 mtpa		1,570	812	8	750
Zinc						
Skorpion refinery conversion		Deferred	156	11		145
Total Flexibility Capex			2,093	955	8	1,130

<sup>(1)</sup> Cost overrun on account of Forex Changes and IDC. Total overrun would be \$120 Mn

<sup>(2)</sup> Current estimate subject to Board approval

<sup>(3)</sup> Total excludes overrun for Balco Project

Vedanta may undertake additional capital expenditures as opportunities or needs arise. In addition, Vedanta may increase, reduce or suspend its planned capital expenditures or change the timing and use of its capital expenditures from what is currently planned in response to market conditions or for other reasons.

Vedanta's ability to maintain and grow its revenues, net income and cash flows depends upon continued capital spending. Vedanta's current and future projects may be significantly delayed by the failure to receive regulatory approvals or renewal of approvals in a timely manner, failure to obtain sufficient funding, technical difficulties, human resources constraints, technological or other resource constraints or for other unforeseen reasons, events or circumstances. See "Risk Factors — Risks Relating to Business". Vedanta adjusts its capital expenditure plans and investment budget periodically, based on factors deemed relevant by it. Therefore Vedanta's actual capital expenditures and investments are likely to be different from its current planned amounts, and such differences may be significant.

# **Contractual Obligations**

The following table sets out Vedanta's total future commitments to settle contractual obligations as of 31 March 2016:

	Payment Due by Period					
		Less Than				
	Total	1 Year	1-2 Years	2-5 Years	5 Years	
			(\$ million)			
Bank loans and other						
borrowings <sup>(1)</sup>	19,179.4	4,711.2	3,434.2	7,645.5	3,388.3	
Convertible bonds <sup>(1)</sup>	595.5	595.5	_	_	_	
Trade and other payable	4,921.6	4,885.5	_	29.9	6.2	
Derivative liabilities	68.9	67.8	1.1			
Total	24,765.4	10,260.0	3,435.5	7,645.4	3,394.5	

Vedanta's total future commitments to settle contractual obligations, as of 31 March 2016, were \$24,765.4 million.

Vedanta also has commitments to purchase copper concentrate for its copper custom smelting operations. These commitments are based on future LME copper spot prices which are not ascertainable as of the date of this Offering Circular.

# **Off-Balance Sheet Arrangements**

Vedanta has no off-balance sheet entities. In the normal course of business, it enters into certain commitments for capital and other expenditures and certain performance guarantees. The aggregate amount of indemnities and other guarantees was \$495.5 million as of 30 September 2016.

Details of Vedanta's indemnities and other guarantees are set out in "— Guarantees". Details of Vedanta's capital commitments and contingencies are set out below.

<sup>(1)</sup> Includes contractual interest payment based on interest rate prevailing at the end of the reporting period.

# Capital Commitments Contracted But Not Provided

Vedanta has a number of continuing operational and financial commitments in the normal course of business. Capital commitments contracted but not provided as of 30 September 2016 amounted to \$1,151.3 million, related primarily to capacity expansion projects, including the construction of new facilities and the expansion of existing facilities.

# Contingencies

As is typical for a Group of its size and complexity, Vedanta is consistently subject to litigation. Certain of its operating subsidiaries have been named as parties to legal actions by third-party claimants and by the Indian sales tax, excise and related tax authorities for additional sales tax, excise and indirect duties. These claims primarily relate either to the assessable values of sales and purchases or to incomplete documentation supporting its tax returns. Vedanta has ongoing disputes with income tax authorities relating to the tax treatment of certain items.

These mainly include disallowed expenses, tax treatment of certain expenses claimed by Vedanta as deductions, and the computation or eligibility of certain tax incentives or allowances. Some of the disputes relate to the year in which the tax consequences of financial transactions were recognised, and in the event these disputes are not resolved in Vedanta's favour, the tax consequences may be reflected in the tax year as required by the income tax authorities and there are therefore timing differences. Most of these disputes and disallowances, being repetitive in nature, have been raised by the tax authorities consistently in most of the years. Vedanta has a right of appeal to the High Court or the Supreme Court of India against adverse initial assessments by the appellate authorities for matters involving questions of law. The tax authorities have similar rights of appeal. The total claims related to these tax liabilities, which are all income-tax related, are \$3,725.0 million as of 30 September 2016. Vedanta has evaluated these contingencies and estimate that it is probable that some of these claims may result in loss contingencies and hence have recorded \$22.6 million as current liabilities as of 30 September 2016.

The amount under dispute with other tax authorities, relating to matters such as sales tax, income tax, excise tax and electricity duty, as of 30 September 2016 is \$251.0 million against which liability of \$2.6 million have been recorded based on Vedanta's estimate that none of these claims would become liabilities. The claims by third-party claimants amounted to \$1,046.5 million as of 30 September 2016, of which \$32.4 million were recorded as current liabilities based on Vedanta's estimate that none of these claims would become liabilities. Vedanta intends to vigorously defend these claims as necessary. Although the results of legal actions cannot be predicted with certainty, it is the opinion of the management, after taking appropriate legal advice, that the resolution of these actions will not have a material adverse effect, if any, on Vedanta's business, financial condition or results of operations. Therefore, Vedanta has not recorded any additional liability in relation to litigation matters in the accompanying consolidated financial statements.

### Inflation

According to Euromonitor International, India's annual overall inflation rate was approximately 6.4%, 5.9% and 5.2% for 2014, 2015 and 2016. Inflation in India has not significantly impacted Vedanta's results of operations in recent years.

#### Guarantees

Companies within Vedanta provide guarantees within the normal course of business. Guarantees have also been provided in respect of certain short-term and long-term borrowings.

As of 30 September 2016, \$386.5 million of guarantees were advanced to banks in the normal course of business. Vedanta has also entered into guarantees advanced to the customs authorities in India of \$109.0 million relating to the export of iron ore and payment of import duties on purchases of raw materials.

# **Export obligations**

The Indian entities of Vedanta have export obligations of \$2,375.1 million as of 30 September 2016 on account of concessional rates received on import duties paid on capital goods under the Export Promotion Capital Goods Scheme and on raw materials under the Advance Licence Scheme enacted by the GoI.

In the event Vedanta fails to meet its obligations, Vedanta's liability would be \$324.3 million, reduced in proportion to actual exports. This liability is backed by a bond executed in favour of the Indian customs department amounting to \$64.8 million.

# Guarantees to suppliers

Vedanta has given corporate guarantees to certain suppliers of concentrate. The value of these guarantees was \$4.6 million as of 30 September 2016.

# Environmental and terminal benefits ("ETB") cash reserve account — KCM

Pursuant to the terms of the shareholders' agreement between Vedanta Resources Holdings Limited ("VRHL") and Zambia Copper Investments Limited or ZCI dated 5 November 2004, KCM is expected to contribute a minimum of \$10 million (and not more than a maximum of \$18 million) in any fiscal year to ensure that the amount of ETB liabilities is covered by a cash reserve when the life of the Konkola Ore Body comes to an end. The ETB liabilities refer to KCM's obligations in relation to environmental and any terminal benefits payable to its employees. As of 30 September 2016, ETB liabilities provided for were \$13.1 million, although these liabilities are likely to fluctuate at each future reporting date.

#### Market Risk Disclosure

Vedanta is exposed to market risk from changes in foreign exchange rates, interest rates, counterparty and concentration of credit, and commodity prices.

Vedanta uses derivative instruments as part of its management of exposure to fluctuations in foreign currency exchange rates, interest rates and commodity prices. Vedanta does not acquire or issue derivative financial instruments for trading or speculative purposes. Vedanta does not enter into complex derivative transactions to manage the treasury and commodity risks. Both treasury and commodities derivative transactions are normally in the form of forward contracts and interest rate and currency swaps and these are subject to Vedanta guidelines and policies.

# **Exchange Rate Risk**

The results of Vedanta's operations may be affected by fluctuations in the exchange rates between the Indian Rupee, South African Rands, Zambian Kwachas, Namibian dollars and Liberian dollars against the US dollar. Exposures on foreign currency loans are managed through the foreign exchange hedging policy which is reviewed periodically to ensure that the risk from fluctuating currency exchange rates is appropriately managed. Natural hedges available in the business are identified at each entity level and hedges are placed only for the net exposure. Short term net exposures are hedged progressively based on their maturity. Longer exposures beyond one year for trade and other current account transactions are reviewed and hedges taken accordingly. However, all new exposures on account of long-term borrowing are being hedged.

Hedging activities in India are governed by the RBI with whose policies Vedanta must comply. The policies under which the RBI regulates these hedging activities can change from time to time and these policies may affect the effectiveness with which Vedanta manages exchange rate risk.

Vedanta has in the past held or issued instruments such as options, swaps and other derivative instruments for purposes of mitigating exposure to exchange rate risk. Vedanta does not enter into hedging instruments for speculative purposes.

Vedanta's exposure to foreign currency arises where a Group company holds monetary assets and liabilities denominated in a currency different to the functional currency of that entity with USD (US dollar) being the major foreign currency exposure of Vedanta's main operating subsidiaries. Set out below is the impact of a 10% change in the US dollar on profit/(loss) and equity arising as a result of the revaluation of Vedanta's foreign currency financial instruments.

		31 March 2016	
	Closing exchange	Effect of 10% strengthening of US dollar on net	
Currency	rate	earnings	equity
Indian Rupee	66.3329	(191.1)	(230.2)
Kwacha	7.5811	(10.1)	(10.1)

The sensitivities are based on financial assets and liabilities held at 31 March 2016 where balances are not denominated in the functional currency of the respective subsidiaries. The sensitivities do not take into account Vedanta's sales and costs and the results of the sensitivities could change due to other factors such as changes in the value of financial assets and iabilities as a result of non-foreign exchange influenced factors. A 10% depreciation of the US dollar would have an equal and opposite effect on Vedanta's financial instruments.

# **Interest Rate Risk**

Vedanta is exposed to the interest rate risk on short-term and long-term floating rate instruments and also on the refinancing of fixed rate debt. The policy is to maintain a balance of fixed and floating interest rate borrowings. The proportion of fixed and floating rate debt is determined by current market interest rates. As of 31 March 2016, 48% of its total debt was at a fixed rate and the balance was at a floating rate.

The USD floating rate debt is linked to US dollar LIBOR and INR floating rate debt to Bank's base rate. Vedanta also aims to opt for a higher proportion of long-term debt to fund growth projects to extend its maturity profile. Vedanta invests cash and liquid investments in short-term deposits and debt mutual funds, some of which generate a tax-free return, to achieve Vedanta's goal of maintaining liquidity, carrying manageable risk and achieving satisfactory returns.

Floating rate financial assets are largely mutual fund investments which have debt securities as underlying assets. The returns from these financial assets are linked to market interest rate movements; however the counterparty invests in the agreed securities with known maturity tenure and return and hence has manageable risk. Additionally, the investments portfolio is independently reviewed by CRISIL Limited, and vedanta's investment portfolio has been rated as 'Very Good', meaning highest safety.

Considering the net debt position as at 31 March 2016 and the investment in bank deposits, corporate bonds and debt mutual funds, any increase in interest rates would result in a net loss and any decrease in interest rates would result in a net gain.

Borrowing and interest rate hedging activities in India are governed by the RBI and as a result, Vedanta has to comply with the RBI's regulations. The policies under which the RBI regulates these borrowing and interest rate hedging activities can change from time to time and can impact the effectiveness with which Vedanta manages its interest rate risk.

The below table illustrates the impact of a 0.5% to 2.0% change in interest rate of borrowings on profit/(loss) and equity and represents management's assessment of the possible change in interest rates for the year ended March 31, 2016:

	Effect on loss	Effect on
Movement in Interest Rates	for the year	total equity
	(\$ million)	(\$ million)
0.5%	42.3	42.3
1.0%	84.5	84.5
2.0%	169.1	169.1

# Counterparty and Concentration of Credit Risk

Vedanta is exposed to credit risk from trade receivables, cash and cash equivalents, liquid investments and other financial instruments. Vedanta has clearly defined policies to mitigate counterparty risks. Cash and liquid investments are held primarily in debt schemes of mutual funds, bonds and bank deposits with good credit ratings. Defined limits are in place for exposure to individual counterparties in case of mutual fund houses and banks.

The large majority of receivables due from third parties are secured. Moreover, given the diverse nature of Vedanta's businesses, trade receivables are spread over a number of customers with no significant concentration of credit risk. During the year ended 31 March 2016 no single customer accounted for 10% or more of Vedanta's net sales or for any of Vedanta's primary businesses. During the year ended 31 March 2015, other than the exception of a single customer in Vedanta's Oil & Gas business, no single customer accounted for 10% or more of Vedanta's net sales or for any of Vedanta's primary businesses. The history of trade receivables shows a negligible provision for bad and doubtful debts. Therefore, Vedanta does not expect any material risks on account of non-performance by any of Vedanta's counterparties.

Vedanta's maximum gross exposure to credit risk as of 31 March 2016 is US\$9,886.0 million compared to US\$9,493.2 million as of 31 March 2015.

# Commodity Price Risk

Vedanta is exposed to the movement of base metal commodity prices on the London Metal Exchange. Any decline in the prices of the base metals that Vedanta produces and sells will have an immediate and direct impact on the profitability of the business. As a general policy, Vedanta aims to sell the products at prevailing market prices. The commodity price risk in the import of copper concentrate and alumina is hedged on back-to-back basis ensuring no price risk for the businesses. Entities with integrated operations aim to achieve the monthly average of the commodity prices for sales realisation. Hedging is used primarily as a risk management tool to secure future cash flows in cases of high volatility by entering into forward contracts or similar instruments. The hedging activities are subject to strict limits set out by the Board and to a strictly defined internal control and monitoring mechanism. Decisions relating to hedging of commodities are taken at the Executive Committee level and with clearly laid down guidelines for their implementation by the subsidiaries.

Whilst Vedanta aims to achieve average LME prices for a month or a year, average realised prices may not necessarily reflect the LME price movements because of a variety of reasons such as uneven sales during the year and timing of shipments.

Vedanta is also exposed to the movement of international crude oil price and the discount in the price of Rajasthan crude oil to Brent price.

# Copper

Vedanta's custom smelting copper operations at Tuticorin is benefited by a natural hedge except to the extent of a possible mismatch in quotational periods between the purchase of concentrate and the sale of finished copper. Vedanta's policy on custom smelting is to generate margins from TC/RCs, improving operational efficiencies, minimizing conversion cost, generating a premium over LME on sale of finished copper, sale of by-products and from achieving import parity on domestic sales. Hence, mismatches in quotational periods are managed to ensure that the gains or losses are minimised. Vedanta hedges this variability of LME prices through forward contracts and tries to make the LME price a pass-through cost between purchases of copper concentrate and sales of finished products, both of which are linked to the LME price. TC/RCs are a major source of income for the Indian copper smelting operations. Fluctuations in TC/RCs are influenced by factors including demand and supply conditions prevailing in the market for mine output. Vedanta's Copper business has a strategy of securing a majority of its concentrate feed requirement under long-term contracts with mines. KCM is largely an integrated copper producer and whenever hedging is done it is with an intention to protect Vedanta from price fluctuations in copper. KCM also does hedging for its custom smelting operations in line with Vedanta's policy on custom smelting at Tuticorin, as explained above.

#### Aluminium

The requirement of the primary raw material, alumina, is partly met from own sources and the rest is purchased primarily on negotiated price terms. Sales prices are linked to the LME prices. At present Vedanta on selective basis hedges the aluminium content in imported alumina to protect its margins. Vedanta also enters into hedging arrangements for its aluminium sales to realise month of sale LME prices.

# Zinc and lead

The sales prices are linked to the LME prices. Vedanta also enters into hedging arrangements for its zinc and lead sales to realise month of sale LME prices.

# Iron ore

Vedanta sells its iron ore production from Goa on the prevailing market prices and from Karnataka through e-auction route as mandated by State Government of Karnataka in India.

Hedging activities in India are governed by the RBI and as a result, Vedanta has to comply with its regulations. The policies under which the RBI regulates these hedging activities can change from time to time and can have an impact on the effectiveness with which Vedanta manages commodity price risk.

Vedanta has in the past held or issued derivative instruments such as forwards, options and other derivative instruments for purposes of mitigating its exposure to commodity price risk. Vedanta does not enter into hedging instruments for speculative purposes.

## Provisionally priced financial instruments

On 31 March 2016, the value of net financial liabilities linked to commodities (excluding derivatives) accounted for on provisional prices was a liability of US\$416.3 million (2015: liability of US\$689.9 million). These instruments are subject to price movements at the time of final settlement and the final price of these instruments will be determined in the financial year beginning 1 April 2016.

Set out below is the impact of a 10% increase in LME prices on profit/(loss) for the year and total equity as a result of changes in value of Vedanta's commodity financial instruments as at 31 March 2016:

(US\$ million except as stated)

Commodity price sensitivity	Closing LME as at 31 March 2016	Effect on profit/(loss) of a 10% increase in the LME 31 March 2016	Effect on total equity of a 10% increase in the LME 31 March 2016
	US\$	(US\$ million)	(US\$ million)
Copper	4,855.5	(44.5)	(44.5)
Zinc	1,785.0	0.2	0.2
Lead	1,704.5	0.6	0.6

(US\$ million except as stated)

Commodity price sensitivity	Closing LME as at 31 March 2015	Effect on profit/(loss) of a 10% increase in the LME 31 March 2015	Effect on total equity of a 10% increase in the LME 31 March 2015
	US\$	(US\$ million)	(US\$ million)
Copper	6,050	(62.2)	(62.2)
Zinc	2,075	0.2	0.2
Lead	1,808	_	_

The above sensitivities are based on volumes, costs, exchange rates and other variables and provide the estimated impact of a change in LME prices on profit and equity assuming that all other variables remain constant. A 10% decrease in LME prices would have an equal and opposite effect on Vedanta's financial instruments.

Further, the impact of a 10% increase in closing copper LME for provisionally priced copper concentrate purchased at Vedanta Limited Copper division custom smelting operations is US\$50.0 million (2015: US\$69.2 million), which is pass through in nature and as such will not have any impact on the profitability.

# Management's Judgment and Estimation

The discussion and analysis of Vedanta's financial condition and results of operations are based upon Vedanta's consolidated financial statements, which have been prepared in accordance with IFRS. In the course of preparing these financial statements, the management has made estimates based on and assumptions that impact the amounts recognised in the consolidated financial statements. For a discussion of the significant accounting policies, see note 2(a) to the consolidated financial statements of Vedanta for fiscal year 2016 incorporated in this Offering Circular. Vedanta's critical accounting judgements and estimation uncertainty are described in note 2(b) of the consolidated financial statements of Vedanta for fiscal year 2016.

# **OVERVIEW OF INDUSTRIES**

Unless otherwise indicated, all data relating to the copper, zinc, aluminium and iron ore industries contained in this Offering Circular is primarily derived from Wood Mackenzie. Unless otherwise indicated, all data relating to the power industry in this Offering Circular is primarily derived from the GoI and its various ministries and from various multilateral institutions. Unless otherwise indicated, all data relating to the oil and gas industry contained in this Offering Circular is primarily derived from International Energy Agency ("IEA") World Energy Outlook 2016, the BP Statistical Review of World Energy June 2016 (the "BP Statistical Review") and other industry sources.

#### Oil and Gas Overview

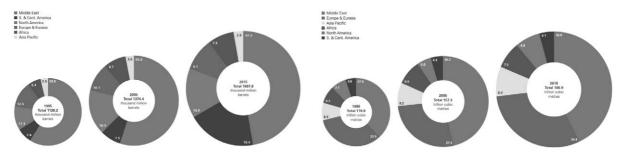
## Global Crude Oil and Gas Reserves and Resources

According to the BP Statistical Review, global oil reserves have increased significantly by 23.5% compared to the end of 2005, reaching 1,698 billion barrels at the end of 2015. Most of the increase in oil reserves has come from the Orinoco reserves upgrades in Venezuela and reserve revisions in other OPEC countries (mainly Iran and Iraq), and reserve revisions in Kazakhstan and the U.S. outside of the OPEC countries. The global Reserves-to-Production ("R/P") ratio was 50.7 years as of the end of 2015, and has been steadily decreasing over the last four years.

Global natural gas reserves have increased by 18.8% since the end of 2005 to 187 trillion m<sup>3</sup> as of the end of 2015, indicating a R/P ratio of 52.8 years. Turkmenistan and Iran gas reserves upgrade and the US shale gas discoveries contributed most to this increase.

Distribution of proved oil reserves in 1995, 2005 and 2015

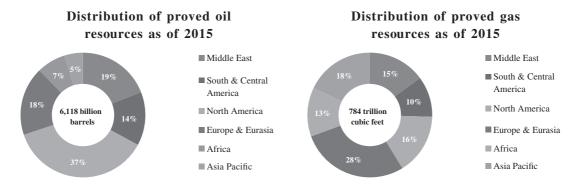
Distribution of proved gas reserves in 1995, 2005 and 2015



Source: BP Statistical Review 2016

According to the estimates by IEA, as of the end of 2015, the remaining recoverable resources for oil worldwide amounted to approximately 6,118 billion barrels, of which approximately 55.1% were classified as unconventional (extra-heavy oil and bitumen, kerogen oil and tight oil). North America holds the largest volume of unconventional oil resources, totalling 1,909 billion barrels.

The IEA estimates that as of end of 2015, remaining recoverable resources for natural gas worldwide were 784 trillion m<sup>3</sup>. Of the total remaining recoverable resources, conventional gas resources were up to 434 trillion m<sup>3</sup> in 2015. The remainder of approximately 349 trillion m<sup>3</sup> was estimated as unconventional (shale gas, tight gas and coalbed methane).



Source: IEA World Energy Outlook 2016

#### Global Oil and Gas Markets

Global oil and gas demand growth has been mainly driven by the non-OECD countries, with growth in the Asia-Pacific region being the strongest. The BP Statistical Review estimates that in 2015 oil demand from the non-OECD countries increased by 1.9 million barrels per day vs. 2014 levels, or 2.6%, with the largest volume gains in oil uses from China, India and the U.S..

Natural gas consumption worldwide grew by 1.7% in 2015, with the largest volume gains in gas uses from the U.S., Iran and China. Gas demand grew by 1.5% in OECD countries vs. 1.9% in non-OECD countries.

Oil and gas prices have significantly fallen since 2014 as a result of higher production globally, primarily driven by the development of unconventional hydrocarbons in the U.S. (the U.S. became the largest oil producing country as its oil production rose by 26.3% between 2013 and 2015; the U.S. gas production rose by 11.9% over the same period) and the absence of production cut agreements between OPEC countries until November 2016. After falling as low as \$28 in January 2016, Brent crude price traded at \$57 as of 3 January 2017 (Source: Bloomberg).

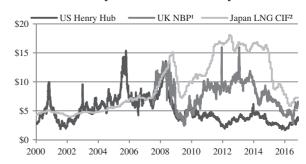
Although natural gas prices tend to be set locally and regionally outside of the U.S., gas prices have decreased alongside oil prices. Gas prices in continental Europe and long-term contracted LNG prices in the Asia-Pacific region are predominantly indexed to oil prices. In the U.S., the substantial production growth has resulted in lower gas prices, with gas price at Henry Hub trading at \$3.3 as of 3 January 2017 (Source: Bloomberg).

The non-OECD economies are expected to continue to drive changes in future global oil and gas demand. IEA estimates that oil demand from non-OECD countries is expected to grow from 43.6 million barrels per day in 2015 to 52.2 million barrels per day in 2025 and 62.5 million barrels per day in 2040. Natural gas usage in the non-OECD economies is expected to expand rapidly, with China experiencing the largest growth in gas demand, indicating a CAGR of 4.6% from 2014 to 2040.

Oil prices (\$/barrel)
3 January 2000 — 3 January 2017



Gas prices (\$/mmbtu)
3 January 2000 — 3 January 2017



Source: Bloomberg as of 3 January 2017

Note: 1 Starting September 2007; 2 CIF — cost, insurance and freight

## **Indian Oil and Gas Industry**

# History

The oil and gas industry in India has traditionally been, and continues to be, dominated by public sector companies. In 1955, the GoI entered the oil and gas sector with the establishment of the Oil and Gas Directorate (the predecessor to ONGC), and formed joint venture agreements with domestic and foreign operators.

Till the early 1990s, the Indian oil and gas industry had been dominated by state-owned entities under a series of policies of nationalisation, including taking over the operations from foreign operators, and regulations in pricings. As India's reliance on oil imports increased, the Indian government embarked on a series of reforms aimed at reducing India's dependence on imports, deregulating the industry, improving efficiency, and encouraging private and foreign investment.

In 1997, the New Exploration Licensing Policy ("NELP") was implemented in order to encourage growth of the domestic exploration and production ("E&P) sector. Successful bidders are required to enter into PSCs with the Indian government. Historically, and in an effort to promote licensing rounds and encourage potential bidders, PSCs have contained comparatively favourable terms, including, for example, 100% costs recovery, and income tax holiday. In addition, under the NELP, private sector companies have marketing rights of crude oil and natural gas in the domestic market subject to overall government policy guidelines.

As a result of the NELP, there have been significantly increased level of participations from the private sectors in the domestic E&P space. Seismic activities were also very strong in the early part of this decade, as was the level of exploration drilling, which led to some of India's largest discoveries being made.

# Supply and Demand

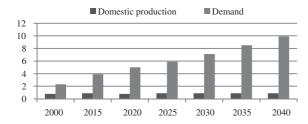
India is the second most populous country in the world with a population of approximately 1.3 billion. Rapid economic growth in India has led to a significant increase in demand for crude oil and natural gas. According to the BP Statistical Review, in 2015, India's world share of oil and gas consumption was 4.4% and 1.5% respectively.

India is a net importer of crude oil and natural gas. The BP Statistical Review estimates that in 2015, India domestically produced 0.9 million barrels per day, representing 21.1% of the total crude consumption which was 4.2 million barrels per day. Similarly, in 2015, India natural gas consumption was 50.6 billion m<sup>3</sup>, but the country produced only 29.2 billion m<sup>3</sup> of gas, representing 57.8% of the total gas consumption.

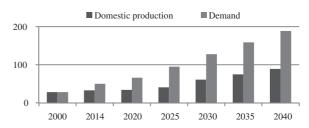
IEA estimates that India's oil consumption will surge from 3.9 million barrels per day in 2015 to 9.9 million barrels per day in 2040, at a CAGR of 3.8%. In contrast, domestic crude production is estimated to remain stable at 0.9 million barrels per day between 2015 and 2035, as most domestic producing fields are already in long-term decline and the fields that have been found in recent years are generally small.

Gas demand in India is expected to grow rapidly. By 2040, IEA estimates that annual natural gas demand will rise to 189 billion m<sup>3</sup>, indicating a CAGR of 5.2% from 50 billion m<sup>3</sup> in 2014 whilst domestic gas production is expected to meet approximately 47.1% of the total demand in 2040.

# Oil domestic production / demand in India (million barrels per day)



# Gas domestic production / demand in India (billion m<sup>3</sup>)



Source: IEA World Energy Outlook 2016

Zinc

Global Zinc Market

Background

Zinc is one of the most commonly produced metals globally, valued as an anti-corrosion agent. Annual mine production for the year ended 31 December 2016 has been estimated by Wood Mackenzie at approximately 12 million tonnes.

According to Wood Mackenzie, the principal use for zinc in the western world is galvanising, which involves coating steel with zinc to guard against corrosion. Galvanising, including sheet, tube, wire and general galvanising, accounted for approximately 60% of world consumption of zinc. The main end-use industries for galvanised steel products are the automobile manufacturing, domestic appliance manufacturing and construction industries, and it is these industries on which zinc consumption ultimately depends. Other major uses for zinc include die-casting alloys (14%), brass semis and castings (10%) and oxides and chemicals (9%). Alloys are principally used in toys, vehicles and hardware.

The end-user market is dominated by the construction industry with 50% of global end-use zinc consumption, followed by the sectors of transport (21%), infrastructure (16%), industrial machinery (7%) and consumer products (6%), according to Wood Mackenzie.

The zinc industry has three broad categories of producers:

- Miners, which mine the lead-zinc ore and produce zinc concentrate for sale to smelters, and usually receive payment for 85% of the zinc contained in the concentrate less a treatment charge ("Tc");
- Smelters, which purchase concentrate and sell refined metal, with some smelters also having some integrated production downstream; and
- Integrated producers, which are involved in both the mining and smelting of zinc.

For custom smelters, treatment and refining charges ("TcRc") for zinc concentrates have a significant impact on profitability as prices for zinc concentrate are equal to the LME price net of TcRc and prices of finished zinc products are equal to the LME price plus a premium. A significant proportion of zinc concentrates are sold under frame contracts and TcRc are negotiated annually. The main conditions of the contract which are subject to negotiation are the TcRcs that are expressed in US dollars per dry metric tonne of concentrate being the Tc and in cents per pound of payable zinc being the Rc and, until recently (under long-term contracts) price participation. The TcRc rates are influenced by the demand-supply situation in the concentrate market, prevailing and forecasted LME prices and mining and freight costs.

## Global Zinc Reserves

Global zinc reserves were estimated to be, as of 31 December 2015, 200 million tonnes, according to preliminary estimates by the U.S. Geological Survey ("USGS"). Australia, China, Peru, Mexico and the United States collectively account for 76% of world reserves.

The following table shows world zinc reserves by country:

	Reserves
	(in million
	tonnes)
Australia	63.0
China	38.0
Peru	25.0
Mexico	15.0
United States	11.0
India	10.0
Canada	6.2
Bolivia	4.6
Kazakhstan	4.0
Ireland	1.1
Other countries	26.0
World total (rounded)	203.9

Source: U.S. Geological Survey (USGS), Mineral Commodity Summaries, January 2016

# Zinc consumption

According to Wood Mackenzie, global zinc consumption rose by 2.7% to 14.3 million tonnes in 2016, following 6 years of strong growth after the 2010 low post economic crisis as refined zinc consumption grew by 41.4% between 2009 and 2016. China, Europe and North America together accounted for 73.0% of global zinc consumption in 2015. With a CAGR of 7.6% between 2009 and 2016, China has been the fastest growing zinc market in the world. Driven by continuing growth in China and India, strong growth in Asia is expected to continue over the next few years.

The following table shows the regional consumption pattern of refined zinc from 2013 to 2016:

			Y	ear Ended 3	31 December	r		
	20	13	20	14	20	15	20	16
Region	Volume	<b>%</b>	Volume	<b>%</b>	Volume	%	Volume	%
	(thousands of tonnes, except percentages)							
China	6,064	45.6%	6,405	46.4%	6,615	47.5%	6,832	47.8%
Europe	2,232	16.8%	2,286	16.6%	2,340	16.8%	2,386	16.7%
Rest of Asia	1,951	14.7%	2,037	14.8%	1,997	14.3%	2,024	14.2%
US & Canada	1,212	9.1%	1,268	9.2%	1,213	8.7%	1,270	8.9%
Latin America	629	4.7%	625	4.5%	584	4.2%	604	4.2%
India	639	4.8%	649	4.7%	634	4.6%	685	4.8%
Russia & Caspian	264	2.0%	248	1.8%	232	1.7%	233	1.6%
Oceania	157	1.2%	141	1.0%	143	1.0%	108	0.8%
Africa	138	1.0%	140	1.0%	161	1.2%	151	1.1%
Total	13,286	100.0%	13,800	100.0%	13,919	100.0%	14,293	100.0%

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

Note: "Russia & Caspian" includes Russia, Armenia, Georgia, Kazakhstan, Tajikistan and Uzbekistan; "Rest of Asia" includes Middle East

## Zinc supply

According to Wood Mackenzie, the five largest zinc mining countries in 2016 are China (40.0%), Peru (9.6%), Australia (6.9%), the United States (6.2%), and Mexico (5.3%), which together accounted for 68.0% of total zinc mined worldwide. The five largest zinc mining companies are Glencore (7.9%), Teck (5.4%), HZL (5.2%), Votorantim (2.9%), and Boliden (2.7%) which together accounted for about 24.1% of the total refined zinc produced worldwide.

The following table shows the regional production pattern of zinc mines from 2013 to 2016:

Year Ended 31 December 2015 2013 2014 2016 Region Volume % Volume % Volume Volume % % (thousands of tonnes, except percentages) 40.0% China ..... 4,663 36.3% 4,876 37.6% 4,874 36.9% 4,960 Latin America..... 2,594 2,706 20.5% 2,591 20.9% 2,520 19.6% 20.0% Oceania ..... 1,481 11.5% 1,516 11.7% 1,599 12.1% 854 6.9% US & Canada ..... 1,174 9.1% 1,139 8.8% 1,081 8.2% 1,081 8.7% 892 911 7.0% 899 911 7.4%Europe..... 6.9% 6.8%India..... 827 6.4%716 5.5% 821 6.2% 643 5.2% 619 701 Russia & Caspian ..... 4.8%596 4.6% 639 4.8%5.7% Rest of Asia ..... 334 2.6% 287 2.2% 280 2.1% 285 2.3% 325 2.3% 369 3.0%Africa..... 2.5% 328 2.5% 308 100.0% 12,963  $100.0\,\%$  $100.0\,\%$ 12,394  $100.0\,\%$ Total ..... 12,835 13,205

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

Note: "Russia &Caspian" includes Russia, Armenia, Georgia, Kazakhstan, Tajikistan and Uzbekistan; "Rest of Asia" includes Middle East

Zinc smelting is slightly less geographically concentrated than zinc mining. Zinc smelter production increased to 14.5 million tonnes in 2016 from 13.7 million tonnes in 2015, a 5.6% rise. China is the largest single refined zinc-producing country in the world with a production of 6.9 million tonnes in 2016, representing a 47.9% global market share. The other major refined zinc producing countries include South Korea (7.1%), Canada (4.7%), India (4.4%), and Japan (3.9%). The top five countries account for approximately 68.0% of total global refined zinc production. The five largest refined zinc producing companies are Korea Zinc (8.6%), Nyrstar (7.0%), Glencore (6.9%), HZL (4.2%), and Votorantim (4.2%), which together accounted for about 30.9% of the total refined zinc produced worldwide.

The following table shows the regional production pattern of refined zinc from 2013 to 2016:

	Year Ended 31 December										
	2013		20	2014		2015		2016			
Region	Volume	%	Volume		Volume	%	Volume	%			
			(thousand	ls of tonnes	, except perc	entages)					
China	5,214	40.3%	5,627	42.5%	5,925	43.2%	6,936	47.9%			
Europe	2,113	16.3%	2,215	16.7%	2,226	16.2%	2,170	15.0%			
Rest of Asia	1,715	13.3%	1,714	13.0%	1,728	12.6%	1,830	12.6%			
Latin America	976	7.5%	940	7.1%	957	7.0%	930	6.4%			
U.S. & Canada	907	7.0%	785	5.9%	859	6.3%	802	5.5%			
India	801	6.2%	736	5.6%	850	6.2%	640	4.4%			
Russia & Caspian	572	4.4%	599	4.5%	599	4.4%	610	4.2%			
Oceania	499	3.9%	484	3.7%	489	3.6%	463	3.2%			
Africa	139	1.1%	134	1.0%	83	0.6%	103	0.7%			
Total	12,935	100.0%	13,233	100.0%	13,716	100.0%	14,484	100.0%			

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

Note: "Russia & Caspian" includes Russia, Armenia, Georgia, Kazakhstan, Tajikistan and Uzbekistan; "Rest of Asia" includes
Middle East

## **Pricing**

Zinc is traded on the LME. Although prices are determined by LME price movements, producers normally charge a regional premium that is market driven. Significant price decrease in 2015 has resulted in a number of mine production cuts, which, along with the closure of mines reaching end of production, pushed the zinc price to \$2,095 per tonne in 2016, an increase of 8.7% over 2015.

The following table shows the movement in zinc prices from 2007 to 2016:

	Year Ended 31 December									
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
	(\$ per tonne, except percentages)									
Zinc LME cash price.	3,248	1,870	1,658	2,158	2,190	1,946	1,909	2,164	1,928	2,095
% change	(0.7)	(42.4)	(11.3)	30.1	1.5	(11.1)	(1.9)	13.4	(10.9)	8.7

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

The last closing LME zinc cash price was \$2,553 per tonne as of 3 January 2017.

#### Indian Zinc Market

# Background

India holds substantial zinc resources — according to the Indian Minerals Yearbook 2014, India held around 36.7 million tonnes in zinc resources as on 1 April 2010. The USGS estimates that India's zinc reserves to be around 10 million tonnes, making it the sixth largest country in terms of zinc reserves globally. The Indian zinc industry has only two producers. The leading producer is Vedanta's majority-owned subsidiary, HZL, which had a 98% market share in India in fiscal 2014 for zinc ingots, according to the Indian Minerals Yearbook 2014. The other producer is Binani Zinc, with a 2% Indian market share in terms of sales volume in fiscal 2014.

#### Production

Based on Wood Mackenzie data, refined zinc production in India decreased 24.7% from 850 thousand tonnes in 2015 to 640 thousand tonnes in 2016, but will stabilize at 843 thousand tonnes per year from 2017 onwards.

# Consumption

According to Wood Mackenzie, consumption of refined zinc in India reached 685 thousand tonnes during 2016. The principal use of zinc in the Indian market is in the galvanizing sector, which is primarily used for tube, sheet and structural products. The other significant end-user of zinc in India is the alloys sector, similar to western world consumption trends, which has seen an increased demand for die-casting alloys. With expected infrastructure development such as roads, irrigation, construction, oil and gas and ports, there is expected to be increased demand for steel, thus providing significant opportunities for zinc in India. Wood Mackenzie forecasts Indian refined zinc demand to increase at a CAGR of 6.0% from 685 thousand tonnes in 2016 to 1,154 thousand tonnes in 2025.

## Pricing and tariff

Indian zinc prices track global prices as the metal is priced on the basis of the landed costs of imported metal.

The following table shows the customs duties that were applicable on zinc for the periods indicated:

	22 January 2007 to	29 April 2008 to	3 January 2009 to	1 March 2016 to
	28 April 2008	2 January 2009	29 February 2016	present
Zinc	5.0%	0.0%	5.0%	5.0%

In addition, the Finance Act (2 of 2004) of India levies an additional surcharge at the rate of 3% of the total customs duty payable, which is an increase from 2% prior to 1 March 2007.

#### Market Outlook

Global zinc outlook

According to Wood Mackenzie, global zinc demand will continue to grow over the next few years, at a CAGR of 2.5% between 2016 and 2020, to reach 15.7 million tonnes in 2020. Growth will be led by developing economies in Asia, while zinc consumption will remain broadly stable in Europe, the United States and Canada (which together have a 0.3% CAGR over the period).

China's zinc consumption will continue to drive the global zinc demand growth based on Wood Mackenzie's forecast. The total consumption of slab zinc in China is expected to grow from 6.8 million tonnes in 2016 to 7.8 million tonnes in 2020. That would translate to China's consumption growth at a CAGR of 3.3% between 2016 and 2020, which compares to global consumption growth excluding China at an expected CAGR of 1.7% for the same period.

According to Wood Mackenzie, between 2016 and 2035, 29 new zinc mines will enter production adding almost 1.2 million tonnes per annum at peak output. The average size of these operations is quite modest at around 40 thousand tonnes per annum. Expansions or production creep at 51 mines globally will add 3.5 million tonnes per annum. The 143 existing producers are forecast to close on reserve depletion by 2035 for the loss of 6.0 million tonnes per annum. And 22 mines which are expected to produce 2.5 million tonnes per annum in 2019 will produce only 2.2 million tonnes per annum by 2035 for a loss of 0.3 million tonnes per annum output by attrition.

## Indian zinc outlook

The Indian market is expected to remain positive, with strong growth in key user segments such as sheet galvanizing and zinc alloys for the construction segment. Indian zinc demand is expected to grow in the next few years based on a positive GDP forecast, at a CAGR of 5.9% between 2016 and 2020 based on Wood Mackenzie's forecast. The key components for growth are the ongoing and upcoming infrastructure projects, telecom and power projects and automobile sector.

# Copper

# Global Copper Market

# Background

Copper is a non-magnetic, reddish-coloured metal with a high electrical and thermal conductivity (second only to silver in electrical conductivity among all pure metals at room temperature), high tensile strength and resistance to corrosion.

The copper market is geographically diverse in terms of both production and consumption. The different geographical locations of the copper mines and the smelting and refining facilities have led to the development of "custom smelters/refineries", which tend to be heavily reliant on imported concentrates.

Copper consumption can be divided into three main product groups: copper wire rods, copper products and copper alloy products. According to Wood Mackenzie, the predominant use of copper has been the production of copper wire rods, which accounted for an estimated 74% of total global consumption in 2015. Wire rod is consumed in five main wire and cable markets which include general and industrial cable, utility power cable, telecommunication cable, other insulated wire and winding wire.

In the global copper consumer market, the construction segment accounted for 31% of copper consumption, followed by the electrical and electronic products segment (23%), the industrial machinery segment (11%), the transportation equipment segment (11%) and the consumer products segment (24%), as estimated by Wood Mackenzie for 2015.

The copper industry has three broad categories of producers:

- Miners, which mine the copper ore and produce copper concentrate;
- Custom smelters, which smelt and refine copper concentrate to produce copper metal; and
- Integrated producers, which mine copper ore from captive mines and produce copper metal either through smelting and refining or through leaching.

# Global Copper Reserves

Global copper reserves were estimated to be, as of 31 December 2015, 720 million tonnes, according to preliminary estimates by the U.S. Geological Survey ("USGS"). Chile, Australia, Peru, Mexico and the United States collectively account for 64% of world reserves.

	Reserves
	(in million
	tonnes)
Chile	210.0
Australia	88.0
Peru	82.0
Mexico	46.0
United States	33.0
China	30.0
Russia	30.0
Congo	20.0
Zambia	20.0
Canada	11.0
Other countries	150.0
World total (rounded)	720.0

Source: U.S. Geological Survey (USGS), Mineral Commodity Summaries, January 2016

### Refined copper consumption

Global refined copper demand increased from 21.9 million tonnes in 2015 to 22.3 million tonnes in 2016, an increase of 2.0%, according to Wood Mackenzie data.

Refined consumption grew in China, India, the rest of Asia, and Europe in 2016, but declined in the United States and Canada, Latin America, Russia & Caspian as well as Oceania. China was the largest end user of copper in 2016 with a 47.5% market share globally, providing Asia with a combined market share of 67.6%, followed by Europe (16.9%), the United States and Canada (8.9%) and Latin America (3.7%). Previously Europe and North America accounted for approximately 60% of copper consumption during the 1980s, but strong growth in Asia, led by China and Japan, has since significantly changed global consumption patterns. This trend of Asia's growing dominance in copper consumption is expected to continue.

The following table shows the regional consumption pattern of refined copper from 2013 to 2016:

	Year Ended 31 December											
	2013		20	2014		2015		2016				
Region	Volume	%	Volume	%	Volume	%	Volume	%				
	(thousands of tonnes, except percentages)											
China	9,165	44.4%	9,836	45.5%	10,196	46.6%	10,610	47.5%				
Rest of Asia	3,712	18.0%	3,921	18.1%	3,981	18.2%	3,986	17.9%				
Europe	3,467	16.8%	3,618	16.7%	3,720	17.0%	3,772	16.9%				
U.S. & Canada	1,952	9.4%	1,982	9.2%	2,003	9.1%	1,994	8.9%				
Latin America	934	4.5%	927	4.3%	875	4.0%	832	3.7%				
Russia & Caspian	716	3.5%	654	3.0%	422	1.9%	402	1.8%				
India	422	2.0%	431	2.0%	460	2.1%	490	2.2%				
Africa	208	1.0%	219	1.0%	224	1.0%	224	1.0%				
Oceania	85	0.4%	22	0.1%	11	0.0%	11	0.0%				
Total	20,660	100.0%	21,610	100.0%	21,892	100.0%	22,320	100.0%				

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

Note: "Russia & Caspian" includes Russia, Armenia, Georgia, Kazakhstan, Tajikistan and Uzbekistan; "Rest of Asia" includes Middle East

# Copper supply

Global mine production is the principal source of copper, with scrap recycling accounting for only a minor part of the aggregate supplies.

According to Wood Mackenzie's data, the five largest copper mining countries were Chile (28.6%), Peru (11.2%), China (7.4%), the United States (7.3%) and Australia (4.6%), which together accounted for approximately 59.1% of the total copper mined worldwide in 2016. The five largest copper mining companies were Codelco (9.3%), Freeport-McMoran (8.7%), Glencore (6.4%), BHP Billiton (5.8%), and Southern Copper (4.5%).

The major smelting locations include China (36.3%), Japan (8.4%), Chile (8.3%), Russia (4.2%) and India (4.1%), which together accounted for 61.3% of global production in 2016. The five largest copper smelting companies were Jiangxi Copper (5.9%), Glencore (5.8%), Codelco (5.6%), Tongling (4.2%), and Aurubis (3.7%).

The five largest refined copper producing countries were China (34.3%), Chile (11.5%), Japan (6.8%), the United States (5.2%) and Russia (3.7%), which together accounted for about 61.5% of the total refined copper produced worldwide in 2016. The five largest copper refining companies were Codelco (6.3%), Freeport-McMoran (5.3%), Aurubis (4.8%), Jiangxi Copper (4.7%), and Glencore (4.7%).

Global refined copper production increased from 21.9 million tonnes in 2015 to 23.0 million tonnes in 2016, an increase of 5.0%.

The following table shows the regional production pattern of refined copper from 2013 to 2016:

	Year Ended 31 December										
	2013	2014	2015	2016							
Region	Volume	%	Volume	<b>%</b>	Volume	%	Volume	<b>%</b>			
	(thousands of tonnes, except percentages)										
China	6,330	30.4%	6,880	31.7%	6,981	31.8%	7,895	34.3%			
Latin America	3,747	18.0%	3,726	17.2%	3,721	17.0%	3,727	16.2%			
Europe	2,875	13.8%	2,926	13.5%	2,927	13.3%	2,876	12.5%			
Rest of Asia	2,786	13.4%	2,841	13.1%	2,780	12.7%	3,099	13.4%			
U.S. & Canada	1,353	6.5%	1,398	6.4%	1,477	6.7%	1,526	6.6%			
Russia & Caspian	1,330	6.4%	1,273	5.9%	1,383	6.3%	1,396	6.1%			
Africa	1,292	6.2%	1,405	6.5%	1,414	6.4%	1,270	5.5%			
India	619	3.0%	762	3.5%	791	3.6%	762	3.3%			
Oceania	483	2.3%	506	2.3%	467	2.1%	493	2.1%			
Total	20,815	100.0%	21,717	100.0%	21,942	100.0%	23,043	100.0%			

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

Note: "Russia &Caspian" includes Russia, Armenia, Georgia, Kazakhstan, Tajikistan and Uzbekistan; "Rest of Asia" includes Middle East

## Pricing

Copper is traded on the LME. Although prices are determined by LME price movements, producers normally charge a regional premium that is market driven. Copper price fell by 37.6% between 2011 and 2015 on the back of slowing Chinese growth and increasing production due to continued investments, and continued to decrease in 2016, falling another 11.6% to \$4,855 per tonne as a result of strong supply and elevated stocks. However Q4 2016 saw prices rise back as Chinese demand turned out to be stronger than expected in 2016 and inventories started decreasing.

The following table shows the movement in copper prices from 2007 to 2016:

	Year Ended 31 December									
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
	(\$ per tonne, except percentages)									
Copper LME cash										
price	7,125	6,951	5,163	7,539	8,810	7,949	7,322	6,862	5,494	4,855
% change	5.9	(2.4)	(25.7)	46.0	16.9	(9.8)	(7.9)	(6.3)	(19.9)	(11.6)

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

The last closing LME copper cash price was \$5,574 per tonne as of 3 January 2017.

Since peak levels of \$1,080 per tonne in 2006, treatment and refining charges (25% concentrate) have fallen significantly, reflecting a continuing tightening in the physical concentrate demand/supply balance while inventories of refined metal remained at elevated levels above 70 days of consumption

since 2012, vs. 50 days in 2007. In 2016, spot quotes averaged \$620 per tonne, representing a 9.0% decline on 2015 level according to Wood Mackenzie data. China's continuing demand for imported copper concentrates and the recent emergence of increasing disruptions to global mine supply saw spot TcRc rates decline during Q4 2016. Treatment and refining charges are expected to remain under pressure over the short to medium term as global smelting capcity outpaces mined production growth; Wood Mackenzie expects that concentrate market will approach equilibrium by 2025, with a long term estimate for treatment and refining charges (25% concentrate) of approximately \$670 per tonne in 2016 real terms.

The following table shows the movement in copper spot annual average TcRc rates from 2007 to 2016 in nominal dollars:

	Year Ended 31 December									
	2007	2008	2009	2010		2012	2013	2014	2015	2016
	(\$ per tonne, except percentages)									
TcRc (25%										
concentrate)	382	287	478	296	357	405	446	586	682	620
% change	(64.6)	(25.0)	66.7	(38.0)	20.4	13.4	10.2	31.4	16.3	(9.0)

Source: Wood Mackenzie Metals Concentrates Market Service Report — Long Term Outlook, December 2016

# Indian Copper Market

# Background

The Indian copper industry consists primarily of custom smelters as there are limited copper deposits in the country. The available deposits are owned by the government-owned Hindustan Copper Limited ("HCL"), which was the only producer in India until 1995 and has transformed significantly with the entry of Birla Copper, now owned by Hindalco. The Indian industry can be classified into two broad categories — manufacturers of refined copper (copper cathodes) and manufacturers of copper products. Of the three manufacturers of refined copper, HCL is the only primary producer, which mines and refines copper. Hindalco and Vedanta Limited process primarily imported copper concentrate to produce end products such as copper bars, rods and wires.

The Indian copper industry opened to private sector investment in 1992. Prior to 1992, the industry was dominated by HCL, a public sector undertaking ("PSU"), owned by the GoI. HCL was incorporated in November 1967 with the objectives of carrying out mining operations and producing copper and related products.

# Production and Consumption

According to the World Copper Factbook 2012 by the International Copper Study Group, in 2011, India's per capita consumption of copper (0.56kg per person) is significantly less than that of China (5.82kg per person) and other developed nations including Germany (16.32kg per person), Spain (7.89kg per person) and the United States (5.64kg per person). India's consumption of copper is dominated by electrical, telecom, engineering, construction and transport. There is an imbalance between India's smelting/refining capacity and its limited production capacity in copper mining. From 2013 to 2016, based on Wood Mackenzie data, Indian refined copper consumption increased at a CAGR of 5.1% to reach 490 thousand tonnes in 2016, while over the same period of time, copper mining output in India decreased by 42.4% with 19 thousand tonnes of copper mined in 2016. Wood Mackenzie expects refined copper demand in India to increase to 939 thousand tonnes in 2025 growing at a CAGR of 7.5% between 2016 and 2025.

# Pricing and tariff

Indian copper prices track global prices as the metal is priced on the basis of landed costs of imported metal. The following table sets out the customs duties that were applicable on copper for the period indicated:

	22 January 2007 to	29 April 2008 to	3 January 2009 to	28 February 2011 to	
	28 April 2008	2 January 2009	27 February 2011	Present	
Copper	5%	5%	5%	5%	
Copper concentrate	2%	2%	2%	2.5%	

In addition, the Finance Act (2 of 2004) of India, which has been in effect since 8 July 2004, levies an additional surcharge at the rate of 2% of the total customs duty payable, which has been further increased to 3% of the total customs duty payable effective as of 1 March 2007.

Further, on 1 March 2011, the GoI announced an exemption from import duty on copper concentrate up to an amount equivalent to the customs duty leviable on the value of gold and silver contained in such copper concentrate.

## Market Outlook

## Global copper outlook

According to Wood Mackenzie, the surplus in refined copper production is expected to continue in the near term as long project lead time means that new production is still coming to the market despite slower demand.

However, copper markets are expected to tighten as output growth slows, with reserve depletion and falling head grades triggering a fall in base case production after 2019. According to Wood Mackenzie, refined copper consumption will grow at a CAGR of 1.7% between 2016 and 2025, reaching 25.9 million tonnes in 2025. Mined production from existing assets and highly probable projects will decrease at a CAGR of 1.5% over the same period, with 17.6 million tonnes mined in 2025. This imbalance will support higher copper prices and new investments in production capacity.

## Indian copper outlook

India's copper market is expected to remain positive with strong growth in key user segments such as power, construction and engineering. Indian refined copper consumption is expected to continue to grow strongly in line with the overall growth of the economy, at a CAGR of 7.5% between 2016 and 2025 according to Wood Mackenzie.

The five major sectors that consume the majority of the copper in India are the electrical, telecom, engineering, construction and transport sectors. These copper consuming sectors have been recognised by the GoI as key infrastructure sectors to sustain the growth of the Indian economy. The GoI's Twelfth Five Year Plan (draft, 2012 — 2017) included addition of approximately 88,000 megawatts of power capacity and 1,229 million tonnes of new capacity in ports, the expansion of India's four-laned and six-laned highway systems and an expansion of its railway system's freight capacity.

#### Iron Ore

# Global Iron Ore Market

#### Background

Iron ore is the key raw material used to make pig iron and steel. According to the Mineral Information Institute, 98% of the mined iron ore is used to make steel.

The iron ore itself is usually found in the form of magnetite (Fe3O4), hematite (Fe2O3), goethite, limonite or siderite. Hematite is also known as "natural ore". The name refers to the early years of mining, when certain hematite ores contained 66% iron and could be fed directly into iron making blast furnaces.

The iron ore industry has two broad categories of producers:

- 1. Mining companies with a focus on extracting different metals and minerals including iron ore; and
- 2. Steel companies, who mine and produce iron ore to benefit from security of supply of its key raw materials.

Historically, steel producers have looked to manage iron ore prices by securing the supply of iron ore through long-term contracts, strategic investments directly in iron ore projects and acquisition of iron ore producers.

#### World Iron Ore Reserves

Global crude iron ore reserves were estimated to be, as of 31 December 2015, 190 million tonnes, according to preliminary estimates by the U.S. Geological Survey ("USGS"). Australia, Russia, Brazil, China and the United States collectively account for 72% of world reserves.

The following table shows world iron ore reserves by country:

	Crude Ore	Iron Content
	(in billio	on tonnes)
Australia	54.0	24.0
Russia	25.0	14.0
Brazil	23.0	12.0
China	23.0	7.2
United States	11.5	3.5
India	8.1	5.2
Ukraine	6.5	2.3
Canada	6.3	2.3
Sweden	3.5	2.2
Iran	2.7	1.5
Kazakhstan	2.5	0.9
South Africa	1.0	0.7
Other countries	18.0	9.5
World total (rounded)	185.1	<u>85.3</u>

Source: U.S. Geological Survey (USGS), Mineral Commodity Summaries, January 2016

# Iron ore consumption

Chinese steel consumption has fueled demand for iron ore between 2000 and 2013, as Chinese apparent finished steel demand grew at a CAGR of 14.4% over the period 2000-2013 based on estimates from Wood Mackenzie. However steel demand in China contracted at a CAGR of 2.1% per

annum between 2013 and 2016, falling from 717 million tonnes in 2013 to 672 million tonnes in 2016. As a result, global steel consumption has remained broadly flat: finished steel consumption has decreased from 1,516 million tonnes in 2013 to 1,492 million tonnes in 2016, representing a decrease of 1.6% over the period.

The following table shows the apparent finished steel consumption pattern from 2013 to 2016:

_	Year Ended 31 December							
Region	2013	2014	2015	2016				
	(mi	llion of tonnes,	except percentag	ges)				
China	717	701	661	672				
Change (%)	11.0	(2.2)	(5.7)	1.6				
India	74	76	80	82				
Change (%)	1.8	3.3	5.3	2.8				
Rest of the world	726	761	746	738				
Change (%)		4.8	(2.0)	(1.0)				
Total	1,516	1,538	1,487	1,492				
Change (%)	6.1	1.4	(3.3)	0.3				

This slowdown in the Chinese steel industry has directly impacted global iron ore demand, which has also remained flat over the same period. Between 2013 and 2016, the world's production of iron ore decreased by 0.3% to 2,025 million tonnes.

The following table shows the regional consumption pattern of iron ore from 2013 to 2016:

	Year Ended 31 December											
	2013		20	2014		2015		2016				
Region	Volume		Volume	<b>%</b>	Volume	%	Volume	<b>%</b>				
		(million of tonnes, except percentages)										
China	1,217	59.9%	1,261	60.1%	1,215	59.6%	1,207	59.6%				
Rest of Asia	266	13.1%	280	13.3%	276	13.5%	275	13.6%				
Europe	151	7.4%	157	7.5%	155	7.6%	152	7.5%				
CIS	139	6.8%	135	6.5%	132	6.5%	136	6.7%				
India	105	5.2%	110	5.3%	116	5.7%	116	5.8%				
North America	75	3.7%	79	3.8%	70	3.4%	64	3.2%				
South America	56	2.7%	55	2.6%	55	2.7%	53	2.6%				
Africa	17	0.8%	16	0.8%	14	0.7%	14	0.7%				
Oceania	6	0.3%	6	0.3%	6	0.3%	6	0.3%				
Total	2,031	100.0%	2,098	100.0%	2,038	100.0%	2,025	100.0%				

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

Note: "Rest of Asia" includes Middle East

Iron ore supply

The largest iron ore producing countries in 2016 are Australia, Brazil, China and India as reported by Wood Mackenzie, and these countries collectively account for 75% of the world's production.

The following table shows the regional production pattern of iron ore from 2013 to 2016:

Year Ended 31 December

Region	2013		2014		2015		2016	
	Volume	<b>%</b>	Volume	<b>%</b>	Volume		Volume	%
	(million of tonnes, except percentages)							
Oceania	626	27.8%	751	32.6%	806	36.6%	851	38.7%
South America	457	20.3%	489	21.2%	507	23.0%	495	22.5%
China	425	18.9%	361	15.7%	269	12.2%	219	10.0%
CIS	210	9.3%	204	8.8%	198	9.0%	193	8.8%
India	148	6.6%	128	5.6%	112	5.1%	132	6.0%
North America	126	5.6%	116	5.0%	103	4.7%	100	4.5%
Rest of Asia	116	5.1%	98	4.2%	77	3.5%	81	3.7%
Africa	104	4.6%	113	4.9%	92	4.2%	89	4.1%
Europe	41	1.8%	44	1.9%	39	1.8%	39	1.8%
Total	2,252	100.0%	2,303	100.0%	2,205	100.0%	2,199	100.0%

 $Source: \ Wood\ Mackenzie\ Metals\ Market\ Service\ Report-Long\ Term\ Outlook,\ December\ 2016$ 

Note: "Rest of Asia" includes Middle East

The iron ore market is highly consolidated with a few producers accounting for the majority of supply. According to Wood Mackenzie, the four largest iron ore mining companies are Vale (18.4% of global iron ore production in 2016), Rio Tinto (14.9%), BHP Billiton (12.2%), and Fortescue Metals Group (8.9%). These four companies accounted for 54.4% of global iron ore production and approximately 68.8% of the supply of seaborne iron ore trade in 2016.

#### World seaborne iron ore trade

Due to the disparity in regional supply and demand, particularly in China, there has been a significant increase in world exports of iron ore over the last few years. Wood Mackenzie estimated world trade had reached 1,532 million tonnes in 2016, an increase of 15.7% from 2013.

During 2016, Australian producers exported 838 million tonnes, while Brazil exported approximately 375 million tonnes of iron ore. These two countries together represented 79.2% of all world exports of iron ore in 2016. In addition to Australia and Brazil, Canada, CIS and the African continent are also significant exporters of iron ore.

Although its iron ore consumption is slowing, China remains by far the main destination for world iron ore shipments, importing 1,020 million tonnes in 2016, representing a 69.6% share of the total world imports. This trend is expected to continue as iron ore quality in China is inferior and needs to be blended with higher quality iron ore for its steel production requirements.

The below table shows historical world seaborne iron ore trade for the last four years with major exporting and importing countries:

_	Year Ended 31 December					
_	2013	2014	2015	2016		
World iron ore exports	1,324	1,461	1,467	1,532		
Change (%)	10.1	10.4	0.4	4.4		
Top 5 exporters (2016)						
Australia	605	748	799	838		
Brazil	331	345	366	375		
South Africa	61	65	64	62		
Canada	38	41	37	42		
Ukraine	38	40	45	39		
World iron ore imports	1,276	1,413	1,416	1,466		
Change (%)	7.5	10.7	0.3	3.5		
Top 5 importers (2016)						
China	832	936	953	1,020		
Japan	136	136	131	129		
South Korea	63	74	73	70		
Germany	40	43	42	41		
Taiwan	22	23	24	24		

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

#### Pricing

Iron ore has seen significant price decreases in recent years due to ample supply in the market and slowdown of global demand. Prices have decreased by 59.2% between 2013 and 2015, but rebounded slightly and rose by 4.4% in 2016, driven by China's ongoing commitment to supply side reform aimed at coal and steel.

The following table shows the movement in iron ore prices from 2007 to 2016:

	Year Ended 31 December									
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
	(\$ per tonne, except percentages)									
Iron Ore Fines (62%										
Fe, CFR NE										
China)	76.1	115.1	79.9	146.9	167.8	128.5	135.4	96.8	55.2	57.6
% change	30.7	51.3	(30.6)	83.9	14.3	(23.4)	5.3	(28.5)	(43.0)	4.4

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

# Indian Iron Ore Market

# Background

India is a self-sufficient producer in iron ore for domestic steel production. India has been a traditional exporter of iron ore, with most of the exports going to China, Japan, South Korea and other Far Eastern countries. India has substantial iron ore resources, and has around 28.5 billion tonnes of

iron ore resources in estimates as of 1 April 2010 as reported in the Indian Minerals Yearbook 2014. According to the estimates by USGS, India is the sixth largest country in terms of size of crude ore reserves in 2015, at 8.1 billion tonnes of crude ore. Key players include National Mineral Development Corporation ("NMDC"), Vedanta Limited, Kudremukh Iron Ore Co. ("KIOCL"), Rungta Mines Ltd ("Rungta"), Mineral Sales Private Limited ("MSPL") and Essel. Apart from these, some of the integrated steel companies like Steel Authority of India and Tata Iron and Steel Companies have their own captive mines.

# Supply and Demand

As of 2016, based on Wood Mackenzie data, India was producing approximately 132 million tonnes of iron ore, of which approximately 16 million tonnes is for export. From 2009 to 2015, India's iron ore production has decreased by 45.9% from 208 to 112 million tonnes while exports have also fallen from 114 million tonnes to around 4 million tonnes. At the same time, India started importing iron ore, with a peak at 10 million tonnes in 2015. The sharp decrease in both production and exports can be attributed to mining ban and suspensions of mining activities that were in place since 2011 and 2012 in the Indian states of Karnataka and Goa, respectively. On 18 April 2013, the Indian Supreme Court has eased the ban on mining in the state of Karnataka by allowing around 100 iron ore mines to restart operation, although production has not fully recovered to historical levels as permitting remains strict.

The table below shows India's historical iron ore production, consumption, imports and exports:

	Year Ended 31 December									
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
	(millions of tonnes)									
Production	178	193	208	205	182	136	148	128	112	132
Consumption	85	90	92	97	100	104	105	110	116	116
Imports	0	0	1	1	1	3	1	7	10	4
Exports	91	101	114	108	81	33	16	10	4	16

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

#### Pricing and tariff

As India is self-sufficient in iron ore with minimal quantities being imported, the domestic market is localised in nature with local demand and supply playing a major role in pricing. In addition, logistic costs, local duty structures and other operating costs affect prices unevenly across the different regional markets. This results in prices at regional markets such as Odisha, Chattisgarh, Karnataka and Goa having a disparity against international prices, while still tracking the general trend in international prices. As the largest producer of iron ore in India, particularly in the Chattisgarh and Karnataka regions, the government-owned agency NMDC determines contract prices. Such prices are reactionary to international prices, with the NMDC adjusting domestic prices to align with international prices with a time lag.

Prior to June 2008, the GoI had set an export duty on iron ore fines with less than 62% iron content of Rs. 50 per tonne while the export duty on iron ore fines with an iron content of 62% or more and all grades of lumps was Rs. 300 per tonne. On 13 June 2008, the GoI changed the export duty on iron ore to 15% ad valorem on the FOB value of exports. On 28 February 2011, India raised the duty to 20% from 5% on fines and to 20% from 15% on lumps with effect from 1 March 2011. In 30 December 2011, the GoI raised the rate of export duty on both iron ore fines and lumps to 30%. From

1 May 2015, export duty in iron ore lumps and fines with less than 58% iron content was reduced to 10%. However, since 1 March 2016, export duty on lumps and fines with less than 58% iron content has been reduced to zero, while lumps and fines with more than 58% iron ore content continue to be charged with a 30% export duty.

	13 June 2008 to	1 March 2011 to	30 December 2011
	<b>28 February 2011</b>	29 December 2011	to Present
Lumps	15%	20%	30%
Fines	5%	20%	30%

#### Market Outlook

#### Global Iron Ore Outlook

The slowdown in Chinese steel growth has severely impacted iron ore markets over the last few years. Wood Mackenzie estimates that Chinese demand for iron ore peaked in 2014 and will continue to slowly decrease over time as scrap usage rises. The rebound in iron ore prices in 2016 was relatively unsupported by fundamentals and kept marginal cost producers cash positive. Medium term outlook still looks challenging, as the low point in demand coincides with rapid growth in low cost seaborne supply.

According to Wood Mackenzie, iron ore markets will gradually tighten as a more concentrated industry structure post rationalisation leads to a return of pricing power. Wood Mackenzie estimates a long term average of \$60 per tonne for iron ore fines (62% Fe, CFR NE China, in 2016 real terms) towards 2025.

#### Indian Iron Ore Outlook

According to Wood Mackenzie, growth in iron ore consumption in India will outpace China and the rest of the world, as Indian iron ore demand will grow at a CAGR of 2.6% between 2016 and 2025, vs. a negative 0.6% for China and a positive 0.1% for world excluding India. Indian iron ore consumption is expected to reach 147 million tonnes in 2025, which will be in line with domestic production.

#### Aluminium

#### Global Aluminium Market

# Background

Aluminium is lightweight in relation to its strength, durability and resistance to corrosion. It can be extruded, rolled, formed and painted for a wide variety of uses.

The raw material from which aluminium is produced is bauxite, which is a very common mineral found mainly in tropical regions. It normally occurs close to the surface and can be mined by open-pit methods. Bauxite is refined into alumina which is used to produce aluminium. Typically, bauxite ranges from 35% to 60% contained alumina. There are several different types of bauxite, and alumina refineries are usually designed to treat a specific type. The majority of alumina refineries are therefore integrated with mines.

The importance of different sectors in aluminium demand varies significantly between developed and developing nations. In mature economies, transport plays a more important role in aluminium demand than construction. As estimated by Wood Mackenzie, in 2016, the four largest sectors of

end-uses for aluminium in mature economies like Germany, Japan, South Korea, the United States and Candada were transport (38%), packaging (19%), construction (15%) and machinery (10%). In comparison, in 2016, the four largest sectors of end-uses for aluminium in China and India were construction (31%), followed by transport (20%), consumer goods (17%) and electrical (13%).

#### Aluminium consumption

Based on Wood Mackenzie data, world primary aluminium consumption increased from 50.2 million tonnes in 2013 to 59.0 million tonnes in 2016, at a CAGR of 5.5%. Chinese demand is fueling the growth, as China accounted for 51.5% of total global consumption in 2016. Between 2013 and 2016, China's demand for primary aluminium increased at a CAGR of 8.2%, compared to an increase of 2.3% for world demand excluding China.

The following table shows the regional consumption of primary aluminium from 2013 to 2016:

	Year Ended 31 December								
	2013		20	2014		2015		2016	
Region	Volume	<b>%</b>	Volume	<b>%</b>	Volume		Volume	<b>%</b>	
	(thousands of tonnes, except percentages)								
China	23,941	47.7%	26,600	49.3%	28,452	50.4%	30,356	51.5%	
Europe	8,539	17.0%	8,778	16.3%	8,971	15.9%	9,130	15.5%	
Rest of Asia	6,351	12.7%	6,823	12.6%	6,869	12.2%	7,035	11.9%	
U.S. & Canada	5,399	10.8%	5,700	10.6%	5,938	10.5%	6,051	10.3%	
Latin America	2,244	4.5%	2,214	4.1%	2,213	3.9%	2,201	3.7%	
India	1,728	3.4%	1,767	3.3%	1,939	3.4%	2,046	3.5%	
Russia & Caspian	890	1.8%	914	1.7%	893	1.6%	902	1.5%	
Africa	553	1.1%	619	1.1%	634	1.1%	654	1.1%	
Oceania	516	1.0%	542	1.0%	554	1.0%	574	1.0%	
Total	50,161	100.0%	53,957	100.0%	56,463	100.0%	58,950	100.0%	

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

Note: "Russia & Caspian" includes Russia, Armenia, Georgia, Kazakhstan, Tajikistan and Uzbekistan; "Rest of Asia" includes Middle East

# Aluminium supply

Aluminium production has become increasingly more concentrated in recent years, with the leading ten producers accounting for 50.5% of world primary aluminium production in 2016 as reported by Wood Mackenzie. The five largest primary aluminium producing companies are Weiqiao Textile Group (9.8%), Rio Tinto (6.3%), UC Rusal (6.2%), Xinfa Group (5.9%) and Chalco (4.4%), which together accounted for approximately 32.5% of the total primary aluminium produced worldwide in 2016.

Global production of primary aluminium increased from 50.6 million tonnes in 2013 to 59.3 million tonnes in 2016, at a CAGR of 5.4%. In 2016, North America, Europe and China together accounted for approximately 69.3%, with China alone accounting for 54.9%, of global primary aluminium production.

The following table shows the regional production of primary aluminium from 2013 to 2016:

Year Ended 31 December 2013 2014 2016 2015 Region Volume % Volume % Volume % Volume % (thousands of tonnes, except percentages) China ..... 24,900 49.2% 27,850 51.9% 30,800 54.0% 32,500 54.9%U.S. & Canada ...... 4,584 8.5%4,465 7.8% 4,023 6.8%4,917 9.7% Rest of Asia ..... 6,039 6,438 10.9%4,746 9.4% 5,814 10.8%10.6%Europe..... 4,258 8.4%4,276 8.0%4,418 7.8% 4,530 7.6%Russia & Caspian ..... 4,257 8.4% 3,866 7.2% 3,930 6.9% 4,016 6.8% Oceania ..... 1,977 3.3% 2,108 4.2%2,033 3.8% 1,978 3.5% Latin America..... 1,906 3.8% 1,542 2.9% 1,325 2.3% 1,352 2.3% Africa..... 1,810 3.6% 1,747 3.3% 1,687 3.0% 1,689 2.9% 4.6%India..... 1,703 3.4% 1,941 3.6% 2,357 4.1% 2,726 50,604 53,653  $100.0\,\%$ 59,250 Total .....  $100.0\,\%$ 56,998 100.0%100.0%

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

Note: "Russia & Caspian" includes Russia, Armenia, Georgia, Kazakhstan, Tajikistan and Uzbekistan; "Rest of Asia" includes Middle East

#### Alumina

Alumina is a key raw material for aluminium production. Generally it takes two tonnes of alumina to produce one tonne of primary aluminium. According to data compiled by Wood Mackenzie, in 2016, the five largest alumina producing companies are Chalco (10.8%), Weiqiao Textile Group (9.1%), Xinfa Group (8.8%), Alcoa (6.8%), and Rio Tinto (6.7%), which together accounted for approximately 42.3% of the total alumina produced worldwide.

The following table shows the regional production of alumina from 2013 to 2016:

	Year Ended 31 December								
	2013		20	2014		2015		2016	
Region	Volume	<b>%</b>	Volume	<b>%</b>	Volume	<b>%</b>	Volume		
	(thousands of tonnes, except percentages)								
China	47,200	44.0%	51,900	46.4%	58,300	49.0%	61,500	50.9%	
Oceania	21,758	20.3%	20,761	18.6%	20,285	17.1%	20,876	17.3%	
Latin America	13,552	12.6%	13,765	12.3%	13,270	11.2%	12,735	10.5%	
Europe	8,406	7.8%	8,319	7.4%	8,427	7.1%	8,300	6.9%	
U.S. & Canada	6,771	6.3%	6,579	5.9%	6,451	5.4%	3,938	3.3%	
Russia & Caspian	4,654	4.3%	4,368	3.9%	4,426	3.7%	4,454	3.7%	
India	3,731	3.5%	4,943	4.4%	5,531	4.7%	6,044	5.0%	
Rerst of Asia	1,109	1.0%	1,175	1.1%	2,194	1.8%	2,942	2.4%	
Africa	0	0.0%	0	0.0%	0	0.0%	0	0.0%	
Total	107,180	100.0%	111,810	100.0%	118,883	100.0%	120,789	100.0%	

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

Note: "Russia & Caspian" includes Russia, Armenia, Georgia, Kazakhstan, Tajikistan and Uzbekistan; "Rest of Asia" includes Middle East

The following table shows the estimated global demand-supply balance for alumina from 2013 to 2016:

-	Fiscal Year Ended 31 December					
_	2013	2014	2015	2016		
		(thousands	of tonnes)			
Global alumina surplus/(deficit)	1,438	100	740	(1,686)		

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

#### Bauxite

Bauxite, the principal raw material used in the production of alumina, is typically open-pit mined in very large-scale operations. Between 2.0 to 3.6 dry tonnes of bauxite are usually required to make one tonne of alumina (depending on ore type, alumina content and variables such as proportion of reactive silica and organic matter). Based on data from the USGS as reported in January 2016, Guinea has the largest bauxite reserves in the world (26%), followed by Australia (22%), Brazil (9%), Vietnam (8%), Jamaica (7%) and Indonesia (34%).

The table below shows the world reserves of alumina:

	Reserves
	(million
	tonnes):
Guinea	7,400
Australia	6,200
Brazil	2,600
Vietnam	2,100
Jamaica	2,000
Indonesia	1,000
Guyana	850
China	830
India	590
Suriname	580
Venezuela	320
Greece	250
Russia	200
Kazakhstan	160
Malaysia	40
United States	20
Other countries	2,400
World total (rounded)	28,000

Source: U.S. Geological Survey (USGS), Mineral Commodity Summaries, January 2016

According to the Wood Mackenzie, global production of bauxite reached 298 million tonnes in 2016. Australia, China, Brazil, Ginea and India are the largest bauxite producing countries, representing 87.6% of world's total production in 2016.

The following table shows the regional production of bauxite from 2013 to 2016:

Year Ended 31 December

	201	13	20	14	20	15	20	16
Region	Volume	%	Volume	<b>%</b>	Volume	%	Volume	%
			(thousand	ls of tonnes	, except perc	entages)		
Oceania	81,420	26.3%	80,146	29.1%	84,513	27.1%	86,350	29.0%
China	73,827	23.9%	87,296	31.6%	91,556	29.3%	91,385	30.7%
Rest of Asia	57,077	18.5%	6,908	2.5%	35,020	11.2%	7,439	2.5%
Latin America	46,703	15.1%	48,850	17.7%	47,297	15.2%	46,825	15.7%
Africa	19,847	6.4%	21,089	7.6%	20,458	6.6%	30,357	10.2%
India	16,576	5.4%	19,125	6.9%	19,687	6.3%	20,600	6.9%
Russia & Caspian	9,917	3.2%	9,093	3.3%	9,798	3.1%	10,098	3.4%
Europe	3,840	1.2%	3,230	1.2%	3,598	1.2%	4,332	1.5%
U.S. & Canada	128	0.0%	126	0.0%	126	0.0%	126	0.0%
Total	309,336	100.0%	275,864	100.0%	312,053	100.0%	297,513	100.0%

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

Note: "Russia & Caspian" includes Russia, Armenia, Georgia, Kazakhstan, Tajikistan and Uzbekistan; "Rest of Asia" includes Middle East

# Pricing

Aluminium is an LME traded metal. It is either sold directly to consumers or on a terminal market. The price is based on LME price but producers are also able to charge a regional price premium, which generally reflects the cost of obtaining the metal from an alternative source.

Alumina prices are negotiated on an individual basis between buyers and sellers but are usually determined by reference to the LME price for aluminium. The negotiated agreements generally take the form of long-term contracts, but fixed prices can be negotiated for shorter periods and a relatively small spot market also exists.

The following table shows the movement in aluminium and alumina prices from 2007 to 2016:

	Fiscal Year Ended 31 December									
	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
	(\$ per tonne, except percentages)									
Aluminium										
LME cash price	2,639	2,571	1,667	2,173	2,395	2,019	1,846	1,866	1,663	1,603
% change	2.8	(2.6)	(35.2)	30.3	10.2	(15.7)	(8.6)	1.1	(10.9)	(3.6)
Alumina										
Spot price	353	362	245	333	374	319	327	330	301	253
% change	(16.0)	2.5	(32.2)	35.6	12.5	(14.9)	2.5	1.1	(8.7)	(16.0)
Ratio										
Alumina/ aluminium (%)	13.4	14.1	14.7	15.3	15.6	15.8	17.7	17.7	18.1	15.8

Source: Wood Mackenzie Metals Market Service Report — Long Term Outlook, December 2016

The LME aluminium cash price was \$1,702 per tonne as of 3 January 2017.

#### Indian Aluminium Market

# Background

India has been producing primary aluminium since 1938, and over the years, the model that prevailed was of a fully integrated operation with access to bauxite, alumina and power. As this model consolidated, the corporate structure of the aluminium industry also changed, with smaller regional producers being absorbed or merged to form larger integrated players with international presence and, in the case of the Company, an international listing.

India possesses considerable bauxite resources, estimated at 3.5 billion tonnes in 2010, according to the Indian Minerals Yearbook 2014. In Orissa, bauxite resources are estimated to be 1.5 billion tonnes, with large reserves in Panchpatmali, Pottangi and Baphalimali. In Andhra Pradesh, there are 0.6 billion tonnes, with large bauxite concentrations in Saparla and Jarella. At current extraction rates, these two states alone have the equivalent of over 100 years of Indian demand. Even using the more conservative the USGS reserve estimate, India has reserves equivalent to almost 30 years at current output. According to the USGS, India has the ninth largest reserves of bauxite ore in the world, with total recoverable reserves estimated at 590 million tonnes. These bauxite ore reserves are high grade and require less energy to refine, thus resulting in significant cost advantages for Indian aluminium producers.

#### Supply and demand

As of 30 September 2016, there are five refineries and five smelters operating in India, owned by four producing companies: 87% state-owned National Aluminium Company Limited, privately held Hindalco, Vedanta Limited and BALCO, which is owned 49% by the Indian government and 51% by Vedanta Limited.

The aluminium industry in India has traditionally been largely self-sufficient. Primary aluminium production has broadly kept pace with demand betwee the 1980's and 2011, with the country being a small net exporter. Following a surge in aluminium demand, India has experienced a small supply deficit in primary aluminium production between 2012 and 2013 according to the estimates by Wood Mackenzie. Significant new production capacity has been built since then, as installed capacity has grown from 1.7 million tonnes in 2013 to 2.7 million tonnes in 2016, while domestic consumption rose from 1.7 million tonnes to 2.0 million tonnes over the same period. Supply growth will continue and installed capacity is estimated to reach 3.8 million tonnes in 2019. Local demand will gradually catch up; growing at a 7.0% CAGR between 2016 and 2025 is estimated to reach 3.7 million tonnes that year.

# Pricing and tariff

Domestic aluminium prices track global price trends as producers usually price the metal at a marginal discount to the landed cost of imported metal. Though value-added product prices also track metal price movement, they usually have relatively less volatility and command a premium reflecting the degree of value addition and quality, as indicated by the brand.

The following table shows the customs duties that were applicable for the periods indicated:

	29 April 2008 to	3 January 2009 to	1st March 2016 to
	2 January 2009	29 February 2016	present
Primary Aluminium	5%	5%	7.5%

In addition, the Finance Act (2 of 2004) of India, which has been in effect since 8 July 2004, levies an additional surcharge at the rate of 2% of the total customs duty payable, which has been further increased to 3% of the total customs duty payable effective 1 March 2007.

Pursuant to a notification dated 1 March 2013, a customs duty of 10% was introduced by the GoI on bauxite (natural), in calcined and non-calcined form.

#### Market Outlook

#### Global aluminium outlook

According to Wood Mackenzie, global primary aluminium production is forecasted to grow at a 3.7% CAGR between 2016 and 2020, then at a 2.3% CAGR to reach 76.3 million tonnes in 2025. China will contribute 65% of the increase in volume, and its annual production will be 41.6 million tonnes in 2025.

Collectively, Wood Mackenzie expects the aluminium market to remain in surplus until 2020 as supply outpaces consumption. The largest supply glut is projected to take place in 2017 when production will exceed consumption by 0.9 million tonnes before tightening slightly in 2018 onwards.

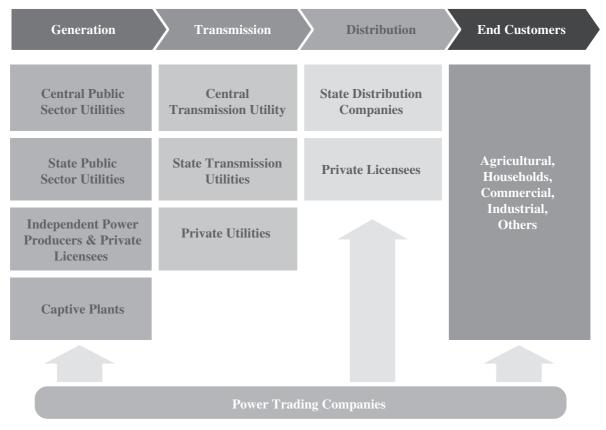
#### Indian aluminium outlook

India will account for 10% of the increase in primary aluminium production globally between 2016 and 2025. India's aluminium consumption will increase at a 7.1% CAGR between 2016 and 2020, then at a 6.9% CAGR to reach 3.7 million tonnes in 2025. This growth will be fuelled by India's demand for housing, retail and office space. Indian smelters form part of integrated chains, stretching back to bauxite, alumina and forward into semi-fabricating operations. Indian smelters are also endowed with their own captive power plants and favourable labour costs.

#### **Commercial Power Generation Business**

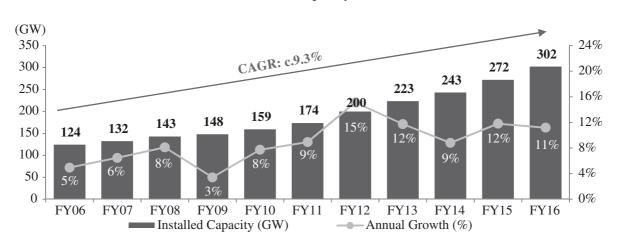
#### Organisation of the Power Industry

Please see below for a summary on the organization of the India Power industry. State, Central and Private entities each play important roles along the generation, transmission and distribution value chain for the sector.



# Overview of the Indian Power Sector

The Indian power sector has grown significantly in size and capacity since independence and is one of the largest power markets globally today. Over the past 10 years, installed capacity grew strongly at 9.3% per annum to 302GW in fiscal year 2016 (310GW for December 2016). Despite growth in the installed capacity, some parts of the country continue to face power shortages due to the growth of consumption outpacing the growth of electricity supply.

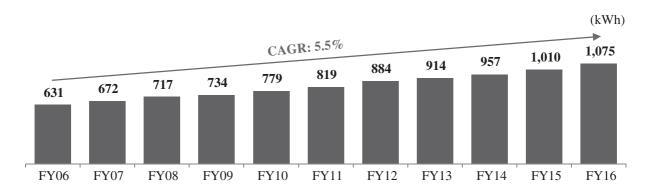


India's Total Installed Capacity Growth (FY06-16)

Source: Central Electricity Authority (CEA)

Demand for electricity is on the rise as India's economy gains in global importance. Factors that contribute to rising per capita consumption include: 1) improvement of electrification in villages, 2) GDP and general economic activity growth, 3) growth in consumer electronic device penetration. These have caused India's per capita consumption to increase steadily over the past 10 years at an annualized growth rate of 5.5%.

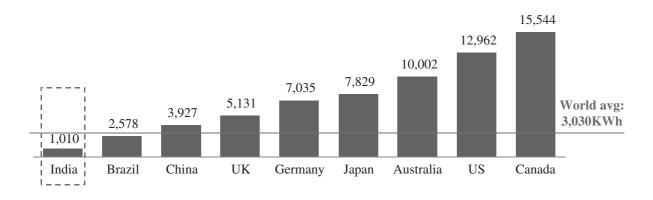
India's Per Capita Electricity Consumption (FY06-16)



Source: CEA

India's per capita consumption remains low at 1,010 kWh as of Mar-15 when compared to other emerging economies like China and Brazil. It is also significantly lower compared to the world average of 3,030 kWh in 2014. In order to address the lack of adequate electricity availability to all people in the country by Mar-19, the Government has launched several schemes to ensure continuous and uninterrupted electricity supply to all households, industries and commercial establishments by creating and improving necessary infrastructure. There are also other demand drivers that facilitate accelerated capacity additions in the sector, including low household access to electricity for lighting and the advent of smart cities and industrial corridors, which is likely to further increase per capita consumption of electricity.

Global Per Capita Consumption Comparison (2014) (1)

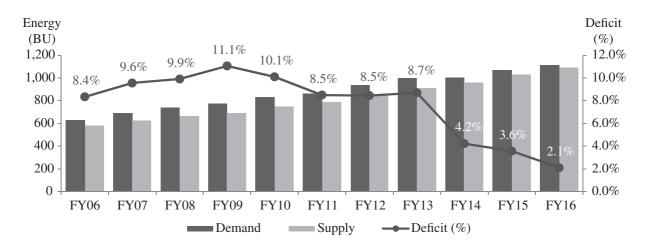


Source: Key World Energy Statistics 2016 (International Energy Agency), CEA

Note: (1) FY15 data used for India for comparison

Electricity shortages have imposed significant constraint on India's economic growth. In fiscal year 2016, India experienced power and peak deficits of 2.1% and 3.2% respectively. Significant capacity addition by renewable sources, such as wind and solar, have helped the power deficit situation.

India's Energy Demand vs Supply (FY06-16)

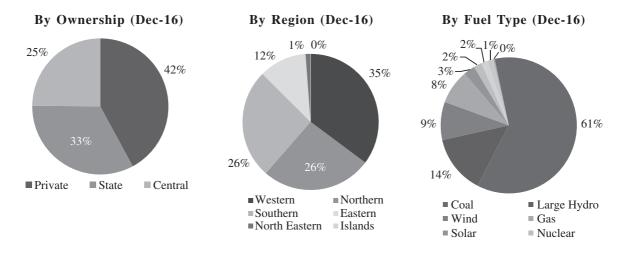


Source: CEA

### India Installed Capacity Breakup

India's power sector has been traditionally dependent on conventional resources like coal and gas. As of Dec-16, 70% of the total installed capacity (310 GW) comes from thermal sources (coal, gas and diesel) indicating India's dependence on conventional sources of power generation. With limited domestic access to such resources and inherent exploration, production and transportation challenges, India is dependent on imports of substantial quantities of gas, oil and coal in order to meet its domestic energy demand.

Private sector accounts for the majority of installed capacity in India (42% as of December 2016 compared to 21% as of March 2011). This is a direct result of the Indian Government's efforts to reform the power generation sector in order to attract private capital.



Source: CEA, Ministry of New and Renewable Energy (MNRE)

Note: (2) Breakup of Renewable capacity (excluding large hydro and nuclear) as of Sep-16 per the latest data from MNRE

# Renewable energy

India has one of the largest installed renewable capacities in Asia with a generation capacity of 46 GW as of December 2016. Renewable/ clean energy sources such as wind, solar and bio-power are expected to play an increasingly important role for India admist favourable government policies supporting the sector. As a result, renewable capacity (excluding large hydro and nuclear projects) has grown from 5.0% in Mar-06 of the total capacity in India to 14.8% in Dec-16.

Renewable energy in India is set to continue its trajectory of growth, given India's significant untapped renewable resources. MNRE estimates India to possess about 900GW of renewable energy potential, of which currently only c.5% is tapped. To further utilize these resources, the India Government up-scaled the target of renewable energy capacity to 175 GW by the year 2022 which includes 100 GW from solar, 60 GW from wind, 10 GW from bio-power and 5 GW from small hydro-power. With 46 GW of renewable capacity as of December 2016, India has achieved 26% of its 2022 target.

In terms of the installed renewable capacity mix, wind represents the largest share at 63% contribution followed by solar with 16% contribution in FY16. Historically, wind has played a dominant role in the renewable power generation space in India. However in recent years, ground mounted solar has experienced an increased policy push and interest among developers primarily as a result of the solar auctions, which resulted in a substantial increase in installed solar capacity from 804 MW as of Jan-11 to 8,513 MW as of Dec-16.

#### Cumulative Capacity FY11-1 (GW) **CAGR** 70.0 76.4% 70.8% 67.7% 71.7% 65.5% 62.7% 60.0 18% 50.0 42.8 35.8 40.0 30% 29.5 27.5 24.5 30.0 18.5 20.0 14% 44 26.9 23.4 10.0 21.1 18.6 17.4 14.1 0.0 FY11 FY12 FY13 FY14 FY15 FY16 Wind Wind Other Renewables — Contribution to total renewable capacity (%)

Growth of Renewable Capacity in India (FY11-16)

Source: MNRE, CEA

Note: (4) Definition of Renewable excludes large hydro and nuclear projects. (5) Wind capacity for FY13 as of Feb-13 instead of Mar-13.

Wind energy has been the predominant contributor to the renewable energy growth in India and is one of the most successful renewable energy options in India. Wind resource in India is primarily situated along the western coast of India, and as a result six key states (Gujarat, Karnataka, Maharashtra, Andhra Pradesh, Tamil Nadu and Madhya Pradesh) hold most of the wind resource and wind capacities in the country. India's wind energy sector has grown rapidly, reaching 26.9 GW of installed capacity in FY16 from 14.1 GW in FY11, registering a CAGR of 14%.

#### Transmission and Distribution

Transmission and distribution in India follows a three-tier structure comprising of: 1) regional grids, 2) state grids and 3) distribution networks. Currently there are five regional grids: Northern, Eastern, Western, Southern and North-Eastern.

Regional grids enable power to be transferred to a power deficit state from a power surplus state. Regional grids also facilitate co-ordination between the power plants and scheduling of maintenance outages to optimize system delivery of electricity. Regional grids will eventually be integrated to form a single grid (national grid).

Power Grid Corporation of India Limited ("PGCIL") operates several of the interstate and inter-regional transmission lines. PGCIL is India's central transmission utility and has one of the largest transmission networks globally. As of August 2016, 45% of the total power generated in India was wheeled through PCGIL's network.

State grids and distribution networks are primarily owned and operated by the respective State Electricity Boards (SEBs) or state governments (through state electricity departments). State distribution networks are managed at the state level and continue to be affected by high Aggregate Technical and Commercial (AT&C) losses, which were reported by CEA to be 25% in fiscal year 2015.

As a consequence of high AT&C losses, SEBs are in poor financial health; this constrains SEBs from upgrading the transmission and distribution network or making any large investments in generation and in upgrading the transmission and distribution network. All India Transmission and Distribution (T&D) losses for the same period stood at 23% as reported by the CEA.

With the enactment of the Indian Electricity Act, 2003 and the guidelines for competitive bidding in transmission projects, private investment was permitted in power transmission which became recognized as an independent activity. Power distribution in the States of Delhi and Orissa has been privatized and distribution networks are now operated by private utilities companies such as Tata Power, CESC Limited, Reliance Energy Limited, Torrent Power AEC, Torrent Power SEC and Noida Power Company Limited, and a number of other distribution companies.

# Regulatory Structure of the Indian Power Sector and Key Policy Initiatives

The following are the key regulatory bodies and their major functions in the Indian Power sector:

- <u>Ministry of Power (MoP)</u>: 1) Responsible for planning, policy formulation and processing of projects for investment decisions; 2) Enacts legislation with regard to power generation, transmission and distribution; 3) Monitors implementation of projects
- <u>Central Electricity Authority (CEA)</u>: A division of the MoP which deals with matters relating to the National Electricity Policy and formulation of plans for development of the power sector
- <u>Central Electricity Regulatory Commission (CERC):</u> Responsible for regulation of tariff and promotion of efficient policies at central level
- <u>State Electricity Regulatory Commission (SERC)</u>: Responsible for regulation of tariff, promotion of efficient policies at state level and formulation of policies regarding subsidies
- <u>Central Transmission Utility (CTU):</u> Focuses on development of a coordinated, efficient and economical system of inter-state transmission lines

- <u>State Transmission Utility (STU):</u> 1) Focuses on development of a coordinated, efficient and economical system of intra-state transmission lines; 2) Undertakes intra-state transmission
- National Load Dispatch Centre (NLDC) / Regional Load Dispatch Centre (RLDC): Focuses on ensuring integrated operations of power systems at the regional level
- <u>State Load Dispatch Centre (SLDC):</u> Focuses on ensuring integrated operations of power systems at the state level

The Indian power sector was opened to private sector participation in 1991. A list of key policy initiatives by the Government are given below:

#### 1991 Electricity Laws (Amendment) Act

- Private participation in generation was allowed
- Foreign ownership was increased to 100%
- Framework for Power Purchase Agreements with State Electricity Boards laid down

# 1998 Electricity Laws (Amendment) Act

- Private participation in transmission was allowed
- CTU and STUs were mandated

# **Electricity Regulatory Commissions Act**

- CERC/SERCs were formed to promote competition and transparency as well as protect consumer interest
- Provide level playing-field for all market participants

# 2003 The Electricity Act

- This Act replaced earlier laws relating to the electricity sector
- The main aim was to enable reform and restructuring of the power sector
- National policy brought out mandatory formation of SERCs
- Emphasizes rural electrification as well as non-discriminatory open access in transmission and distribution

#### 2006 National Tariff Policy

- Framework for determining tariffs and rate of return for generation, transmission and distribution projects
- After January 2011, mandatory competitive bidding was introduced for all transmission projects

#### 2011 National Tariff Policy (Amendment)

- Intra-state transmission sector was exempted from mandatory competitive bidding until January 5, 2013
- Exemption of select experimental, urgent or compressed time schedule work from tariff based competitive bidding

# 2016 National Tariff Policy (Amendment)

- Emphasizes renewable energy sector by allowing competitive bidding for renewable energy procurement and waiver of inter-state transmission charges
- Mandatory procurement of power from waste-to-energy introduced
- Discourages differential duties particularly when states impose differential duties on captive power generation
- Allows licensees to charge lower tariffs than those determined by the SERC

#### Other Government Initiatives

Deendayal Upadhyaya Gram Jyoti Yojana (Rural Electrification Initiative)

The Deen Dayal Upadhyaya Gram Jyoti Yojana (DDUGJY) is a Government of India scheme designed to provide continuous power supply to rural India. The scheme replaces the Rajiv Gandhi Grameen Vidyutikaran Yojana (RGGVY).

When it was launched in 2015, DDUGJY had an initial outlay of Rs 76,000 crores for implementation of projects under which Government of India agreed to provide a grant of Rs 63,000 crores. As of Jan-17, 591,456 villages out of 597,464 (99%) have been electrified.

# Ujjwal Discom Assurance Yojana

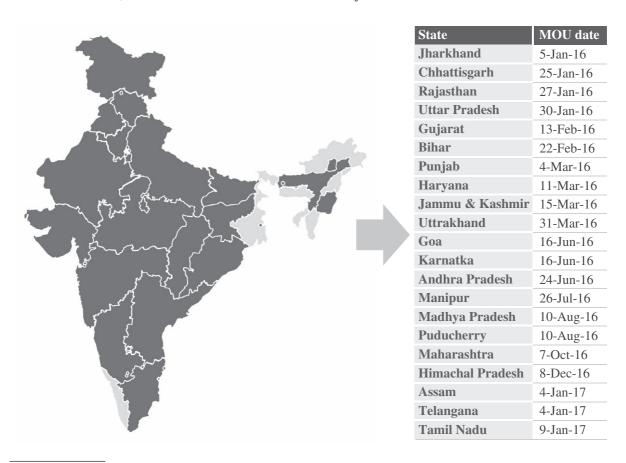
In November 2015, the Ujjwal Discom Assurance Yojana (UDAY) scheme was launched to address the problem of high accumulated losses and debts of distribution companies (DISCOM) in India. As of fiscal year 2015, DISCOMs had accumulated losses of c.Rs 3.8 lakh crores and outstanding debt of c.Rs 4.3 lakh crores.

The scheme is designed to improve fiscal performance of distribution companies. Key initiatives under UDAY include:

- Phased takeover of DISCOM debt by state governments, with a view to reduce in interest costs of distribution companies;
- Incentivizing distribution companies to achieve higher operational efficiencies;
- Reduction in cost of power purchase; and
- Imposing financial discipline on distribution companies through an alignment with state finances

The scheme requires significant support from the state governments which need to take over 75% of the debt carried by the distribution companies (50% by September 2015 and 25% entirely by fiscal year 2017). Principal debt taken over will not be included in fiscal deficit of States. However, interest has to be serviced within Fiscal Responsibility and Budgetary Management Act (FRBM) limits.

As of Jan-17, 21 states and Union Territories have joined the UDAY scheme.



Source: MoP

#### Provision for Merchant Power Plants

Merchant Power Plants (MPPs) generate electricity for sale at market-driven rates in the open wholesale market. Typically, the MPPs do not have long-term PPAs and are constructed and owned by private developers. Merchant sales, however, include the sale of power under short-term PPAs and on-spot basis. Many private sector newcomers are starting to adopt the MPP model for their projects to generate higher returns as opposed to selling power through a long term PPA, as the off-take risk is seen to be low in light of significant power shortages in the country. The MPPs can sell power to the power trading companies (such as PTC India Limited and Tata Power Trading Company Limited), the SEBs, distribution companies and industrial and bulk customers.

# Captive Power Generation

Another important segment of power generation in India is the captive power segment. Captive power refers to power generation from a project established for industrial consumption. Continuing shortage of power and India's sustained economic growth makes captive power an important avenue of meeting electricity demand. Captive power capacity is 40,726 MW in India as of November 16.

# **BUSINESS**

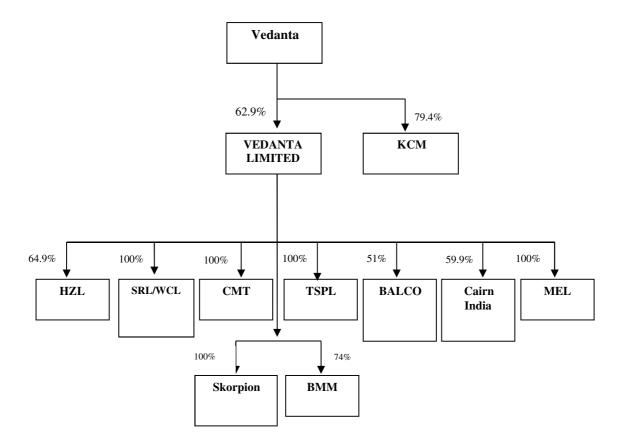
#### Overview

Vedanta is an LSE-listed globally diversified metals and mining, oil and gas, power generation company. Its businesses are principally located in India, one of the fastest growing large economies in the world with a 7.6% increase in real GDP from the fiscal year 2015 to fiscal year 2016, according to the Central Statistical Organization of the GoI's Ministry of Statistics and Programme Implementation. In addition, Vedanta has assets and operations in jurisdictions such as Zambia, Namibia, South Africa and Fujariah a workforce of 70,000 people worldwide. Vedanta is primarily engaged in oil and gas, zinc, copper, iron ore, aluminium and commercial power generation businesses and is also developing port operation businesses and infrastructure assets. Vedanta has experienced significant growth in recent years through the ramp up of expansion projects for its oil and gas, copper, zinc, aluminium and iron ore businesses. Vedanta believes its experience in operating and expanding its businesses in India will allow it to capitalise on attractive growth opportunities arising from India's large mineral reserves, relatively low cost of operations and large and inexpensive labour and talent pools.

For fiscal years 2014, 2015 and 2016, Vedanta reported total revenue of \$12,945.0 million, \$12,878.7 million and \$10,737.9 million, respectively, and Vedanta EBITDA of \$4,491.2 million, \$3,741.2 million and \$2,336.4 million, respectively. For the six months ended 30 September 2015 and 2016, Vedanta reported total revenue of \$5,699.3 million and \$4,867.8 million, respectively, and EBITDA of \$1,285.7 million and \$1,233.1 million, respectively.

#### **Group Structure**

The following chart depicts Vedanta's corporate structure as of 30 September 2016. Vedanta owns other subsidiaries that are not material and are not shown in the chart below.



On 14 June 2015, Vedanta announced an all-share merger of Cairn India with Vedanta Limited to be implemented by way of a scheme of arrangement under Indian law. Thereafter on 22 July 2016, Vedanta Limited and Cairn India announced the revised terms to the merger. As per the revised terms, on completion the non-controlling shareholders of Cairn India will receive for each equity share held in Cairn Inida, one equity share in Vedanta Limited of face value Re. 1 each, and four 7.5% Redeemable Preference Shares in Vedanta Limited with a face value of Rs. 10 each. No shares will be issued to Vedanta Limited or any of its subsidiaries for their shareholding in Cairn India. NSE and BSE have provided their 'No Objection' to the proposed merger and shareholders of Vedanta Limited, Cairn India and Vedanta and the secured and unsecured creditors of Vedanta Limited have approved the Scheme with requisite majority. The Scheme is now subject to the approval of the NCLT and other regulators.

As of 30 September 2016, Vedanta Limited has equity interests in Cairn India of 59.9%. and the Company has economic percentage holding in Cairn India of 37.6%. Following the implementation of the merger with Cairn India, the Vedanta's ownership in Vedanta Limited is expected to decrease to 50.1% from 62.9% shareholding, as of 30 September 2016 and Vedanta's economic holding in Cairn India is expected to increase from 37.6% as of 30 September 2016 to 50.1%.

# **Competitive Strengths**

Vedanta believes it has the following competitive strengths:

# Large, low-cost and diversified asset base

Vedanta is a leading diversified natural resources company with assets primarily located in India. The Company believes that its business comprises of high quality assets of global size and scale.

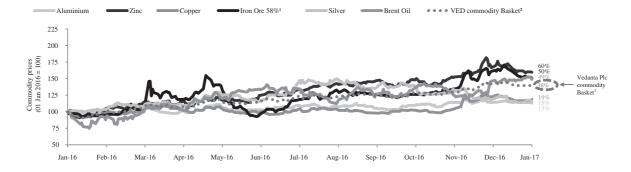
- Zinc: According to Wood Mackenzie, HZL is the second largest zinc miner globally with first quartile cost position. HZL owns six zinc mines of which Rampura Agucha mine is the largest zinc-lead mine globally. Under Zinc International operations, Vedanta operates the Black Mountain Mine and smelter operations in Namibia. It is also developing the Gamsberg mine, which is one of the world's largest undeveloped zinc deposits. The development of Gamsberg is being done in a modular and flexible manner to maximise value.
- Oil and gas: Cairn India is one of the largest independent oil and gas exploration and production companies in India. Cairn India operates approximately 27% of India's domestic crude oil production according to the Ministry of Petroleum and Natural Gas statistics as of March 2016. In fiscal 2016, Cairn India produced approximately gross 71.9 mmboe of oil (working interest production of 45.7 mmboe) and gross 2.7 mmboe of gas (working interest production of 1.2 mmboe). During the six months ended 30 September 2016, Cairn India produced approximately gross 34.8 mmboe of oil (a working interest of 22.4 mmboe) and gross 1.2 mmboe (a working interest of 0.5 mmboe) of gas.
- Copper: Vedanta Limited is one of only two custom copper smelters in India with highest primary market share by sales volume in India in fiscal 2016, according to ICPCI. According to Wood Mackenzie, the Tuticorin smelter is currently amongst the lowest quartile cost custom smelters in the world benefiting from economies of scale, low labour cost, and a captive power plant. Vedanta's Copper Zambia assets, includes the underground copper mine at Konkola which, according to Wood Mackenzie, contains one of the world's highest grade large-scale (defined as containing approximately 1.5 mt of contained copper) copper ore bodies in active production.

- Aluminium: Vedanta, through its subsidiaries BALCO and Vedanta Limited, is the largest primary producer of aluminium in India. Vedanta expects to reach an aluminium design capacity of 2,320,000 tpa, representing an increase of over 66% from its capacity as of 30 September 2016 of 1,395,000 tpa.
- Power: Vedanta has a total power portfolio of 9,000 MW, including 3,600 MW of commercial power generation capacity. This includes a new coal-fired power plant at Talwandi Sabo with a design capacity of 1,980 MW, currently in commissioning. The projects are strategically located with easy access to fuel and water, and are well connected by railways and roads. Vedanta has reduced production and pricing risks with long-term power off-take arrangements with state electricity boards and state-owned utilities.

Vedanta's costs of production in its oil and gas, zinc, copper and aluminium businesses are competitive compared with those of leading natural resources companies in the world, which Vedanta believes is enabled by its high quality assets, operational skills and experience and the integrated nature of its operations.

#### Attractive commodity mix

The diversified nature of Vedanta's portfolio has helped in times of volatility and enabled us to maintain strong margins through the cycle. Vedanta's commodity basket has been much less volatile than the individual commodities, but at the same time has captured the rebound in commodity prices very well, being up 38% since 1 January 2016.



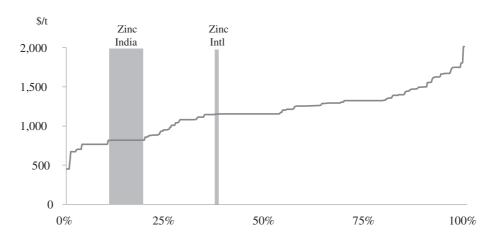
Source: FactSet and Bloomberg as of 3 January 2017

- 1. Iron ore spot price index 58% import fine ore in US\$
- 2. Vedanta Plc commodity Basket is a weighted average of commodity prices with weights based on actual FY2016 revenue mix. Copper India and Copper Zambia custom revenue based on realized Tc/Rc's. Excludes commercial power

Vedanta's portfolio is weighted towards zinc, with 44.2% of EBITDA coming from zinc operations during the six months ending September 2016. Zinc market has strong fundamentals, as global zinc concentrate and refined zinc market remain in deficit. Supply of zinc concentrate continues to be constrained, due to continued closure of mines, the latest being the Century and Vedanta's Lisheen mines in 2015. Inventory levels at the LME and SHFE are at 6-year lows. These fundamental and structural factors have continued to support the zinc prices.

Vedanta is ideally positioned to take advantage of the strength in this market, given the scale, high quality and low-cost nature of its HZL assets. HZL assets sit in the first quartile of the zinc mine cost curve, as per Wood Mackenzie.

CY 2016E Zinc C1 composite cost curve

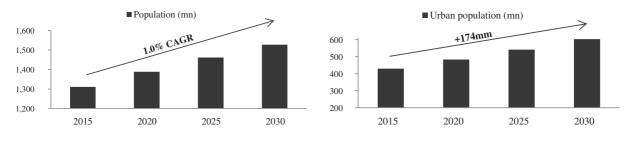


Source: Wood Mackenzie as of Q4 2016 (cost curve by Company)

#### Ideally positioned to capitalise on India's growth and natural resource potential

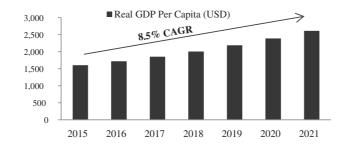
Vedanta believes that its experience in operating and expanding its business in India will allow it to capitalize on attractive growth opportunities arising from factors including:

India's economic growth. India is one of the fastest growing large economies in the world with a 7.6% increase in GDP during fiscal 2016 (at constant (2011-12) prices), according to the Central Statistical Organisation of the GoI's Ministry of Statistics and Programme Implementation. According to the IMF, India's GDP per capita is expected to grow at a cumulative average growth rate of 8.5% during the period of 2015 to 2021. Expected growth rate in the total population of India is 1.0% (Source: World Bank) and the growth in urban population is expected to be 174 million during 2015 to 2030 (Source: World Bank).



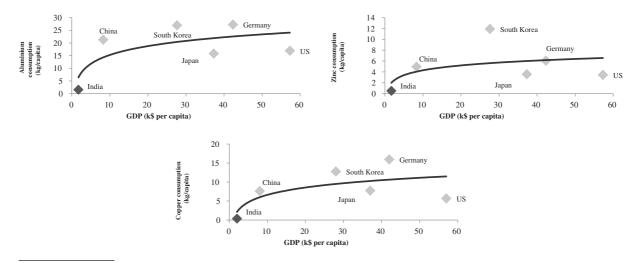
Source: World Bank (May 2016)

Source: World Bank (May 2016)



Source: International Monetary Fund (October 2016)

The metal intensity curves as shown in the below charts plot the historical metal consumption per capita against GDP per capita on a yearly basis for various countries. Extrapolating the positioning of China and other developed nations on these curves, it is clear that as India's per capita income grows, expected consumption of metals and energy would also increase.



Source: International Monetary Fund (October 2016), Wood Mackenzie LTO Q4 2016

India's mineral resource base. According to the USGS, Mineral Commodity Summaries (January 2016), India's zinc reserves are the sixth largest in the world with total reserves estimated at 10 million tonnes, bauxite reserves are the ninth largest in the world with total reserves estimated at 590 million tonnes, has the sixth largest iron ore reserves in the world at 8.1 billion tonnes. According to the BP Statistical Review of World Energy, India has the fifth largest coal reserves in the world at 61 billion tonnes.

India's undeveloped oil and gas resource potential. India is an attractive country for investment in the oil and gas exploration and production sector with domestic demand for hydrocarbons exceeding supply and expected to continue to do so in the foreseeable future. The GoI has continued to provide further growth opportunities through annual licensing rounds. According to the USGS, India has approximately 125 billion barrels of hydrocarbon resources in the yet-to-establish category, and only 7 of 26 basins are in production.

Vedanta is strongly positioned to benefit from this expected growth and resource potential, as 63.1% of FY2016 revenue comes from India. The Company has a long history of established operations and experience in the country. Vedanta also has a strong market share in India in its key commodities. As per ILZDA, Vedanta had a market share of 79% by sales volume in the Indian zinc market, #1 primary aluminium producer with a 40% market share according to the Aluminium Association of India, #1 copper producer with a 36% primary market share by sales volume according to ICPCI and the #1 crude oil producer operating 27% of the crude oil produced in India.

# Well invested assets driving cash flow growth

Vedanta has largely completed its capex program in all its businesses though the businesses are not fully ramped up. It is now ramping up its capacities in its Zinc, Aluminium, Iron Ore and Power businesses with incremental capex as described under the section "Management's Discussion and Analysis of Financial Condition and Results of Operations — Capital Resources — Project Capital Expenditures", with focus on strong cash flow growth.

• Zinc: At HZL, Vedanta has finalized the next phase of growth, which will increase mined metal production capacity to 1.2 million tonnes. The plan comprises developing a 3.75 mmtpa underground mine at Rampura Agucha mine and expanding the Sindesar Khurd mine from 2.0 mmtpa to 4.50 mmtpa, Zawar mines from 1.5 mmtpa to 4.0 mmtpa, Rajpura Dariba

mine from 0.6 mmtpa to 1.2 mmtpa and developing Kayad mine to 1.0 mmtpa. The growth plan will increase mined metal (MIC) production capacity to 1.2 mmtpa. The Company is also developing the Gamsberg project in South Africa, with a design capacity of 250,000 tonnes per annum and targeted first ore production in FY 2018 and ramp-up in subsequent years.

- Aluminium: BALCO is setting up a 325,000 tonnes per annum aluminium smelter, the first 84 pots of which started commercial production in September 2014 and another 84 pots in August 2016. The remaining 168 pots will start commercial production by the end of fiscal year 2017. Vedanta Limited is also setting up another 1.25 mtpa aluminium smelter in Jharsuguda, The commissioning of pots at the first line of the 1.25 mtpa aluminium smelter at Jharsuguda was completed at the end of July 2016. Vedanta expects to reach a target aluminium capacity of 2,320,000 tpa, representing an increase of over 66% from its capacity as of 30 September 2016 of 1,395,000 tpa.
- Power: As of September 30, 2016, Vedanta had total commercial power generating capacity of 3,600 MW including the new coal-fired Talwandi Sabo project which has a generation capacity of 1,980MW, which is being commissioned in three phases. The first 660 MW unit of the Talwandi Sabo power plant was capitalized in fiscal year 2015 and the second 660 MW unit was capitalized in December 2015 after the successful completion of trial runs. The third unit was commissioned in the second quarter of fiscal year 2017.
- *Iron ore*: Vedanta's iron ore business has a design capacity of 20.5 million tonnes per annum production. The combined production from these mines is currently restricted to 7.8 million tonnes per annum.

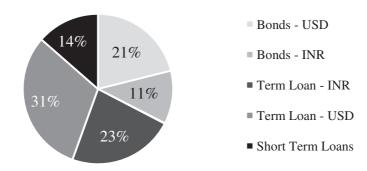
# Strong financial profile

Vedanta generated total revenues of \$10.7 billion and EBITDA of \$2.3 billion during FY 2016. Through its diversified portfolio of assets, Vedanta has maintained strong EBITDA margins during this period of low and volatile commodity prices.

Vedanta also has a balanced debt portfolio, with a diversified range of funding sources. The Company maintains a strong relationship with its lending banks, which enables it to obtain funding at attractive rates.

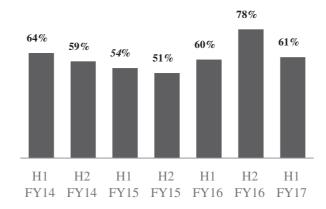
# **Diversified Funding Sources for Term Debt** (\$15.6bn)

As of 30 Sep 2016



The focus on optimising operating and capital expenditure and working capital management contributed to strong free cash flow of US\$1.7 billion (after capital expenditure), during fiscal year 2016. Throughout this period of low commodity prices, Vedanta has maintained a strong EBITDA to cash flow conversion ratio.

# Strong cash flow conversion<sup>2</sup>



Calculated as (EBITDA less capex) / EBITDA

Vedanta also has a programme to deliver cost and marketing savings of \$1.3 billion, and has already achieved savings of an estimated \$536 million through these initiatives as of 30 September 2016.

#### Proven track record

Vedanta has a strong track record of exploration, executing projects and delivering production growth. The Company has delivered 19% annualized production growth in copper equivalent terms since listing in fiscal year 2004.

- Cairn India has long and proven exploration expertise in India, having made 40 hydrocarbon discoveries since 1994. Cairn India has continued to add to its exploration portfolio and, in addition to accessing new opportunities, has been an active and successful participant in the NELP licensing rounds, as demonstrated by Cairn India being awarded two blocks in the NELP VIII round. Cairn India's executive management team has a proven track record of developing hydrocarbon resources which includes making 38 discoveries in the Rajasthan Block including the landmark Mangla field, commencing natural gas production in less than 28 months at the Lakshmi field in Cambay Basin, building the world's longest continuously heated and insulated crude oil pipeline, and executing the world's largest polymer flood project.
- Vedanta started its aluminium business with the acquisition of BALCO with an installed capacity for aluminium smelting of 100ktpa. It has since then expanded its aluminium business to include Design capacities for aluminium smelting of 375ktpa at BALCO and 1,750 ktpa at Jharsuguda.
- Vedanta acquired HZL in 2002, when its production was at 170kt pa and R & R life of 5 years. Through investments in technology and people with an innovative mindset and increasing productivity, HZL today has a R & R life of 25+ years with a 1.2mtpa production capacity, making HZL the second largest zinc miner in the world.
- Vedanta's senior management has significant experience in all aspects of its business which has contributed in transforming Vedanta into a leading diversified natural resources company that is listed on the LSE. Mr. Anil Agarwal, Vedanta's founder, remains involved in overseeing Vedanta's business as its Executive Chairman. Vedanta's executive management team focuses on group strategy and capital allocation, while operational and project goals are led by the experienced management teams overseeing each individual business.

Vedanta's experienced and focused management and dedicated project execution teams
have proven track record of successfully implementing capital-intensive projects to
increase its production capacities. Vedanta utilises project monitoring and assurance
systems to facilitate timely execution of its projects.

# Vedanta's Strategy

Vedanta's strategic goal is to become one of the top diversified natural resources company in the world, and has the following five key strategic priorities:

# Production growth and asset optimization

Vedanta strives to ramp up its assets with a disciplined approach towards cost, capex allocation and operating efficiency. Strict cost management and increases in productivity form an integral component of its day-to-day operations. Vedanta is placed in the lower half of the global cost curve in most of its operations, and intends to improve its cost position further. Highlights of Vedanta's recent achievements include:

- As of September 30, 2016, Vedanta's power business under TSPL became fully operational, with the capitalisation of the third 660MW unit during the second quarter of fiscal year 2017.
- Vedanta is ramping up its aluminum business to achieve the design capacity of 2.3 million tonnes. During FY 2017, three of the four 600MW units at the Jharsuguda started to supply power to the Jharsuguda-II smelter for its capacity ramp up.
- Vedanta's iron ore business is operating at the full capacity based on limits set by the Government.
- The transition to underground mine at Rampura Agucha, and a progressive ramp-up at Sindesar Khurd mine are on track to increase the overall capacity at Zinc India to 1.2mtpa from 1mtpa.
- EOR programs at the O & G business have commenced and Vedanta expects significant contribution from these to achieve higher production volumes.

### De-leveraging the balance sheet

A key strategic priority for Vedanta is to reduce gross debt through strong cash flow growth through disciplined approach on capital allocation towards capital expenditure and operating expenditure; along with disciplined management of working capital. Despite low commodity prices recently, Vedanta continued to deliver strong EBITDA margins and free cash flows through a strong focus on its cost optimization plan. As Vedanta continues to ramp up its portfolio of diversified, low-cost and well-invested assets, Vedanta expects to generate significant organic free cash flow with minimal remaining capital expenditure.

#### Simplifying Vedanta structure

As a step towards simplifying its corporate structure, Vedanta announced the merger between Vedanta Limited and Cairn India in June 2015. It revised the offer terms for the minority shareholders of Cairn India in July 2016 and received approvals from both sets of shareholders and creditors. It believes that this merger will help generate long-term value for all shareholders. Vedanta is working towards all regulatory approvals for the merger and expects to complete it by the fourth quarter of fiscal year 2017.

# Creating Sustainable Value for all Stakeholders

A key strategic priority and critical to its licence to operate, Vedanta continues to focus on embedding a culture of sustainability across the businesses, allocating resources, skills and financial contributions to support its people and the communities where it operates whilst minimizing its environmental impact. Although Vedanta's injury rates have declined over the years, the 12 fatalities recorded during fiscal year 2016 have heightened Vedanta's resolve to create a zero-harm culture across the organisation and raise the profile of health and safety by reviewing safety incidents at the board, business segment and operational levels. The business units have implemented and put forward behavioural based and technical programmes to avoid the reoccurrence of these incidents. Further safety investigations and follow-ups have been improved and quantitative risk assessments have been introduced for all critical areas.

Making a positive contribution to local communities in India and Africa remains a high priority for Vedanta, with around 2.25 million beneficiaries of community development programmes during fiscal year 2016, supported by over 250 partnerships with NGOs, local governments, academia and private hospitals. Vedanta's social investment reached US\$ 37 million and is aligned with its social vision and community need based approach.

Vedanta is committed to managing its environmental footprint seeking to control pollution, reduce water and energy consumption and protect bio-diversity around its operating sites. During fiscal year 2016, there were zero higher category environmental incidents and all subsidiary businesses have been assessed with environmental gaps identified in energy, water management, greenhouse gas emissions and biodiversity. The significant improvements and adoption of best practices in resource management, biodiversity and site closure practices along with awards like CII-Sustainable Plus platinum label, National Energy Conservation Award and Global IOD Awards for Excellence in Corporate Governance and Sustainability are testament to the focus and improvement, Vedanta has made towards environment sustainability.

#### Identify next generation of resources

Vedanta follows a disciplined approach to exploration and continues to enhance its exploration capabilities. Vedanta's strategic priority is to add to its reserves and resources by extending resources at a faster rate than deplete them, through a continuous focus on its drilling and exploration programme. In order to achieve this, the Company has formed an exploration cell - VEDEX under the guidance of senior leaders to build on the Company's reserve base across businesses.

#### History and Development of Vedanta

In 1979, Mr. Anil Agarwal acquired Shamsher Sterling Corporation, which manufactured polyvinyl chloride power and control cables, overhead power transmission conductors and enamelled copper wire. Sterlite Cables Limited, in which the Agarwal family had a substantial interest, subsequently acquired this business and in 1986 changed its name to Sterlite Industries (India) Limited ("Sterlite").

- In 1988, Sterlite conducted an IPO in India.
- In 1995, Sterlite entered the aluminium production business by acquiring an 80% interest in The Madras Aluminum Company Limited ("MALCO")
- In 1997, Sterlite commissioned the first privately developed copper smelter in India
- In 2001, Sterlite acquired a 51% interest in BALCO
- In 2002, Sterlite acquired a 26% interest in HZL. In 2003, Sterlite increased its interest in HZL to 64.9%.

- In 2003, Vedanta was incorporated and re-registered as a public company and its name was changed to Vedanta Resources plc.
- In 2003, Vedanta was listed on the LSE.
- In 2004, Vedanta acquired a 51% interest in KCM.
- In 2006, Sterlite acquired Sterlite Energy Limited.
- In 2007, Vedanta acquired its iron ore business through the acquisition of a 51.2% interest in Sesa Goa Limited ("SGL") (now Vedanta Limited).
- In 2007, Sterlite completed an IPO on the NYSE. Vedanta's ownership interest in Sterlite decreased to 59.9%.
- In 2008, Vedanta increased its ownership interest in KCM to 79.4%.
- In 2009, Vedanta increased its ownership interest in MALCO to 94.8%.
- In 2009, Sterlite conducted a follow-on offering of its shares. Vedanta's ownership interest in Sterlite decreased to 56.9%.
- In 2009, SGL acquired SRL, which increased Sesa Go Limited's iron ore reserves and resources by an estimated 101.8 million tonnes.
- In 2010 and 2011, Vedanta acquired Skorpion, Black Mountain Mining, and Lisheen.
- In 2011, SGL acquired the steel plant assets in Karnataka of Bellary Steel & Alloys Limited.
- In 2011, SGL acquired 51% of WCL.
- In 2011, Vedanta acquired a 58.5% interest in Cairn India.
- In 2012, SGL acquired GEL.
- In 2012, SGL acquired the remaining 49% of WCL.

In 2014, Vedanta completed the reorganization transactions where in

- Sterlite merged with and into SGL;
- Aluminum business of Vedanta Aluminium Limited was demerged into SGL;
- Sterlite Energy Limited was merged with and into SGL;
- Power business of MALCO was demerged into Vedanta Aluminum Limited (now renamed as MALCO Energy Limited or MEL);
- Remaining MALCO was merged with and into SGL;
- Power business of Vedanta Aluminum Limited was slump sold to SGL;
- Group's ownership in Cairn India was consolidated under SGL; and
- the name of SGL was changed to Sesa Sterlite Limited with effect from 18 September, 2013.

In 2015, the name of Sesa Sterlite Limited was changed to Vedanta Limited. In 2015, Vedanta Limited announced a proposed merger with Cairn India. In 2016, Vedanta Limited and Cairn India announced the revised terms to the merger.

#### Oil and Gas Business

Vedanta's oil and gas business is operated by Cairn India. Cairn India was incorporated in India in 2006 and was listed on the BSE and the NSE in 2007 and as of 30 September 2016, had a market capitalisation of Rs. 375 billion (\$5.6 billion). Cairn India's headquarters are in Gurgaon, India. Vedanta's total ownership interest in Cairn India is 59.9% as of 30 September 2016. Cairn India has a diversified asset base with eight production and exploration blocks, one in Rajasthan, two on the west coast of India, four on the east coast of India and one in South Africa.

#### Zinc Business

Vedanta's zinc India business is owned and operated by HZL. The international zinc business is operated by Skorpion in Namibia, Linseen in Ireland and Black Mountain Mining in South frica.

HZL. HZL was incorporated in Jaipur, India, and is headquartered in Udaipur in the State of Rajasthan. HZL's equity shares are listed and traded on the NSE and the BSE and as of 30 September 2016, had a market capitalisation of Rs. 986 billion (\$14.8 billion). As of 30 September 2016, Vedanta Limited directly owns 64.9% of the share capital of HZL and has management control. The remainder of HZL's share capital is owned by the GoI (29.5%) and institutional and public shareholders and employees of HZL (5.6%). HZL's fully integrated zinc operations include five lead-zinc mines at the Chanderiya, Darbia and Zawar facilities in the State of Rajasthan. Processing facilities are located at Haridwar, Punjab and Uttrakhand.

THL Zinc Namibia Holdings (Pty) Ltd. Skorpion was incorporated in Namibia, and is headquartered near Rosh Pinah. Skorpion was acquired from Anglo American plc in May 2010. The acquisition of Skorpion was completed on 3 December 2010. Skorpion produces zinc ingots of LME grade.

Vedanta Lisheen Holdings Limited. Lisheen was incorporated in Ireland, and is headquartered in Thurles. Lisheen was acquired from Anglo American plc in May 2010. The acquisition of Lisheen was completed on 15 February 2011. The Lisheen mine is located in County Tripperary, Republic of Ireland. Mining and milling activities at the Lisheen mine ceased in December, 2015 and the facility is currently in the process of implementing a mine closure plan in conjunction with statutory authorities.

Black Mountain Mining (Pty) Ltd. Black Mountain Mining was incorporated in South Africa, and is headquartered in Aggeneys. Black Mountain Mining was acquired from Anglo American plc in May 2010 and its assets include the Black Mountain mine and the Gamsberg deposit in South Africa. On 4 February 2011, Vedanta Limited completed the acquisition of the 74.0% ownership interest in Black Mountain Mining. Black Mountain Mining consists of the Black Mountain mine and the Gamsberg Project which produces zinc, copper and lead in concentrate.

# Copper Business

Vedanta's copper business comprises operations in India, Zambia and Australia. Vedanta's Indian and Australian copper business is operated by Vedanta Limited, while its Zambian copper business is owned and operated by KCM.

Vedanta Limited. Vedanta Limited was incorporated in Kolkata, India, and is headquartered in Tuticorin in the state of Tamil Nadu. Vedanta Limited has been a public listed company in India since 1988. Its shares are listed and traded on the NSE and the BSE, and are also listed and traded on the

NYSE in the form of American Depository Shares ("ADSs"). Vedanta, as of 30 September 2016 owns 62.9% of Vedanta Limited and has management control of the company. The remainder of Vedanta Limited's share capital is held by institutional and public shareholders. Vedanta Limited operates the copper business in India and operates the Australian business through CMT.

CMT. CMT was incorporated in Belmont, Australia, and is headquartered in Queenstown, Tasmania. Vedanta Limited owns 100.0% of CMT as of 30 September 2016 and has management control of the company. The Company's registered office is in Marin Place, Sydney.

KCM. KCM was incorporated in Lusaka, Zambia, and has its registered office in Chingola, Zambia. As of 30 September 2016, Vedanta owns 79.4% of KCM's share capital through Vedanta's wholly-owned subsidiary, VRHL, and has management control of the company. KCM's other shareholder is ZCCM Investment Holdings Plc. The Government of Zambia has a controlling ownership interest in ZCCM Investment Holdings Plc.

#### Iron Ore Business

Vedanta's iron ore business comprises operations in India and Liberia.

Vedanta Limited: Vedanta Limited operates Vedanta's Iron Ore business in the states of Goa and Karnataka, India.

Western Cluster Limited. WCL was incorporated in Liberia and is headquartered in Monrovia, Liberia. WCL's assets include development rights to the Western Cluster, a network of iron ore deposits in West Africa.

#### Aluminium Business

*BALCO*. BALCO was incorporated in New Delhi, India and is headquartered at Korba in the State of Chattisgarh. Vedanta Limited owned 51.0% as of 30 September 2016 of the share capital of BALCO and has management control of the company. The GoI owns the remaining 49.0%. BALCO operates two Bauxite mines in Chattisgarh, India.

Vedanta Limited. Vedanta Limited operates Vedanta's aluminium business in the state of Odisha.

#### Commercial Power Generation Business

Vedanta Limited. Vedanta Limited operates the 2,400 MW coal based power plant facility in Jharsuguda in the state of Odisha. The three units of 600 MW each of coal-based thermal power plants in Jharsuguda have been converted from commercial power plants to captive power plants from 1 April 2016 and is now part of the aluminium business and one unit is an independent power plant for commercial power generation.

TSPL is a wholly-owned subsidiary of Vedanta Limited acquired by Vedanta Limited in September 2008. It is currently operating a 1,980 MW coal-based thermal commercial power plant at Talwandi Sabo, Punjab, India.

*MEL*. MEL is a wholly owned subsidiary of Vedanta Limited and operates a 106.5 MW coal based thermal power plant in Mettur Dam.

BALCO. BALCO operates a IPP 600 MW thermal power plant in Korba, Chattisgarh.

HZL. HZL operates wind power plants in Gujarat, Karnataka and Rajasthan with a combined capacity of 274.2 MW as of 30 September 2016.

#### **Description of the Businesses**

#### Oil and Gas Business

#### Introduction

Vedanta's oil and gas business is owned and operated by Cairn India, one of the largest independent oil and gas exploration and production companies in India. Cairn India was incorporated in India in 2006 and was listed on BSE and NSE on 9 January 2007. As of 30 September 2016, Cairn had a market capitalisation of Rs. 375 billion (\$5.6 billion).

Cairn India is primarily engaged in the business of exploration, development and production of crude oil, gas and related by-products. The Cairn India Group has rights to explore and develop oil exploration blocks in India and South Africa. Cairn India operates approximately 27% of India's domestic crude oil production and, to date, has opened four frontier basins with numerous discoveries.

Cairn India has a diversified asset base with eight production and exploration blocks: one in Rajasthan, two on the west coast of India, four on the east coast of India and one in South Africa. The following table sets forth details of Cairns India's assets including its percentage interest and its partners, as of 30 September 2016:

	Asset	Basin	Cairn India's Interest (%)	Joint Operation Partners	Area (in km²)
	Ind	lia			
1	RJ-ON-90/1	Barmer	70%	ONGC	3,111
2	CB/OS-2	Cambay	40%	ONGC, Tata Petrodyne	207
3	PKGM-1	KG Offshore	22.5%	ONGC, Ravva Oil, Videocon	331
4	KG-ONN-2003/1	KG Onshore	49%	ONGC	315
5	KG-OSN-2009/3	KG Offshore	100%	_	1,988
		Mumbai			
6	MB-DWN-2009/1	Offshore	100%	_	2,961
7	PR-OSN-2004/1	Palar-Pennar	35%	ONGC, Tata Petrodyne	9,417
			Internationa	al	
		Orange, South			
8	Block 1	Africa	60%	Petro SA	19,898
	Total				38,228

Oil and gas is produced from the Rajasthan, Ravva and Cambay blocks. Gross production of Cairn India was 211.7 kboepd in fiscal years 2015 and 203.7 kboepd in fiscal year 2016. For the six months ended 30 September 2016, the Vedanta EBITDA and revenue for Vedanta's oil and gas segment was \$273.9 million and \$585.9 million respectively.

The Rajasthan RJ-ON-90/1 ("Rajasthan") block is an onshore block. It is the principal production asset where Cairn owns a 70% participating interest pursuant to the production sharing contract that runs until May 2020. Joint operation partner, ONGC, has a 30% participating interest. The Rajasthan block is spread over 3,111 sq. kms west of Barmer district. The block consists of three contiguous development areas or DA: (i) DA 1, primarily comprising the Mangala, Aishwariya, Raageshwari and Saraswati or MARS fields; (ii) DA 2 primarily consisting of the Bhagyam, NI and NE and Shakti fields; and (iii) DA 3, comprising the Kaameshwari West fields.

The Mangala field was discovered in January 2004. This was followed by many other discoveries including the Aishwariya and Bhagyam fields. In the Rajasthan block, 38 discoveries have been established, since inception. The Mangala, Bhagyam and Aishwariya fields (collectively, the "MBA Fields") are the largest in the Rajasthan Block and the Mangala field was the first to be developed, having commenced production of commercial crude oil in August 2009. In addition, Cairn India has completed the MPT, a centralised hub facility to handle crude oil production from the MBA Fields and other fields, such as Raageshwari, Saraswati and other satellite fields. Since June 2010, sales of crude oil from the Rajasthan Block are made through a pipeline (the "Pipeline") of approximately 590 km running from the MPT to Salaya which further extends 73 km to Bhogat. In November 2015, the Salaya-Bhogat pipeline and terminal at Bhogat were commissioned and the first cargo of 500,000 barrels of Rajasthan crude oil was successfully loaded in December 2015 through the Bhogat terminal for Mangalore Refinery and Petrochemicals Limited ("MRPL"). The terminal provides access to a larger market for Rajasthan crude. The Bhogat terminal is a 160 hectare site located eight km from the Arabian Sea coast at Bhogat in Jamnagar District, Gujarat.

Outside of the Rajasthan Block, the two producing blocks are Ravva and the Cambay Basin Block.

Cairn India Group signed a farm-in agreement with the Petroleum Oil & Gas Corporation of South Africa Ltd. ("PetroSA"), the national oil company of South Africa, for the 19,922 km² off-shore Block 1, located in the geologically-proven Orange Basin in South Africa. As of 30 September, 2016, cairn India Group holds a 60% interest in the block and is its operator. Following farm-in and assignment of participating interest in the block in early calendar year 2013, 1,981 sq. km of 3D seismic data was acquired in fiscal year 2014. Additionally, acquisition of 3,000 line km of 2D seismic data was concluded in early March, 2014. Cairn awaits a decision on proposed changes to the MPRDA and fiscal regime before considering a decision to progress into the second exploration license phase.

In addition, Cairn holds interest in the onshore block KG-ONN-2003/1 under development phase and offshore blocks KG-OSN-2009/3, MB-DWN-2009/1 and PR-OSN-2004/1 under exploration phase.

# Principal products

Oil. Cairn India produces crude oil of various grades with different degrees and contents, depending on which field it has been extracted from. While, the crude oil in the majority of fields in the Rajasthan block is characterized by its high pour point and is medium sweet oil in nature, the crude oil produced from Ravva and Cambay oil blocks are light sweet in nature.

Gas. The Rajasthan, Ravva and Cambay blocks produce natural gas and natural gas commingled with crude oil. While gas is being sold from the offshore blocks of Ravva and Cambay, pursuant to the regulatory approval of March 2013, gas sales have commenced from the Rajasthan block in fiscal year 2014.

#### Production

The table below sets out Cairn India's total production<sup>(1)</sup> and production results for the periods indicated:

	For the Year Ended 31 March			For the six months ended 30 September	
	2014	2015	2016	2015	2016
<b>Average Daily Gross Operated</b>					
Production (boepd)	218,651	211,670	203,703	207,538	196,629
Rajasthan	181,530	175,144	169,609	170,164	167,323
Ravva	27,386	25,989	23,845	27,303	19,228
Cambay	9,735	10,538	10,249	10,071	10,078
<b>Average Daily Working Interest</b>					
Production (boepd)	137,127	132,663	128,191	129,286	125,484
Rajasthan	127,071	122,601	118,726	119,115	117,126
Ravva	6,162	5,847	5,365	6,143	4,326
Cambay	3,894	4,215	4,100	4,028	4,031
Total Oil and Gas (mmboe)					
Oil & Gas-Gross	79.8	77.3	74.6	38.0	36.0
Oil & Gas-Working Interest	50.1	48.4	46.9	23.7	23.0

<sup>(1)</sup> See "Presentation of Information — Reserves and Production" for an explanation of the basis of preparation of production amounts.

The following table sets forth Cairn India's oil and gas production for the periods indicated.

	For the Year Ended 31 March			For the six months ended 30 September	
	2014	2015	2016	2015	2016
Gross:					
Oil (bopd)	209,378	204,761	196,955	200,692	190,088
Gas (mmscfd)	56	41	40	41	39
Oil and gas (boepd)	218,651	211,670	203,703	207,538	196,629
Total:					
Oil (mmbbls)	76.4	74.7	72.1	36.7	34.8
Gas (mmboe)	3.4	2.6	2.5	1.3	1.2
Oil and gas (mmboe)	79.8	77.3	74.6	38.0	36.0

Cairn India's Estimates of Hydrocarbons Initially in Place, Reserves and Contingent Resources

Cairn India uses various measures of hydrocarbons to make decisions regarding exploration priorities and investment in field developments. In the exploration phase, estimates of hydrocarbons initially in place, and the associated estimate of prospective resource are essentially speculative and subject both to a binary risk (probability of success or failure) and considerable uncertainty of volumetric magnitude. Following successful exploration and appraisal work, and as a field matures technically and commercially through development work and actual production, it becomes possible for Cairn India to make estimates, which may change over time, of the volumes of hydrocarbons or reserves that, in varying degrees of certainty or uncertainty, will ultimately be recoverable.

Cairn India relies primarily on estimates of 2P reserves for purposes of significant capital investment decisions.

Estimates of contingent resources are also used as a further measure of the potential commerciality of known accumulations of hydrocarbons in Cairn India's areas. The estimation of these resources, and the likelihood that they may be reclassified as reserves, depends on Cairn India's ability to prove commercial and technical viability of recovery within a reasonable timeframe. Cairn India employs reserves and resources definitions according to SPE/WPC International Standards which provide detailed descriptions for each category of reserves and resources.

The table below sets forth certain data regarding Cairn India's estimates of gross hydrocarbons initially in place, gross and net working interest reserves and contingent resources from fields within the Rajasthan Block, the Ravva Block and the Cambay Basin Block as of 31 March 2016. The estimates with respect to Rajasthan Block fields include resources which are based on the assumption that Cairn India will be granted an extension of the Rajasthan Block PSC beyond the expiration of the PSC in 2020. This assumption might not prove to be correct. Based on the fiscal year 2016 gross production, the gross 2P reserves and 2C resources of have a life of approximately 18 years.

			Net Working
	<b>Gross Proved</b>		Interest
	Plus Probable	<b>Gross Proved</b>	<b>Proved Plus</b>
	Hydrocarbons	Plus Probable	Probable
	Initially in	Reserves and	Reserves and
	Place	2C resources	2C resources
		(mmboe)	
Rajasthan Block			
Total "MBA" Fields	2,208	496	347
Rajasthan EOR	225	158	
Rajasthan Block Other Fields	4,189	471	330
Ravva Block	706	39	9
Cambay Basin Block	215	23	9
KG-ONN-2003/1	481	74	36
Total (excluding EOR)	7,799	1,103	731
Total (including EOR)	7,799	1,328	889

DeGolyer and MacNaughton's Estimates of Reserves and Contingent Resources

DeGolyer and MacNaughton, independent petroleum engineering consultants, had been engaged to prepare estimates of the Proved, Probable, and Possible oil, condensate, and sales gas reserves and the contingent resources contained within the areas of Cairn India.

The estimation of oil and gas reserves and resources is uncertain and subjective and different, reasonable estimates may be produced by different engineers analysing the same geological, technical and commercial data. As a result, there are differences between Cairn India's estimates and DeGolyer and MacNaughton's estimates.

The table below sets forth a summary of the gross and net participating interest oil equivalent reserves reported in millions of barrels for certain properties which have been derived from estimates of gross oil and gas reserves prepared by DeGolyer and MacNaughton for fields within the Rajasthan Block, the Ravva Fields, and fields within the Cambay Basin Block as of 31 March 2016. In this table, gas has been converted into oil equivalent using a conversion factor of 6,000 standard cubic feet per barrel of oil equivalent.

		Net Participating
	<b>Gross Proved Plus</b>	<b>Interest Proved Plus</b>
	Probable Hydrocarbon	Probable Hydrocarbon
	Reserves (mmboe)	Reserves (mmboe)
Rajasthan Block		
Mangala	161.8	113.3
Bhagyam	35.6	24.9
Aishwariya	22.5	15.8
Total "MBA" Fields	219.9	153.9
Rajasthan Block Small Fields	19.6	13.0
Rajasthan Block Other Fields	3.1	2.2
Ravva Block	14.4	3.2
Cambay Basin Block	9.5	3.8

The difference in total gross "Proved plus Probable" hydrocarbon reserves estimates between Cairn India and D&M is approximately 3.5 mmboe (1.3%). The field by field differences are due to differences in the interpretations made by the estimating engineers. The largest difference between field estimates occurs for the Cambay Basin Block, where Cairn India's estimate includes three technically justified infill wells awaiting approval, but the D&M estimate does not.

#### The Rajasthan Block

The majority of the estimated hydrocarbons in place, 2P reserves and contingent resources attributable to fields in which Cairn India has an interest are contained in the Rajasthan Block. The block consists of three contiguous DAs: (i) DA 1, primarily comprising the Mangala, Aishwariya, Raageshwari and Saraswati or MARS fields; (ii) DA 2 primarily consisting of the Bhagyam, NI and NE and Shakti fields; and (iii) DA 3, comprising the Kaameshwari West fields.

The Mangala, Bhagyam, Aishwariya, Saraswati, Raageshwari, NI and NE oil fields are under production. As of 31 March 2016, Cairn India estimates the gross hydrocarbons initially in place and the gross 2P reserves plus 2C resources of 6.4 bnboe and 1.2 bnboe, respectively and as of 31 March 2016. Additionally, for the fiscal year 2016 two private sector buyers constituted 78.2% of total oil sales for Rajasthan block.

As of 31 March 2016, Cairn India estimates that the MBA fields (including EOR) contained gross hydrocarbons initially in place and the gross 2P reserves plus 2C resources 2.2 bnboe and 0.7 bnboe respectively. The other fields in Rajasthan block contained gross hydrocarbons initially in place and the gross 2P reserves plus 2C resources 4.2 bnboe and 0.5 bnboe.

Set out below is the gross production from the Rajasthan Block and Cairn India's net participating interest with regard to such production for the periods indicated:

Average Daily					30 September	30 September
Production	Units	2014	2015	2016	2015	2016
Gross operated	Boepd	181,530	175,144	169,609	170,164	167,323
Net operated	Boepd	127,071	122,601	118,726	119,115	117,126
Oil	Bopd	126,221	121,554	117,086	117,685	115,283
Gas	Mmscfd	5.1	6.3	9.8	8.6	11.1

Cairn India is working in partnership with its joint venture partner ONGC, in the Rajasthan Block. The Rajasthan Block PSC was signed in May 1995 between the GoI and a consortium consisting of ONGC and SIPD.

Cairn India acquired its interest in the Rajasthan Block PSC in three stages, eventually acquiring a 100.0% beneficial interest in the assets and liabilities as of May 2002 and acquiring legal title to this 100.0% interest on 20 June 2003. Under the Rajasthan Block PSC, the GoI has an option to acquire a participating interest of 30.0% in any development area containing a commercial discovery. The GoI exercised this right in all three development areas, specifically, DA 1 in 2005, DA 2 in 2007 and DA 3 in 2009, acting through its nominee ONGC, and acquired a 30.0% participating interest.

Under the Rajasthan Block PSC, until such time as India attains self-sufficiency in its crude oil supply, Cairn India is required to sell to the GoI, or its nominee, all of Cairn India's entitlement to crude oil and condensate extracted from the Rajasthan block in order to assist in satisfying domestic Indian crude oil demand. The GoI has the option but not an obligation to purchase the whole or part of crude oil produced from the Rajasthan block, and accordingly the GoI is entitled to appoint a nominee to purchase all of the contractor's entitlement of the crude oil and condensate produced from the Rajasthan block. However, the GoI has granted permission to Cairn India to sell the remaining quantities of crude oil, over and above those allocated to government nominees to other domestic private refineries and as of 30 September 2016, Cairn India sells crude oil to both private refineries and the public sector undertakings refineries. As of 31 March 2016, commercial sales arrangements are in place for over 200,000 bopd with public sector undertakings and private refineries with public sector undertakings and private refineries and overseas are subject to approval from the GoI.

The Rajasthan Block PSC established a management committee for the Rajasthan Block which consists of four members, two of whom are nominated by and represent the GoI and the licencee, namely ONGC, taken together, and two of whom are nominated by and represent Cairn India. The management committee must unanimously approve annual work programmes, budgets, proposals for the declaration of a discovery as commercial, field development plans, and the delineation of or additions to a development area, while all other matters only require a majority vote.

The Rajasthan Block PSC is valid until May 2020, but it may be extended subject to mutual agreement among the parties for up to an additional ten years in the case of commercial production of non-associated natural gas or up to five years otherwise. There is also provision to further extend the PSC by agreement of the parties if production of crude oil or of natural gas is expected to continue after the relevant period.

The Rajasthan Block has benefited from a tax holiday of seven years from fiscal 2009 (the year of commencement of commercial production from the Rajasthan Block) to 31 March 2016. However, during the seven-year tax holiday, minimum alternate tax rules were applicable resulting in a taxation of book profits computed in accordance with the generally accepted accounting principles as used in India ("Indian GAAP"). Any minimum alternate tax paid can be carried forward (at current rates) for a total period of ten years from the year of credit and used to reduce corporate tax to be paid in future years in excess of minimum alternate tax payable in those years.

Under the Rajasthan Block PSC, all sales are to be valued at a weighted average FOB selling price per barrel of a basket of international crude oils as agreed by all parties which is quoted in Platts, a provider of energy information. For any delivery period in which sales take place, the price will be set at an average price per barrel determined by calculating the average for such delivery period of the mean of the high and low FOB prices of the basket for each day adjusted for differences in quality, delivery time, quantity, payment terms and other contract terms to the extent known. In agreeing to an appropriate basket, the parties shall attempt, so far as is reasonably practicable, to choose a mixture

and weighting of crude oils which would produce a quality similar to the quality of crude oil expected to be produced from that development area, and to agree what quality adjustment (if any) to the basket price is appropriate. In determining the quality of crude oil, account is to be taken of all relevant characteristics including gravity, sulphur and metal content, pour point and product yield.

The crude oil produced at the Rajasthan Block is benchmarked to Bonny Light, an international low sulphur crude oil published in Platt's Crude Oil Market Wire on a daily basis. The pricing formula also adjusts for differences in yield and quality.

In the event that there is a dispute between the parties to the Rajasthan Block PSC as to the basis of, or mechanism for, the calculation of the crude oil price, then any party may refer the matter to a sole expert who is to be an independent and impartial person of international standing with relevant qualifications and experience. Under the provisions of the Rajasthan Block PSC, the decision of the sole expert is final and binding on the parties and not subject to arbitration.

Northern Fields — Mangala. The Mangala field which was discovered in 2004, is the largest field in the Barmer Basin in the state of Rajasthan.

The main reservoir unit in the Mangala field is of the late Palaeocene Age Fatehgarh group which is also common to the other Northern Fields. The Fatehgarh sequence consists of stacked reservoir units of interbedded sands and shales. The Fatehgarh sandstones exhibit reservoir characteristics, with porosities ranging from 21% to 26% and in-situ permeability averaging more than two Darcies. The structure is a simple tilted fault block, bounded to the West and North by first and second order faults respectively, with the field structure dipping at around nine degrees toward the South-East. The depth of the crest of the structure is only 600 metres below sea level, with crude oil-water contact at 960 metres below sea level. Ground elevations are in the order of 200 metres above mean sea level. The Fatehgarh crude oil column covers an area in excess of 13 km<sup>2</sup>.

Mangala crude oil is waxy and sweet, having a low sulphur content, averaging 27.3 degrees API and a relatively high pour point of 40 degrees Celsius to 45 degrees Celsius. The reservoir is normally pressured and hot water flooding is implemented to maintain reservoir pressure and efficiently improve oil recovery.

The Mangala field development plan recommended drilling of wells from the well pads will significantly reduce their overall footprint and environmental impact. Consequently, all wells are deviated to some extent. As of 30 September 2016, a total of 18 well pads were in place and production was originating from wells equipped with artificial lifts, such as jet pumps and electrical submersible pumps.

The Mangala field development plan envisaged drilling 162 development wells, out of which 12 were horizontal producers which have since been drilled and completed. Of these, 111 wells were producing and 51 were injector wells injecting water into the reservoirs. The commercial production in the Mangala field commenced in 2009 and reached 150,000 bopd in 2012, which is the peak rate approved by the field development plan. Additionally, 48 infill wells were also drilled as pre-producers to be converted later on into polymer injectors during polymer phase. An additional 3 horizontal wells have also been drilled to support field performance.

To increase the ultimate oil recovery and aid to production volumes, efforts are being made to embark on an enhanced oil recovery or EOR project, which was successfully executed with encouraging results during fiscal year 2016. The first polymer injection at the Mangala field started in October 2014. By end of fiscal year 2016, polymer injection was ramped up to the target levels of 400,000 blpd and, going forward, the plan is to maintain injection at this rate. EOR alone led to an increased oil recovery averaging about 47,000 boepd in the six months ended 30 September 2016. The integrated drilling programme was completed for 93 new wells during the year. In October 2015, the central polymer facility was made fully operational with five trains preparing polymer solution.

The alkaline surfactant polymer enhanced oil recovery pilot commenced during fiscal year 2015 and has shown positive results with better mobilization of un-swept oil. Preliminary analysis suggested that the alkali surfactant polymer pilot wells produced approximately 10-15% incremental oil of the pilot stock tank of oil in place over polymer flood.

Northern Fields — Bhagyam.

Bhagyam is the second largest discovery, after Mangala, in the Northern Barmer Basin in the state of Rajasthan.

The main reservoir unit in the Bhagyam field is of the late Palaeocene Age Fatehgarh group. The Fatehgarh sequence consists of stacked reservoir units of interbedded sands and shales deposited in fluvial environment. The Fatehgarh group reservoir at Bhagyam is of high quality, with porosities ranging between 20% to 26% and absolute rock permeability averaging four to five Darcies. The structure is a simple tilted fault block, bounded to the West and North by first and second order faults, respectively, with the field structure dipping at around 10 to 12 degrees toward the East-South-East. The depth of the crest of the structure is about 250 metres below sea level, with crude oil-water contact at 450 metres below sea level. Ground elevations are in the order of 200 metres above mean sea level. The Fatehgarh crude oil column covers an area of 4.5 km<sup>2</sup>.

Bhagyam crude oil is waxy and sweet, and of medium gravity, averaging 26 degrees API and has a pour point of 40 to 45 degrees Celsius which is similar to the pour point of the crude oil from the Mangala field.

Further, there is slightly more variation in crude oil type with depth at Bhagyam than in the other Northern Fields with a variation from 21 degrees API close to the oil-water-contact and up to 33 degrees API at the crest of the structure. Moreover, the Bhagyam field has a very small gas cap in the Fatehgarh Group accounting for less than 1% of the total reservoir hydrocarbon pore volume.

The reservoir is normally pressured and peripheral hot water flooding has been implemented to maintain reservoir pressure and efficiently sweep the oil. Artificial lifts have been installed in almost all the production wells in the Bhagyam field.

Crude oil production from Bhagyam commenced in 2012. In Bhagyam, a total of 153 development wells have been drilled as of 30 September 2016, of which 112 are producer wells and 41 are injector wells. Crude oil is transported via the Bhagyam trunk line to the MPT for processing and further export through the main section of the Pipeline.

Northern Fields — Aishwariya.

The Aishwariya field is located in the northern Barmer Basin in the state of Rajasthan, immediately south of the Mangala field and was discovered in March 2004.

The basin is a tertiary rift, consisting predominantly of Palaeocene-Eocene sediments. The main reservoir unit in Aishwariya is of the Fatehgarh group, consisting of stacked reservoir units of interbedded sands and shales. The reservoir characteristics of the Fatehgarh sands vary from moderate to excellent with porosities ranging from 12% to 26% and *in-situ* permeabilities ranging from 10 milli-Darcies to over 20 Darcies. The Aishwariya structure is a simple tilted fault block, dipping at around 12 degrees to the east.

Aishwariya crude oil is waxy and sweet, having a low sulphur content, with an API gravity ranging from 27 degrees to 32 degrees API. Like the Mangala field, the crude oil has a relatively high pour point of 40 to 45 degrees Celsius. The reservoir is normally pressured and hot water flooding is planned to be implemented to maintain reservoir pressure and efficiently sweep the oil.

The Aishwariya FDP included a drilling programme of 51 development wells, namely 36 producer wells and 15 injector wells, to recover the reserves using the water flood method. Additional 20 infills were drilled to fully exploit the potential of the field. Production from the Aishwariya field commenced in 2013.

Northern Fields — Raageshwari Deep Gas Field.

The Raageshwari deep gas field was initially designed to supply gas to meet the energy requirements at the MPT and the Pipeline. A revised field development plan was approved by the GoI in December 2014 for commercial gas sales and internal fuel consumption. As of 30 September 2016, 30 wells have been drilled and completed with multistage hydraulic fractures and are being brought progressively under production. Hydraulic fracturing operations have also been completed in all the wells with 5-7 zones fractured in each well. These fracturing operations have increased the flow rates, with wells having flow rates of up to 8 to 10 mmscfd, which is 1.5-2.0 times the rate previously achieved from this reservoir. The processed gas is transported to GSPL grid through midstream pipeline and MPT through fuel gas pipelines for captive consumption.

Southern Fields — Raageshwari. The Raageshwari crude oil field is located at the northern end of the Central Basin High within the Barmer Basin and was discovered in 2003.

A 3D seismic survey over this area of the Rajasthan Block has identified that the Raageshwari crude oil field is separated into various fault blocks which are likely to require individual drain points to develop the field's resources.

The shallow Thumbli sandstone reservoir is the primary reservoir in the field. The Thumbli section is a relatively low permeability sandstone formation of laminated sands and shales. The typical porosity ranges from 20% to 35%, with permeability varying from 10 milli-Darcies to 250 milli-Darcies.

The Raageshwari field also has a gas cap which provides natural pressure support while the oil field is under production, and the gas cap will serve as a source of production in the future, once the oil recovery has been optimised.

The crude oil from the Raageshwari field has a crude oil gravity of 35 degrees API, a high wax content and a relatively high pour point. though not as high as the crude oil found in the Northern fields.

The Raageshwari field commenced production in 2012. As of 30 September 2016, 5 development wells have been drilled.

The approved field development plan focuses on the use of the minimum facilities to provide separation, metering, and flow lines with the associated infrastructure and utilities. Crude oil, water and associated gas from the well heads will be processed through production and separation units on each of the planned pads.

Southern Fields — Saraswati. The Saraswati field was discovered by Cairn India in 2001. There are two reservoir types in this field, the Fatehgarh Group Sandstone Reservoir and the Barmer Hill Formation sandstones. The Fatehgarh formation at this location is approximately 65 km south of the Mangala field, at a deeper depth and lower quality as compared to the Northern Fields with porosity of 15% to 20% and permeability of between 50 milli-Darcies to 100 milli-Darcies. The Barmer Hill formation is tight but there is evidence of a fracture system at Saraswati which would increase its production potential.

Saraswati crude oil is light and sweet, having a low sulphur content, and has a typical crude oil gravity of 40 degrees API. Similar to crude oil from the other fields in the Rajasthan Block, it has a high wax content, but its pour point is lower, at 30 degrees Celsius.

The Saraswati field commenced production in 2011. As of 30 September 2016, 5 development wells have been drilled.

This oil is being processed at the MPT and is being co-mingled with the Mangala oil sold through the Pipeline. The development facilities provide for separation, metering, and flow lines with the associated utilities and infrastructure. Crude oil, water and associated gas are processed through production and separation units on each of the planned pads.

Barmer Hill and Other Fields. In addition to the MBA, Raageshwari and Saraswati fields, Cairn India has discovered 33 other fields (including the Barmer Hill formation) that contain hydrocarbons.

The Barmer Hill formation is present throughout the basin overlying the Fatehgarh formation. The Barmer Hill is an extensive low-permeability formation that contains substantial oil in place and was discovered in 2004 with the Mangala and Aishwariya field discoveries.

During fiscal year 2016, the Barmer Hill appraisal campaign was successfully completed. A total of 15 wells were drilled, a combination of seven vertical and eight horizontal wells, across Mangala and Aishwariya formations in fiscal year 2015. Until February 2016 production from these fields was through the existing 8 wells of Mangala BH and 7 wells of Aishwariya BH. An order to cease production from these fields, pending submission and approval of an FDP, was received from the Director General of Hydrocarbons (the "DGH") in February 2016. The fields are currently not in production. CIL is preparing FDPs with phased developed plans, the first phase of which would use the existing wells. The NI and NE fields are currently in production with 4 and 2 wells respectively.

# Further Potential Exploration

In fiscal year 2016, Cairn India announced a new discovery and the total discoveries made till date are 38. Since resumption of exploration in Rajasthan from 2013, the company has announced 13 new discoveries till 30 September 2016, Cairn India has discovered 1.7 billion boe of drilled and tested hydrocarbons initially in place with an additional 0.45 billion boe of hydrocardons initially in place drilled but yet to be tested. Exploration successes in Rajasthan have led to the addition of over 200 mmboe of 2C Resources since 2013. Exploration activities will continue focussing on seismic data processing and interpretation. In order to enhance the current portfolio, efforts are on integration of all available data and identification of high impact new plays.

### The Mangala Processing Terminal

The MPT is spread over an area of 1.6 sq. kms and is a core asset. The MPT processes crude oil produced from the Rajasthan block. Following processing, the crude oil is transported to refineries through a 24 inch diameter continuously heated and insulated pipeline. The MPT's integrated production facilities support the field development plan approved production, which is in line with Cairn India's unified Rajasthan block off-take capability.

During fiscal 2016, the capacity of the injection water system was upgraded to around 700,000 barrels of water per day. A new water well has been drilled at Thumbli and hooked up with the MPT through a new 30 inches pipeline. An injection water pump was also installed as part of the additional facility, which will augment injection water capacity. This will increase the voidage replacement ratio, thereby maintaining field pressure and enhancing recovery rates from the field. In addition, this would improve the reliability and efficiency of water injection at the Rajasthan Block as well as create spare capacity.

### The Mangala development pipeline or MDP

The MDP is designed to evacuate the crude oil and transport gas from the Rajasthan block. Beginning at the MPT and Raageshwari terminal respectively, the 24 inch crude oil and 8 inch gas pipeline passes through eight districts across two states, Rajasthan and Gujarat. The pipeline ends at Bhogat near Jamnagar on the western coast of India. There are buffer crude storage terminals at Radhanpur and Viramgam for sales to Indian Oil Corporation and off-take lines at Salaya for sales to the Reliance India Limited and Essar Oil refineries in Jamnagar.

Since its commissioning, total cumulative crude oil sales of 332 million barrels have been achieved through the existing pipeline facilities up to 31 March 2016. With the use of drag reducing agents, the proven dispatch capacity of the Mangala development pipeline has been enhanced to around 250,000 bbls per day. Given its length, the Mangala development pipeline incorporates a pipeline intrusion detection system to provide surveillance along its entire length by using fibre optics. Vedanta's pipeline operations received the prestigious Oil Industry Safety Directorate award for 'Best Near-Miss reporting' and accreditation of both OHSAS: 18001 and ISO: 14001 systems.

In fiscal year 2014, gas sales commenced through the 8 inch gas line. Capacity was further enhanced through installation of higher capacity gas compressors at Raageshwari and Viramgam terminals to nearly double gas sales capability and modification of impellers of the mainline booster pumps at Viramgam. During fiscal year 2016, stabilization of the compressors and optimization of plant operations aided the production.

In November 2015, the Salaya-Bhogat pipeline and terminal at Bhogat were commissioned and the first cargo of 500,000 barrels of Rajasthan crude oil was successfully loaded in December 2015 through the Bhogat terminal for Mangalore Refinery and Petrochemicals Limited or MRPL. The terminal has provided the access to larger market for Rajasthan crude. This should enable us to diversify customer mix and reduce dependence on limited number of customers.

The Bhogat terminal in the Jamnagar district of Gujarat, is a 160 hectare site located eight kms from the Arabian Sea coast. The terminal will facilitate the storage and evacuation of crude oil by sea. The terminal consists of tankages with storages capacity of about 2.1 million barrels of Rajasthan crude. It also has associated facilities for operation of terminal and marine export of crude. Evacuation facility includes two 24 inch sub-sea export pipelines from the Bhogat landfall point to the single point mooring system to enable crude transfer and a single point mooring system and sub-sea pipeline end manifold in deep sea to enable tanker berthing and loading.

# The Ravva Block — Krishna Godavari Basin

Cairn India is the operator of the Ravva field in the Ravva Block, which lies in the Krishna Godavari Basin mostly off the coast of the state of Andhra Pradesh in eastern India in water depths of between approximately 5 and 40 metres isobaths. ONGC discovered the Ravva field in 1987 and production commenced in 1993.

As on 30 September 2016, Ravva field had produced more than 280 mmbbls of crude oil and 347 bcf of gas since it commenced production, significantly more than the initial expectations achieving approximately 50% recovery.

# The Ravva PSC

The production sharing contract for the exploration, development and production of the Ravva block (the "Ravva PSC") was signed on 28 October 1994 between GoI and a consortium consisting of ONGC, Videocon Industries Limited (formerly Videocon Petroleum Limited), Ravva Oil and Cairn Energy India Pty Limited (formerly known as Command Petroleum (India) Pty Limited) ("Command Petroleum") with Command Petroleum being designated as the operator. In 1996, Cairn Energy Plc acquired Command Petroleum, including its interest in the Ravva block, and Cairn India became the operator.

Cairn India holds a 22.5% working interest in the Ravva field with the remaining interests currently held by ONGC (40%), Videocon Industries (25%) and Ravva Oil (12.5%) (together, the

"Ravva JV). The PSC is currently valid until 27 October 2019, but may be extended by the GoI for up to an additional ten years in the case of commercial production of non-associated natural gas or up to five years otherwise. The MoPNG, the notification dated 28 March 2016, issued a policy for the grant of an extension to the PSCs signed by the GoI awarding small, medium sized and discovered fields to private joint ventures ("Extension Policy"). The Extension Policy defines the framework for the granting of extension and covers 28 small and marginal fields, including the Ravva field.

Under the Ravva PSC, Cairn India is entitled to recover 100% of exploration, development and costs of production from crude oil and natural gas sales before any profit is allocated among the parties. Further, until such time as India attains self-sufficiency in its crude oil supply, Cairn India is required to sell in the domestic Indian market all of its entitlement to crude oil extracted from the Ravva field to assist in satisfying domestic Indian crude oil demand. All sales to the GoI nominees are to be valued at a FOB selling price per barrel in US dollars, ascertained on Platts, of one or more crude oils of similar characteristics and quality or through the spot market for such crude oils, whichever price is determined by the parties to reflect more truly the current value of the sale. See "Risk Factors — Business Risks".

The Ravva PSC also provides that royalties and cess are payable on production. The royalty rate on crude oil and casing head condensate is set at Rs. 481 per metric tonne (\$1.0 per barrel), regardless of the value of the crude oil. A levy on the production of crude oil under the provisions of the Oil Industry (Development) Act, 1974 of India (the "OIDA Cess") is set by the Ravva PSC at Rs. 900 per tonne of crude oil production (\$1.8 per barrel). A further Rs. 27 per barrel (\$0.1 per barrel) (representing a 3% increase in the OIDA Cess) is levied against members of the Ravva JV as educational cess and senior and higher secondary educational cess until November 2013. From December 2013, the educational cess and senior and higher secondary educational cess levied was discontinued as per the circular from the Ministry of Finance.

The royalty payable on natural gas is 10% of the wellhead value of the natural gas (typically 9% of natural gas revenue). OIDA Cess is not payable on natural gas production. Royalties and OIDA Cess are capped by the Ravva PSC at these levels regardless of the generally prevailing royalty and OIDA Cess rate. Royalty and OIDA Cess payments are recoverable under the Ravva PSC before any profit is allocated among the parties. As ONGC originally discovered the Ravva field, Cairn India and the other members of the Ravva JV are obliged to make a series of production payments to ONGC based on cumulative crude oil production. The method of calculating the production payments is set out below.

	GrossPayment	Net Payment
	Owed to	by Cairn
	ONGC	<u>India</u>
	(\$ mi	llion)
For every 25 million barrels produced up to 75 million barrels	9.0	3.4
For every 5 million barrels produced between 75-100 million barrels	1.8	0.7
For every 5 million barrels produced between 100-225 million barrels	1.7	0.6
For every 5 million barrels produced between 225-250 million barrels	1.4	0.5
For every 5 million barrels produced over 250 million barrels	1.0	0.2

From time to time, disputes have arisen between the joint venture over the interpretation of the Ravva PSC which have required arbitration. For example, a dispute arose between the GoI and Ravva Joint Operating Partners on the issue of excess cost recovery made by Ravva joint operation partners against the base development cost as mentioned in the Ravva PSC which has limited the escalation of such costs for cost recovery purposes. The Ravva joint operation partners (excluding ONGC) initiated arbitration proceedings and the arbitral tribunal announced its award on 18 January 2011, broadly allowing companies including Cairn India to recover base development cost spent amounting to \$278 million and disallowed an over-run of \$22.3 million spent in respect of base development cost and

directed 50.0% legal cost on the GoI. The High Court of Kuala Lumpur, on 30 August 2012, dismissed the GoI's application for setting aside the award with costs.. The GoI further filed an appeal before the Court of Appeal, Kuala Lumpur, which was dismissed on June 27, 2014. The GoI thereafter filed an application for a leave to appeal against the Court of Appeal's order before the Federal Court, which was dismissed by the Federal Court of Malaysia on 17 May 2016. Meanwhile, GoI issued a show-cause notice in this matter which Cairn India Limited replied to and subsequently also filed an application for enforcement of the award before the Delhi High Court as an additional measure of caution. The next hearing in the matter is scheduled for 15 February 2017. Additionally, on 14 August 2015, the GoI filed a suit and obtained an ex-parte 'stay-order' from the Delhi High Court against the determination of 'quantum of costs' by the arbitral tribunal. Cairn India filed an appeal before the Court against the 'stay order' and the 'stay-order' obtained by the GoI in this matter was set aside on 3 May 2016. The next hearing before the Court in the Gol's civil suit is scheduled for 21 April 2017. GoI has also filed an SLP before the Supreme Court against the Division Bench Order of the High Court, dated 3 May, 2016, setting aside the 'stay-order' obtained by the GoI, which is due for hearing on 31 January 2017 See "Business — Litigation — Arbitration proceedings on issues related to the cost recovery of the Ravva block."

The Ravva JV operates eight unmanned offshore platforms and a 225 acre onshore processing facility at Surasaniyanam, Andhra Pradesh, for processing the natural gas and crude oil produced from the offshore field. The Ravva onshore terminal operates in internationally recognized environmental standard (ISO 14001) and occupational health and safety standard (OHSAS18001). The onshore facility has the capacity to handle 70,000 bopd of crude oil, 95 mmscfd of natural gas and 110,000 bbls of water injection per day. The terminal also has the capacity to store 1.0 mmbbls of crude oil and captive power generation capacity of 10 MW.

# Production from the Ravva Field

During fiscal year 2016, the block produced 23,845 boepd on a gross basis, with a plant uptime of 99.7% and was supported by coil tubing based rig-less well intervention programmes contributing significantly to the total field production. Production optimisation efforts such as deeper gas lift valve installation in oil wells and the de-bottlenecking of the water separation unit also assisted in realising higher production, thus arresting the average field decline during the year. Sustained water injection rates through acid stimulation in five water injection wells and deeper gas lift injection have also supported production from oil wells.

The following table sets out the net average oil and gas daily production from the Raava block for the years ended 31 March 2014, 2015 and 2016 and for the 6 months ended 30 September 2015 and six months ended 30 September 2016.

Average Daily					30 September	30 September
Production	Units	2014	2015	2016	2015	2016
Gross operated	Boepd	27,386	25,989	23,845	27,303	19,228
Net operated	Boepd	6,162	5,847	5,365	6,143	4,326
Oil	Bopd	4,796	5,077	4,690	5,369	3,797
Gas	Mmscfd	8.2	4.6	4.1	4.6	3.2

# The Cambay Basin Block — Lakshmi, Gauri and CB-X

The Cambay CB/OS-2 ("Cambay") block is an offshore block which is located in the Cambay Basin of the state of Gujarat in western India. Vedanta's operations in the Cambay block are centered on the Lakshmi and Gauri oil and gas fields and the CB-X development area. Based on exploration and development activities undertaken by us, the Cambay block has yielded natural gas discoveries in its offshore Lakshmi and Gauri fields and onshore CB-X field and crude oil discoveries in the former two fields. Gas production commenced from the Lakshmi gas field in 2002 and from the Gauri field in 2004. Production of co-mingled crude oil, which consists of crude oil plus condensate, from the

Gauri field commenced in 2005. The Lakshmi and Gauri offshore fields cover areas of 121.1 sq. kms and 50.7 sq. kms, respectively, in the Cambay Basin and lie off the coast of the state of Gujarat in water depths of approximately 20 meters. CB-X is an onshore gas field situated in the Cambay block and covers an area of 33.28 sq. kms.

As of 30 September 2016, the block has produced  $\sim$  27 mmbbls of crude oil and  $\sim$  228 bcf of gas with an overall recovery of 30% since inception.

An 82-acre onshore processing facility at Suvali processes natural gas and crude oil from the Lakshmi and Gauri fields. This facility has a capacity to process 150 mmscfd of natural gas and 10,000 bopd of crude oil and includes a three stage separator oil processing train, four storage tanks of combined capacity of 37,700 bbls and a 4.8 MW captive power generation capacity. As part of the asset's long term facility augmentation plan, a storage tank to expand the crude storage capacity at Suvali terminal and an offshore gas lift compressor package to provide artificial lift to the wells have been commissioned during the year. The processing plant and offshore infrastructure are certified to ISO 14001 and OHSAS 18001 standards.

# Cambay Basin PSC

Exploration, development and production of the Cambay Basin Block is governed by a PSC between the GoI and a consortium consisting of ONGC, Tata Petrodyne Limited and Cairn India (the "Cambay Basin JV") which was signed on 30 June 1998 (the "Cambay Basin PSC") and runs until 2023 and can be extended up to a period of 35 years in case of commercial production if non-associated natural gas or for a period not exceeding five years. Cairn India's participating interest in the Cambay Basin JV consists of a 40% interest in the Lakshmi, Gauri and CB-X development areas. The remaining interests in these development areas are held by ONGC (50%) and Tata Petrodyne (10%).

# Production from the CB/OS-2 Field

During fiscal year 2016, the block produced 10,249 boepd, with an uptime of 99.9%. Production was supported by effective reservoir management practices offsetting its natural decline. A successful well intervention campaign carried out during the first quarter of fiscal year 2016, which helped improve the deliverability of producer wells. Commissioning of an artificial gas lift system and better reservoir performance also added to the production. Cleaning and intelligent pigging of the 24" diameter 36 km long sub-sea pipeline in Cambay was accomplished with minimal downtime during the year.

The following table sets out the net average oil and gas daily production from the CB/0S-2 block for the years ended 31 March 2014, 2015 and 2016 and during the six months ended 30 September 2015 and 30 September 2016.

Average Daily					30 September	30 September
Production	Units	2014	2015	2016	2015	2016
Gross operated	Boepd	9,735	10,538	10,249	10,071	10,078
Net operated	Boepd	3,894	4,215	4,100	4,028	4,031
Oil	Bopd	3,099	3,419	3,538	3,484	3.409
Gas	Mmscfd	4.8	4.8	3.4	3.3	3.7

## Exploration Blocks

In addition to the Rajasthan Block, Ravva Block and Cambay Basin Block, Cairn India also holds interests in five other blocks where there is currently no production but which are in various stages

of exploration or early development. The main basins where Cairn India is currently actively involved in exploring include the Orange Basin, the Barmer Basin, Mumbai Offshore Basin, the Krishna Godavari Basin, and the Palar Pennar Basin. This section provides a summary of the exploration interests.

Krishna Godavari Basin — Block KG-ONN-2003/1 (49% participating interest)

The onshore block KG-ONN-2003/1, located in the Krishna Godavari basin in the state of Andhra Pradesh, was awarded in NELP V round to a joint venture between Cairn India and ONGC. Cairn India and ONGC entered into a PSC on 23 September 2005 (the "KG-ONN-2003/1 PSC"). As of 30 September 2016, Cairn India has 49% ownership interest in the block. Nagayalanka-1Z was the first discovery in the block. Following this discovery, the joint operation (with ONGC) for the block opted to enter phase-II of the exploration license. The second exploration well, Nagayalanka-SE-1, was drilled which resulted in a light oil discovery in the onshore part of the KG basin.

The Declaration of Commerciality for the two Nagayalanka discoveries (Nagayalanak-1z and Nagayalanka SE-1) was approved at the Management Committee meeting held in July 2014. Operatorship was then transferred to ONGC as per the KG-ONN-2003/1 PSC. ONGC has submitted the Field Development Plan or FDP to the Management Committee and the FDP is being reviewed by the Management Committee.

Krishhna Godavari Basin — Block KG-OSN-2009/3 (operator, 100% participating interest)

The offshore block KG-OSN-2009/3 covers an area of 1,988 km<sup>2</sup> and is located in the Krishna Godavari Basin off the coast of the state of Andhra Pradesh. It was awarded to Cairn India, which holds 100% of the interests, as of 30 September 2016. Block KG-OSN-2009/3 is a shallow water block with water depths within the block ranging between near shore to 400 metres. The PSC was signed on 30 June 2010 and the PEL was granted in August 2010.

100% of the planned 1,075 km<sup>2</sup> of 3D seismic data acquisition was completed during fiscal year 2015. During fiscal year 2016, seismic processing and interpretation projects were carried out, resulting into identification of four prospects and a number of smaller leads over different play types. Cairn continues to engage with the MoPNG for an extension contingent upon full lifecycle clearance from Ministry of Defence. Phase-I was up to 8 March 2016.

Palar Pennar Basin — Block PR-OSN-2004/1 (operator, 35% participating interest)

Block PR-OSN-2004/1 is located in the Palar Pennar basin, south of the Krishna Godavari basin and north of the Cauvery basin off the east coast of India. Water depths in the block range from a few metres (near shore) to 400 metres at the eastern boundary of the block. The block covers an area of approximately 9,417 km<sup>2</sup>.

Cairn India has a 35.0% ownership interest in the block and is the operator, while the consortium members, ONGC and Tata Petrodyne, hold interests of 35.0%, and 30.0%, respectively.

The block was under force majeure since fiscal year 2010 as the location was falling within the prohibited zone notified by government authorities and permission to carry out exploration and petroleum operations in this area was not considered appropriate by the Department of Space, GoI. However, the application for the shift of the restricted boundary has been accepted by government authorities paving the way for further exploration activity. Approval for a special dispensation period in the block was granted for 30 months effective from January 1, 2015 and date of the expiry of Phase-1 is expected to be 30 June 2017. The prospect inventory description of the block has been completed. The program for drilling the commitment wells is being advanced and drilling is planned to commence in the fourth quarter of fiscal year 2017.

This block was awarded under the NELP VIII licensing round and is located in the Mumbai Offshore Basin. Cairn India operates and holds a 100% interest in the block. MB-DWN-2009/1 has water depths of between 1,000 metres to 2,200 metres.

The processing of the acquired 2,128 line km of 2D broadband seismic was completed in fiscal year 2015. During fiscal year 2016, regional prospectively analysis has been completed, together with interpretation of the newly acquired PSTM processed broadband 2D seismic data. Due to poor prospects and high levels of risk revealed through the analysis, Cairn India has applied for the relinquishment of the block. The first exploration phase expired on 16 April 2016 and the formalities related to the relinquishment of the block are in progress.

Block 1 — Orange Basin, South Africa (operating through a subsidiary, 60% participating interest)

Cairn India signed a farm-in agreement with PetroSA, the national oil company of South Africa, for the 19,898 km<sup>2</sup> off-shore block 1 ("Block 1"), located in the Orange Basin in South Africa. A wholly owned subsidiary, Cairn South Africa Pty. Limited, a wholly owned subsidiary of Cairn India holds a 60% participating interest in Block 1 and is the operator.

Following farm-in and assignment of participating interest in the block in early calendar year 2013, 1,981 km<sup>2</sup> of 3D seismic data was acquired in fiscal year 2014. Additionally, acquisition of 3,000 line km of 2D seismic data was concluded in early March, 2014. Both the 3D seismic and 2D seismic surveys were completed without incident and on time.

A robust inventory of exploration prospects has been identified based on fiscal year 2014 3D seismic survey, which covers the outboard portion of Block 1. The outboard region is interpreted as oil-prone, constituting a play fairway that has not been tested by historical exploration drilling. Assessment of exploration potential of inboard plays is ongoing to provide other drilling options. Cairn India awaits a decision on the proposed changes to the Mineral and Petroleum Resources Development Act, 2002 and fiscal regime before considering a decision to progress into the second exploration license phase.

# Distribution, logistics and transport

## Rajasthan

The MPT has been designed as a centralised hub facility to handle crude oil production from the fields in the Rajasthan Block. Once crude oil reaches the MPT, generally via the Pipeline, it is processed and transported to public-sector undertakings or private refineries as per sales agreement.

Gas produced from Raagehswari fields in sold to a Government allocated fertilizer unit located in Gujarat.

# Cambay

The 82-acre onshore processing facility at Suvali processes natural gas and crude oil from the Lakshmi and Gauri fields. It has a capacity to process 150 mmscfd of natural gas and 10 kbopd of crude oil and includes a three stage separator oil processing train, four storage tanks of combined capacity of 37,700 bbls as well as 4.8 MW captive power generation capacity. The processing plant and offshore infrastructure are certified to ISO 14001 and OHSAS 18001 standards.

The crude oil produced from Suvali Onshore Terminal is transported via truck tankers approximately 15 km to Adani Hazira Port Private Limited. Thereafter, the crude cargo is sold to coastal refineries via sea tankers.

The processed natural gas is sold through the Gujarat State Petronet Limited pipeline facility to CLP India Private Limited and Gujarat Gas Corporation Trading Limited.

#### Ravva

Currently, there are eight unmanned offshore platforms and a 225 acre onshore processing facility at Surasaniyanam for processing the natural gas and crude oil produced from the offshore field. The Ravva onshore terminal operates as per the internationally recognized environmental standard (ISO 14001) and the occupational health and safety standard (OHSAS18001). Onshore facility has the capacity to handle 70 kbopd of crue oil, 95 mmscfd of natural gas and 110,000 bbls of water injection per day. The terminal also has the capacity to store 1.0 mmbbls of crude oil.

The crude produced from the wells in the Ravva block is sent to the onshore processing terminal via subsea pipelines. The oil is processed and stored in the storage tanks at the terminal. Thereafter, the crude oil is transported to local refineries (nominated by GoI) via 20 inch export line (approximately 16 km long) from the terminal to a ship tanker, which is moored to the single point mooring buoy located in the field. The single point mooring buoy and associated equipment are together termed as tanker mooring and loading facility.

Natural gas from the wells after treatment is transported to buyer's (GAIL) pipeline.

## Sales and marketing

Cairn India's 10 largest customers accounted for approximately 100% of its revenue in fiscal years 2014, 2015 and 2016 respectively. Four of Cairn India's customers accounted for greater than 90.0% of Cairn India's business revenue in fiscal years 2014, 2015 and 2016. In fiscal year 2016, Cairn India sold 100% of the oil and gas it produced in the Indian market.

100% of the oil and gas that Cairn India produced in fiscal year 2016 was sold under annual/monthly contracts specifying quantity and price. For Rajasthan and Cambay blocks, crude oil price is benchmarked to Bonny Light, West African low sulphur crude that is frequently traded in the region, with appropriate adjustments for crude quality. Similarly, for Ravva block, crude oil price is benchmarked to Tapis and Minas, South Asian crude. The crude oil price benchmarks are based on crude oil sales agreement.

### Projects and Developments

Cairn India intends to spend \$100 million on working interest capital expenditure split between 20% for exploration and 80% for development activities in fiscal year 2017. The activities mainly include Raageshwari gas development, Mangala enhanced oil recovery completion activities, pre-engineering work for Bhagyam & Aishwariya enhanced oil recovery and Aishwariya Barmer Hill. All the projects will be financed from internal sources. A number of our principal projects are set out below.

MBA fields — enhanced oil recovery project including drilling campaign and facilities upgrade

During fiscal year 2016, the water injection capacity was upgraded at the MPT to 700,000 barrels of water per day by addition of Thumbli pipeline and an injection water pump. This will aid in enhancing recovery rates from the field and has also improved the overall integrity of Vedanta's water injection systems.

Successful execution of polymer flood has yielded positive results with an increase in oil production and stabilization of water cut. At the end of fiscal year 2016, polymer injection ramped up to planned levels of 400,000 blpd and, going forward, plans are being made to maintain the injection at this rate. Enhanced oil recovery led to an increased oil recovery averaging about 47,000 boepd in the first half of fiscal year 2017.

The development of Barmer Hill and Satellite Fields is a key growth driver for Cairn India, with a focus on increasing non-MBA production through the development of these fields. The Barmer Hill formation can be classified into two major development opportunities: Barmer Hill North, consisting of oil prone porcellanite rocks, and Barmer Hill South, consisting of muddy porcellanites.

During fiscal year 2016, Barmer Hill appraisal campaign was successfully completed. A total of 15 wells were drilled, a combination of seven vertical and eight horizontal wells, across Mangala and Aishwariya formations in fiscal year 2015. A combination of different completion types has been tested in both vertical and horizontal wells to permit optimization. The wells were put on long term testing to ascertain decline rates and deliverability. Valuable data gathered through the programme is now being used towards a full field development plan. A set of advanced technologies was deployed to delineate key parameters.

Appraisal activities produced significant learning on fraccability and well productivity in Mangala and Aishwariya. Wells at Aishwariya showed greater productivity (800 to 1,000 bopd) and consequently full field development at Aishwariya has been prioritized. Cairn India achieved sub-surface technical alignment with ONGC, its joint venture partner, and is progressing on technical alignment for the surface facility.

The Satellite Fields produced 1.3 mmboe of oil during fiscal year 2016. The focus here is to improve productivity, reduce operating expenditure and to bring more wells online. Several optimisation interventions have helped reduce total cost of production and enabled the project to withstand current oil price conditions.

In fiscal year 2016, Cairn India successfully concluded appraisal work in the Guda field. A total of eight wells were tested and modular quick production facilities were deployed in a number of well pads. Long term testing of the wells has yielded positive indication and a revised field development plan is being prepared for monetising this field.

# Gas development

During fiscal year 2016, Cairn India achieved progress regarding the pipeline connectivity from its Raageswari Deep Gas terminal by signing a framework agreement with GIGL and GSPL. As per the agreement, Cairn India shall be provided wiith tie-in connectivity to the pipeline grid, which is being developed by GIGL pursuant to authorization by PNGRB.

Cairn India is also working on a phased ramp-up of gas production. The first phase includes low cost augmentation of the existing facility and installation of additional gas compressor stations. Completion of Phase-1 is expected to increase the gas production to 40-45 mmscfd by end of the first hald of the calender year 2017. For the second phase, Cairn India is progressing well on its tendering process for new gas processing terminal and rig services. Completion of Phase-2 will increase the gas production upwards of 100 mmscfd and condensate production to about 5,000 boepd.

As a result of the successful application of hydro frac technology and better reservoir characterisation, the expected ultimate recovery from the RDG field has been upgraded by 26% as of 30 September 2016. During this hydro frac campaign, Cairn India has successfully placed the largest frac in India in one of the RDG wells.

# Market share and competition

The oil and gas exploration and production industry in India is competitive. In seeking to obtain desirable exploration and development prospects, competition is faced from Indian companies, including ONGC and Reliance Industries Limited, and major integrated and large independent multinational companies. GOI has major stake in ONGC, which has won majority of the exploration

blocks offered by the GoI in the nine New Exploration & Licensing Policy rounds held thus far. Many of these competitors have access to financial or other resources substantially in excess of those available to us and accordingly may be better positioned to acquire and exploit prospects, hire personnel and market production. In addition, many of Vedanta's competitors may be better able to withstand the effect of external changes in industry conditions such as worldwide crude oil and natural gas prices and levels of supply and the application of government regulations, which affect Vedanta's business and which are beyond Vedanta's control.

Vedanta is a significant contributor to India's domestic crude oil production, operating approximately 27% as derived from the Ministry of Petroleum and Natural Gas statistics of March 2016.

### Zinc Business

#### Introduction

Vedanta's fully integrated zinc business in India is owned and operated by HZL, India's leading primary zinc producer with a 79.1% market share by sales volume in India in fiscal year 2016, according to ILZDA.

HZL's fully-integrated zinc operations include five lead-zinc mines, one rock phosphate mine, four hydrometallurgical zinc smelters, two lead smelters, one pyrometallurgical lead-zinc smelter, seven sulphuric acid plants and six captive power plants at the Chanderiya, Dariba and Zawar facilities in the state of Rajasthan, processing and refining facilities for zinc at Haridwar and processing and refining facilities for zinc and lead, as well as a silver refinery at Pantnagar, both located in the State of Uttarakhand in northern India. HZL sources almost all of its concentrate requirements from its mines and HZL also exports surplus zinc and lead concentrates. HZL's annual production of zinc and lead for year ended 31 March 2016 was 758,938 tonnes and 151,576 tonnes, respectively.

In 2016, HZL was one of the top five lead mining companies based on production volumes and in the lowest cost quartile in terms of all zinc mining operations worldwide, according to Wood Mackenzie. In addition, HZL's Rampura Agucha mine was the largest zinc mine in the world on a production basis and its Chanderiya hydrometallurgical zinc smelter was the fourth largest smelter on a production basis worldwide in 2016, according to Wood Mackenzie.

As of 30 September 2016, Vedanta Limited has a 64.9% ownership interest in HZL, with the remainder owned by the GoI (29.5%) and institutional and public shareholders (5.6%). Vedanta Limited exercised a call option in 2009 to acquire the GoI's remaining ownership interest in HZL although the exercise is subject to dispute and an alternative offer authorised by the Company's shareholders has not yet been accepted by the GoI. Accordingly, the acquisition might not proceed. See "— Litigation — Vedanta Limited has commenced proceedings against the GoI, which has disputed Vedanta Limited's exercise of the call option to purchase its remaining 29.5% ownership interest in HZL."

In recent years, HZL has improved its operating performance by:

- its ability to maintain a high share of concentrate from its Rampura Agucha mine by consistently adding to the capacity of the mine and the concentrator and by also adopting the technique of underground mining, as its open cast capacity has started to decline;
- commissioned a concentrator at Sindesar Khurd mine of 1.5 mmtpa in 2011 and increased capacity to 2.8 mmtpa in fiscal year 2016; also increased capacity of Sindesar Khurd mine to 3.0 mmtpa in fiscal year 2016;
- commenced ore mining Kayad mine since fiscal year 2013 and has a capacity of 1 mmtpa in fiscal year 2016;

- continuing its initiatives to improve operational efficiencies at its existing operations;
- reducing power costs by building on-site captive power plants rather than relying on state power grids;
- reducing the size of its workforce including through voluntary retirement plans;
- increasing productivity and upgrading existing technology; and
- increasing recovery from its residue and waste.

HZL pays royalties to the state government of Rajasthan based on its extraction of lead-zinc ore. The royalty rate is 10% of the LME zinc metal price payable on the zinc metal contained in the concentrate produced and 14.5% of the LME lead metal price payable on the lead metal contained in the concentrate produced. For silver, the royalty rate is 7.0% of the silver London Bullion Market Association price chargeable on silver-metal produced. Since September 2015, the MMDRA Amendment Act provides for a royalty of one third of the base royalty rate to be contributed to the DMF for the benefit of people affected by mining and an additional 2% of the base royalty rate to the NMET. Vedanta also pays royalties in connection with its zinc operations in Namibia at 3% of sale value the product, Ireland and South Africa.

In addition to ongoing exploration activities, HZL has finalised plans for the next phase of development growth, which will involve the sinking of underground shafts and developing underground mines. The plan comprises developing a 3.75 mtpa underground mine at Rampura Agucha, expanding the Sindesar Khurd mine from 2.0 mtpa to 4.50 mtpa, expanding the Zawar Group mines from 1.2 mtpa to 4.0 mtpa, expanding the Rajpura Dariba mine from 0.6 mtpa to 1.2 mtpa and developing a new mine at Kayad with capacity of 1.0 mtpa.

Vedanta's Zinc International business comprises assets held by Vedanta Limited, namely (i) Skorpion, which owns the Skorpion mine and refinery in Namibia, (ii) a 74%, (as of 30 September 2016) ownership interest in Black Mountain Mining, which has assets that include the Black Mountain mine and the Gamsberg Deposit, in South Africa and (iii) Lisheen, which owns the Lisheen mine in Ireland, which ceased operations in December 2015 and is in the process of being shut down. Vedanta has commenced the closure operation in April, 2014 and expects to receive the closure certificate in March, 2020.

## Principal products

Zinc. HZL produces and sells zinc ingots in all four international standard grades: Special High Grade (99.995%) ("SHG"), High Grade (99.95%) ("HG"), Continuous Galvanising Grade (99.5%)("CGG") and Prime Western (98.0%) ("PW"). HZL sells most of its zinc ingots to Indian steel producers for galvanising steel to improve its durability and also in the export markets. Some of its zinc is also sold to alloy, dry cell battery, die casting and chemical manufacturers. Skorpion produces SHG zinc ingots of LME grade. Skorpion offers the product to customers through one-year contracts and also through spot contracts with market-determined premiums, covering the sale of all zinc ingots produced at the integrated mine and refinery of Skorpion. Black Mountain produces zinc in concentrate which is sold through market priced off-take concentrate sales contracts with international customers and also in the spot market.

Lead. HZL produces and sells lead ingots of 99.99% purity primarily to battery manufacturers and to a small extent to chemical manufacturers. Black Mountain produces lead in concentrate, which is sold through market-priced off-take concentrate sales contracts with international customers and in the spot market.

### By-products

Sulphuric acid. HZL sells sulphuric acid to fertiliser and cement manufacturers and other industries.

Silver. HZL produces and sells silver ingots primarily to industrial users, jewellery manufacturers and traders of silver. Black Mountain also produces silver as a by-product.

*Copper.* Black Mountain produces copper in concentrate as a by-product, which is sold through market-priced off-take concentrate sales contracts with international customers and in the spot market.

### **Production**

The following table sets out Vedanta's total production<sup>(1)</sup> from its Chanderiya, Debari, Dariba and Vizag facilities for the periods indicated:

			Six months ended 30 September			
Facility	Product	2014	2015	2016	2015	2016
		(To	onnes, excep	t for silver w	hich is in m	oz)
Chanderiya:						
ISP <sup>(TM)</sup> pyrometallurgical lead-zinc						
smelter	Zinc	78,032	91,000	86,908	41,235	35,686
	Lead <sup>(2)</sup>	15,901	26,898	21,517	10,284	9,841
Hydrometallurgical zinc smelters	Zinc	398,919	373,724	401,562	213,017	131,644
Ausmelt(TM) lead smelter	Lead	30,586	6,110	23,045	18,923	952
Sulphuric acid plants	Sulphuric acid	586,919	547,165	618,426	316,921	230,183
Dariba:						
Hydrometallurgical zinc smelter	Zinc	197,715	199,694	203,704	103,512	79,625
Sulphuric acid plant	Sulphuric acid	459,026	480,542	499,222	250,922	188,036
Lead smelter	Lead	76,109	94,135	100,357	41,894	44,435
Debari:						
Hydrometallurgical zinc smelter	Zinc	74,501	69,385	66,764	40,510	5,124
Sulphuric acid plant	Sulphuric acid	282,565	251,408	224,675	133,754	37,166
Pantnagar Silver Refinery	Silver <sup>(3)</sup>	11.24	10.53	13.65	6.01	6.29
Skorpion:						
Zinc refinery	Zinc	124,924	102,188	82,029	42,495	46,770
Total	Zinc	874,091	835,991	840,967	440,769	298,849
	Lead	122,596	127,143	144,919	71,101	55,228
	Silver	11.24	10.53	13.65	6.01	6.29
	Sulphuric acid	1,328,510	1,279,115	1,342,323	701,597	455,385
	Sulphuric acid	1,328,510	1,279,115	1,342,323	701,597	455,385

<sup>(1)</sup> See "Presentation of Information — Reserves and Production" for an explanation of the basis of preparation of production amounts.

<sup>(2)</sup> Excludes lead contained in lead with high content of silver (High Silver lead) produced from the pyrometallurgical lead-zinc smelter for captive use, which was 7,262 tonnes, 7,755 tonnes, 6,657 tonnes, 3,451 tonnes and 3,698 tonnes in fiscal year 2014, 2015 and 2016, and for the six months ended September 2015 and 2016 respectively.

<sup>(3)</sup> Excludes silver contained in lead with high content of silver (High Silver Lead) produced from pyrometallurgical zinc-lead smelter for captive use which was 1.35 moz, 1.42 moz, 1.22 moz 0.67 moz and 0.35 moz in fiscal years 2014, 2015 and 2016, and in the six months ended September 2015 and 2016, respectively.

The following table sets out Vedanta's total ore, zinc concentrate and lead concentrate production<sup>(1)</sup> for the periods indicated:

		Year	Ended 31 M	Six months ended 30 September		
Mine (Type of Mine)	Product	2014	2015	2016	2015	2016
Rampura Agucha (Open-pit and			(Tonnes	, except perc	entages)	
Underground) <sup>(3)</sup>	Ore mined	5,953,138	5,823,320	5,464,735	3,065,442	1,640,988
	Ore grade — Zinc	12.3%	12.7%	11.6%	11.9%	10.5%
	Lead	1.7%	1.7%	1.8%	1.8%	1.4%
	Recovery — Zinc	90.7%	91.7%	88.8%	90.0%	92.4%
	Lead	59.0%	61.4%	60.0%	60.2%	63.1%
	Zinc concentrate	1,290,376	1,279,421	1,158,281	655,074	316,882
	Lead concentrate	96,137	98,694	101,662	57,326	25,783
Zawar Group (Underground)	Ore mined	1,003,600	1,056,000	1,349,850	616,075	831,075
1 ( 5 )	Ore grade — Zinc	2.8%	2.8%	2.8%	3.0%	2.7%
	Lead	1.7%	1.7%	2.1%	2.2%	2.1%
	Recovery — Zinc	90.8%	90.3%	90.4%	90.4%	89.9%
	Lead	90.2%	89.8%	90.4%	90.5%	90.5%
	Zinc concentrate	0	0	0	0	3,139
	Lead concentrate	0	0	0	0	2,772
	Bulk Concentrate(3)	68,432	74,186	102,987	49,975	53,521
Sindhesar Khurd (Underground)	Ore mined	1,723,253	1,910,055	2,969,587	1,188,576	1,810,300
	Ore grade — Zinc	3.5%	3.6%	3.9%	3.8%	3.8%
	Lead	2.1%	1.9%	2.2%	2.2%	1.8%
	Recovery — Zinc	87.8%	89.8%	91.0%	90.7%	90.3%
	Lead	85.5%	86.8%	89.0%	88.7%	88.3%
	Zinc concentrate	105,562	126,952	176,761	78,764	121,366
	Lead concentrate	60,128	61,630	92,611	44,422	51,655
Rajpura Dariba (Underground)	Ore mined	610,242	573,284	668,777	298,699	368,844
	Ore grade — Zinc	5.3%	5.3%	5.1%	5.2%	5.0%
	Lead	1.3%	1.3%	1.2%	1.3%	1.2%
	Recovery — Zinc	82.8%	83.4%	83.4%	83.7%	83.7%
	Lead	67.7%	70.1%	70.3%	72.0%	69.0%
	Zinc concentrate	52,212	43,359	52,351	20,153	31,414
	Lead concentrate	12,241	10,647	12,407	4,871	7,834
	Bulk Concentrate(2)	0	9,832	8,941	8,457	0
Skorpion (Open-pit)	Ore mined	1,252,092	1,344,272	1,245,198	579,656	748,042
	Ore grade — Zinc	10.2%	9.0%	7.5%	7.9%	8.3%
	Recovery — Zinc	90.1%	88.2%	85.5%	85.9%	85.3%
Lisheen (Underground)(4)	Ore mined <sup>(5)</sup>	1,401,741	1,375,069	849,618	623,517	0
	Ore grade — Zinc	11.8%	10.5%	9.5%	9.6%	0
	— Lead	2.2%	1.9%	1.5%	1.4%	0
	Recovery — Zinc	91.3%	90.3%	89.2%	89.4%	0
	— Lead	68.5%	72.5%	68.5%	69.0%	0
	Zinc concentrate	282,159	244,354	135,611	101,710	0
	Lead concentrate	34,409	30,956	14,371	10,068	0

		Year Ended 31 March			30 September	
Mine (Type of Mine)	Product	2014	2015	2016	2015	2016
			(Tonnes	, except perc	entages)	
Black Mountain (Underground)	Ore mined	1,395,534	1,437,562	1,579,633	824,340	852,013
	Ore grade — Zinc	2.7%	2.5%	2.5%	2.4%	2.3%
	— Lead	3.2%	2.6%	2.6%	2.5%	3.3%
	Recovery — Zinc	78.0%	74.2%	75.0%	74.0%	73.6%
	— Lead	87.4%	84.8%	84.6%	85.1%	85.9%
	Zinc concentrate	59,942	54,445	59,006,	28,339	26,797
	Lead concentrate	53,221	45,129	48,091	23,572	31,476
Totals	Ore mined	13,339,600	13,519,562	14,127,398	7,196,305	6,251,262
	Zinc concentrate	1,790,251	1,748,531	1,582,010	884,040	499,598
	Lead concentrate	256,136	247,056	269,142	140,259	119,520
	Bulk Concentrate(3)	68,432	84,018	111,928	58,432	53,521

Six months ended

# Ore Reserve base

The following table sets out Vedanta's Proved and Probable zinc and lead Ore Reserves<sup>(1)</sup> as of 31 March 2016:

	Proved Reserve			Pro	bable Rese	erve	Total Proved and Probable Reserves		
	Quantity	Zinc Grade	Lead Grade	Quantity	Zinc Grade	Lead Grade	Quantity	Zinc Grade	Lead Grade
	(Million tonnes)	(%)		(Million tonnes)	(%)		(Million tonnes)	(%)	
Rampura Agucha	4.9	13.5	2.1	46.2	14.0	1.8	51.1	14.0	1.8
Rajpura Dariba	6.4	6.1	1.6	2.9	6.7	1.5	9.3	6.3	1.6
Zawar Group	3.4	3.5	1.8	6.2	3.4	1.7	9.5	3.4	1.7
Kayad	0.7	13.8	1.8	3.3	13.4	1.8	3.9	13.4	1.8
Sindesar Khurd	8.5	4.3	2.5	24.7	4.8	3.4	33.2	4.7	3.2
Skorpion	1.15	8.00	_	3.23	9.9	_	4.38	9.4	_
Black Mountain	42.4	6.90	0.5	7.67	5.9	0.5	50.1	6.76	0.5
Total	67.5	6.9	1.0	94.2	9.8	2.0	161.5	8.6	1.6

<sup>(1)</sup> See "Presentation of Information — Reserves and Production" for an explanation of the basis of preparation of production amounts.

<sup>(2)</sup> Bulk concentrate is concentrate that contains both zinc and lead.

<sup>(3)</sup> Includes mining operations at Kayad mine.

<sup>(1)</sup> See "Presentation of Information — Basis of Presentation of Reserves and Resources" for an explanation of the basis of preparation of reserve amounts.

Smelters and refineries. The following table sets out the total capacities<sup>(1)</sup> as of 30 September 2016 at Vedanta's Chanderiya, Debari, Dariba, Zawar, Pantnagar and Skorpion facilities:

	Capacity							
Facility	Zinc	Lead	Silver	Sulphuric Acid	Power Plant			
		(tpa	n)		(MW)			
Chanderiya <sup>(2)(3)</sup>	525,000	85,000	_	828,500	247.7			
Debari	88,000	_	_	419,000	7.4			
Dariba <sup>(3)</sup>	210,000	100,000	_	710,500	174.3			
Zawar Group	_	_	_	_	80.0			
Pantnagar	_	_	518	_	_			
Skorpion	150,000			335,000				
Total	973,000	185,000	518	2,293,000	509.4			

Chanderiya. The Chanderiya facility is located approximately 120 km east of Udaipur in the State of Rajasthan in northwest India. The Chanderiya zinc smelter is the fourth largest smelter on a production basis worldwide in 2016, according to Wood Mackenzie. The facility contains four smelters, two associated captive power plants, two sulphuric acid plants and one silver refinery:

- An ISP<sup>(TM)</sup> pyrometallurgical lead-zinc smelter with a capacity of 105,000 tpa of zinc ingots and 35,000 tpa of lead ingots that was commissioned in 1991;
- Two hydrometallurgical zinc smelters with 210,000 tpa capacity each that were commissioned in May 2005 and December 2007 and expanded in April 2008 together with associated captive power plants;
- An Ausmelt<sup>(TM)</sup> lead smelter with a capacity of 50,000 tpa that was commissioned in February 2006;
- Associated 154 MW and 80 MW coal-based thermal captive power plants commissioned in May 2005 and April 2008, respectively;
- A 14.5 MW captive power plant which was commissioned at Debari in March 2003 and transferred from Debari to Chanderiya in March 2009;
- Two sulphuric acid plants with a total capacity of 828,500 tpa sulphuric acid; and
- A silver refinery with a capacity of 168 tpa silver ingots.

<sup>(1)</sup> See "Presentation of Information — Reserves and Production" for an explanation of the basis of preparation of production amounts.

<sup>(2)</sup> The Haridwar plant refines and processes zinc ingots from zinc cathodes produced in the Chanderiya and Dariba smelters and therefore its production capacity does not increase the total production capacity of HZL's facilities.

<sup>(3)</sup> The Pantnagar plant refines and processes zinc and lead ingots from zinc and lead cathodes that are produced in the Chanderiya and Dariba smelters and silver ingots from lead residues in the Dariba lead smelter. Accordingly, it does not contribute to the total production capacity of HZL's facilities.

The 154 MW, 80 MW and 14.5 MW captive power plants provide all of the power for the Chanderiya facilities. The captive power plant requires approximately 100,000 metric tonnes of coal per month, which is currently met through imports, mostly from Indonesia.

HZL was also awarded 1.2 million tonnes of coal linkage by the Ministry of Coal, which will enable it to source coal from mines of Coal India Limited ("Coal India") (catering to approximately a quarter of its total coal requirements), although access to this coal has been stopped since April 2013. HZL's operations source their back-up power from liquid fuel-based captive power plants or from local power companies. The liquid fuel is sourced from third-party suppliers on yearly contracts.

Debari. The Debari hydrometallurgical zinc smelter is located approximately 12 km east of Udaipur in the State of Rajasthan, India. The hydrometallurgical zinc smelter was commissioned in 1968, uses RLE technology and has a capacity of 88,000 tpa. The Debari facility also includes a 419,000 tpa sulphuric acid plant. A majority of the power requirements of the facility is sourced from the coal-based thermal captive power plant at Chanderiya and the balance is sourced from an on-site liquid fuel-based 14.5 MW captive power plant commissioned in March 2003. The liquid fuel is procured from domestic oil-producing companies through a tender process for a yearly contract.

Vaizag. Operations at the Vaizag plant shut down sincle July 2013.

Haridwar. The 210,000 tpa zinc ingot melting and casting plant in Haridwar in the State of Uttarakhand was commissioned in July 2008. This plant refines and processes zinc ingots from zinc cathodes produced in the Chanderiya and Dariba smelters and therefore its production capacity does not increase the total production capacity of HZL's facilities. After the start of the second stream, the capacity of Haridwar Zinc Plant is 292,000 tpa. The plant is no longer in operation and operations are expected to commence in March, 2017.

Zawar Group. The Zawar Group facility does not have a smelter. The captive power plant at this facility provides power to the mine.

Dariba. The Dariba hydrometallurgical zinc smelter is located in the Rajsamand district of Rajasthan which was commissioned in March 2010 and has a capacity of 210,000 tpa. The Dariba facility also includes a 306,000 tpa sulphuric acid plant. In July 2011, a new 100,000 tpa lead smelter was comissioned, which also included a 98,500 tpa sulphuric acid plant. A majority of the power requirements of the facility is sourced from the 160 MW coal-based captive power plant at Dariba. A new roaster was commissioned in April 2013 in the Dariba facility with an associated sulphuric acid plant capacity of 306,000 tpa. Zinc cathodes are sent to its refining facilities at Pantnagar in Uttarakhand state for finishing and casting. The anode slime obtained as a residue from lead smelting at this smelter is refined and casted into silver ignots at the Pantnagar plant.

Pantnagar. The Pantnagar plant, which is located in Pantnagar in the State Uttarakhand, India, includes facilities for the refining and processing of zinc, lead and silver. The silver refinery has a capacity of 518 tpa and was commissioned in December 2011. The 465,000 tpa zinc ingot and 100,000 tpa lead ingot melting and casting plant were commissioned in March 2012. This plant was established to convert zinc and lead cathodes from the Chanderiya and Dariba hydrometallurgical smelters, as well as silver-rich lead residues from the Dariba lead smelter, into ingots.

Skorpion. The Skorpion mine and refinery are located 25 kms of Rosh Pinah town in Namibia. The Skorpion mine is an open cast oxide deposit mine, which feeds material directly to the refinery. The refinery uses a leaching process due to the oxide feed from the mine. Metal is casted in the electro wining-circuit as ingots or otherwise according to customer requirement. The Skorpion refinery runs on oxide feed.

### Mines

Rampura Agucha. The Rampura Agucha lead-zinc mine is located near Gulabpura in the north-west State of Rajasthan. The good ore mineralogy of the mine provides a high metal recovery ratio and a low overall cost of production for zinc concentrate extracted from the mine. The mining and processing facilities are modern and in good condition. The ore body is mined by open-pit and underground methods. The capacity of the mine and concentrator was expanded between 2003 and 2010 from 2.4 million tpa to 6.2 million tpa for mine and 6.5 million tpa for mill through the purchase of additional mining equipment, upgrades to the truck fleet, improvements to the operational efficiency of the plant and the installation of a new semi-autogenous, or SAG, mill and ball mill circuit.

Open pit mining at Rampura Agucha is a simple drill and blast, load and haul sequence using 221 metric tonnestrucks and 34 cubic meter excavators. Ore is fed to the primary crusher and waste is dumped at the waste dump. The mining equipment is largely owner-operated. The processing facility is a conventional crushing, milling and differential lead-zinc floatation plant. Ore from the open-pit is crushed in a series of crushing circuits and then milled in four streams, one rod mill-ball and three other sag mill-balls in closed circuit. The milled ore is then sent to the lead flotation circuit which includes roughing, scavenging and three stages of cleaning. The lead concentrates are thickened and filtered ahead of storage and transport to the Chanderiya and Dariba lead smelter. The lead flotation tails proceed to zinc flotation which comprises roughing, scavenging and four stages of cleaning. Zinc concentrates are thickened and filtered ahead of storage and transported to different HZL zinc smelters. Zinc flotation tails are thickened ahead of disposal to the tailings dam.

Since 2004, exploration at Rampura Agucha has resulted in significant increases in the reserves at the mine. Following an extensive drilling program to convert mineralized material to reserves, better definition of the ore body boundaries, addition of mineralized material and the conduct of open-pit re-optimization, as well as the commencement of underground mine project work, the reserves were 51.1 million tonnes as of 31 March 2016 with an average grade of 14.0% zinc, 1.8% ore. The drill spacing for the definition of proven reserves were approximately 50 meters by 50 meters while for probable reserves was 100 meters by 100 meters. HZL commenced production at the mine in 1991. Since inception, approximately 74.9 million tonnes of ore, with an ore grade of 12.6% zinc and 1.9% lead, respectively, have been extracted from the open-pit mine. HZL is continuing to evaluate the potential of this deeper mineralization. As of 31 March 2016, HZL estimates the remaining mine life at Rampura Agucha to be 13 years based on (i) reserves; and (ii) planned production which is determined on the basis of a life-of-mine plan.

In fiscal year 2016, 4.7 million tonnes of ore at 12.0% zinc and 1.8% lead were mined from Rampura Agucha, which produced approximately 1.0 million tonnes of zinc concentrate at 49.9% zinc and 96,768 tonnes of lead concentrate at 57.6% lead. Approximately 62.6 million tonnes of waste was removed giving a strip ratio of 11.0 tonnes of waste per tonne of ore mined. The expansion of the mine from 5 mmtpa to 6.2 mmtpa was completed in 2010 and has resulted in a significant increase in the strip ratio as there was dimensional change in the pit with the ultimate depth of the mine increasing to 421 meters. During fiscal year 2016, approximately 88.7% of the zinc was recovered to the zinc concentrate, while 60.9% of the lead and 65.5% of the silver was recovered from the metal contained in the ore mined. The strip ratio is expected to increase to about 17.7 times in fiscal year 2017, considering the anticipated overburden removal of about 56.9 million tonnes and ore production of 3.2 million tonnes from the open-pit. The Rampura Agucha mine is in the midst of transition from open pit to underground mine production, with the underground project picking up pace after a slower than planned ramp up due to difficult geotechnical conditions. The main shaft has reached a depth of 860 meters (out of a planned depth of 950 meters) with completion of the north and south vent work.

The gross book value of the Rampura Agucha mine's fixed assets and mining equipment (including assets related to the Rampura Agucha's underground mining operations and the Kayad mine) was Rs. 51,924 million (\$778.9 million) as of 31 March 2016. The mining lease of Rampura Agucha mine is up to March 2020. Power is mainly supplied from the HZL's captive thermal power plants with two backup 5 MW generators on-site.

Rajpura Dariba. Rajpura Dariba is a medium sized underground lead-zinc mine and processing facility located northeast of Udaipur in the Rajsamand district in the state of Rajasthan, northwest India.

Mining at Rajpura Dariba commenced in 1983 and is carried out using the vertical crater retreat method and blasting hole mining method with mined out stopes backfilled with cemented classified mill tailings. In certain areas the ground conditions adversely affect slope stability and dilution. These ground conditions are the result of the weak graphitic nature of the shear zone combined with the dissolution of fractured and sheared dolomites by percolating acidic groundwater derived for overlying adjacent oxidized zones. HZL's Rajpura Dariba's mine lease is valid until May 2030. The mine is serviced by two vertical shafts approximately 600 meters deep. The main shaft is 6 meters in diameter and the auxiliary shaft is 4.5 meters in diameter. The main shaft has the capacity to hoist 0.7 million tpa of ore and is equipped with a modern multi-rope koepe winder. All personnel and materials are hoisted in a large counterbalanced cage which is operated by the koepe winder. The surface infrastructure includes ventilation fans, compressors and ore loading facilities. A 2.2 km surface decline was commissioned in September 2013 to increase the ore production.

The ore is crushed underground before being hoisted to the surface. It is then crushed again and milled before undergoing a lead flotation process incorporating roughing, scavenging and includes three stages of cleaning of rougher concentrate to get final lead concentrate. Lead flotation tails are sent to the zinc flotation process which incorporates roughing, scavenging and includes three stages of cleaning of rougher concentrate to get final Zinc concentrate. In one flotation the Zinc rougher concentrate is being cleaned in column flotation cells. Then Zinc flotation tails proceed to a backfill plant where final tails are cycloned with the underflow proceeding to intermediate storage where cement is added in preparation for use as underground fill. The cyclone overflow is thickened to recover water ahead of disposal in the tailings dam. The final lead and zinc concentrates are thickened, filtered and stored before they are sent to HZL's smelters.

Power for the mine is supplied largely from HZL's 160 MW captive power plants at Dariba and through a contract with a state-owned entity.

The gross book value of the Rajpura Dariba mine's fixed assets and mining equipment is approximately Rs. 5,441 million (\$81.6 million) as of 31 March 2016.

As of 31 March 2016, HZL estimates the remaining mine life at Rajpura Dariba to be around eight years based on (i) reserves; and (ii) planned production which is determined on the basis of a life-of-mine plan which includes assumed production expansion. An exploration program is also underway to identify new resources with the potential to be upgraded to reserves, and has been and continues to be focused on maintaining the reserve position after annual mining depletion. The drill spacing for proved reserves was approximately 30 meters while for probable reserves was less than 60 meters.

The average grade for each individual stope was defined using standard parameters for internal waste and dilution and a geological cut-off grade of 3.0% combined lead and zinc, though the mineralization generally has a sharp natural contact. The in-situ quantities and qualities were adjusted by applying a mining loss factor of 10.0%, a dilution factor of between 12.0% and 20.0% depending on ground conditions. These parameters are based on a reconciliation of historical production. Stopes with average grades below this economic cut-off grade were excluded from the reserve estimate. The final reserve estimate is the sum of the stopes with an average grade above the economic cut-off limit. As the stopes are all accessed using the existing infrastructure and as there is sufficient capacity on the tailings dam, the capital expenditure was limited to the replacement of mining equipment and was therefore considered not to have a material impact on the cut-off grade.

In fiscal year 2016, 668,777 tonnes of ore at a grade of 5.1% zinc and 1.2% lead ore was mined at Rajpura Dariba mine which produced 59,054 tonnes of zinc concentrate at 48.2% zinc, 15,784

tonnes of lead concentrate at 40.9% lead and 1,702 grams per tonnes of silver, with 83.5% of the zinc being recovered in the zinc concentrate and 70.7% of the lead and 69.6% of the silver. The bulk concentrate produced during fiscal year 2016 was 8,941 tonnesat 37.2% zinc and 9.7% lead with 85.8% of the zinc being recovered and 82.8% of the lead and 81.5% of the silver.

Sindesar Khurd. The Sindesar Khurd mine is a large scale underground mine deposit that was explored during 1992 to 1995. Mine production began at the Sindesar Khurd mine in April 2006 and HZL's mining permit is valid until March 2029. The Sindesar Khurd mine lies on the same geological belt as the Rajpura Dariba mine. The mine is approachable from Rajpura Dariba mines by road.

The mineralization has been traced over almost 2.5 kilometers along strike and 1.3 kilometer vertical extension. In the mine area, dip is steep westerly, while the dip turns into easterly direction in the lower-southern part of the deposit. The current mine block extends over 1,500 meters along strike and up to 420 meters depth extension.

The deposit has been drilled to a depth of approximately 1,300 meters below surface and the ore body is traced over approximately 2 kilometers along the strike with a 1,100 meters vertical extension. While the deposit is still open in depth in the southern extension of the present mine block, the area below the mine block and towards the north extension only has narrow and low to moderate grade mineralization intersected.

Exploration at the south part of Sindesar Khurd has been continuing since March 2005 with a drilling program aimed at increasing the size of the ore body. A continuous exploration program from underground is also underway with the aim to upgrade the reserve status so that the stopes planned to be mined out shall be extracted with maximum recovery and thereby reducing mining losses. The drill spacing for proven reserves was 12.5-25 meters while for probable reserves was less than 25-50 meters.

The proven and probable ore reserves for the Sindesar Khurd mine as of 31 March 2016 is 33.2 million tonneswith 4.7% zinc and 3.2% lead. The in-situ quantities are adjusted by applying a mining loss factor of 5.0% and dilution factor of 12%.

Access to the mine is through an incline shaft and declines (north and south) from the surface while ore is hauled through the declines by low profile dump truck or LPDTs. The ore body is accessed via horizontal drives on number of levels. The mine currently utilizes blast holes toping with back filling mining method with stope panels varying from 25 to 50 metres in strike.

Ore produced from the mine is treated at 2.0 mmtpa beneficiation plant commissioned in 2011 at Sindesar Khurd. Benefication plant has undergone debottlenecking in January 2015 to increase its capacity from 2 to 2.8 mtpa at Sindesar Khurd. Lead and zinc concentrates are sent to their respective high rate thickeners installed separately for lead concentrate and zinc concentrate generated from the concentrator. Tailing dewatering and disposal section comprises of hydro cyclone, tailing thickener, neutralization tank, pumping of tailing to tailing pond and reclaimed water pumping. Lead and zinc concentrates are thickened, filtered and stored before they are sent to HZL's smelters.

The gross book value at this mine is approximately Rs. 21,290 million (\$319.4 million) as of 31 March, 2016.

As of 31 March 2016, HZL estimates the remaining mine life at Sindesar Khurd to be around 9 years based on (i) reserves; and (ii) planned production which is determined on the basis of a life-of-mine plan which includes assumed production expansion. Power for the mill and the mine is supplied from HZL's captive power plant located at Dariba itself.

In fiscal year 2016, 2,969,587 tonnes of ore at a grade of 3.9% zinc and 2.2% lead ore was mined at the Sindesar Khurd mine. As there was mismatch in the mining and beneficiation capacity, the part of the ore produced at Sindesar Khurd mine was treated at Rampura Agucha mine and Rajpura Dariba mine being HZL's mines. Out of the total ore produced at Sindesar Khurd mine, 2,567,816 tonnes of ore was treated at Sindesar Khurd mine beneficiation plant which produced 176,761 tonnes zinc concentrate at a grade of 51.5% zinc and 92,611 tonnes lead concentrate at a grade of 53.2% lead with 2,686 grams of silver in lead concentrate. In addition, 291,568 tonnes of Sindesar Khurd mine ore was treated at Rampura Agucha mine which produced 20,171 tonnes of zinc at a grade of 48.7% zinc and 7,363 tonnes of lead at a grade of 56.9% lead with a 2,456 grams of silver per tonneof lead concentrate and 100,777 tonnes of Sindesar Khurd mine ore was treated at Rajpura Dariba mine beneficiation plant which produced 6,703tonnes zinc concentrate at a grade of 48% zinc and 3,377 lead concentrate at a grade of 45.9% lead with 1,947 grams of silver in lead concentrate.

Zawar Group. Zawar consists of four mines namely, Mochia, Balaria, Zawar Mala and Baroi. The deposit is located near Udaipur city, in Rajasthan in northwest India. The deposits lie within a 36.2 square kilometers mining lease granted by the state government of Rajasthan which is valid until 31 March 2030.

Ore processing is carried out in a conventional comminution and flotation plant having facility for "differential" as well as "bulk flotation" of zinc and lead metals. The ore is crushed primarily underground and then hoisted to the surface. Thereafter, the ore is crushed to 12 to 15mm in size before being milled to 74 microns. In the differential flotation process, milled ore is conveyed separately to two lead flotation circuits and undergoes a process incorporating roughing, scavenging and cleaning. Lead flotation tails proceed to two zinc flotation circuits comprising roughing, scavenging and cleaning. Zinc flotation tails are disposed in slurry form in designated tailings disposal area. Lead and zinc concentrates are thickened, filtered and then stored before they are sent to HZL's smelters. In the bulk flotation process, milled ore is conveyed to the flotation circuit and undergoes a process incorporating roughing, scavenging and cleaning. Final bulk concentrate is thickened, filtered and then stored before it is sent to the lead zinc smelter at Chanderiya. Bulk flotation tails are disposed in slurry form in designated tailings disposal areas.

In fiscal year 2016, approximately 1,349,850 tonnes of ore at 2.8% zinc and 2.1% lead was mined which produced 102,987 tonnes of bulk concentrate at 32.3% zinc and 24.2% lead. The recovery of zinc and lead during fiscal year 2016 was 90.4% and 90.4%, respectively.

The gross book value of the Zawar fixed assets and mining equipment was approximately Rs. 4,600 million (\$69.0 million) as of 31 March 2016 and of the 80 MW coal-based thermal captive power plant at Zawar was Rs. 3,220 million (\$48.3 million).

Power is supplied through a combination of an 80 MW thermal coal-based captive power plant commissioned in December 2008 and a 6 MW captive power plant.

As of 31 March 2016, HZL estimates the remaining mine life of the Zawar mine to be 5 years based on (i) reserves; and (ii) planned production which is determined on the basis of a life-of-mine plan which includes assumed production expansion. The focus of mine exploration at Zawar is to replenish the ore reserves that are being depleted through exploration activities and to look for new mineralized areas to enhance production capacity. A surface drilling program is underway to locate deeper resources below -100 meter reduce level up to 500 meter reduce level. Underground exploratory drilling is carried out on a grid of between 25 meters and 30 meters which is then infilled to 12.5 meters/15 meters after completing the development for final delineation of ore bodies. Past exploration has outlined additional in-mine mineral resources which require further delineation to add to reserves and further extend the mine life.

The proven and probable reserves for the Zawad Group as of 31 March 2016 is 9.5 million tonnes with 3.4% zinc and 1.7% lead.

Kayad. The Kayad lead-zinc mine is located in Ajmer, in the state of Rajasthan.

The Kayad lead-zinc deposit was initially prospected by Airborne Mineral Survey and Exploration wing of Geological Survey of India and drilling commenced in August 1988 and was completed in December 1991. Mineral Exploration Corporation Limited worked on the project on promotional basis, started the exploration and a total of 9,585 meters of drilling was achieved in 42 completed bore holes between 1994 and 1997. The detailed exploration of Kayad deposit was commenced by HZL in 1999 and continues as of today with a total of 162 kilometers in 919 drill holes. According to the reserve report, the proven and probable reserves for Kayad mine as on March 31, 2016 was 3.9 million tonnesat 13.4 % zinc and 1.8% lead. As of 31 March2016, HZL estimates the remaining mine life of the Kayad mine to be over 4 years based on (i) reserves; and (ii) planned production which is determined on the basis of a life-of-mine plan which includes assumed production expansion.

The ground breaking of the mine commenced on 11 June 2011. The access is through a decline which then divides into two declines at 420 meter reduce level. Development ore production was achieved in the second quarter of fiscal year 2013, and the mine started operations in fiscal year 2014. The mining method practiced in Kayad is long hole open stoping with cemented rock filling/rock filling in the steeper portions of the deposit; while transverse stoping method at flat portion along with rock filling/cemented rock filling. About 47 kilometers of development is planned by 2021. The mining is highly mechanized with twin boom jumbo drills used for face drilling, rock bolting machines used for support and 10 T and 17 T diesel load haul dump vehicles coupled with 30 T/50 T low profile dump trucks for loading and hauling. For production drilling Simba Drills are being used. The run of mine is stacked in the surface ore stock pile and transported by trucks to the Rampura Agucha mine for beneficiation.

A mine lease of 480.45 hectares was granted to Kayad mine by the state of Rajasthan and is valid until February 2048, subject to further renewal. Surface land rights over 49.8 hectares have been obtained. Mine plan approval from the Indian Bureau of Mines have been obtained and received environmental clearance from the MoEF for an increase in lead zinc ore production capacity from 0.35 million tonnesper annum to 1.0 million tonnesper annum. Consents under various environmental laws to operate the mine, including from the Rajasthan State Pollution Control Board have also been obtained.

A 33 KV power line was commissioned on 2 February 2012 to meet the constructional power requirements of the mine. Currently, most of the power is being taken from captive power plant, Zawar and some power is taken from state grid. A one megavolt amperes diesel generator is kept as a backup power supply for emergency operations in the event of power failure. For proper power distribution 2 megavolt amperes underground sub station is commissioned in North and south section each.

Skorpion. The Skorpion mine and refinery is located in the Karas region of southern Namibia, comprising an open pit mine. As of 31 March 2016, the remaining mine life of the Skorpion mine is approximately 4.57 years based on (i) reserves; and (ii) planned production which is determined on the basis of a life-of-mine plan, which includes assumed production expansion. The Skorpion mine has an attached electrolytic refinery producing approximately 150,000 tonnes of SHG zinc ingots annually. Further opportunities to extend the life of the mine are currently being evaluated based on the sulphide ore bodies in the nearby areas. Skorpion is also working towards expanding the refinery from stand-alone oxide ore treatment to sulphide ore treatment also.

According to Wood Mackenzie, the Skorpion mine has consistently been one of the largest zinc producing mines in the world and in 2016, it ranked tenth in the world in terms of production volume with a cost base in the lower half of the zinc industry cost curve. The Skorpion mine produces only high-grade, high purity SHG zinc ingots that are registered on the LME. Exploration of nearby ore bodies is underway to extend the life of mine beyond 2021.

The mineral rights over the Skorpion zinc deposit are currently held under mining licence ML 108 and exclusive prospective licence 2229. The EPL was originally issued by the Government of Namibia to Erongo Mining and Exploration Company, which covered 33,192 hectares. An extension to the south was subsequently granted, which increased the exclusive prospective licence area to 98,683 hectares. Mining licence number 108 of July 2000 is valid for 25 years up to July 2025. The licence covers 951 hectares and includes the site for the refinery. Skorpion is also the holder of another mining licence covering the limestone mining area, ML 127, which is valid until February 2026.

The Skorpion deposit lies within the volcano sedimentary rocks of the late Proterozoic Port Nolloth zone of the pan-African Gariep Belt. The ore body consists of secondary oxide zinc mineralisation, including silicates, clays and carbonates. It is covered by a 10 to 20 km thick layer of sand, calcrete, boulder beds and silcrete and is hosted by weakly metamorphosed, quartz-rich clastic sediments. Commonly, mineralisation occurs in the lower portion of the sedimentary package immediately overlaying a unit of impure limestone and calcareous sandstone. A steep dipping zone of sheared sericite schist cuts through the ore and the surrounding host rocks, roughly following the long axis of the mineralised body. Quartz sericite schist, believed to be a weathered product of a felsic volcanic unit, occurs in the north eastern portion of the open pit. Towards the west, black shale, amphibolite and quartz biotite schist underlies the body. Down hole geophysical logging indicates that the water table lies at about 175 metres below the surface.

Although the geology of the deposit is complex and the ore, limestone and arkose interface requires careful separation, the mine has managed this with accurate grade control and selective mining.

The processing at the Skorpion mine is unique, using solvent-extraction/electrowinning from zinc oxide ore. In this process, mined ore is crushed, homogenised and milled before acid leaching in agitated tanks at the refinery. Clarified liquor is purified by solvent extraction and zinc is electrolytically plated on to aluminium cathodes. Zinc is periodically stripped from these cathodes before being melted and cast as ingots for export.

Zinc at the Skorpion mine is cast into ingots for export and transported from the refinery to the port of Luderitz, approximately 300 km away, by trucks each having a maximum capacity of 35 tonnes.

The maximum power demand of the Skorpion mine is 85 MW and power is supplied from South Africa and is governed by a trilateral US dollar-denominated fixed price contract between Namibia Power Corporation (Proprietary) Limited, Eskom Holdings Limited and Skorpion, that currently links the annual increases in power costs to a US inflationary index.

The Skorpion mine used 65,412 tonnes of sulphur in fiscal year 2016, of which 96.0% was imported in bulk and shipped to Namibia through the port of Luderitz while the remaining sulphur was brought from South Africa in molten form by road. During the year ended 31 March 2016, 1.2 million tonnes of ore at 7.53% zinc were mined from the Skorpion mine, which produced approximately 81,938 tonnes of zinc metal.

Lisheen. The Lisheen mine is located in County Tipperary, Republic of Ireland and when operational consisted of an underground mine, concentrator and backfill plant, with a related capacity of approximately 131,000 tonnes of zinc in concentrate annually. The Lisheen mine also included approximately 19,000 tonnes of lead in concentrate annually. Mining and milling activities ceased in December 2015 and the facility is currently in the process of implementing a mine closure plan in conjunction with the statutory authorities. Management is actively exploring further business opportunities and ways to utilize the existing resources and skills at Lisheen following the cessation of normal mining activities and a task force has been established to facilitate this.

During fiscal year 2016, 849,618 tonnes of ore at 9.5% zinc and 1.5% lead were processed at the Lisheen mine, which produced approximately 135,611 tonnes of zinc concentrate and 14,371 tonnes of lead concentrate, containing 71,825 tonnes and 8,726 tonnes of zinc and lead, respectively.

The Lisheen zinc deposit is located in the Rathdowney Trend, which comprises sedimentary rocks, mainly limestone, which was formed approximately 320 million years ago. The Lisheen deposit owes its existence to the presence of several faults in the district, which played a major role in the formation, morphology and location of the ore bodies. It is believed that these fractures in the strata acted as conduits for the hydrothermal mineralizing fluids which carried metals upwards from extreme depths.

Mining activities at the Lisheen mine ceased in December, 2015. Closure operations commenced in April, 2014 and are expected to be complete by September, 2017. Vedanta expects to procure the required mine closure certificate in March 2020. After successfully closing down the mine, Vedanta will continue to provide care and maintenance for at least 30 years as required under Irish law.

Black Mountain. The zinc mine at Black Mountain is an underground operation, mining a polymetallic ore body, with an attached concentrator producing approximately 38,577 tonnes of zinc, 48,883 tonnes of lead, 3,799 tonnes of copper and 51 tonnes of silver in concentrate, annually. Exxaro Resources (through its wholly owned subsidiary, Exxaro Base Metals) holds the remaining 26.0% interest in Black Mountain.

The Black Mountain mine is operated pursuant to mining right 58/2008 MR granted pursuant to the Mineral and Petroleum Resources Development Act, 28 of 2002 of South Africa which entitles Black Mountain Mining to mine for lead, copper, zinc and associated minerals in, on and under an area in the district of Namaqualand measuring 24,195 hectares for a period of 30 years from 2008 to 2038.

Four major stratiform exhalative sediment hosted base metal deposits are located in a 10 by 30 km area, centred on Aggeneys. The deposits are situated in the supracrustal rocks of the mid-Proterozoic age Bushmanland group of the Namaqualand metamorphic complex. The deeps ore body, which is currently being mined, is considered to start at 166 metres above mean sea level, with a down plunge extent of 1.1 km with the deepest position of the ore body being 1,680 metres below the surface. Mineralisation in the deeps is hosted by iron formations, massive sulphide and sulphide quartzite. The massive sulphide rock is either banded, massive or occurs as fine grained mylonite. Banding is expressed as 1-5 m thick sulphide bands alternating with quartz rich bands of similar thickness.

Underground drilling of the deeps ore body started in 2000 and was completed in 2012. Based on Ore Reserves and Mineral Resources as of 31 March 2016 and current production levels, Black Mountain Mine estimates the remaining life of the mine of the deeps ore body to be over 14 years.

The predominant mining method is ramp in stope cut and fill. The planned production rate is 1.8 mtpa plant feed and the shaft hoisting capacity is approximately 1.44 mtpa from Deeps mine and 0.36 mtpa from Swartberg. All production stopes in the Deeps mine are backfilled and waste filled, integrated into the mining sequence.

The mining process includes primary crushing underground before being hoisted to surface coarse ore silos for stockpile. Coarse ore is screened before secondary and tertiary crushing, from where it is fed into a milling plant. The slurry product from the grinding mills passes directly to the floatation circuits from which copper concentrates, lead concentrates and, finally zinc concentrates are floated off. The concentrates are dewatered by thickening and subsequent pressure filtration to reduce moisture content to shipment requirements. The dewatered concentrates are discharged onto conveyors, before being transferred to separate copper, lead and zinc concentrate stockpiles. From the stockpiles, the concentrates are hauled by truck to a dedicated railway siding 170 kms away, where they are loaded onto rail cars for outbound shipping.

Power at the zinc mine at Black Mountain is supplied from two 40 MVA transformers at the Eskom Aggeneys substation. Water is supplied by the Pelladrift Water Board, which supplies potable water to the mine from the Orange River for both human consumption and industrial water requirements.

Zinc, lead and copper concentrate from the mine are road hauled to a dedicated railway siding along a 170 km gravel road, which is owned by the provincial authorities but maintained by Black Mountain. The concentrate is then transported by train to Saldanha on the Sishen-Saldanha railway with delivery terms to export customers on a cost, insurance and freight basis.

During fiscal year 2016, 1,579,633 tonnes of ore at 2.47% zinc and 2.56% lead were mined from the Black Mountain mine, which produced approximately 59,006 tonnes of zinc concentrate and 48,091 tonnes of lead concentrate, containing 29,272 tonnes of zinc and 34,114 tonnes of lead respectively. In addition, the Black Mountain mine also produced 4,729 tonnes of copper in concentrate and 41 tonnes of silver in concentrate.

## Principal raw materials

The principal inputs of HZL's zinc smelting business are zinc and lead concentrates and power. HZL has in the past been able to secure an adequate supply of the principal inputs for its business.

Zinc and lead concentrates: Zinc and lead concentrates are the principal raw material of HZL's smelters. HZL's lead-zinc mines have provided nearly all of its requirements for zinc and lead concentrates in the past. However, a marginal portion of the metal is being produced through sourced concentrates. In fiscal year 2016, 3.1% of the lead production was through sourced concentrates. Vedanta expect HZL's mines to continue to provide nearly all of its zinc and lead concentrate requirements for the foreseeable future.

Power: Most of HZL's operations are powered by the coal-based captive power plants at Chanderiya, Dariba and Zawar. HZL imports the required thermal coal from a number of third party suppliers and part of the requirement is sourced by way of linkage with South Eastern Coalfields Ltd (which is a subsidiary of Coal India). HZL was awarded 2.43 million tonnes of coal linkage by Ministry of Coal. However, due to limited coal availability, Coal India has been supplying only 50.0% of the 2.4 million tonneslinkage quantity. As of April 2013, the coal supplies to Chanderiya have stopped due to pending decision at Ministry of Coal on the linkages for plants which have been allocated coal blocks. In February 2014 the coal block allocated to the Chanderiya lead zinc smelter captive power plant was deallocated by the Ministry of Coal. As in January 2016 the coal supplies to Dariba captive power plant has stopped due the expiry of the existing fuel supply agreement and further renewal of fuel supply agreement has not been sanctioned by South Eastern Coalfields Limited as 30 September 2016. If the FSA is not renewed, HZL will source its entire coal supplies through imports. Linkage coal supplies to HZL's power plants at Zawar are continuing and the linkage quantity for these plants has been restricted to 50% of 0.4 million tons. The remaining coal requirements are met via import of coal from various countries which is currently priced lower than linkage coal on a landed basis.

HZL's remaining operations source their required power from liquid fuel-based captive power plants or from local power companies. The liquid fuel is sourced from third party suppliers on yearly contracts.

Metallurgical coke: In addition, HZL's pyrometallurgical smelter at Chanderiya requires metallurgical coke that is used in the smelting process. HZL currently sources its metallurgical coke requirements from third parties under long-term contracts and the open market.

# Distribution, logistics and transport

Zinc and lead concentrates from HZL's lead-zinc mines are transported to the Chanderiya and Debari smelters by road. Zinc and lead ingots, silver and sulphuric acid by-products are transported primarily by road to customers in India directly or via HZL's depots. Zinc and lead cathodes are mostly

transported by rail to its processing and refining facilities in Uttarakhand state in northern India. Zinc and lead ingots are transported for exports to ports in India primarily by rail, from where they are loaded on ships. The facilities in Uttarakhand also serve as finished goods center for nationwide distribution of its finished products.

Zinc at the Skorpion mine is cast into ingots for export and transported from the refinery to the port of Luderitz, approximately 300 km away by trucks each having a maximum capacity of 35 tonnes.

Zinc concentrate, lead concentrate and copper concentrate from the Black Mountain mine is hauled by road to a dedicated railway siding along a 170 km gravel road, which is owned by the provincial authorities but maintained by Black Mountain Mining. The concentrate is then transported by train to Saldanha on the Sishen-Saldanha railway with delivery terms to export customers on a cost, insurance and freight basis.

Lisheen transports the zinc concentrates it produces to the port at Cork (135 km from mine site) via on-site haulage contracted with a single supplier. Lisheen is within close proximity to international airports (Dublin 157 km, Cork 135 km), the national highway network and nearby towns. The nearest motorway is 10 km from the mine site and provides direct motorway access to the port facility in Cork.

# Sales and marketing

HZL's 10 largest customers accounted for approximately 41.2%, 40.5% and 36.5% of its revenue in fiscal years 2014, 2015 and 2016 respectively. No customer accounted for greater than 10.0% of HZL's zinc business revenue in fiscal years 2014, 2015 and 2016.

HZL's marketing office is located in Mumbai, and it has field sales and marketing offices in most major metropolitan centers in India. In fiscal year 2016, HZL sold approximately 70.2% of the zinc and lead metal it produces in the Indian market and exported approximately 29.8% of Vedanta's zinc India segment revenue

In fiscal year 2016, HZL sold approximately 96.9% of the zinc metal in the domestic market and exported approximately 56.1% under annual contracts specifying quantity, grade and price, with the remainder sold on the spot market. The contract sales price is linked to prevailing LME price with an additional physical market premium. Thus, the price that HZL receives for its zinc is dependent upon, and subject to fluctuations in the LME price.

Skorpion's 10 largest customers accounted for approximately 100%, 99.9% and 79.9% of its revenue in fiscal years 2014, 2015 and 2016 respectively. Three of Skorpion's customers accounted for approximately 85%, 85% and 64% of Skorpion's revenue in fiscal years 2014, 2015 and 2016. Skorpion's marketing office is located in Rosh Pinah. Most of the zinc metal that Skorpion produced in fiscal year 2016 was sold under bi-annual/annual contracts. About 30% of the metal produced is sold in the Southern African Customs Union market and balance is sold to other regions. The contract sales price is linked to prevailing LME price with an additional market premium. Thus, the price that Skorpion receives for its zinc is dependent upon and is subject to fluctuations in the LME price.

Black Mountain Mining produces zinc, lead and copper concentrates that are sold in the international markets on spot basis and through long term contracts. The commercial terms negotiated on an annual basis include taking into account the percentage of payable metals, treatment and refining charges and applicable prices. Some of the customers of Black Mountain mine are Trafigura Beheer B.V., MRI Trading and Ocean Partners UK Limited. Approximately 80% of the zinc and lead metal that BMM produced in fiscal year 2016 was sold under annual contracts specifying quantity, grade and price, with the remainder sold on the spot market. The contract sales price is linked to the prevailing LME price with an additional market premium. Thus, the price that BMM receives for its zinc and lead is dependent upon and is subject to fluctuations in the LME price.

# Projects and developments

HZL has been actively conducting exploration, which has resulted in net ore reserves of 107.1 million tonnesacross all mines in fiscal year 2016. Based on long-term evaluation of assets and in consultation with mining experts, Vedanta has finalized the next phase of growth, which will involve sinking of underground shafts and developing underground mines. The plan comprises developing a 3.75 mmtpa underground mine at Rampura Agucha mine and expanding the Sindesar Khurd mine from 2.0 mmtpa to 4.50 mmtpa, Zawar mines from 1.5 mmtpa to 4.0 mmtpa, Rajpura Dariba mine from 0.6 mmtpa to 1.2 mmtpa and Kayad mine from 0.35 mmtpa to 1.0 mmtpa. The growth plan will increase mined metal (MIC) production capacity to 1.2 mmtpa. The estimated cost for these projects amounts to Rs. 86,700 million (\$1,300.6 million). HZL spent Rs. 10,420 million (\$156.3 million) on these projects in fiscal year 2016. These projects are financed from internal sources.

### Gamsberg Project

The Gamsberg ore body is a large undeveloped zinc deposit situated approximately 22 kms from Black Mountain. The Gamsberg Project was officially approved by Vedanta's Board in November 2014. In April 2015, the Project Schedule was revised after optimizing the Mining Cost. The mining and milling capital cost reduced mainly on engineering improvements and negotiations.

During fiscal year 2016, pre strip mining started from July 2015 and to 31 March 2016 6.5 million tonnes of waste has been mined. A total of \$80.6 million of commitments have been made, with the total spend being \$15.1 million. Other infrastructure jobs such as Residential Housing, Pre start Infrastructure is under progress as planned.

The estimated production capacity of the mine is expected to be 250 ktpa.

In fiscal year 2017, the project activities will cover the ordering of plant and infrastructure packages followed by construction activities. The initial ore production is planned for fiscal year 2018 with ramp up to full production expected in subsequent years.

# Market share and competition

HZL is the only integrated zinc producer in India and had a market share by sales volume of the Indian zinc market of 79.1% in fiscal year 2016, according to ILZDA. Imports and secondary sources accounted for the remaining 20.9% market share, according to ILZDA. Zinc is a commodity product and HZL competes primarily on the basis of price, time of delivery and location. Zinc metal also faces competition as a result of substitution of materials, including aluminium, stainless steel and other alloys, plastics and other materials being substituted for galvanized steel and epoxies, paints and other chemicals being used to treat steel in place of galvanization in the construction market.

HZL is the only primary lead producer in India, with competition coming from imports which provide a substantial majority of the lead consumed in India. Lead is a commodity product and HZL competes primarily on the basis of price, time of delivery and location.

# Copper Business

### Introduction

Vedanta's copper business comprises operations in India, Zambia and Australia. Vedanta's Indian and Australian copper business is operated by Vedanta Limited, while its Zambian copper business is owned and operated by KCM. As of 30 September 2016, the Company owned 62.9% of the share capital of Vedanta Limited through Twin Star and MEL and 79.4% of the share capital of KCM. According to Wood Mackenzie, KCM is one of the world's highest grade copper mines, in terms of contained copper in 2016. Vedanta's custom smelting and refining business forms 40% of the total Indian capacity according to the Indian Minerals Yearbook 2014. KCM is one of Africa's largest integrated copper producers.

Vedanta's Indian copper business is principally a custom smelting business, which includes a smelter, refinery, phosphoric acid plant, sulphuric acid plant, copper rod plant and three captive power plants at Tuticorin in southern India, a refinery and two copper rod plants at Silvassa in western India, a precious metal refinery that produces gold and silver, a doré anode plant, and a copper rod plant at Fujairah in the UAE. According to Wood Mackenzie, Vedanta Limited's Tuticorin smelter was one of the world's top ten, in terms of production volumes in 2016.

In addition, Vedanta Limited owns the Mt. Lyell copper mine in Tasmania, Australia, which provides a small percentage of its copper concentrate requirements. The operation of Mt Lyell mine was suspended in January 2014, following a mud slide incident. Subsequently, the operations at Mt. Lyell copper mine has been placed under care and maintenance since 9 July 2014 following a rock falling on the ventilation shaft in June 2014.

As a custom smelter, Vedanta Limited buys copper concentrate at LME-linked copper prices less TcRc that it negotiates with suppliers. Vedanta Limited sells refined copper at LME-linked prices in domestic and export markets. Vedanta Limited receives a discount from its suppliers in the form of aTcRc, which is influenced by the global copper concentrate demand, supply of copper smelting and refining capacity, LME trends, LME-linked price participation and other factors. Vedanta Limited sources its concentrate from various global suppliers and its Mt. Lyell copper mine.

In recent years, Vedanta Limited has improved the operating performance of its copper business by improving operational efficiencies and reducing unit costs, including reducing power costs by constructing a captive power plant at Tuticorin. Vedanta Limited intends to further improve the operating performance of its copper business by continuing to reduce unit operating costs through improvements in recovery rates, lowering power and transport costs, achieving economies of scale and the achievement of other operational efficiencies. The copper business in Zambia is owned and operated by KCM which is largely an integrated copper producer. KCM's Zambian operations comprise various facilities at Konkola, Nchanga, Nkana and Nampundwe. KCM's operations at Nchanga include a number of open-pit mines, a large underground mine, TLP with the associated solvent extraction electro winning ("SX-EW") facility, a smelter with a cobalt recovery furnace, and a sulphuric acid plant and copper concentrators comprising two main processing units and a refractory ore stockpile. At Konkola, KCM operates a large underground mine and a concentrator on site. There is also a refinery at Nkana and a pyrite mine and concentrator at Nampundwe. In fiscal year 2016, the KCM mines provided approximately 53% of KCM's copper concentrate requirements for its smelting operations, with the remainder of KCM's copper concentrate requirements being obtained from third parties. As of 30 September 2016 Vedanta had spent over three billion since 1 April 2005 on its asset base.

Since the acquisition of KCM in 2004, Vedanta has implemented or is in the process of implementing various projects and expansions to improve KCM's operating performance. These include:

- the Konkola Deep Mining Project (the "KDMP"), a comprehensive project developing mining infrastructure to access the large copper ore body available at deeper levels at KCM's Konkola mine, which Vedanta estimates will increase the output of KCM's Konkola underground mine to approximately 7.5 mtpa at full ramp-up; It is a flagship asset with a life of 169 years.
- de-bottlenecking the TLP at Nchanga to increase its capacity from 15.1 mtpa to up to 17.3 mtpa;
- installing a second cobalt recovery furnace at the Nchanga smelter to double cobalt recovery;

- upgrading and modernising the east and west mill processing plants at the Nchanga concentrator, including upgrading the west mill Nchanga underground mine concentrator with a new 3.0 mtpa concentrator and the east mill Nchanga open-pit concentrator with a new 6.5 mtpa concentrator;
- commissioning a 311,000 tpa direct-to-blister flash smelter at Nchanga with a cobalt recovery furnace;
- commissioning a 6 mtpa concentrator at Konkola to enhance mining output, improve recovery and improve the concentrate grade of its copper;
- expanding the Nkana refinery to a production capacity of 300,000 tpa of copper cathode;
   and
- commissioning a 640,000 tpa sulphuric acid plant at Nchanga to produce acid for use in the TLP.

KCM intends to further improve its operating performance by:

- substantially developing its open-pit mines at Nchanga, including the opening of additional pits and the mining of cobalt ore at the Nchanga open-pit;
- expanding capacity at, and extending the life of, the existing Nchanga underground mine by extracting as yet unmined ore in the upper ore body of the Nchanga ore deposit; and
- accelerating development at KDMP for ramping to its full potential.

Total revenue from Vedanta's copper businesses during fiscal year 2016 was \$4,163.5 million.

# Principal products

Copper cathode. Vedanta's copper cathodes from the Tuticorin and Nkana refinery are square shaped with purity levels of 99.9% copper. These cathodes meet international quality standards and are registered as LME "A" Grade. KCM also produces Kabundi copper cathode, which is marketed as "KBC" from SX-EW TLP at Nchanga. The major uses of copper cathodes are in the manufacture of copper rods for the wire and cable industry and copper tubes for consumer durable goods. Copper cathodes are also used for making alloys like brass, bronze and alloy steel, with applications in transportation, electrical appliances and machinery in defence and construction.

Copper rods. Vedanta's copper continuous cast rods meet all the requirements of international quality standards including the ASTM B 49: 2010 or the BS EN 1977:1998 standards. Vedanta's copper rods are currently used primarily for power and communication cables, transformers and magnet wires.

Sulphuric acid. Vedanta Limited and KCM produce sulphuric acid at their sulphuric acid plants through conversion of sulphur dioxide gas that is generated from the copper smelter. A significant amount of the sulphuric acid produced at the Tuticorin smelter is consumed by the phosphoric acid plant in the production of phosphoric acid, and the remainder is sold to fertiliser manufacturers and other industries. Sulphuric acid produced at the sulphuric acid plants at the Nchanga smelter is used in the TLP to extract oxide copper minerals from the current and old tailings and any surplus sulphuric acid is sold in the region.

*Phosphoric acid.* Vedanta Limited produces phosphoric acid at its phosphoric acid plant by chemical reaction of sulphuric acid and rock phosphate, Vedanta Limited imports. Phosphoric acid is then sold to fertiliser manufacturers and other industries.

Other by-products. Other by-products of Vedanta Limited's copper smelting operations are gypsum, bismuth and anode slimes, which Vedanta Limited sells to third parties. Copper cobalt alloy is a by-product of KCM's copper mining operations, which KCM also sells to third parties. KCM is also pursuing potential opportunities to extract sales from the slag produced at its Nchanga smelter.

### Production

Copper anode is an intermediate product produced by copper smelters and is generally not sold to customers except KCM where copper anodes are sold to customers. Approximately one tonne of copper anode is required for the production of one tonne of copper cathode. Sulphuric acid is used as a starting material for phosphoric acid. Approximately 2.8 tonnes of sulphuric acid is required for the production of one tonne of phosphoric acid. Copper cathode is produced at the TLP at Nchanga using current tailings from the Nchanga west concentrator and reclaimed tailings sourced from the decommissioned tailings storage facilities. The Nchanga smelter produces copper in the form of copper-cobalt alloy, which accounts for approximately 8% to 10% of the smelter's total design capacity of 311,000 tpa. Nampundwe currently produces pyrite concentrate which is blended with copper concentrate at the Nchanga smelter when required. Copper cathode is used as a starting material for copper rods. Approximately one tonne of copper cathode is required for the production of one tonne of copper rods. The table below sets out Vedanta's total production<sup>(1)</sup> from Tuticorin, Silvassa, Nkana, Nchanga and Nampundwe for the periods indicated.

		Year	Ended 31 M	<b>farch</b>		ths ended tember
Facility	Product	2014	2015	2016	2015	2016
				(Tonnes)		
Tuticorin	Copper anode	274,573	334,367	345,374	167,157	163,126
	Copper cathode	151,592	194,019	201,864	103,123	104,075
	Copper rods	22,105	53,400	68,685	35,629	36,093
	Sulphuric acid	835,798	1,006,692	1,070,786	513,217	517,632
	Phosphoric acid	116,340	189,353	198,779	102,783	93,729
Silvassa	Copper cathode	142,842	168,353	182,183	89,652	93,710
	Copper rods	100,948	116,938	142,114	67,408	72,942
Nkana refinery	Copper cathode	97,477	92,525	60,092	37,109	4,008
Nchanga (smelter and						
TLP)	Copper anodes <sup>(2)</sup>	102,852	97,242	99,661	48,196	58,948
	Copper cathode <sup>(3)</sup>	60,737	55,232	60,985	30,110	29,254
	Sulphuri c acid	234,726	234,879	237,308	120,326	106,290
Nampundwe	Pyrite concent rate	12,827	14,275	15,810	5,387	3,242
Total	Copper anode	377,425	431,609	445,035	215,326	222,074
	Copper cathode	452,648	510,129	505,124	259,994	231,137
	Copper rods	123,053	170,338	210,799	103,037	109,035
	Sulphuric acid	1,070,524	1,241,571	1,308,094	633,543	623,922
	Phosphoric acid	116,340	189,353	198,779	102,783	93,729
	Pyrite concentrate	12,827	14,275	15,810	5,387	3,242

<sup>(1)</sup> See "Presentation of Information — Reserves and Production" for an explanation of the basis of preparation of production amounts.

<sup>(2)</sup> During fiscal years 2016, and the six months ended 30 September 2015 and 2016, 39,942 tonnes, 12,045 tonnes and 49,200 tonnes, respectively, of copper anode were not processed into copper cathode and sold as Copper anode and anode slags.

(3) The production numbers for copper cathode excludes the copper in copper cobalt alloy and copper in concentrate produced and sold as concentrate. Copper in copper cobalt alloy production in fiscal years 2014, 2015 and 2016, and the six months ended 30 September 2015 and 2016 was 18,804 tonnes, 21,166 tonnes, 19,828 tonnes, 10,782 tonnes and 7,463 tonnes, respectively, Copper in copper concentrate produced and sold as concentrate in fiscal years 2016, and the six months ended 30 September 2016 was 826 tonnes and 1,570 tonnes, respectively.

The table below sets out KCM's and CMT's total mine production<sup>(1)</sup> for the periods indicated:

		Fiscal Y	ear Ended 3	1 March	Six months ended 30 September	
Mine (Type of Mine)	Product	2014	2015	2016	2015	2016
				(Tonnes)		
Mt. Lyell (Underground)	Ore mined	1,739,223	_	_	_	_
	Copper concentrate	67,386	_	_	_	_
	Copper in concentrate	17,839	_	_	_	_
Nchanga (Open-Pit and						
Underground	Ore mined	10,408,511	10,676,035	10,299,672	5,062,350	6,245,070
	Copper concentrate	126,110	103,902	101,744	54,473	41,003
	Copper in concentrate	26,502	24,374	18,054	9,121	7,010
Konkola Mine						
(Underground)	Ore mined	1,815,854	1,426,782	1,676,592	863,045	810,709
	Copper concentrate	131,932	110,193	136,748	70,023	65,961
	Copper in concentrate	45,891	40,217	49,448	25,523	23,661
Nampundwe Mine						
(Underground)	Pyrite ore mined	52,808	87,870	136,879	61,208	37,972
Total	Copper ore mined	13,963,588	12,102,817	11,976,264	5,925,395	7,055,779
	Copper concentrate	325,428	214,095	238,492	124,496	106,964
	Copper in concentrate	90,232	64,591	67,502	34,644	30,671
	Pyrite ore mined	52,808	87,870	136,879	61,208	37,972

### Ore Reserve base

The figures for the Mt. Lyell Mine show the split between the ore derived from primary ("in-situ") ore and secondary ore, which consists of broken fresh ore from previous levels, remnants of ore from the open-pit side wall and pillars remaining from a former mining method together with sub-economic dilution from the mineralised material surrounding the ore body. The quantity and grade of the secondary ore was determined from the analysis of historical production. The estimate of the quantity and grade of the remnant material has been evaluated from previous studies and only uses a small proportion of this source of ore. Consequently, Vedanta believes that this allowance can be sustained for the forecast life of the Ore Reserves.

As of 31 March 2016, the Proved and Probable copper Ore Reserves at the Mt. Lyell Mine is nil.

<sup>(1)</sup> See "Presentation of Information — Reserves and Production" for an explanation of the basis of preparation of production amounts.

The table below sets out the Proved and Probable copper Ore Reserves<sup>(1)</sup>, as applicable, at Konkola and Nchanga as of 31 March 2016:

	Proved Reserve		Probable	Reserve	Reserves	
	Quantity	Total Copper Grade	Quantity	Total Copper Grade	Quantity	Total Copper Grade
	(Million tonnes)	(%)	(Million tonnes)	(%)	(Million tonnes)	(%)
Konkola	21.4	3.38%	24.8	2.99%	46.2	3.17%
Nchanga (Underground)	_	_	_	_		_
Nchanga (Open-Pit)	_	_	11.3	1.10%	11.3	1.10%
Other	_	_	30.5	1.16%	30.5	1.16%
Stockpiles	0.0	0.69%	_	_	0.0	0.69
Refractory Ore	_	_	121.1	0.85	121.1	0.85
Tailings Dams	46.1	0.68%	_	_	46.1	0.68%
Total	67.5	1.53%	187.7	1.20%	255.2	1.29%

See "Presentation of Information — Basis of Presentation of Reserves and Resources".

Nampund we has total Ore Reserves 1.6 Mt grading 11.2% S comprising, Proved Ore Reserves of 0.2 Mt grading 10.3% S and 1.3 Mt grading 11.3% S.

# Description of operations

# Smelters and Refineries

The table below sets out Vedanta's total capacities from the Tuticorin, Silvassa, Nkana and Nchanga facilities as of 30 September 2016:

	Capacity							
	Copper Anode <sup>(1)</sup>	Copper Cathode <sup>(2)</sup>	Copper Rods <sup>(2)</sup>	Sulphuric Acid <sup>(3)</sup>	Phosphoric Acid <sup>(3)</sup>	Captive Power Plant		
			(tpa)			(MW)		
Tuticorin	400,000	205,000	90,000	1,300,000	230,000	191.5		
Silvassa		200,000	172,000					
Nchanga	311,000	80,000		582,750				
Total	711,000	485,000	<u>262,000</u>	1,882,750	230,000	191.5		

<sup>(1)</sup> Copper anode is an intermediate product produced by copper smelters and is generally not sold to customers customers except in case of KCM where copper anodes are sold to customers. It is used for the production of copper cathode by copper refineries. Approximately one tonne of copper anode is required for the production of one tonne of copper cathode.

<sup>(2)</sup> Copper cathode is used as a starting material for copper rods. Approximately one tonne of copper cathode is required for the production of one tonne of copper rods.

<sup>(3)</sup> Sulphuric acid is used as a starting material for phosphoric acid. Approximately 2.8 tonnes of sulphuric acid are required for the production of one tonne of phosphoric acid.

Tuticorin facility. The Tuticorin facility, commissioned by Vedanta Limited in 1997 and is located approximately 17 km inland from the port of Tuticorin in the State of Tamil Nadu in southern India. Tuticorin is one of India's largest copper smelters based on production volume. As of 30 September 2016, the Tuticorin facility consists of a 400,000 tpa copper smelter, a 205,000 tpa copper refinery, a 90,000 tpa copper rod plant, a 1,300,000 tpa sulphuric acid plant, a 230,000 tpa phosphoric acid plant, and three complete captive power plants with capacities of 160 MW, 22.5 MW and 24 MW, respectively. The proposed expansion of the existing capacity of the 400,000 tpa copper smelter at Tuticorin to 800,000 tpa by building a 400,000 tpa copper smelter is pending environmental clearances. The coal based power plant of 160 MW is primarily used for captive consumption and Vedanta Limited have also entered into a power purchase agreement with the Tamil Nadu Electricity Board for selling power in excess power over the captive consumption.

Presently, the captive power plants have a total capacity of 191.5 MW, excluding the 15 MW power generating power plant shifted to HZL for the Pantnagar operations. Further, we also have a 11.2 MW of power generated from a smelter waste heat boiler. Coal for the 160 MW power plant is imported, and other captive power plants at Tuticorin operate on furnace oil. With captive power plants with a total capacity of 206.5 MW, which, together with a further 11.2 MW generated from the smelter waste heat boiler, Tuticorine facility will meet most of the facility's power requirements once the proposed expansion to 800,000 tpa is complete.

In addition, on 29 March 2013, the TNPCB ordered the closure of the copper smelter at Tuticorin due to complaints about a noxious gas leak by local residents. On 1 April 2013, Vedanta Limited (then Sterlite) filed a petition in the NGT challenging the order of the state pollution control board on the basis that the plant's emissions were within permissible limits. See "Business — Litigation — Writ petitions filed against Vedanta alleging violation of certain air, water and hazardous waste management regulations at Vedanta's Tuticorin plant."

Silvassa refinery. The Silvassa facility, commissioned in 1997, comprises a refinery and two copper rod plants and is located approximately 140 km from Mumbai in the union territory of Dadra and Nagar Haveli in western India. Its refinery uses IsaProcess<sup>(TM)</sup> technology to produce copper cathode and its copper rod plants use Properzi CCR copper rod technology. Silvassa facility consists of a 200,000 tpa copper refinery and two copper rod plants with a total installed capacity of 172,000 tpa of copper rods. Vedanta Limited's Silvassa facility draws on the state power grid to satisfy its power requirements.

Fujairah precious metal refinery. The Fujairah Gold FZE facility is located in Fujairah Free Zone-2. It is strategically located 130 km east of Dubai, on the coast of the Arabian Sea. The precious metals refinery at the Fujairah Gold FZE facility was completed in March 2009 and it began production in April 2009. The precious metals refinery has a capacity of 20 million tonnes ("mt") of gold and 100 mt of silver. The technology for the refinery was supplied by Outotec Oyj, Finland, a pioneer in providing technology for the extraction and refining of precious metals. The Fujairah Gold FZE facility also has a copper rod plant with an annual capacity of 100,000 tpa. Production commenced in May 2010. Continuous-Properzi S.p.A., Italy supplied the rod mill equipment for this project, and the copper cathode required for the copper rod plant is expected to be sourced from the smelters of KCM. Additionally, the doré anode plant which was previously located at Tuticorin has been relocated to the precious metals refinery at Fujairah in June 2012for smelting of "anode slime" to "doré anode" which is the raw material used by the Fujairah precious metal refinery.

Nkana facility. The Nkana facility, commissioned in 1932, primarily comprises a smelter, as refinery and a sulphuric acid plant, of which smelter and sulphuric acid plant have been dismantled. The Nkana operations are located in Kitwe approximately 360 km from Lusaka in the Copperbelt Province of Zambia and approximately 55 km from Chingola where the Nchanga facilities are located.

The Nkana refinery produces finished copper in the form of cathodes. It also produces anode slime as a by-product, which contains copper and smaller amounts of certain precious metals, such as gold, silver, platinum, and palladium. The Nkana refinery uses the conventional electrolytic refining

process to produce copper cathode and starter sheets. The starter sheets produced at the Nkana refinery are used at the Nkana and Nchanga TLP for electro-refining and electro-winning, respectively. The Nkana refinery utilises conventional processes to produce copper cathode that is LME-registered REC brand which is at a minimum 99.99% pure copper. Capacity at the Nkana refinery has been expanded from approximately 220,000 tpa to 300,000 tpa and this expansion was completed in November 2009.

Nchanga facility. The Nchanga facility, initially commissioned in 1971, comprises a TLP and SX-EW facility and a state-of-the-art smelter commissioned in 2008 with a capacity of 311,000 tpa in the form of copper in copper anode and copper in copper-cobalt alloy and sulphuric acid plant capacity of 1,850 tonnes per day. It processes reclaimed tailings sourced from the Nchanga surfaces sources operations and the current tailings from the Nchanga concentrator for the production of copper cathode with an installed capacity of 80,000 tpa, as of 30 September 2016.

The TLP comprised an acid leach SX-EW circuit which treats both reclaimed tailings and mine tailings from the copper flotation circuits at the west mill.

During fiscal year 2013, the west mill Nchanga underground mine concentrator was upgraded with the commissioning of a new 3.0 mtpa concentrator and the east mill Nchanga open-pit concentrator was upgraded with the commissioning of a new 6.5 mtpa concentrator. Additionally, a cobalt recovery furnace was commissioned.

### Mines

Mt. Lyell. The Mt. Lyell mine is located at Queenstown, Australia. It comprises of an underground copper mine and a copper processing facility and is owned and operated by CMT. The Mt. Lyell mine is owned and operated under the terms and conditions as stipulated in Mining Leases 9M/2013 (earlier 1M95) and 10M/2013 (earlier 5M95) granted by the state government of Tasmania. Mining Lease 9M/2013 was granted on 1 January 1995 for a period of 15 years and the mining lease 10M/2013 was granted on 1 February 1995 for a period of 14 years and 11 months. Both leases have been renewed for a period of 18 years and are valid up to December 30, 2027. The mine is also covered by the Copper Mines of Tasmania (Agreement) Act 1999, which, in conjunction with an agreement between the state government of Tasmania and CMT entered into pursuant to that Act, limits CMT's environmental liabilities to the impact of current operations, thereby insulating CMT from any historical legacy claims. The operation of Mt Lyell mine was suspended in January 2014, following a mud slide incident.

Monte Cello acquired CMT in 1999 from Mt. Lyell Mining Company Limited. Since Monte Cello took over the mine, annual production has increased from 2.2 million tpa in fiscal year 2000 to 2.5 million tpa in fiscal year 2013. Vedanta Limited acquired Monte Cello, and CMT, from a subsidiary of Twin Star in the year 2000.

The principal deposits in the Mt. Lyell region are all of the volcanic disseminated pyrite-chalcopyrite type which accounts for approximately 86.0% of the known ore in the region. The geology of the Mt. Lyell mine consists of a series of intercalated felsic to mafic-intermediate volcanics. Lithologies are highly altered quartz-sericite-chlorite volcanics with individual units delineated largely by the relative abundance of phyllosilicates. Volcaniclastic and rhyolitic lithologies occur sporadically throughout the sequence, as does pervasive iron mineralisation in the form of haematite, magnetite and siderite.

Chalcopyrite is the principal ore mineral and occurs chiefly in higher grade lenses enveloped by lower grade halos. The overall structure of Mt. Lyell is that of a steeply dipping overturned limb of a large anticline. The hanging wall (stratigraphic footwall) of the ore body consists of weakly mineralised chloritic schists with disseminated pyrite. The footwall is sharply defined by the Great Lyell Fault — Owen Conglomerate contact which truncates the ore body at its southern end.

The Mt. Lyell mine is under care and maintenance following a rock falling on the ventilation shaft in June 2014. All mining operations at CMT, when operational were undertaken by contractors while the processing and mill maintenance operations are undertaken by CMT employees. A sub-level caving underground mining method is used at the Prince Lyell ore body. Ore is loaded into trucks and then transported to the underground crusher and skip loading area. Crushed ore is then hauled by the Prince Lyell shaft and unloaded onto a conveyor feeding the ore bin at the Mt. Lyell processing plant. At the processing plant, the ore is crushed and ground prior to processing by flotation to produce copper concentrate which is then filtered to form a cake and trucked to the melba flats railway siding for transport to the port of Burnie. The concentrate is stored at Burnie until it is loaded into ships for transport to the port of Tuticorin from where it is trucked to the smelter. CMT has an active exploration and evaluation program at Mt. Lyell which involves upgrading resources below the Prince Lyell reserves and testing additional exploration targets on the mining lease. The western tharsis deposit lies to the west of the Prince Lyell ore body, but CMT has not yet committed to its development. Additional targets include Tasman and Crown, Glen Lyell, Copper Clays and NW Geophysics. The tailings dam is a valley-fill type and excess water is discharged via a spillway. The water quality is sampled before the water is released from the site. The tailings are deposited on beaches around 300 metres from the dam spillway. CMT's accepted closure plan is to flood the tailings which will require CMT to raise the tailings dam wall and such plan is currently in progress.

The processing plant is approximately 30 years old and has been partially refurbished following CMT's acquisition with the addition of crushers, a float cell and a regrind mill at the surface. While the condition of the plant is ageing, maintenance is carried out as required to ensure that the process plant remains in safe and efficient condition.

Power at the mine is supplied through an electricity supply agreement with Aurora Energy Proprietary Limited and Hydro Tasmania Proprietary Limited to supply approximately 112 giga watts per hour. Aurora Energy Proprietary Limited supplies electricity on a spot price basis and Hydro Tasmania Proprietary Limited is under a fixed arrangement. There is ample supply of mine water and storm water captured on the tailings dam.

The gross and net value of fixed assets, including capital works-in-progress was approximately AUD 161.0 million (\$124 million) and AUD 5.7 million (\$4.4 million) respectively, as of 31 March 2016.

The cut-off grades are based on copper grades with the gold credit deducted from the operating costs. The reserves are derived from stopes which are designed such that the limits of the stope are defined by a cut-off grade of 0.8% copper and have an average grade that exceeds 0.8% copper. The revenue derivation of the cut-off grade includes the gold credit. The break-even cut-off grade of 0.65% copper is the grade that makes enough margin to cover the fixed and variable costs while the actual or operational cut-off grade used is 0.55% copper. CMT operates on a 0.8% copper operational cut-off grade in practice, which prefers to take higher revenue at the expense of a longer mine life.

At the time of finalization of reserve statement as on 30 September 2016, no mineral reserves have been determined due to government statutory restrictions imposed post the mud slide incident in January 2014.

The reserves at CMT in the proven reserve category are defined as the portion that can be economically mined of the measured in-situ resource, which has gold drill coverage (<50 metres) and is on or within the 50 metre zone below the lowest active production level. The probable in-situ reserve is the material which has been defined as the portion that can be economically mined and has good drill coverage but is outside the 50 metre zone from the lowest active production level. The ex-situ probable reserve is the portion of ex-situ indicated resource which can be economically recovered with the mining of the in-situ reserves; this is applied as a modifying factor.

CMT does not use a copper equivalent calculation for the determination of stope limits as the relationship between the copper and gold grades is essentially linear, allowing the gold credits to be deducted from operating costs.

CMT has identified additional mineral deposits in the Mt. Lyell mine and had engaged in drilling, scoping and feasibility studies on these deposits and has completed scoping study of Prince Lyell North Flank bottom block/lift and Copper Chert prospect and feasibility of Prince Lyell North Flank top block.

KCM mines. KCM's mining operations are located in the Copperbelt Province of Zambia and consist of the Nchanga open pits and Nchanga underground mines, concentrator and TLP, the Konkola underground copper mine and concentrator, the Nchanga smelter with a copper recovery furnace and sulphuric acid plant, and the Nkana smelter and refinery. The Zambian Copperbelt ore deposits lie along a 50-km wide strip of country that extends for 150 km from Chililabombwe in the northwest to Luanshya in the southeast. The Nampundwe pyrite mine and the concentrator are located in the Central Province approximately 50 km from Lusaka.

The geological setting of the Zambian Copperbelt is unusual compared to other worldwide copper deposits in that it occurs in sedimentary host rocks that have high carbonate content. The presence of dolomite in the geological sequence effectively eliminates any risk of acid mine drainage. The dominant structural feature of the Zambian Copperbelt is the Kafue Anticline, a Northwest — Southeast striking structure, the core of which is comprised of granite, schist and gneiss of the basement complex.

The focus of KCM's exploration has been the maintenance of resources and reserves following mining depletions.

Konkola. The Konkola mine is situated about 26 km north of Chingola and is the most northerly of KCM's Copperbelt mines. These mining operations currently exploit the Kirila Bombwe ore body by underground methods and have historically been focused on two existing shaft systems, the Kirila Bombwe South ore body (the "No. 1 shaft") and the Kirila Bombwe North ore body (the "No. 3 shaft"). Additionally, in June 2006, KCM commenced sinking of the No. 4 shaft in the Kirila Bombwe South ore body as part of the KDMP. The No. 4 shaft lies approximately 130 metres due north of the No. 1 shaft. The mid-shaft loading station of the No. 4 shaft was commissioned in April 2010. The mid-shaft loading station of the No. 4 shaft was commissioned in April 2010. Construction of the bottom shaft sinking, which included the continued development of the No. 4 shaft to a design depth of approximately 1,500 metres, was completed during fiscal year 2012.

The Konkola mine commenced production in 1957. KCM acquired the mine in April 2000 from Zambia Consolidated Copper Mines Limited. At Konkola, KCM holds large scale mining licence ("LML") number 7076-HQ-LML for its operations, which expires on 31 March 2025. The licence permits the mining of copper, cobalt, gold, silver, sulphur, selenium and tellurium within the leasehold area. KCM's mining licence is valid until 31 March 2025, but operating permits must be renewed annually.

The operating units at the Konkola mine are the underground mine (No. 1 shaft, No. 3 shaft and new No. 4 shaft, along with a number of ventilation shafts as well as the pipe shaft) and the Konkola east and west concentrators.

The dominant features of the mine are the Kirila Bombwe Anticline in the southeast and the Konkola Dome in the northwest. The ore body in the No. 1 shaft area lies on the southern flank of the Kirila Bombwe Anticline and has an average thickness of about nine metres. The No. 1 shaft ore body generally strikes to the northwest-southeast and dips steeply southwest. It has a strike length of

approximately 4,000 metres with an average dip of 50 degrees. The ore body at the No. 3 shaft lies across the axis of the Kirila Bombwe Anticline and has an average thickness of 13 metres. The dips at the No. 3 shaft generally range from 15 degrees to 55 degrees. The ore body at the No. 3 area has been traced to a depth of 1,100 metres and is open-ended at that depth.

Historically, the No. 1 and No. 3 shafts have been managed as two separate mines. Underground haulage connections between the two mines were developed mainly for cross tramming and de-watering purposes. The separate treatment of the two mines was due to their Ore Reserves being physically divided by the presence of a barren gap in the ore body that extended from the surface down to about 720 metres. Below that level the ore body is continuous along a strike length of approximately 10 km and this large ore body forms the basis of the KDMP. The total capacity of the Konkola underground mine has been expanded by the KDMP.

Mine developments consist of primary and secondary developments at both the No. 1 and No. 3 shafts. Primary developments involve mining haulages, drain drives, access ramps, footwall ventilation raises and rock passes on main levels. Secondary development includes the mining of drives, crosscuts and raises in ore and waste on the sublevel to prepare the ore body for stoping. The mining operations are constrained by the necessity to de-water from both hangingwall and footwall aquifers at an overall pumping rate of approximately 350,000 m<sup>3</sup> per day.

The ore body limits are defined by mining as well as diamond drilling on a 30 metres by 30 metres pattern. The stope limits are contained within the ore body defined using a 1.0% total copper cut-off. Other stope dimensions are worked out using geomechanical properties of the rocks.

Appropriate actions are taken while designing the blast holes as well as during blasting to minimise dilution from the sub-economic areas outside the ore body limits. However, due to the stratified nature of the rocks some dilution does take place. Dilution generally ranges from 5.0% to 40.0%, depending on the rock condition.

Mining methods employed at the Konkola mine include overcut and bench drift and fill, post pillar cut and fill and longitudinal room and pillar. The total rock hoisting capacity at the Konkola mine is 645 kilo tonnes per month ("ktpm") which comprises 160 ktpm from the No. 1 shaft, 135 ktpm from the No. 3 shaft and 350 ktpm from the No. 4 shaft. On reaching the surface run of the mine ("RoM") ore from the No. 1 shaft is conveyed via conveyor belt directly to the Konkola concentrator and the RoM ore from the No. 3 shaft is transported three km to the Konkola concentrator using 85 tonne off-highway trucks.

The 6 mtpa Konkola concentrator processes RoM ore sourced from the Konkola underground mine using froth flotation to produce copper concentrate for smelting at the smelter in Nchanga. RoM ore hoisted from the new No. 4 shaft, through the mid-shaft loading station is transported to the plant through conveyor belts.

The 6 mtpa concentrator comprises two streams of 3 mtpa. KCM commissioned the first stream of 3 mtpa in October 2008 and the second stream of 3 mtpa in February 2010. The Konkola concentrator utilises SAG & Ball mill comminution and beneficiation by froth flotation processing. The nominal capacity of the milling circuit is 6.6 mtpa, which with a 10.0% design allowance yields a maximum milling capacity of 7.3 mtpa.

The crushed RoM ore is fed directly into the concentrator's SAG mill with final milling being performed in the Ball mill prior to flotation. The concentrates are thickened and filtered to produce a final concentrate with a grade of approximately 36.0% to 40.0%.

The concentrates are then transported 30 km southwest of Chililabombwe by road to the Nchanga smelter in Chingola. Approximately 60.0% of the residual tailings from the concentrator are thickened and pumped straight to the Lubengele tailings dam situated approximately 4.5 km north of the plant, while approximately 40.0% of the tailings are pumped to the backfill plant to produce backfill for underground mining operations.

During fiscal year 2016, Konkola mined and processed approximately 1,677,116 million tonnes of ore, to produce 136,748 tonnes of copper concentrate containing 3.25% tonnes of copper in ore. Based on Ore Reserves and Mineral Resources as of 31 March 2016 and anticipated production, the Konkola mine has an estimated mine life of over 50 years from fiscal year 2016, a significant position of which is contributed from Inferred Mineral Resources.

Power at the mine is supplied by Copperbelt Energy Corporation PLC ("CEC") with fixed rates subject to index adjustment based on the US Producer Price Indices until 2020. The maximum demand for Konkola is currently 90 MW, but Vedanta estimates that it will rise to 120 MW as it ramps up the KDMP. On-site emergency power is available from two 10 MW diesel generators owned and operated by CEC. This power is mainly utilised for running the de-watering pumps underground. Water pumped from underground is utilised for the plant. The power infrastructure at Konkola is being upgraded to meet the enhanced requirements of the KDMP project. In addition, in anticipation of any power failure, KCM has installed three diesel generator sets of 8 MW each to meet the power requirements of its Konkola mining operations and the KDMP project.

Mine water as well as water from the nearby Kafue river is utilised for domestic requirements. Mulonga Water and Sewerage Company handles the domestic water supply.

Nchanga. The Nchanga mine is situated in the Copperbelt Province of Zambia, in the vicinity of the town of Chingola. Nchanga's operating units comprise two operational open-pit mines, a large underground mine (currently on care and maintenance), a TLP with the associated SX-EW facility, a sulphuric acid plant, copper concentrators comprising two main processing units and a recently commissioned direct blister flash smelter. At Nchanga, KCM holds LML number 7075-HQ-LML for its operations which expires on 31 March 2025. The licence allows KCM to mine copper, cobalt, gold, silver, sulphur, selenium and tellurium within the leasehold area. Under its mining licence, KCM is required to obtain an operating permit on an annual basis. The current mining licence is valid until 31 March 2025.

Following exploration in 1923, development in 1927 and the cessation of operations due to flooding and low copper prices in 1931, mining at the Nchanga underground mine recommenced in 1937. Surface mining operations from the Nchanga open-pit commenced in 1957.

Access to the underground operations is by a series of vertical and inclined primary and sub-vertical shafts. The combined rock hoisting capacity is 292 ktpm. The current operations are projected to extend to 920 metres below the surface. Mine de-watering at Nchanga requires pumping approximately 75,000 m<sup>3</sup> of water per day, a component of which is derived from inflow through the open-pit during the wet months. Underground operations are currently under care and maintenance status and there are zero audited Ore Reserves as on 31 March 2016.

The Nchanga deposit is situated on the northern end of the southwest margin of the Kafue anticline in the vicinity of Chingola. The mineralisation is hosted within two stratigraphic horizons being the Lower Ore Body ("LOB") and Block "A". Block "A" lies to the southwest of LOB and has a similar deposit with a slightly more gentle dip of about 20 degrees. The underground Mineral Resources are defined using an assay footwall and an assay hanging wall with a cut-off grade of 1.5% total copper.

The Nchanga mining licence areas also have stockpiles of Chingola Refractory One ("CRO") with a high refractory material content in mica which is not treatable by conventional methods. These stockpiles add up to approximately 121.1 million tonnes of Probable Ore Reserves with an average grade of 0.85% total copper.

The mining method currently employed at Nchanga is block carving using a continuous advancing long wall caving method. The ore body and the rocks above the areas where the long wall caving method is used are very weak and as a result no development takes place within it. Ore body limits are primarily defined by diamond drilling from the access established below the ore body. The

drill holes are located on a 30 metres by 30 metres pattern. Extreme care is taken to ensure that core recovery from diamond drilling remains high (in excess of 85.0%) and contamination is avoided by use of double or triple tube core barrels. Logging, sampling and assaying are carried out in accordance with quality assurance/quality control procedures. An external cut-off of 1.5% total copper is taken to define the ore body limits. The cut-off is reduced to 1.0% total copper where the ore body is thin and richly mineralised. For the Nchanga open-pit ore bodies, a cut-off grade of 0.5% total copper is used.

Sub-economic dilution is practically zero at the initial stages, but it increases as the extraction increases. Depending upon the in situ grade, a dilution in excess of 50.0% may be recorded at the time when the grade of material from a finger raise has fallen below 1.0% exhausted finger raises are barricaded with timbers.

Open-pit mining has historically been exploited near surface ore bodies, including the LOB, UOB, River Lode, Luano and Chingola Ore Bodies. The mining operations are heavily mechanised using surface drilling techniques, electric shovel loading and hydraulic excavators for loading and 240 tonnes off-highway rear dump trucks. The mining operations at Nchanga are currently exclusively owner operated with the exception of stockpile dumps which are outsourced to meet mill requirements.

The Nchanga mining licence areas also have stockpiles of CRO with a high refractory material content in mica which is not treatable by conventional methods. These stockpiles add up to approximately 121.1 million tonnes of Probable Ore Reserves with an average grade of 0.85% total copper.

As part of growth projects for the Open pits, Mimbula II open pit which is located south — east of Chingola, about 12 km from the Chingola-Chilabombwe highway, and along the Mimbula Chabunyama syncline is being considered for exploitation. In fiscal year 2006, further exploration work was done at Mimbula II area indicating a north extension to the existing Mimbula II open pit and also led to the upgrade of the existing mineral resource. Viability of the resource is understudy and provides good potential for open pits

The Nchanga concentrator comprises two main processing units; the east mill and the west mill. The east mill is a conventional comminution circuit with a RoM capacity of 6.5 mpta which treats copper ore from the open-pits to produce a thickened product which is pumped to the west mill situated approximately two km away for further processing. The west mill comprises two distinct circuits: the copper comminution circuit for underground ore, the copper flotation circuit for open-pit and underground. The copper comminution circuit crushes and mills ore from the Nchanga underground mine ahead of the flotation circuit and has a RoM capacity of approximately 3.0 mpta. The copper flotation circuit treats milled ore from the Nchanga underground mine (copper comminution circuit) and milled ore from the Nchanga open-pit (east mill) to produce concentrates. Residues from the concentrator are pumped to the TLP for hydrometallurgical processing. The concentrates are transported to the Nchanga smelters except bulk copper-cobalt concentrates which are sold in the market.

During fiscal year 2013, the west mill Nchanga underground mine concentrator was upgraded with the commissioning of a new 3.0 mtpa concentrator and the east mill Nchanga open-pit concentrator was upgraded with the commissioning of a new 6.5 mtpa concentrator. For the six months ended 30 September 2016, the Nchanga underground mine mined and processed approximately 0.11 million tonnes of ore at a grade of 1.3% copper and the Nchanga open-pit mines mined and processed approximately 0.06 million tonnes of cobalt ore at a grade of 1.14% copper and 0.27% of total cobalt. For the six months ended 30 September 2016, the Nchanga open pits and underground mine concentrators processed ore to produce 41,003 tonnes of copper concentrates containing 7,010 tonnes of copper.

From 2014 through to 2015, the Nchanga underground mine was making losses entity due to high cost of production emanating from high power tariffs, low mine grade due to mining in the fringe and patchy lower ore body compounded with low copper price at LME. Hence, NUG was put under managed Care & Maintenance in November 2015.

Power at the mine is supplied by CEC with fixed rates subject to index adjustment based on the US Producer Price Indices until 2020. Nchanga's maximum demand is 97 MW.

Nampundwe. The Nampundwe mining operating assets are the Nampundwe pyrite underground mine and concentrator. These are located in the Central Province of Zambia, approximately 50 km west of Lusaka. Nampundwe exploits iron pyrite rich ore bodies containing 11.0% in situ sulphur and has capacity to produce 60,000 tpa of pyrite concentrate that is blended with copper concentrate for smelting. As of 31 March 2016, the Nampundwe mine also had a reserve of 6.4 mt of Sulphur, which is a material used in the smelting process.

### Principal raw materials

The principal inputs of Vedanta's copper business are copper concentrate, rock phosphate, power, fuel and sulphuric acid. Other inputs include coke, lime, reagents and oxide ore. Vedanta has in the past been able to secure an adequate supply of the principal inputs for its copper production.

Copper concentrate. Copper concentrate is the principal raw material of Vedanta Limited's copper smelters. During fiscal year 2016, Vedanta Limited sourced 100% of its copper concentrate requirements from third-party suppliers, either through long-term contracts or on spot markets. Vedanta Limited purchases copper concentrate at the LME price less a TcRc that it negotiates with its suppliers but which is influenced by the worldwide prevailing market rate for the TcRc. Vedanta Limited expect the percentage it purchases from third party suppliers to increase in future periods as the Mt. Lyell copper mine has been placed under care and maintenance. It is also expected that the percentage that is purchased from third party suppliers to also increase in future periods to the extent sought to increase the copper smelting and refining capacity.

During fiscal year 2016, KCM sourced 50% of its copper concentrates requirements (in terms of copper content) from third-party suppliers and sourced 50% of its copper concentrates requirements (in terms of copper content) from its own mines in Zambia, respectively. KCM purchases copper concentrate at the LME price less a TcRc that KCM negotiates with its suppliers, but which is influenced by the worldwide prevailing market rate for the TcRc.

In general, Vedanta Limited's long-term agreements run for a period of three to five years and KCM's agreements run for a period of one year, and are renewable at the end of the period. The quantity of supply for each contract year is fixed at the beginning of the year and terms like TcRc and freight differential are negotiated each year depending upon market conditions. As of 30 September 2016, Vedanta Limited and KCM sourced approximately 60.9% and 100%, respectively, of their copper concentrate requirements through long-term agreements.

Vedanta Limited also purchases copper concentrate on a spot basis to fill any gaps in its requirements based on production needs for quantity and quality. These deals are struck on the best possible TcRc during the period and are specific for short-term supply. In fiscal year 2016, Vedanta Limited sourced approximately 19.5% of its copper concentrate requirements through spot purchases

Rock phosphate. Vedanta Limited's rock phosphate is sourced primarily from Jordan at spot prices. Vedanta Limited is currently exploring the sourcing of rock phosphate from countries such as Morocco, Nauru, Togo, Algeria and Israel to diversify its supply base.

*Power.* The electricity requirements of Vedanta Limited's copper smelter and refinery at Tuticorin are primarily met by the on-site captive power plants. The first 80 MW of a new 160 MW coal-fired thermal power plant was commissioned in the first quarter of fiscal year 2014. Vedanta

Limited's other captive power plants at Tuticorin operate on furnace oil that is procured through long-term contracts with various oil companies. Vedanta Limited has outsourced the day-to-day operation and maintenance of its captive power plants at Tuticorin. Vedanta Limited's Silvassa facility relies on the state power grid for its power requirements.

KCM's Nkana, Nchanga and Konkola operations receive their electricity requirements pursuant to a long-term agreement with CEC. KCM also has an agreement with the national utility company of Zambia, Zambia Electricity Supply Corporation Limited ("ZESCO"), to provide power to Nampundwe on substantially the same terms as its agreement with CEC. ZESCO transmits power from hydroelectric generating stations at Kariba North, Kafue Gorge and Victoria Falls to the central switching station in Kitwe and at the Luano substation outside Chingola at 330 KV, which is sold in bulk to CEC. The 330 KV voltage is stepped down to 220 KV and 66 KV and distributed by CEC throughout the Zambian Copperbelt. ZESCO also supplies electricity directly to the mining operations at Nampundwe in the Central Province of Zambia. In addition, in anticipation of any power failure, KCM has installed a diesel generator set of 24 MW to meet the power requirements of its Konkola mining operations and the KDMP project.

KCM agreed to a 33.0% increase in its tariff under the terms of its electricity supply agreement with CEC. This increase became effective on 1 January 2008 and remained fixed for a period of three years. A 50.0% tariff increase effective from 2011 and spread over a period of five years was signed with CEC. Effective from 1 January 2016, Zambia has increased power tariffs for mining companies in a bid to lure companies to invest in power generation. The increase in prices by 25% comes as the country is facing severe electricity crisis, which has worsened by a drought.

Fuel. KCM's fuel supply is completely dependent on imports. In the past, Zambia has faced fuel shortages. KCM has addressed these fuel shortages by entering into a light fuel supply agreement with BP Zambia Limited on 1 September 2010, which expired on 31 December 2013. Fuel supplies through imports under spot market. In addition to the light fuel supply agreement with BP Zambia Limited, KCM is also party to a heavy fuel oil supply agreement with Kobil Zambia Limited. .

Sulphuric acid. The sulphuric acid for KCM's TLP is largely supplied by the Nchanga smelter.

## Distribution, logistics and transport

Copper concentrate from the Mt. Lyell processing facility is transported by road to a rail head and then transported by rail to the port of Burnie, Tasmania, from which it is shipped to the port of Tuticorin in India. Copper concentrate sourced from both the Mt. Lyell processing facility and from third parties is received at the port of Tuticorin and then transported by road to the Tuticorin facility.

Once processed at the Tuticorin facility, copper anodes are either refined at Tuticorin or transported by road to Silvassa. Copper cathodes, copper rods, sulphuric acid, phosphoric acid and other by-products are shipped for export or transported by road to customers in India.

KCM's finished copper in the form of copper cathodes are mainly sold to overseas markets in the Middle East, Southeast Asia and the Far East with very little copper being sold locally in Zambia. The metal is transported to these markets by road and rail to the Indian Ocean ports of Dar-es-Salaam in Tanzania and Durban in South Africa and, more recently, Beira in Mozambique.

## Sales and marketing

The ten largest customers of Vedanta's India copper business accounted for approximately 42.6%, 32.8% and 30.6% of Vedanta's revenue from the copper business in fiscal years 2014, 2015 and 2016,. No customer accounted for greater than 10.0% of Vedanta's copper business revenue in fiscal years 2014, 2015 and 2016 and for the six months ended 30 September 2016.

Vedanta Limited's copper sales and marketing head office is located in Mumbai, and it has field sales and marketing offices in most major metropolitan centres in India. KCM does not maintain any significant sales offices as sales are effected mainly through contracts executed at its corporate offices in Chingola, Zambia. Vedanta Limited sells its copper rods and cathodes in both domestic and export markets. KCM primarily sells its products in export markets. Domestic sales in Zambia form an insignificant portion of KCM's sales. In fiscal years 2014, 2015 and 2016, exports accounted for approximately 61.2%, 58.6% and 60.5%, respectively. Vedanta's export sales were primarily to China, Japan, the Philippines, Singapore, South Korea, Taiwan, Thailand and various countries in the Middle East. Vedanta Limited also sells phosphoric acid and other by-products in both domestic and export markets. Vedanta's exports of copper anode slimes are predominately sold to Europe.

Domestic sales by Vedanta Limited in India are broadly based on the LME spot price plus regional premiums, as well as domestic supply and demand conditions. A majority of Vedanta's sales are made pursuant to existing supply agreements. The price for the copper Vedanta Limited sells in India is normally higher than the price it charges in the export markets due to the tariff structure on costs, smaller order sizes that domestic customers place and the packaging, storing and truck loading expenses that it incurs when supplying domestic customers.

Vedanta Limited's export sales of copper are made on the basis of both long-term sales agreements and spot sales. The prices of Vedanta Limited's copper exports include the LME price plus a producer's premium. Vedanta Limited does not enter into fixed price long-term copper sales agreements with its customers. In fiscal year 2016, 54% of KCM's sales were through annual contracts priced on the monthly average LME price plus a premium.

### Market share and competition

Vedanta Limited owns one of the two custom copper smelters in India and had a 36% primary market share by sales volume in India in fiscal year 2016, according to International Copper Association (India). The other major custom copper smelter in India is owned by Hindalco, with the remainder of the primary copper market in India primarily served by imports and Hindustan Copper Limited.

Copper is a commodity product and Vedanta Limited competes primarily on the basis of price and service, with price being the most important consideration when supplies of copper are abundant. Vedanta Limited's metal products also compete with other materials, including aluminium and plastics that can be used in similar applications by end-users. Copper is sold directly to consumers or on terminal markets such as the LME. Prices are established based on the LME price, though as a regional producer Vedanta Limited is able to charge a premium to the LME price which reflects the cost of obtaining the metal from an alternative source.

# Projects and developments

#### Tuticorin.

Vedanta Limited had undertaken expansion projects to setup Copper smelter plant at Tuticorin costing Rs. 16,820 million (\$252.3 million) to increase its total copper capacity to 800,000 tpa. The expansion of the smelter is on hold as required approvals from the state government have not yet been received. Specifically, the proposed capacity expansion at Tuticorin had been on hold, pending environmental clearances. Vedanta Limited has incurred Rs. 6,423 million (\$96.4 million) on these projects as of 30 September 2016.

KDMP. The KDMP was approved by KCM's board of directors in July 2005, at a total initial capital outlay of approximately \$357.0 million. This project is expected to contribute to the productivity of KCM's underground copper deposit. All governmental approvals for the KDMP have been received. The mid-shaft loading station of the No. 4 shaft was commissioned in April 2010. Construction of the bottom shaft sinking, which included the continued development of the No. 4 shaft to a design depth of approximately 1,500 metres, the bottom-shaft loading and waste hoisting was completed during fiscal year 2012. The KDMP was originally planned to increase the ore production of the Konkola mine from 1.8 mtpa of ore to approximately 6 mtpa, and its scope and configuration was subsequently revised. This revised scope and configuration plans an increase in target output of up to an estimated 7.5 mtpa at full ramp-up by accessing its rich underground ore body. The increase in target output, changes in commodity prices and other project work have resulted in an increase in the estimated project cost from \$357.0 million to \$674.0 million, as of 31 March 2016. The cost has since been revised upward to \$974.0 million primarily due to an increase in the scope of the project and consequent extra time required, weak ground conditions at the site resulting in additional engineering costs, commodity price increases and appreciation of the South African rand to the US dollar.

The Konkola Deep Mine Project (KDMP) started to bring copper ore from its mid-level in 2010 and from the bottom of the shaft in 2014. The infrastructure for the KDMP project is now complete and mine development to ramp-up production is underway.

#### Iron Ore Business

#### Introduction

Vedanta's iron ore business is carried out in the states of Goa and Karnataka through Vedanta Limited. Vedanta Limited's iron ore business includes exploration, mining and processing of iron ore. During fiscal year 2016, Vedanta Limited produced approximately 5.2 million dmt of saleable iron ore fines and lumps. The sales for fiscal year 2016 were at 5.3 million dmt (including sales of ore purchased through e-auction of the ore confiscated by the government prior to the suspension) as compared to sales of 1.3 million dmt in fiscal year 2015. According to the Federation of Indian Mineral Industries, Vedanta Limited has been India's largest exporter of iron ore in the private sector by volume since 2003. As of 31 March 2016, Vedanta Limited and its subsidiaries owned or had the rights to ore reserves consisting of 193.6 million tonnes of iron ore at an average grade of 55.4% and 190.6 wmt of mineral resources as of 30 September 2016. Vedanta operates a metallurgical coke plant with an installed capacity of 522,000 tpa and a pig iron plant operating with a rated capacity of 7,742,000 tpa. Vedanta Limited manufactures pig iron through the blast furnace route. Vedanta Limited has a patent for the technology for the manufacture of energy recovery based metallurgical coke.

Ore from Vedanta Limited's mine at Karnataka was exported mainly through the ports at Goa and Mangalore. However, since the ban on exports imposed by the Government of Karnataka in July 2010, Vedanta Limited sells the iron ore produced at the Karnataka mine only to domestic Indian customers. The suspension on mining operations which was issued by the Supreme Court of India in August, 2011 was lifted by the court on 18 April 2013 and operations partially resumed on 29 December 2013 and fully resumed on 28 February 2015.

The mining suspension orders, due to environmental violations by the miners, issued by the state government of Goa and the Supreme Court of India in September 2012 and October 2012 respectively, were lifted, subject to certain conditions on 21 April 2014. On 10 August 2015, operations at the Codli mine resumed and operations at the remaining mines resumed in second half of fiscal year 2016 after receiving the required consents and approvals.

In addition, Vedanta Limited manufactures pig iron and metallurgical coke in Goa, and also operates two waste heat recovery plants of 30 MW each in Goa. In fiscal year 2016, Vedanta Limited produced approximately 647,645 tonnes of pig iron and 485,794 tonnes of metallurgical coke and as of 30 September 2016, Vedanta Limited has a capacity to produce pig iron of approximately 772,000 mt

On 22 August 2011, Vedanta Limited acquired a 51.0% ownership interest in WCL, a Liberian iron ore exploration company which was a wholly-owned subsidiary of Elenilto Minerals & Mining LLC, for a cash consideration of \$90.0 million. WCL's iron ore project in Lbreria comprises of deposits in Bomi hills, Bea Mountain and Mano River. On 20 December 2012, Vedanta Limited acquired the remaining 49.0% of the outstanding common shares of WCL from Elenilto Minerals & Mining LLC for a cash consideration of \$33.5 million. However, due to the outbreak of Ebola in Liberia, Vedanta Limited's project was temporarily suspended in August, 2014 as the staff had to be evacuated. Since then, iron ore prices have fallen sgnificantly, due to which it was considered not viable to resume operations. Vedanta Limited is in discussions with the government to extend the Mineral Development Agreement to make this project more sustainable.

In consideration of the suspension of exploration in Liberia, low iron ore prices, geo-political factors and no plans for any substantive expenditure has resulted in continued uncertainty in the project, an impairment charge of \$227.5 million has been recognized in fiscal year 2016. Further, an impairment charge of Rs 1,153 million (\$17.7 million) was recorded in fiscal year 2016, towards unused plant and machinery at Bellary, Karnataka.

Goa Energy Limited ("GEL"), which merged into Vedanta Limited on 24 March 2015, owned one of the 30 MW waste heat recovery power plants in Goa which generates power from the waste gases of the metallurgical coke plant and blast furnace.

A number of initiatives were earlier undertaken to expand the mining and logistical capacity at Vedanta Limited's mines at Goa and Karnataka to 40 mmt, but these initiatives have been scaled back and are currently on hold due to regulatory issues and capping of production limits across the state. Vedanta Limited has also made substantial progress on its logistics capacity, with a new railway siding already commissioned in Karnataka and made rprogress on widening the existing roads and building dedicated road corridors in both Karnataka and Goa. Vedanta Limited has also added capacity in river and port logistics, and now have a fleet of 33 barges and 2 transhippers and 1 floating crane station as on date.

On 6 May 2016, a Memorandum of Understanding ("MOU") was signed between the state government of Jharkhand and Vedanta Limited to set up a 1 mtpa hot metal plant with a facility to produce 0.7 mtpa pig iron and 0.3 mtpa ductile iron pipe plants in Kharswan/Manoharpur. This MOU will support an application to the state government of Jharkhand for the grant of the Dhobil mining lease. The MOU will be valid for one year within which the site selection for plant, identification of source of water, power and raw material, and prepare a detailed project report or DPR will have to be completed, so as to proceed to Stage-II MOU signing.

Revenue from Vedanta's iron ore business in the six months ended 30 September 2016 was \$217.1 million.

#### Principal products

Iron ore. Vedanta Limited's iron Ore Reserves consist of both lump and fine ore. As of 31 March 2016, the percentage of lump ore in the reserves was approximately 12.0% and 18.0% in Goa and Karnataka, respectively. While the ore in Goa contains an average iron content deposit of 50.0% to 55.0%, the mines in Karnataka are of higher grade deposits, ranging between 56.0% to 60.0% iron. The lump ore is sold from the mines in Karnataka primarily to domestic pig iron or steel producers. The majority of other iron ore produced by Goa mines is sold internationally, primarily to purchasers in China.

*Pig iron.* Vedanta Limited produces basic, foundry and nodular grade pig iron in various grades for steel mills and foundries.

*Metallurgical coke*. Vedanta Limited also produces metallurgical coke, the majority of which is consumed internally.

### Production

The table below sets out Vedanta Limited's total production<sup>(1)</sup> for the periods indicated:

		Year	Ended 31 Ma	Six months ended 30 September		
Mine/Mine Type(1)	Product	2014	2015	2016	2015	2016
			(M	lillion tonnes	s)	
Goa (Open-Pit) <sup>(2)</sup>	Iron ore	0	0	2.0	0.1	2.6
A. Narrain (Open-Pit)	Iron ore	1.5	0.6	3.0	0.9	1.7
SRL (Open-Pit) <sup>(2)</sup>	Iron ore	0	0	0.2	0	0.4
Total Iron Ore	Iron ore	1.5	0.6	5.2	1.0	4.7
Amona Plant	Metallurgical coke	0.41	0.49	0.48	0.25	0.24
	Pig iron	0.51	0.61	0.65	0.30	0.37

In fiscal year 2016, Vedanta Limited produced 5.2 mt. million tonnes of iron ore fines and lumps. In addition, as of 31 March 2016, Vedanta Limited had total production capacities 729,000 tpa of pig iron and 522,000 tpa of metallurgical coke. As of 30 September 2016, the pig iron capacity was 772,000 tpa after debottlenecking exercises.

The table below sets out Proved and Probable iron Ore Reserves<sup>(1)</sup> as of 31 March 2016 at mines that Vedanta Limited owns or has rights to:

Total Proved

	Quantity	Proved Reserve			2	Probable Reserve	and Probable Reserves	
		Fe Grade	Quantity	Fe Grade	Quantity	Fe Grade		
	(Million tonnes)	(%)	(Million tonnes)	(%)	(Million tonnes)	(%)		
Goa:								
Codli Group	18.1	53.3	6.0	55.7	24.1	53.9		
Sonshi Group	16.3	59.6	21.4	59.2	37.7	59.4		
Other	7.7	55.3	11.7	56.4	19.4	56.0		
A. Narrain	19.1	56.1	20.3	56.2	39.4	56.2		
SRL	42.1	52.16	30.9	55.1	73	53.4		
Total Iron Ore Reserves	103.3	54.50	90.3	56.5	193.6	55.4		

<sup>(1)</sup> See "Presentation of Information — Reserves and Production" for an explanation of the basis of preparation of production amounts.

<sup>(2)</sup> Goa mining operations were suspended due by the State of Goa since 11 September 2012. Post all proper applications and necessary clearances from various government bodies, the suspension has been lifted and operations resumed from August, 2015.

## Production facilities

Amona plant. Vedanta Limited commenced operations at its Amona plant in Goa in 1992 and has been engaged in the manufacture and sale of pig iron since then. Vedanta Limited's metallurgical coke plant at Amona produces a range of coke fractions from over 70 mm for foundries, 20 mm to 60 mm for blast furnaces and six mm to 25 mm for the ferrous alloy industry. Approximately 63.0% of the total production of metallurgical coke is consumed by Vedanta Limited for its pig iron production and the remainder is sold to customers primarily located in India. The cost of the input coal blend is the single most important cost component for the production of coke. Vedanta Limited's production consists mainly of low ash coking coal and it imports 100.0% of low ash coking coal each year. In order to ensure a stable raw material supply, Vedanta Limited has long-term supply contracts for the procurement of such coal. Vedanta Limited generates its own electric power from the waste heat of Vedanta Limited's metallurgical coke plant and the blast furnace gas.

The following table sets out the total rated capacities as of 30 September 2016 at Vedanta Limited's Amona facility:

	Cap	acity
	Metallurgical	
	Coke	Pig Iron
	(t <sub>l</sub>	pa)
Amona Plant	522,000	772,000

Mines

Goa mines. Vedata Limited's iron ore operations in Goa consist of four major iron ore mines, namely Codli, Sonshi, Bicholim and Surla. In addition, Vedanta Limited derives ore production from several satellite mines in North Goa. The Goa leases were originally granted as mining concessions by the government during the Portuguese regime from 1955 onwards, and in 1987 these concessions were converted to mining leases. Before suspension of operations in September 2012, Vedanta Limited operated a total of twenty one mining leases in Goa representing an area of approximately 1,695 hectares (includes one third-party lease on contract, representing an area of approximately 62 hectares).

Vedanta Limited carries out exploration in grid patterns of 100 metres by 100 metres at the initial stage of exploration, followed by grid patterns of 50 metres by 50 metres. Core samples are analysed and used to interpret the ore body for the preparation of geological cross sections and the classification of the ore as either crude ore or sub-grade ore. Drill core sampling is undertaken on entire holes and the drill core material is sampled at the sample preparation facilities.

The gross value of fixed assets for the Goa operations, including capital works-in-progress, was Rs. 106,765 million (\$1,601.6 million) as of 31 March 2016.

Codli mines. The Codli group of mines is situated in South Goa, approximately 600 km south of Mumbai and 50 km east of Panaji, the capital of Goa. It is an open-pit operation and the mining leases are held by Vedanta Limited. The nearest railway stations, Sanvordem and Margao, are approximately 13 km and 40 km, respectively, from the mine. There is an airport 55 km from the mine at Dabolim. The river loading points at Sanvordem and Capxem are approximately 12 km and 14 km, respectively, from the Codli mines while the port is approximately 40 nautical miles from the river loading point.

The Codli mines cover an area of approximately 340 hectares and are operated under the terms and conditions stipulated in four contiguous leases, three of which are owned by us with the remaining lease being owned by a third-party. Vedanta Limited owns an additional two mining leases to the northwest of the current Codli mine operations where exploration is being undertaken. Exploration at the Codli mines began in 1966 and the mine first commenced production in 1973. Production at the mine reached 3 mmtpa by 1995. This mine has been granted environmental clearance for a production level of 7 mmtpa.

At the Codli mines, the lower grade iron formation is folded and subsequently eroded into basinal areas amenable to open-pit mining. Economically mineable material occurs over an area of about 3.1 km by 1.6 km and is located between 84 metres above sea level and 50 metres below sea level. The formations show a general northwest-southeast trend with shallow to moderate dips towards the northeast with local reversals. The footwall is comprised manganiferous clay and decomposed quartzites and the stratigraphy of the ore body is cross cut by late dolerite dykes and sills which are manifested by pink clayey zones in the mine area.

The Codli mines are multi-pit, multi-lease fully mechanised mining units. The open-pits have a bench height of seven metres, haulage roads of 25 metres width and an overall pit slope of 26 degrees. The Codli mines have 14 basins, of which five pits have been exhausted. The lateritic overburden is removed either by ripping or dozing, and loaded by excavators and/or wheel loaders into heavy earth moving machinery such as rigid dumpers and articulated dumpers. Hauling within the mine is also done by rigid and articulated dumpers. An ore stockpile is maintained at all times to continuously feed the processing plants.

Vedanta Limited has extensive ore processing facilities for upgrading the ore, which include crushing, dry screening, scrubbing, log washing, classifying, hydrocycloning, and magnetic separation with a wet high- intensity magnetic separator. The four Codli processing plants are between 1 and 18 years old and throughput capacity of the four Codli processing plants is 10 mmtpa. The processed ore is transported by road to a riverhead jetty by 10 tonne tipper trucks and then further transported by barges to the Goa ports or transhipper for onward shipment. One plant is provided with a dry circuit to process high grade ore, while the remaining four wet plants process low grade ores. The Codli processing plants undergo regular maintenance and annual repairs are conducted during the monsoon season.

As of 30 September 2016 Vedanta Limited has undertaken an exploration and evaluation program at the Codli mines which involved drilling a total of 78,082 metres in depth in 1,156 holes. The Codli mine deposits are extensively sampled in vertical drill hole grids between 8 metres and 127 metres in length.

Power at the Codli mines is supplied through a government grid supply network with a maximum contracted demand of 5,000 kVA. There are also generator sets with an aggregate of 5,190 kVA available to supply power. The site's full water requirements are met from the rainwater accumulated in exhausted pits.

In fiscal year 2016, 2.9 million wmt of crude ore was produced from the Codli mines since the recommencement of operations at the mines in August 2015 after its temporary suspension of mining activities relating to iron ore imposed by the state government. For the six months ended 30 September 2016, 0.98 million wmt of crude ore was produced from the Codil mines.

The economic cut-off grade at the Codli mines is determined by the requirement to meet various sales contracts. Vedanta Limited operates on a 50.0% iron operational cut-off grade in practice, as compared to the statutory cut-off grade of 45.0% iron. Ore containing 45.0 to 50.0% iron is preserved for future use and ore containing 50.0 to 54.0% iron is beneficiated in order to make it saleable.

The reserves at the Codli mines in the proved reserve category are defined by drill holes spaced at 50 metre intervals, the probable reserves are generally defined by drill holes spaced at a further 50 metre interval from the proved reserves. Possible reserves are generally defined by drill holes spaced at a further 50 metre to 75 metre interval from the probable reserves. As the area is drilled at approximately 50 metre by 50 metre grids, the physical continuity of the ore is well demonstrated.

Vedanta Limited operates the Gauthona Dusrifal mine, the lease of which is held by M/s Timblo Private Limited, as an ore raising contractor since 1989. Since 1983, Vedanta Limited had a common boundary working agreement with M/s Timblo Private Limited and, in 1989, Vedanta Limited acquired control of 40.8 hectares of the leasehold area. This mine is contiguous to the Codli mines. The mining method at the Gauthona Dusrifal mine is the same as that of the Codli mines described above. During fiscal years 2015 and 2016, there was no ore production from the Gauthona Dusrifal mine due to the temporary suspension of mining activities relating to iron ore imposed by the state government.

Sonshi mine. The Sonshi mine is situated in the North Goa District, approximately 34 km from Panaji and approximately 40 km north of the Codli mines. It comprises an open-pit mine. The area is well connected by metalled roads and the nearest railway station is at Tivim, approximately 25 km from the Sonshi mine. The river loading point, Amona, is nine km from the site and the port is approximately 35 nautical miles from the river loading point. The airport is approximately 50 km from the Sonshi mine.

The leasehold area of the Sonshi mine is 62 hectares. The leaseholder has submitted timely renewal applications to the state government and no rejections have been notified. The Sonshi mine was operating under deemed consent until the temporary suspension of mining activities relating to iron ore by the state government of Goa. Due to the narrow width of the leasehold area, common boundary working agreements have been entered into with adjoining lessees to facilitate mining operations. The original mining concession was granted in 1953 to Cosme Costa & Sons. Though the the lease has not been acquired, but Vedanta Limited has been operating the Sonshi mine as an ore raising contractor since 1958. Production at the mine commenced in 1958. The agreements entered into by us with Cosme Costa & Sons for the raising and sale of iron ore expired in March 2013 and was renewed until November 2017. The Sonshi mine has been granted environmental clearance for a production level of 3.0 mmtpa. The area surrounding the Sonshi mine is covered with laterite capping underlain by lumpy ore zone. The ore deposit at the Sonshi mine forms the northern limb of the northwest-southeast trending syncline. The formations dip 50 degrees to 60 degrees northeast. The principal deposit of the Sonshi mine comprises three distinct ore bodies that are folded into a syncline. The youngest ore body has a width of 50 metres, while the other ore bodies dip steeply to the northeast and have widths of approximately 20 metres to 25 metres. The intervening parting between the ore bodies comprised 50 metres of manganiferous clay and a 30 metre wide limonitic zone separating one ore body from the footwall phyllite. The depth extent of these bands has been outlined with deep drilling. Hematite is the major economic mineral in each of the bands.

The open-pit mining operations at the Sonshi mine are fully mechanized. The hard laterite capping is loosened either by drilling, blasting or ripping/dozing. The soft sub-lateritic zone is excavated and transported to respective laterite, clay and ore stacks. The material is then reloaded into smaller 10-tonnetrucks and transported to the plants for processing and beneficiation, which involves crushing, scrubbing, log washing, classifying, double stage cycloning and thickening. The waste is transported to a dump stockpile six to seven km away. Processing operations for the Sonshi mine are similar to those of the Codli mines described above. The processed ore is transported to the Amona jetty, loaded in barges and sent to Mormugao port approximately 35 nautical miles away.

There is no processing plant on-site. The extracted ore is transported by a fleet of contractors with 10-tonnetrucks to the processing plants at Amona (approximately nine km away) and at Cudnem (approximately six km away). The combined throughput capacity of the processing plants is 7.9 mmtpa. The plants undergo regular maintenance and annual repairs are carried out during the monsoon season.

No exploration activity was carried out in the mine during fiscal year 2015 due to temporary suspension of mining activities relating to iron ore imposed by the state government. The Sonshi mine has been sampled in vertical and inclined drill holes with a total of 66,766 metres being drilled in 644 holes as of 30 September 2016.

Power at the mine is supplied through a government grid supply network and the maximum contracted demand is up to 1,550 KVA. A 625 KVA diesel generator is also available to supply power in case of the fluctuations at grid power. In fiscal year 2016, 0.2 million wmt of crude ore was produced from the Sonshi mine and for the six months ended 30 September 2016 0.29 million wmt of crude ore was produced from the Sonshi Mine.

The economic cut-off grade at the Sonshi mine is determined by the requirement to meet various sales contracts and the need to maintain stockpiles to meet the contract. Vedanta Limited operates on a 50.0% iron operational cut-off grade in practice, as compared to the statutory cut-off grade of 45.0% iron. Ore containing 45.0 to 50.0% iron is preserved for future use and ore containing 50.0% to 54.0% iron is beneficiated in order to make it saleable.

Vedanta Limited acquired an adjoining mining lease for the Mareta Sodo mine in 2004 from Pandurang Timblo Industries. This mining concession was granted in 1955 and was operated intermittently until the mine was transferred to us in November 2004. This mine has been granted environmental clearance by the MoEF for production of 1 mmtpa. As of 30 September 2016, 17,702 metres have been drilled in 112 boreholes on the leased area. The mining method of the Mareta Sodo mine is the same as that of the Sonshi mine described above. Due to allegations of illegal mining in the State of Goa, the state government of Goa banned mining operations within the state in September 2012, and the MoEF also suspended environmental clearances within the state. In January 2015, the state government of Goa revoked the mining suspension order, and in March 2015 MOEF has likewise revoked the suspension of environmental clearances. Subsequently, the lease deeds were executed and registered as of August 2015 to resume production for all working leases, including the mining lease for the Mareta Sodo mine. In fiscal year 2016, 0.13 million wmt crude ore was produced from this mine. In addition to the Codli mines and right to the third-party mining lease at the Sonshi mine, Vedanta Limited has ten additional mining leases, of which four are non-operative leases. The operative mines are the Sanquelim mines with three contiguous leases with an environmental clearances of 0.2 mtpa, the Orasso Dongor mine (0.2 mtpa) and the Botvadeacho Dongor mine (0.2 mtpa). The non-operative leases are under exploration. Karnataka. Vedanta Limited's main operations in Karnataka are at the A. Narrain mine which is located approximately 200 km northwest of Bangalore. The open-pit mine is operated by us and is well connected by rail, with the nearest stations, Sasalu and Amruthapura, and M/s Mineral Enterprises server by Chikkajajur or MMEC railway siding located 16 km, 17 km and 4 km respectively, from the A. Narrain mine. The nearest port at Mangalore is approximately 430 km from the mine and the nearest airport is located at Bangalore, approximately 230 km from the mine.

The leasehold area of the mine is 160.6 hectares, which is classified into two blocks, namely the south block, which is 123.5 hectares, and the north block, which is 37.1 hectares. These two blocks are joined by a narrow stretch of land 40 metres in width and 660 metres in length along the eastern side of the leasehold area. Vedanta Limited has operated the mine since 1994. The MOEF had granted an environment clearance for 6 MTPA in the year 2009. However, due to conditions introduced by the Supreme Court, the production capacity of the mine was reduced to 2.29 MTPA. Furthermore, in May 2016, Vedanta Limited had applied for an enhancement in production capacity of 6 MTPA to Central Empowered Committee appointed by the Supreme Court. Therefore, as per procedure Vedanta Limited has received recommendation from Federation of Indian Mineral Industries for 6 MTPA and from Indian Council for Forestry Research and Education for 5.3 MTPA.

The geological formation of this region belongs to the Archean-Proterozoic age. The geology of the A. Narrain mine consists of Archean formations locally termed "Dharwars" which contain rich and large iron ore deposits. The leasehold area forms part of the Chitradurga-Tumkur schist belt and part of a regional isoclinal fold. The strike direction of the ore body dips westerly at an angle of about 60

degrees to 70 degrees. Hematite is the principal ore mineral and limonite, goethite and magnetite constitute the associated minor minerals of the mine. The mineralized horizon extends over a length of about two km. The footwall comprised decomposed quartzite and phyllite, and the stratigraphy is cross cut by late dolerite dykes and sills which are manifested by pink clayey zones in the mine area.

Currently, the north and the south block of the A. Narrain mine have mechanized mining operations. The open-pit mines have a bench height of seven metres, haulage roads of 12 metres to 15 metres in width and an overall pit slope of less than 30 degrees. The A. Narrain mine is equipped with dry process facilities for processing all grades of ore.

The lateritic overburden is removed either by blasting or ripping/dozing, loaded onto and transported by 30-tonnetrucks. The ore mined is processed at the mine's processing facilities, which involves crushing and dry screening processes. The processed ore is then transported by road to the railway yard, for onward transport to customers in Karnataka, Goa and other places. Ore produced in Karnataka ranges from 56.0% to 60.0% iron content and comprises 82.0% fines and 18.0% lumps.

The two processing plants at the A. Narrain mine have a combined capacity of 1,150 tonnesper hour.

Since the mine was taken over by Vedanta Limited, exploration at the A. Narrain mine involved the drilling of a total of 59,025 metres in 605 boreholes as of 30 September 2016. The A. Narrain deposit is extensively sampled in vertical and inclined drill hole grid intervals in side direction of 50 metres and in cross section average of 25 metres with most of the holes covering a depth of 50 metres to 200 metres. Power at the mine is supplied by a 725 KV and 320 KV generator. All power supplied to the mine and plant is through generators.

The gross value of fixed assets, including capital works-in-progress, was Rs. 24,820.5 million (\$372.3 million) as of 31 March 2016.

On 26 August 2011, the Supreme Court of India syuspended mining activities in the Chitradurga and Tumkur districts of Karnataka. On 18 April 2013, this suspension was lifted by the Court and in December 2014, the operations were resumed after getting necessary regulatory clearances. Although Vedanta Limited resumed operations in Karnataka based on the stage I forest clearance from the state government of Karnataka and a temporary working permission from the MoEF, the temporary working permission expired on 31 July 2014. Karnataka operations were halted for the period from 1 August 2014 to 27 February 2015. Vedanta Limited resumed operations in Karnataka after all statutory clearances were in place from 28 February 2015. The economic cut-off grade at the A. Narrain mine is determined by the requirement to meet various sales contracts and the need to maintain stockpiles to meet the contract specifications.

The reserves in proved reserve category at the Karnataka mines are estimated based on drilled boreholes spaced at 50 metres along predefined section lines and occasionally off of the section lines, the probable reserves are estimated based on drilled boreholes spaced at 50 metres from the proved reserves and the possible reserves are estimated based on drilled boreholes spaced at 25 metres from the probable reserves. As the area is drilled at approximately 50 metre by 50 metre grids, the physical continuity of the ore is well demonstrated.

*Odisha*. The Thakurani mine is situated at Barbil within the State of Odisha, approximately 400 km from Kolkata airport. The Thakurani mine has been operated by Vedanta Limited as an ore raising contractor since 1999 and the lease expired on 30 November 2010. Production at this mine has ceased.

SRL, Goa. SRL and its subsidiary Sesa Mining Corporation Limited extract iron ore from 11 mining leases spread across a total of approximately 980 hectares in Goa. SRL's operations consist of two major iron ore mining areas, one in Bicholim and the other in Surla, both located in North Goa and which together account for approximately 90.0% of SRL's total estimated iron ore reserves as of 31 March 2016. The Bicholim mine consists of five contiguous mining leases covering an area of

479.3 hectares in the north of Goa. The Surla mine consists of three contiguous mining leases covering an area of 253.4 hectares in the recognized iron ore belt of Pale-Velguem-Bicholim-Shirgao in the north of Goa. Mining operations started at the Bicholim mine and the Surla mine in 1958. Processed ore from the Bicholim and Surla mines is transported by SRL to loading jetties at Sarmanas and Surla/Sinori in north of Goa, and then loaded into barges and sent to Mormugao port in Goa, India, where it is then shipped to customers. SRL's mining assets include processing plants, barges, jetties, transhippers and loading capacities at the Mormugao port. In fiscal year 2016, the combined production of the Bicholim and Surla mines was 0.61 million wmt of crude ore since the recommencement of operations at the mines after temporary suspension of mining activities in August 2015, relating to iron ore imposed by the state government.

Vedanta Limited also had a ship building division for the construction and repair of inland mini bulk carriers owned by us as its primary activity as well as supporting Vedanta's core activities including the export of iron ore and the import of coke and coal. This division has now closed.

*WCL*. WCL comprises of three concession areas (Bomi Hills, Bea Mountain and Mano River). The ebola epidemic in Liberia resulted in stoppage of drilling and exploration work for iron ore during fiscal year 2015. The staff was evacuated as a result of the ebola outbreak in 2015.

In consideration of the suspension of exploration in Liberia, low iron ore prices, geo-political factors and no plans for any substantive expenditure resulting in continued uncertainty in the project, an impairment charge of US\$227.5 million was recognized in fiscal year 2016. Vedanta Limited is in discussions with the government to extend the MDA to make this project more sustainable.

# Principal raw materials

Iron ore operations. There are no direct raw materials used in Vedanta Limited's iron ore mining and processing operations. Indirect raw materials include power, fuel and lubricants. Vedanta Limited procures these indirect materials from various vendors. The electricity required for its operations is supplied by the government grid and supplemented by Vedanta Limited's owned and hired diesel generator sets. The prices of fuel and necessary lubricants are volatile and the price of power is dependent on tariffs imposed by State Governments.

Pig iron operations. The principal raw materials for the manufacture of pig iron are iron ore, metallurgical coke, limestone and dolomite.

Iron ore is largely sourced from mines in Karnataka and Goa. The iron ore is transported from Karnataka by truck and railway rakes and from Goa by truck. Iron ore requirements are met by Vedanta Limited's own mines from Karnataka and purchases from other mines in Karnataka and Goa. Vedanta Limited's metallurgical coke requirements are met by its metallurgical coke division. Limestone and dolomite are purchased from mines in Karnataka and transported to Vedanta Limited by trucks.

Metallurgical coke. The principal raw materials for the manufacture of metallurgical coke are hard and semi-hard coking coals. These raw materials are imported from various international suppliers mainly from Australia and Russia.

*Power.* Electricity for Vedanta Limited's metallurgical coke and manufacturing operations is primarily supplied by its wholly owned subsidiary, GEL, which generates power from the waste gases of Vedanta Limited's metallurgical coke plant and its blast furnace.

### Distribution, logistics and transport

Vedanta Limited's mining operations are advantageously located in Goa and are complemented by an efficient transportation network. In order to achieve higher volume and loading capacities and vessels with higher drafts, Vedanta Limited and SRL own and operate transfer vessels, which are used for mid-stream loading at Goa. Vedanta Limited ships products from ports on the west coast of India and so, the annual monsoon season in Goa impacts its distribution operations from June to September. Vedanta Limited maintains a network of rail cars, barges and transhippers that are primarily used to facilitate the export of its ore to foreign customers. Vedanta Limited's fleet includes 33 barges with capacities between 1,600 to 2,500 tonnesper barge. Vedanta Limited also has one transhippers and a floating crane station with a combined rated capacity of upto 54,000 ton/day.

Sales from Vedanta Limited's Karnataka mines to Indian domestic customers take place on an ex-mine basis, and the transportation is handled by the customer.

#### Sales and marketing

*Pig iron*. Currently, the majority of the pig iron produced by Vedanta Limited is sold within India to foundries and steel mills. The sale of pig iron is generally done on a spot basis with prices valid for a month. The prices of pig iron are fixed on a delivered basis, with material generally being sent on a freight-to-pay basis.

Metallurgical coke. Currently, all of the metallurgical coke produced by Vedanta Limited is primarily (about 90%) consumed within plant and balance is sold within India to internal and external customers. Approximately 75% to 85% of Vedanta Limited's total metallurgical coke production during fiscal year 2016 was used for the production of pig iron. The balance was sold in the domestic Indian market.

The sale of metallurgical coke to other customers is done on a spot basis with prices valid for a month.

Vedanta Limited has a marketing office at Panaji in Goa with indenting agents to sell the pig iron and metallurgical coke products. The sales and chartering needs are managed from the office at Goa. To cater to Chinese customers, Vedanta has a marketing office in China.

Vedanta Limited's ten largest customers accounted for approximately 49.1%, 40.6% and 28.5% of revenue for iron ore business in fiscal years 2014, 2015 and 2016, respectively. No customer accounted for greater than 10.0% of Vedanta Limited's revenue in fiscal year 2016. One customer each accounted for greater than 10.0% of the revenue in each fiscal year 2014 and 2015.

## Market share and competition

Since 2003, Vedanta Limited has been India's largest exporter of iron ore in the Indian private sector by volume, prior to the temporary suspension of mining activities relating to iron ore in the states of Goa and Karnataka, according to the Federation of Indian Mineral Industries. In fiscal year 2015, no sales were accounted due to the temporary suspension of mining activities relating to iron ore in the state of Goa. In fiscal year 2016 the total sales including sale of confiscated ore purchased through e-auction, was 5.3 million tonnes for Fiscal year 2016 and 3.4 million tonnes for the six months ended 30 September 2016. Vedanta's primary competitors in both the public and private sectors in India include NMDC, MMTC India Limited, Rungta Mines Ltd., MSPL and Essel. In addition, Vedanta Limited competes with a number of international producer-exporters of iron ore worldwide.

#### Aluminium Business

#### Introduction

Vedanta's aluminium business is in Chhattisgarh and Odisha. Vedanta operates the business in Chhattisgarh through BALCO, in which Vedanta Limited has a 51.0% ownership interest as of 30 September 2016 and the remaining 49.0% is held by GoI. Operations in Odisha are held through Vedanta Limited.

Since acquiring the interest in BALCO, Vedanta Limited has worked to improve BALCO's operating performance through expansion and by improving operational efficiencies and reducing unit costs of production. BALCO currently sources the alumina required for its smelters from third-party suppliers on the international markets. BALCO intends to further improve its operating performance by continuing to reduce unit operating costs at the Korba facility, including by lowering power consumption and improving the operating efficiency of the captive power plant. BALCO also intends to focus on the production of fabricated products with higher margins.

BALCO, one of the four primary producers of aluminium in India, had a 20.0% primary market share by production volume in India in fiscal year 2016 according to the AAI and as of 30 September 2016. BALCO's partially integrated aluminium operations are comprised of two bauxite mines, 1,140 MW power plants, and refining, smelting and fabrication facilities in central India. BALCO's operations benefit from relatively cost effective access to power, the most significant cost component in aluminium smelting due to the power-intensive nature of the process. This is to a considerable extent due to BALCO being an energy-integrated aluminium producer. BALCO is also setting up a 325,000 tpa aluminium smelter, the first 84 pots of which started commercial production in September 2014 and another 84 pots in August 2016. The remaining 168 pots will start commercial production by the end of fiscal year 2017. The consent to operate 1,200 MW power plant was received in January 2015, of which 900 MW is commissioned/operationalized at various dates in phased manner during fiscal year 2016. The fourth unit has been commissioned and started commercial production from 1 May 2016.

Pursuant to the re-auctioning of coal mines conducted by the GoI in February 2015, BALCO was successful in securing the Chotia coal block and was the highest bidder for the Gare Palma IV/1 coal block. The total reserves at the Chotia block are 17.5 million tonneswith the annual production capacity of one million tonnes and mining operations commenced at the mine in November 2015.

By way of letter dated 29 July 2015, the GoI rejected the representation of BALCO to accept its bid for the Gare Palma IV/1 coal mine, which would cover 90% of BALCO's coal requirement for captive power generation. As a result, BALCO challenged the rejection before the Delhi High Court. However, as BALCO secured linkage coal of 3.2 million tonne per annum for its captive power plant for a term of 5 years, BALCO has withdrawn its application challenging the rejection.

BALCO's Bodai-Daldali bauxite mines provide a majority of the bauxite required for BALCO's smelters. The bauxite is transferred to the alumina refinery in Lanjigarh, which converts bauxite to alumina and supplies the alumina back to BALCO, for payment of a conversion price by BALCO to us, which is based on the actual cost of production plus a reasonable margin. The remainder of BALCO's alumina requirements is sourced from third parties. The mining lease of the Mainpat bauxite mine has been renewed and it is valid up to 8 July 2042. BALCO has temporarily stopped the mining activity on account of pending approval from the necessary mining authorities.

The Odisha operations include 1.0 million tpa alumina refinery at Lanjigarh with associated 75 MW coal based captive power plant, 0.5 million tpa aluminium smelter with an associated 1,215 MW (nine units with a capacity of 135 MW each) coal based captive power plant and a 1,800 MW (three units with a capacity of 600 MW each) coal based captive power plant at Jharsuguda. The alumina refinery at Lanjigarh was commissioned in March 2010. The green field smelter project of 0.5 million tpa at Jharsuguda was implemented in two phases of 250,000 tpa each. Phase 1 was completed on 30 November 2009 and Phase 2 was completed on 1 March 2010. At Lanjigarh, production ramped up with recommencement of the second stream of the refinery during the first quarter of fiscal year 2017 (up to 2 million tonnes per annum debottlenecked capacity) while approval was received for the expansion to 4 million tonnes per annum.

Vedanta Limited is also setting up another 1.25 mtpa aluminium smelter in Jharsuguda, The commissioning of pots at the first line of the 1.25 mtpa aluminium smelter at Jharsuguda was completed at the end of July 2016. However, this line was impacted by a power outage in early August 2016, following which 168 pots were taken out of production. The impacted pots are currently being rectified and 26 pots have restarted production as on 30 September 2016.

As of 30 September 2016, Vedanta Limited has 1,395,000 tpa of aluminium capacity and 1,400,000 tpa of alumina capacity.

Revenue from Vedanta's aluminium business in the six months ended 30 September 2016 was \$863.3 million from external customers.

# Principal products

*Primary aluminium.* Primary aluminium is produced from the smelting of metallurgical grade alumina. Vedanta produces primary aluminium in the form of ingots and wire rods for sale. Ingots are used extensively for aluminium castings and fabrication in the construction and transportation industries. Wire rods are used in various electrical applications especially in the form of electrical conductors and cables. Vedanta Limited also produces aluminium billets.

Rolled products. Rolled products, namely coils and sheets, are value-added products that BALCO produces from primary aluminium. Rolled products are used for a variety of purposes in different industries, including aluminium foil manufacturing, printing, transportation, consumer durables, building and architecture, electrical and communications, packaging and general engineering industries.

*By-products*. Vanadium sludge is a by-product of the alumina refining process and is primarily used in the manufacture of vanadium-based ferrous alloys.

#### **Production**

The following table sets out Vedanta's total production<sup>(1)</sup> from its Korba, Lanjigarh and Jharsuguda facilities for the periods indicated:

		Year	Six months ended 30 September			
Facility	Product	2014 <sup>(3)</sup>	2015(4)	2016	2015	2016 <sup>(5)</sup>
				(Tonnes)		
Korba	Ingots	34,714	104,650	93,442	44,726	89,738
	Rods	166,239	172,464	217,650	99,169	106,838
	Rolled products	51,082	46,807	20,526	20,093	6,254
	Total	252,035	323,921	331,618	163,988	202,830
Lanjigarh	Alumina <sup>(2)</sup>	524,060	976,915	970,893	541,150	566,935
Jharsuguda	Ingots	301,008	303,756	333,249	187,505	193,583
	Rods	120,013	133,603	139,184	59,817	56,174
	Hot metal sold	_	_	8,892	4,528	23,977
	Billets	121,231	115,979	110,400	48,108	64,438
	Total	542,252	553,338	591,725	299,958	338,172
Total	Alumina <sup>(2)</sup>	524,060	976,915	970,893	541,150	566,935
	Ingots	335,722	408,406	426,691	232,231	283,321
	Rods	286,252	306,067	356,834	158,986	163,012
	Rolled products	51,082	46,807	20,526	20,093	6,254
	Hot metal sold	_	_	8,892	4,528	23,977
	Billets	121,231	115,979	110,400	48,108	64,438

<sup>(1)</sup> See "Presentation of Information — Reserves and Production" for an explanation of the basis of preparation of production amounts.

(2) Alumina is used for the production of aluminium and rolled products. Approximately two tonnes of alumina is required for the production of one tonne of aluminium. Additional alumina needed for the production of aluminium is purchased from third parties and is not reflected in alumina production numbers.

The following table sets out the total bauxite ore production<sup>(1)</sup> for each of Vedanta's mines for the periods indicated:

		Year	Ended 31 M	Six months ended 30 September		
Mine (Type of Mine)	Product	2014	2015	2016	2015	2016
			(Tonnes	, except perc	entages)	
Mainpat (Open-pit)	Bauxite ore mined	_	_	455	455	_
	Ore grade	_	_	47.70%	47.7%	_
Bodai-Daldali (Open-pit)	Bauxite ore mined	472,155	860,710	1,033,300	515,100	516,000
	Ore grade	46.90%	46.80%	46.90%	46.8%	46.9%
Total	Bauxite ore mined	472,155	860,170	1,033,755	515,555	516,000

<sup>(1)</sup> See "Presentation of Information — Reserves and Production" for an explanation of the basis of preparation of production amounts.

## Ore Reserve base

The table below sets out BALCO's Proved and Probable bauxite Ore Reserves as of 31 March 2016:

Mines	nes Proven Reserves		Probable Reserves		Total Proven and Probable Reserves			SSL Interest	Reserve Life		
	Quantity	Alumina	Silica	Quantity	Alumina	Silica	Quantity	Alumina	Silica	<b>%</b>	(years)
	(in million			(in million			(in million				
	tons)	(%)	(%)	tons)	(%)	(%)	tons)	(%)	(%)		
Mainpat	4.22	44.48	4.43	_	_	_	4.22	44.48	4.43	_	5-6
Bodai-Daldali	1.93	45.68	3.64				1.93	45.68	3.64		1-2
Total	6.15	44.86	4.18				6.15	44.86	4.18	51	

The table below sets out Vedanta Limited's Proved and Probable bauxite Ore Reserves as of 31 March 2016:

	Proved Reserve		Probable	Reserve	Total Proved and Probable Reserves	
	Quantity	Quantity Oxide		Oxide	Quantity	Oxide
	(Million tonnes)	(%)	(Million tonnes)	(%)	(Million tonnes)	(%)
Vedanta						
Limited <sup>(2)</sup> Shevaroy	0	0	0	0	0	0
Kolli Hills	0	0	0	0	0	0
Total	6.15	44.86	0	0	6.15	44.86

<sup>(1)</sup> See "Presentation of Information — Basis of Presentation of Reserves and Resources" for an explanation of the basis of preparation of reserve amounts.

(2) Operations at these mines have been suspended. Reserves as of 31 March 2016 are estimated to be 0.04 million tonnes in the case of Shevaroy and 0.11 million tonnes in the case of Kolli Hills.

### Description of operations

Smelters and Refineries

The following table sets out the total capacities as of 30 September 2016 at BALCO's Korba and Vedanta Limited's Lanjigarh and Jharsuguda facilities:

	Capacity			
	Alumina <sup>(1)</sup>	Aluminium	Power	
	(tp	a)	(MW)	
Korba	_	245,000	2,010	
Korba (under construction)		$162,500^{(2)}$		
Lanjigarh	1,400,000	_	75	
Jharsuguda		500,000	3,015	
Jharsuguda (Under construction)		487,000 <sup>(3)</sup>		
Total	1,400,000	1,395,000	5,100	

Korba aluminium complex. BALCO's aluminium complex is located at Korba in the State of Chhattisgarh in central India. The aluminium smelter at Korba, which uses pre-baked Guiyang Aluminium Magnesium Design Research Institute technology or GAMI technology and has a capacity of 245,000 tpa, was fully commissioned in November 2006 at a cost of \$543.2 million. The Korba alumina refinery was commissioned in 1973, used the conventional high pressure Bayer process and has a capacity of 200,000 tpa of alumina. The operations of the refinery have stopped since September 2009.

BALCO is in the process of setting up a 325,000 tpa smelter at the Korba facility, first 84 pots of which commenced commercial production in September 2014. The remaining 257 pots will commence commercial production by the end of fiscal year 2017. BALCO's 100,000 tpa smelter and 200,000 tpa smelter are no longer in operation since June 2009 and November 2009 respectively.

The fabrication facility at Korba has two parts, a cast house and a sheet rolling shop. The cast house uses Properzi CCR copper rod technology and has a foundry which has twin-roll continuous casters with a SNIF degasser and hydraulically driven semi-continuous ingot casting machine to produce ingots and wire rods. The sheet rolling shop has three parts: a hot rolling mill with a capacity of 75,000 tpa, an older cold rolling mill with a capacity of 30,000 tpa and a cold rolling mill

<sup>(1)</sup> Alumina is used for the production of aluminium and rolled products. Approximately two tonnes of alumina is required for the production of one tonne of aluminium.

<sup>(2) 168</sup> pots out of 336 pots of 325,000 smelter at Korba was commissioned fully during six months ended 30 September 2016. However, a technical issue in September 2016 took 167 pots out of production. Rectification work is in progress and these pots are expected to be re-started by the forth quarter of fiscal year 2017.

<sup>(3)</sup> For the 1,250,000 tpa smelter, Line 1 of 312,500 tpa was commissioned in July 2016, however, this line was impacted by a power outage in early August, following which 168 pots were taken out of production. The impacted pots were being rectified, and 26 pots were restarted as on 30 September 2016. In Line 2 of 312,500 tpa, 168 pots were commissioned during six months ended September 2016 and the remaining 168 pots will commence commercial production in balance fiscal year 2017.

commissioned in 2004 with a capacity of 36,000 tpa. Molten metal is cast into slabs and then either hot-rolled and sold as hot-rolled sheets or converted into cold-rolled sheets in the cold rolling mills. Alternatively, molten metal is directly used in strip casting and then fed to the cold rolling mills to be converted into cold-rolled sheets or coils.

Smelting requires a substantial continuous supply of power and interruptions can cause molten metal to solidify and damage or destroy the pots. Power for the Korba facility is for the most part provided by the coal-based 540 MW captive power plant commissioned in March 2006. The surplus generation from the power plant is supplied to the State Electricity Board and other customers. Following the shutdown of the 100,000 tpa aluminium smelter, power from its associated 270 MW power plant was sold in the merchant power market and presently 270 power plant is udner suspension due to lower realization in merchant sale. BALCO has constructed a CPP 600 MW coal-based thermal power facility at Korba in the state of Chhattisgarh. The power generated from CPP 600 MW units is being utilized in the 325,000 tpa smelter.

### Coal mining operations

Thermal coal is a key raw material required for the operation of BALCO's captive power plants. In September 2014, the Supreme Court of India canceled all the coal blocks that had been awarded by the Ministry of Coal between 1992 and 2012 to all companies in India. Consequently, in February 2015, the GoI conducted an auction to award mining rights to successful bidders for all such coal blocks. Pursuant to the re-auctioning of coal mines conducted by the GoI in February 2015, BALCO was successful in securing the Chotia coal bloc, in the state of Chhattisgarh and was the highest bidder for the Gare Palma IV/1 coal block. The total reserves at the Chotia block are 17.5 million tonnes with the annual production capacity of one million tonnes and mining operations commenced at the mine in November 2015.

The following tables contain details of Vedanta's coal mining operations.

1. The Chotia coal mine is divided into two sub-blocks, Chotia I and Chotia II. Both of these blocks are assigned to the existing captive power facilities at the BALCO operations. The estimates provided below are based on the DMT report.

Blocks	Gross CV range (Min — Max)	Sulphur (%)
	Kcal/kg	
Chotia-I	3,565 - 6,476	0.30-0.60 (Total)*
Chotia II	3,967 - 6,152	0.30 (Total)*

- \* Sulphur data is not available for all seams. Total is based only on available seam data.
- 2. This coal, which is thermal grade coal, would be blended with low GCV coal before being fed to the Boiler.
- 3. The extractable coal indicated is considering all losses. This number reflects the final tonnage of the mine. There is no plan of putting wash plant either at the mine site or at the plant as the coal is of high GCV.

Lanjigarh alumina refinery. The Lanjigarh alumina refinery is located in the Lanjigarh district in the state of Odisha, which is located approximately 450 km from BALCO's Korba facility in the state of Chhattisgarh. In March 2007, Vedanta Limited began the progressive commissioning of a 1,000,000 tpa Greenfield alumina refinery, with expansion to 1.4 mmtpa of installed capacity progressively commissioned during six months ended 30 September 2016. Lanjigarh alumina refinery

also has associated 75 MW captive power plant, expandable to 90 MW. The captive power plant is fully operational and can meet the power requirements of the refinery. Vedanta Limited is currently in discussions with government authorities for sourcing adequate supply of bauxite. Production at the alumina refinery does not affect production at the smelters.

Vedanta Limited planned to expand the alumina refining capacity at Lanjigarh to 5 MTPA by increasing the current alumina refinery's capacity to 2,000,000 tpa by de-bottlenecking and then further expand the refinery by constructing a second alumina refinery, with a refining capacity of 3 mmtpa along with an associated 210 MW captive power plant. Vedanta Limited has received approvals for expanding the Lanjigarh refinery to 4 mtpa and received environmental clearance from MoEF for the same on 20 November 2015. Environment clearance for expanding operations up to 6 mtpa will be received after the balance area of 666.03 HA of land has been acquired. However the environmental clearance for the expansion of the alumina refinery at Lanjigarh was challenged by an individual before the NGT. For more information on these proceedings, see "Risk Factors — Litigation — Petitions have been filed in the Supreme Court of India and the High Court of Odisha to seek the cessation of construction of Vedanta Limited refinery in Lanjigarh, and related mining operations in Niyamgiri Hills, which are currently suspended".

The second stream operations have commenced at the Alumina refinery from April 2016 and the debottlenecked capacity has reached 1.7-2.0 million tonnes per annum (although this is contingent on the bauxite quality). When Vedanta Limited has further visibility on bauxite sources, a further ramp-up to 4 million tonnes will be considered.

Jharsuguda aluminium smelter. The Jharsuguda aluminium smelter is located in Jharsuguda in the state of Odisha, India. Operations in the Jharsuguda facility were implemented in two phases. The first phase has a production capacity of 250,000 tpa and was completed in November 2009. The second phase was commissioned in June 2010. A total of 9 units of the associated 1,215 MW coal-based thermal captive power plant of 135 MW each have been commissioned. The captive power plant units meet the power requirements of the Jharsuguda smelter and all other power requirements of this facility.

Vedanta Limited is also setting up an 1,250,000 tpa aluminium smelter. For the 1,250,000 tpa aluminium smelter, Line 1 of 312,500 tpa was commissioned in July 2016, however, this line was impacted by a power outage in early August, following which 168 pots were taken out of production. The impacted pots are in the process of being rectified and 26 pots have restarted operations as on 30 September 2016. In Line 2 of 312,500 tpa, 202 pots were operationalized as of 30 September 2016 and the remaining 134 pots will commence commercial production in balance fiscal year 2017. Power to this smelter will be provided by Vedanta Limited's 2,400 MW power plant in Jharsuguda. Three units of 600 MW each are identified as captive power plant for its aluminum business, with effect from 1 April 2016 and one unit is considered as independent power plants for commercial power generation. Operations of the first three units are captured in Commercial Power Sector for period up to 31 March 2016 and aluminum sector thereafter.

### Balco Korba

On 7 October 2006, BALCO entered into a memorandum of understanding with the state government of Chhattisgarh and the Chhattisgarh State Electricity Board, under which, among other things, feasibility studies were undertaken to build a thermal coal-based 1200 MW power facility, along with an integrated coal mine in the state of Chhattisgarh at an estimated cost of Rs. 46,500 million (\$697.6 million). The project was disrupted in September 2009 due to the collapse of a chimney under construction during heavy rains and lightning at Korba. There were 40 fatalities in the accident and SEPCO Electric Power Construction Corporation, the contractor and the sub-contractor Gamon Dunkerley and Company Limited, are the subject of an investigation by the Chhattisgarh government. The matter is to be heard on 29 April 2017.

On 8 August 2007, BALCO entered into a memorandum of understanding with the state government of Chhattisgarh for a potential investment to build an aluminium smelter with a capacity of 650,000 tpa at Chhattisgarh at an estimated cost of Rs. 81,000 million (\$1,215.1 million). BALCO has received environmental clearances for both phases of the project. Trial production started in February 2014 from the 325,000 tpa aluminium smelter and 84 pots started commercial production from September 2014.

BALCO received a coal block allocation in fiscal year 2007 of which 211 million tonnesfor use in its captive power plants which was subsequently deallocated in fiscal year 2015 pursuant to the orders of the Supreme Court of India. Consequently, in fiscal year 2015, the Company made an assessment for the recoverability of the amount incurred thus far, and made a provision for Rs. 294.1 million (\$4.4 million) in its income statement.

### Mines

Chhattisgarh. BALCO has two captive bauxite mines, namely, the Mainpat bauxite mine and the Bodai-Daldali bauxite mine, in the state of Chhattisgarh in central India. Mainpat is an open-pit bauxite mine located in the Surguja district of the state of Chhattisgarh. The Mainpat mine has been in production since 1993 and has a leased hold area of 6.39 km². The bauxite extraction limit for the mine granted by MoEF is 750,000 tpa. The mining lease of Mainpat mine is valid until 8 July 2042. Environmental clearance for the Mainpat mine has been renewed by the MoEF and is valid up to 16 September 2038. The Forest Clearance for the entire revenue forest land co-terminus with the Mining Lease period obtained and the Mining operation resumed in October 2016.

The Bodai-Daldali deposits are located approximately 260 km from Korba in the Kawardha district of the state of Chhattisgarh. Bodai-Daldali was commissioned in 2004 and the mining lease that is valid until 26 March 2017. The bauxite extraction limit for Bodai-Daldali Mines granted by MoEF is 1,250,000 tpa.

The Chhattisgarh bauxite deposits are situated over a plateau with steep scarps on both sides, at an elevation of approximately 1,000 meters above sea level, for Mainpat, and approximately 940 meters above the surrounding land, for Bodai-Daldali. Bauxite is generally one meter to three meters thick and lies within a laterite sequence overlying thick tertiary basalts of the Deccan Traps. The cover of laterite and thin top soil is up to five meters thick but is generally less than two meters. Bauxite outcrops around much of the plateau rims.

A typical profile of the Chhattisgarh deposits comprises topsoil and soft overburden above the laterite. The upper laterite consists of hard, loose or indurated bauxite pebbles and boulders with a clear contact with the underlying hard bauxites. The bauxite occurs in discontinuous lenses up to four meters in thickness with laterite infilling joints and fractures with the bauxite. The contact with the softer lower laterite is usually gradational and irregular.

The bauxite is hard with a natural moisture content of 5.0% to 10.0%, with an in-situ density of 2.3 tonnes per metre<sup>3</sup> to 2.4 tonnes per meter<sup>3</sup>. It comprises primarily gibbsite with boehmite and minor diaspore. The reactive silica content is low and iron is present in the form of hematite and aluminous goethite. The average grade of the bauxite is approximately 44.9% aluminium oxide and silica levels of 4.2% as of 31 March 2016.

All mining and transportation at both mines are undertaken by contractors. One thin top soil layer is removed by an excavator and is either transported to an adjacent storage point or an area that is being backfilled. The laterite layer is drilled and blasted. The overburden is then removed by backhoe excavators and 15 tonne dumpers. Broken ore is hand-sorted, leaving waste material behind. Ore productivity is around 2 to 3 tonnesper person per day in the dry season which decreases to 1.25 to 1.75 tonnesper person per day in the wet season.

The current exploration drilling program is based on a 50-meter square pattern and is reduced to a 25-meter centers for detailed mine planning. Sampling is normally in 0.4 meter lengths and core is currently split and retained for future reference. Bauxite samples are tested for silica and aluminium oxide at laboratories situated on site and at the Korba plant. Selected sample are re-assayed as part of a quality control program.

Since the commencement of operations, the Mainpat mine has produced approximately 7.4 million tonnes of bauxite. During fiscal year 2016 there was production totaling approximately 455 tonnes at 47.7% aluminium oxide. Currently, bauxite production has been temporarily suspended from 17 September 2015 due to pending forest clearance of mining lease area and a restriction on the removal of mined ore from the mining site.

As of 31 March 2016, BALCO estimates reserves at Mainpat to be 4.2 million tonnes and the remaining mine life of the Mainpat mine to be approximately five to six years based on (i) reserves; and (ii) planned production which is determined on the basis of a life-of-mine plan.

Total production at the Bodai-Daldali mine since the commencement of production has been 5.9 million tonnes of bauxite, with production in fiscal year 2016 totaling to approximately 1,033,300 tonneswith 46.9% aluminium oxide. Power is supplied by on-site diesel generators and ground water provides the water requirements for the mine.

As of 31 March 2016, BALCO estimates the reserves at Bodai-Daldali to be 1.93 million tonnes and the remaining mine life to be approximately 2 years based on (i) reserves; and (ii) planned production which is determined on the basis of a life-of-mine plan. The cut-off grade used to define the reserves at BALCO's mines was 42.0%.

In fiscal year 2016, all mining and transportation of the bauxite was done by contractors and the total cost for this was Rs. 2,334 (\$35.2) per tonne of bauxite.

Based on current costs and historical prices, BALCO's operations are forecasted to remain profitable and therefore the deposits at the Mainpat and Bodai-Daldali mines fulfill the requirements for being classified as reserves. The reserves as of 31 March 2016 at BALCO's mines at Mainpat and Bodai-Daldali have been determined by verifying that the integrated operation is economic at an aluminium price of \$1,751 per ton, which is the average metal price for fiscal years ended 31 March 2016, 2015 and 2014.

The mining recovery factors applied to determine the reserves for both mines are 65.0%. The grade dilution factor is reconciliation between the actual mined/dispatched grades obtained and in-situ grade values. The grade correction/dilution factors applied for Mainpat and Bodai-Daldali mines are Al2O3 — 96%, SiO2 — 114% and Al2O3 — 95%, SiO2 — 104% respectively. The parameters for Mainpat are derived from the reconciliation of actual production against the geological model, while the parameters for Bodai-Daldali are based on estimates.

In fiscal year 2016, there was no stripping ratio at the Mainpat mine as there was no ore extraction during the year, while the stripping ratio at the Bodai-Daldali mine was 1.0:3.89. The stripping ratio for the remaining reserves at Mainpat is 3.84 tonnes of waste per tonne of ore, while at the Bodai-Daldali mine, it is 3.85 tonnes of waste per tonneof ore.

Shevaroy. The Shevaroy bauxite mine is located eight km northeast of Yercaud town in the state of Tamil Nadu in India, which is approximately 85 km east of the Mettur Dam complex, where Vedanta Limited's aluminium operations were located when they were operational. Work at the Shevaroy mine has been suspended since Vedanta Limited's aluminium operations ceased in November 2008. Vedanta Limited estimates the balance reserves of the portion of the Shevaroy mine which Vedanta Limited is permitted to mine was 0.04 million tonnes as of 31 March 2016. If mining recommences at this mine, its life is estimated by Vedanta Limited to be approximately three months.

Kolli Hills. The Kolli Hills bauxite mine is located in the state of Tamil Nadu in India, approximately 150 km southeast of the Mettur Dam complex, where Vedanta Limited's aluminium operations were located when they were operational. Work at the Kolli Hills mine has been suspended since Vedanta Limited's aluminium operations ceased in November 2008. It is estimated the balance reserves of the portion of the Kolli Hills mine which Vedanta Limited is permitted to mine was 0.11 million tonnes as of 31 March 2016. If mining recommences at this mine, its life is estimated by Vedanta Limited to be approximately seven months.

### Principal raw materials

The principal inputs for Vedanta's aluminium operations are bauxite, alumina, power, water, carbon, caustic soda and certain other raw materials. In the past, Vedanta has been able to secure an adequate supply of the principal inputs for its aluminium business.

Bauxite. Bauxite is the primary raw material used in the production of alumina. Currently, Vedanta Limited does not have any dedicated mining source and are in the process of identifying bauxite mining sources across India. Currently, bauxite is being sourced mainly through imports (34.1%), from the domestic market in the west coast (6.3%), BALCO mines (33.6%) and the remaining from Madhya Pradesh, Chhattisgarh, Jharkhand and Andhra Pradesh. BALCO supplies bauxite to the Lanjigarh refinery, on per job basis and receives alumina produced from the supplied bauxite.

Alumina. Alumina is the primary raw material used in the production of aluminium. Vedanta's aluminum business currently sources alumina largely from third-party suppliers in international markets. The alumina sourced externally is metallurgical grade calcined alumina with a minimum alumina content of 98.6% on a dry basis. In fiscal years 2014, 2015 and 2016, BALCO purchased 355,950 tons, 317,701 tons and 299,375 tons of alumina at an average price of, \$397, \$374, and \$323 per ton, respectively, on a cost, insurance and freight or CIF basis at the port of Vizag, Kakinada and Gangavaram, India. Similarly, in fiscal years 2014, 2015 and 2016, Vedanta Limited purchased 0.72 million tons, 0.37 million tons and 0.47 million tons of alumina at an average price of \$352 per mt, \$357 per mt and \$353 per mt, respectively, on a cost, insurance and freight basis at the port situated in the state of Andhra Pradesh.

Power. Smelting primary aluminium requires a substantial, continuous supply of electricity. As a result, power is a key input at BALCO's Korba facility, where it is provided by two coal-based captive power plant of 540 MW and CPP 600 MW. The captive power plant has historically been dependent upon coal allocations from Coal India. In November 2007, BALCO received a coal block allocation of 211.0 million tonnes for use in its captive power plants. The said coal block was deallocated during fiscal year 2015. However, the company received another coal the Chotia coal block through the e-auction. As of 31 March 2016, Company also secured linkage coal of 3.2 million tonne per annum for its captive power plants for a term of 5 years.

Power for BALCO's mines is provided by on-site diesel generators. BALCO has constructed a 1200 MW coal-based thermal power facility three out of four units of which were commissioned during fiscal year 2016 and the forth unit has commenced operations during May 2016. Of the 1200 MW facility, power generated from two 300 MW units is being utilized in the 325,000 tpa smelter being set up and the power from the balance 600 MW units will be sold to third parties as of 30 September 2016.

Vedanta Limited's nine coal-based captive power plant of 135 MW each at Jharsuguda facility have been sourcing coal through coal linkage from Mahanadi coal field, imports, e-auction and from washeries. The linkage coal quantity from Mahanadi coal field is transported through bottom discharge wagons. The power plant at Jharsugada sources coal from sources such as the GoI's coal mining companies, long-term coal supply agreements with various state governments under PPAs and from imports. In fiscal year 2016, the total coal purchased from these other sources was 7.21 million tonnes.

The total volume of coal consumed annually by coal-fueled power plants is largely dependent on the amount of generation and is approximately 7.14 million tonnesas of 30 September 2016.

Water. Water is also an important input for Vedanta Limited's and BALCO's captive power plants. BALCO sources its water requirements at Korba from a nearby canal, with the water transported by pipelines. BALCO is currently in a dispute with the National Thermal Power Corporation or NTPC in relation to the right of way for its water pipeline that supplies water to its 270 MW captive power plant, which has been built through NTPC premises. On the issue of easmentary rights, the Arbitrator issued its award on 11 January 2016 in favour of BALCO. NTPC challenged the said award before the Delhi High Court and and the next hearing will take place on 8 March 2017. BALCO has also filed counter applications before the Delhi High Court which are pending consideration. During fiscal year 2016, BALCO received another water allocation of 7 million m<sup>3</sup> (MCM) p.a. for 1200 MW facility.

Vedanta Limited's Jharsuguda facility sources its water requirements at Jharsuguda from Hirakud Dam situated over a distance of 33 km, with the water transported by pipelines. Water from the dam is stored at water reservoir inside the plant, from where the water is purified in a demineralized plant to make it fit for use in the power plant.

Carbon. Carbon is an important raw material to the aluminium smelting process. Carbon is used in the process of electrolysis, in the form of cathodes and anodes, with the latter being the biggest component of Vedanta Limited 's carbon costs. Anodes are made up of carbonaceous material of high purity. For pre-baked anodes, green carbon paste made of calcined petroleum coke and coal tar pitch is compacted or pressed into the required form. These anodes are baked before their use in electrolytic cells or pots. Both BALCO and Vedanta Limited has in-house facilities to manufacture carbon anodes to meet their entire carbon anode requirements at Korba and Jharsuguda facility, respectively. Calcined petroleum coke, coal tar pitch and fuel oil, which are the key ingredients for the manufacture of carbon anodes, are sourced primarily from the Indian market. There is an adequate supply of these raw materials in India, though their prices are generally determined by movements in global prices. At times, based on commercial comparison, orders for imports are also placed.

Caustic soda. Caustic soda is a key raw material used to dissolve the bauxite in the alumina refining process. The caustic soda requirement varies significantly depending on the silica content of the bauxite and the technology employed.

Other raw materials. Vedanta Limited and BALCO uses other raw materials such as fluorides and other chemicals. For these raw materials, there are several sources of supplies in the domestic/international markets and Vedanta does not currently foresee any difficulty in securing supplies when needed.

### Distribution, logistics and transport

Bauxite mined from the Mainpat and Bodai-Daldali mines is transported by road and rail Alumina Refinery at Lanjigarh of Vedanta Limited for conversion into Alumina and Alumina from Vedanta Lanjigarh is transported through Rail to BALCO's Korba facility. Alumina purchased from third-party suppliers is obtained from a combination of domestic sources and imports, and is transported to the Korba facility by rail and the Jharsuguda facility by road from domestic third-party suppliers or ports. BALCO's and Vedanta Limited's aluminium products are transported from the Korba facility and the Jharsuguda facility, respectively to domestic customers through a combination of road and rail, and shipped for export.

#### Sales and marketing

BALCO's aluminium businesses' ten largest customers accounted for 42.0%, 47.0% and 58.4% of its revenue from the aluminium business in fiscal years 2014, 201 and 2016 respectively. While two of BALCO's customers accounted for greater than 23.19% of BALCO's revenue in fiscal year 2016, no customer accounted for greater than 10.0% of BALCO's revenue in fiscal years 2014 and 2015.

Vedanta Limited's 10 largest customers of the Odisha aluminium business accounted for approximately 39.5%, 46.3% and 53.4% of its Odisha aluminium business in fiscal years 2014, 2015 and 2016 respectively. One of the Odisha aluminium business customers accounted for 10.2% of its revenue in fiscal year 2016. None of the customers accounted for greater than 10.0% of Odisha aluminium business in fiscal years 2014 and 2015.

BALCO's and Vedanta Limited's aluminium sales and marketing head office is located in Mumbai, and it has field sales and marketing offices in most major metropolitan centers in India. Currently, Vedanta's aluminium business sells its products primarily in the Indian market, with limited focus on exports. However, with the further commissioning of the new 325,000 tpa aluminium smelter at Korba and Line 1 and Line 2 of new 1,250,000 tpa aluminium smelter at Jharsuguda, a significant part of the additional production will be sold in the export market. Vedanta's aluminium business's key customers include conductor manufacturers, state road transport corporations, railways, defense contractors and electrical equipment and machinery manufacturers.

Domestic sales are normally conducted on the basis of a fixed price that BALCO and Vedanta Limited determine from time to time based on the LME spot prices plus regional premiums, as well as domestic supply and demand conditions. The price for the aluminium which BALCO and Vedanta Limited sell in India is normally higher than the price it charges in the export markets due to the Indian tariff structure, smaller order sizes that domestic customers place and the packaging, storing and truck loading expenses incurred when supplying domestic customers.

Vedanta's export sales of aluminium are currently through short-term contracts as well as on a spot basis at a price based on the LME price plus a premium.

## Projects and developments

### Lanjigarh

Vedanta plans to invest Rs. 106,000 million (\$1,590.2 million) to expand the alumina refining capacity at Lanjigarh to 5 mmtpa by (i) increasing the current alumina refinery's capacity to 2,000,000 tpa by de-bottlenecking; (ii) constructing a second alumina refinery with a capacity of 3 mmtpa; and (iii) constructing an associated 210 MW captive power plant. The expansion of the alumina refinery at Lanjigarh was on hold since 20 October 2010 due to the order passed by the MoEF's restricting Vedanta from any further expansion of this refinery. However the required environmental approvals were received on 20 November 2015 for up to 4 mtpa, and an additional environmental clearance for up to 6 mtpa will be received after the completion of land acquisition of the balance area of 666.03 HA. Further, a Consent to establish the 6 mtpa capacity and a consent to operate for 2 mpta capacity has also been obtained. However, construction activities continue to be on hold and the management is evaluating the timing for resuming construction activities in Lanjigarh. As approvals for expansion of the Lanjigarh refinery to 4 mtpa has been received, second stream operations have commenced at the Alumina refinery from April 2016 and the debottlenecked capacity has reached 1.7-2.0 million tonnes per annum (although this is contingent on the bauxite quality). When further visibility on bauxite sources is possible, a further ramp-up to 4 million tonnes will be considered. As of 31 March 2016, Rs. 55,387 million (\$830.9 million) was spent on the Lanjigarh expansion project.

An investment of Rs.\$2,910 million is being made to set up a second 1,250,000 tpa aluminium smelter. As of 31 March 2016, \$2,569 was spent on this project.

# Jharsuguda

Vedanta Limited is also setting up another 1,250,000 tpa aluminium smelter in Jharsuguda, The commissioning of pots at the first line of the 1.25 mtpa aluminium smelter at Jharsuguda was completed at the end of July 2016. However, this line was impacted by a power outage in early August 2016, following which 168 pots were taken out of production. The impacted pots are currently being rectified and 26 pots have restarted production as on 30 September 2016.

As of 30 September 2016, Vedanta limited has 500,000 tpa of aluminium capacity and 2,000,000 tpa of alumina capacity. In addition, the first line of 1,250,000 tpa aluminum smelter at Jharsuguda is currently being ramped up.

### Market share and competition

According to the AAI, BALCO and Vedanta Limited are two of the four primary producers of aluminium in India and together had a 40.0% market share by sales volume in India in fiscal year 2016 while its main competitors are Hindalco and National Aluminium Company Limited with a 42.0% and 18.0% market share by sales volume in India in fiscal year 2016, respectively.

Aluminium ingots, wire rods and rolled products are commodity products and BALCO and Vedanta Limited compete primarily on the basis of price and service, with price being the most important consideration when supplies are abundant. Aluminium competes with other materials, particularly plastic, steel, iron, glass, and paper, among others, for various applications. In the past, customers have demonstrated a willingness to substitute other materials for aluminium.

#### Commercial Power Generation Business

#### Introduction

Vedanta has been building and managing captive power plants in India since 1997, and currently operates multiple power plants across locations in India. Vedanta's commercial power generation business in India leverages its experience in building and managing captive power plants that support its primary businesses. As of 30 September 2016, the total power generating capacity of Vedanta Limited's thermal power plants, wind power plants and gas based plants was 9,000 MW.

Vedanta owns and operates several commercial power plants, namely Vedanta Limited's 600 MW coal-based thermal power plant in Jharsuguda, MEL's 106.5 MW coal-based thermal power plant in Mettur Dam, HZL's wind power plants in Gujarat, Karnataka, Maharashtra, Tamil Nadu and Rajasthan aggregating 274.2 MW, BALCO's 600 MW coal-based thermal power plant and TSPL's 1,980 MW coal-based thermal power plant at Talwandi Sabo.

Vedanta Limited operates a coal-based thermal power plant of 2,400 MW, four units of 600 MW each at Jharsuguda. The three units of 600 MW each of coal-based thermal power plants in Jharsuguda have been converted from commercial power plants to captive power plants from 1 April 2016 and is now part of the aluminium business and one unit is an independent power plant for commercial power generation. Operations of the first three units are captured in Commercial Power Sector for the period up to 31 March 2016 and in the aluminum sector thereafter.

BALCO operates coal-based thermal power plant of 1,200 MW, four units of 300 MW each at Korba. The first two units are identified as independent power plants and are referred to as IPP 600 MW. The first 300 MW unit of the IPP 600 MW was capitalized on 1 August 2015 after the successful completion of trial runs. The second unit has been commissioned and commenced commercial production on 1 May 2016.

Sales of units of power increased from 9,859 million units in fiscal year 2015 to 12,121 million units of power in fiscal year 2016. The increase in sales drove revenue from Vedanta's commercial power generation business from \$420.9 million in fiscal year 2012 to \$691.7 million in fiscal year 2016. As of 30 September 2016, the total power generating capacity of Vedanta's non-captive thermal power plants and wind power plants was approximately 3,830.7MW. Revenue from Vedanta's commercial power generation business in the six months ended 30 September 2016 was \$375.4 million from external customers.

The following table sets out information relating to Vedanta's power plants:

Fiscal Year	Capacity			
Commissioned	(MW)	Location	Fuel Used	CPP/IPP
1988 <sup>(1)</sup>	270.0	Korba	Thermal Coal	IPP
1997	24.0	Tuticorin	Liquid fuel	CPP
1999	75.0	Mettur Dam	Thermal Coal	IPP
2003	7.4	Debari	Liquid fuel	CPP
2003	6.0	Zawar	Liquid fuel	CPP
2003	14.8	Chanderiya (2)	Liquid fuel	CPP
2003	4.8	Cambay	Gas based	CPP
1999 and 2003	10.0	Ravva	Gas based	CPP
2005	7.5	Tuticorin	Liquid fuel	CPP
2005	15.0	Pantnagar	Liquid fuel	CPP
2005	154.0	Chanderiya	Thermal coal	CPP
2006	540.0	Korba	Thermal coal	CPP
2007	75.0	Lanjigarh	Thermal coal	CPP
2007	107.2	Gujarat and Karnataka	Wind (3)	IPP
2007	30.0	Amona	Gas based	CPP
2008	80.0	Chanderiya	Thermal coal	CPP
2009	80.0	Zawar	Thermal coal	CPP
2009	16.0	Gujarat and Karnataka	Wind (3)	IPP
2009	675.0	Jharsuguda	Thermal coal	CPP
2009	25.0	Mettur Dam	Thermal coal	IPP
2010	540.0	Jharsuguda	Thermal coal	CPP
2010	3.3	Rajasthan Raageshwari Gas terminal	Gas based	CPP
2010	14.4	Gujrat Viramgam Terminal	Gas based	CPP
2010	32.5	Pipeline Above Ground Installations	Gas based	CPP
2011	1,200.0	Jharsuguda	Thermal coal	CPP
2011	48.0	Rajasthan and Karnataka	Wind	IPP
2011	174.3	Dariba	Thermal coal	CPP
2012	103.0	Karnataka, Maharashtra, Rajasthan and	Wind (3)	IPP
		Tamil Nadu		
2012	600.0	Jharsuguda	Thermal coal	IPP
2012	30.0	Amona	Gas based	CPP
2013	600.0	Jharsuguda	Thermal coal	CPP
2013	80.0	Tuticorin	Thermal coal	CPP
2013	6.5	Mettur Dam	Thermal coal	IPP
2014	80.0	Tuticorin	Thermal coal	CPP
2010 and 2014	60.0	Rajasthan Mangala Processing terminal	Thermal coal	CPP
2015	31.3	Gujrat Bhogat terminal	Thermal coal	CPP
2015	660.0	Mansa- Talwandi Sabo Road, Mansa, Punjab	Thermal coal	IPP
2016	660.0	Mansa-Talwandi Sabo Road, Mansa, Punjab	Thermal coal	IPP
2016	1,200	Korba	Thermal coal	CPP
2016	600.0	Mansa-Talwandi Sabo Road, Mansa, Punjab	Thermal coal	IPP
Total	9,000			

<sup>(1)</sup> Commissioned by BALCO prior to the acquisition of BALCO in 2001 which is not being used for captive purposes at present due to the closure of operations at the 100,000 tpa aluminium smelter.

- (2) Transferred from Debari to Chanderiya in March 2009.
- (3) The wind power plants are not for captive use.

The following table sets out the total power sales in MU for the fiscal years ended 31 March 2014, 2015 and 2016 and for the six months ended 30 September 2015 and 2016.

_	For the Fi	scal Year Ende	six months ended 30 September		
Facility	2014	2015	2016	2015	2016
Jharsuguda 2400 MW coal based					
thermal power plant	7,625	7,206	7,319	3,820	1,497
TSPL	_	1,213	2,792	1077	2951
BALCO 270 MW	390	89	169	128	0
BALCO 600 MW	_	10	1,025	158	1156
HZL - Wind Power Plant	448	444	415	286	320
MALCO — 106.5 MW coal based					
thermal power plant	911	897	402	320	115
Total	9,374	9,859	12,122	5,789	6,039

### Commercial power plants

Vedanta Limited. Vedanta Limited has a 2,400 MW coal based thermal power plant facility (comprising of four units of 600 MW each) in Jharsuguda in the state of Odisha. The three units of 600 MW each of coal-based thermal power plants in Jharsuguda have been converted from commercial power plants to captive power plants from 1 April 2016 and is now part of the aluminium business and one unit is an independent power plant for commercial power generation. Operations of the first three units are captured in Commercial Power Sector for the period up to 31 March 2016 and in the aluminum sector thereafter.

The plant has been built with an estimated investment of approximately Rs. \$769 million. The first unit of commercial operation commenced in November 2010. The second unit was operational on 20 March 2011, the third unit was operational on 19 August 2011. The fourth unit was operational on 26 April 2012.

This facility requires approximately 15 million tpa of coal. Vedanta Limited has applied to the Ministry of Coal for allotments of coal blocks and long term coal linkages, which are long term supply contracts for delivery of coal meeting specific contract specifications for captive use. In January 2008, the Ministry of Coal jointly allocated the coal blocks in the Rampia and Dip Side Rampia in the state of Odisha to six companies, including Vedanta Limited. The six companies entered into an agreement to jointly promote a new company, Rampia Coal Mine and Energy Private Limited, or RCMEPL which was incorporated in February 2008.

On 16 April 2008, RCMEPL submitted an application to the state government of Odisha for the grant of a prospecting license, or a license for exploration, which was pending approval from the regulatory authorities. However, Ministry of Coal issued a letter on January 15, 2014 de-allocating the coal block from RCMEPL. RCMEPL has approached the High Court of Odisha against the action of the Ministry of Coal. On 24 September 2014, the Supreme Court ordered for the cancellation of coal blocks allotted by the government over past few decades. In fiscal year 2016, the total coal purchased from these other sources was 5.6 million tons.

The total volume of coal consumed annually by Odisha's coal-fueled power plants is largely dependent on the amount of generation and ranges between 5.5 million to 6.4 million tons.

Additionally, Vedanta Limited has been allotted a coal linkage of 2.6 mmtpa for the Jharsuguda project to meet the coal requirements of one of the units of 600 MW of the 2,400 MW power facility, for which Mahanadi Coalfields Limited has signed fuel supply agreement for supplying 80% of the letter of assurance quantity. For the remaining 3 X 600 MW units, Vedanta Limited is buying coal primarily through the auction route. The facility is also designed to include a water reservoir, railway marshalling yard, coal stockpile, ash pond and other required facilities. The power generated from the 2,400 MW power plant is sold to customers such as, state electricity boards, state-owned utility companies, power trading companies and private entities.

In September 2006, Vedanta Limited entered into a power purchase agreement with Grid Corporation of Orissa Limited ("GRIDCO"), under which GRIDCO was granted the right to purchase up to 25.0% of the installed capacity of the power plant after adjustments for auxiliary consumption by us, for approximately up to 561 MW from this project. Further, GRIDCO shall at all times have the right on behalf of the state government of Odisha to receive from the Jharsuguda power project, 7.0% of the power generated (after adjustments for auxiliary consumption by us), up to approximately 157 MW of power at variable cost, as determined by the Odisha Electricity Regulatory Commission ("OERC"). GRIDCO will have the right to purchase power from us once every five years, for a period of 25 years from the date of commercial operation of the last unit. This right is an option to purchase rather than a binding commitment of GRIDCO.

In the event GRIDCO decides not to avail part or whole of the above mentioned right during any five year period, it shall give six months' notice of the same to us prior to the commencement of such period. Power from the power plant to be purchased by GRIDCO will be evacuated by GRIDCO from the bus bar (which is the discharge point of the power plant) of the project. For the evacuation of the remaining power, Vedanta Limited has constructed a 400 KV Loop-In-Loop-Out I and a 400 KV Loop-In-Loop-Out II transmission line to connect to the transmission line being developed by Power Grid Corporation India Limited ("PGCIL") near Jharsuguda. Vedanta Limited entered into an agreement with PGCIL in July 2010 to build the dedicated transmission system required for evacuating power from the power plant to the pooling units of PGCIL. The tariff for the sale of power by Vedanta Limited to GRIDCO will be determined by the OERC as follows:

For the sale of power up to 25.0% of the installed capacity:

- a fixed capacity charge which shall be determined by the OERC as per the terms and conditions of tariff issued from time to time and will be related to target availability. Recovery of fixed capacity charges below the level of target availability shall be done on a pro rata basis and calculated proportionately to the capacity requisitioned to GRIDCO; and
- a variable energy charge, which shall comprise fuel cost and shall be calculated on the basis of the ex-bus energy scheduled to be sent out from the generating station. The energy charges shall be calculated as per the methodology prescribed by the OERC from time to time

For the sale of power for 7% or 5% depending on the allocation of coal blocks within the state of Odisha a variable energy charge is applicable, which shall comprise fuel cost and shall be calculated on the basis of the ex-bus energy scheduled to be sent out from the generating station. The energy charges shall be calculated as per the methodology prescribed by the appropriate commission, from time to time. The working methodology of tariff determination is under dispute and pending before the courts in India.

Vedanta Limited petitioned to OERC to convert the 600 MW X 4 IPP into a captive generating plant ("CGP") to cater to the power needs of the 1.25 MTPA Smelter at Jharsuguda. After extensive deliberation and inconsideration of the facts, the OERC issued an order of conversion of Unit I, III and IV into CGP with effect from 1 April 2015, while retaining the IPP status of Unit II to fulfill the obligation under a PPA with GRIDCO.

BALCO's power business includes a 270 MW power plant at BALCO's Korba facility, which was previously for captive use before the shutdown of the 100,000 tpa aluminum smelter at Korba on 5 June 2009. BALCO also operates IPP 600 MW coal-based thermal power facility in the state of Chhattisgarh which had received approval to operate on 14 January 2015 from the regulatory authorities. One unit of 300 MW was commissioned and commenced production during fiscal year 2016 and the second unit was commissioned and commenced commercial production on May 1, 2016.

MEL. Mettur power plant is a 106.5 MW coal based thermal power plant operated by MALCO Energy Limited or MEL in the state of Tamil Nadu. The plant has been set up in stages, with the first 75 MW set up in the year 1999 to cater to the requirements of the aluminum smelter operated by MEL. The aluminum operations were closed since November 2008. An additional 25 MW unit was added in the year 2009. Further, a 6.50 MW steam turbine generator was added in the year 2013 taking capacity to 106.5 MW.

MEL entered in to an energy purchase agreement with Tamil Nadu Electricity Board in January 2009 for supply of power until April 2009 and entered with Power Trading Corporation Limited for supply of power to Tamil Nadu Electricity Board from April 2009 until May 2011, which was subsequently re-entered with Tamil Nadu Electricity Board from June 2011 until May 2016. MEL has entered into an agreement with NTPC Vidyut Vyapar Nigam Limited for supply of power (66.3 MW) to Telangana State Southern Power Distribution Company Limited (TSSPDCL) from June 2016 to May 2017. The tariff for power supply is as provided in the energy purchase agreement.

MEL sources entire coal through imports, primarily from Indonesia, Russia and South Africa. In fiscal year 2016, the total coal purchased from these sources was 0.32 million tons. The total volume of coal consumed annually bythe coal-fueled power plants is largely dependent on the amount of generation and ranges between 0.5 million to 0.55 million tons. MEL's 10 largest customers accounted for approximately 96.2%, 91.6% and 78.5% of revenue for MEL's power business in fiscal years 2014, 2015 and 2016, respectively. One of MEL's customers accounted for 82.7%, 91,9%, and 88.4% of MEL's revenue in fiscal years 2014, 2015 and 2016.

HZL. As of 30 September 2016, wind power plants with a combined power generation capacity of 274 MW have been commissioned in the States of Gujarat, Karnataka, Tamil Nadu, Maharashtra and Rajasthan in India at a total cost of Rs. 14,520 million (\$217.8 million). The electricity from these wind power plants is sold to State Electricity Boards. During their meeting on 21 January 2016, the HZL's Board of Directors approved the sale of the Company's wind power assets subject to the final approval of the price by the board. HZL is in the process of identifying a buyer.

Projects

Talwandi Sabo — Being set up though TSPL

In July 2008, the 1,980 MW Talwandi Sabo project was awarded to Vedanta Limited through an international Case 2 tariff based competitive bidding process. The project was set up through Vedanta Limited's wholly owned subsidiary, TSPL. All necessary approvals for the project have been obtained and commissioning of this project was carried out in four stages. Total cost of the project is Rs. 116,840 million (\$1,752.8 million). The boiler light up and synchronization of the first unit was achieved in the third quarter of fiscal year 2014 and coal logistics were established in the fourth quarter of fiscal year 2014. The first 660 MW unit of the Talwandi Sabo power plant was capitalized

in fiscal year 2015 and the second 660 MW unit was capitalized in December, 2015 after the successful completion of trial runs. The third unit was commissioned in the second quarter of fiscal year 2017. As of 30 September 2016, Rs. 108,018 million (\$1,620.4 million) was spent on the Talwandi Sabo thermal power project. This project is financed through internal sources and external borrowings.

The primary fuel for TSPL is domestic coal which Vedanta sources from Mahanadi Coalfields Limited or MCL. The annual coal requirement of the power plant is around 8.19 MTPA (for a GCV of coal at 3,700 kcal/kg and PLF of 80%). TSPL entered into a Fuel Supply Agreement (FSA) with MCL on 4 September 2013 with Annual Contracted Quantity (ACQ) of 7.72 million tons per annum (MTPA) for a 20 year period. As per the FSA, the coal supplied would be E/F grade i.e. between G8-G13 based on the recent grading system of Coal India Limited. Based on the G8- G13 grades, the GCV of the coal would be in the range of 3400 - 5200 Kcal/kg.

According to the terms of FSA, the MCL shall endeavor to supply coal from its own sources and also has the option to supply the balance quantity of coal through import (subject to mutual agreement with TSPL). The supply of domestic coal would be at least 75% of ACQ from fiscal year 2017 onwards as any supply below these levels by MCL would have an incidence of penalty on MCL. MCL may also provide domestic coal more than these levels. The balance coal requirement will be met by the Company through alternate sources i.e. use of imported coal/ e-auction coal.

As per the presidential directive issued on 17 July 2013 and consequently the Cabinet Committee of Economic Affairs (CCEA) approval and advice of CERC, considering impact on cost of generation in the concluded PPAs due to shortage in domestic coal availability, pass through of imported coal cost has been allowed in the tariff.

In May 2008, Vedanta Limited entered into an on-shore and offshore engineering, procurement and construction contract with SEPCO Electric Power Construction Corporation("SEPCO"), for the Talwandi Sabo thermal power project for Rs. 66,560 million (\$1,024 million). Under the contract, SEPCO is to provide testing, system design, engineering services for the plant and equipment among other things. In November 2012, TSPL had entered into a revised offshore EPC contract where contract value was revised upto \$1,081 millon. After the commissioning of three units, the contract was revised upwards by \$74 million in November 2012. In April 2016 the parties entered into a revised ECP contract, for USD1,041.8 million and Rs. 21,371 million for offshore and onshore EPC services respectively.

# Surplus Power from Captive Power Plants

Vedanta also sells excess power generated from its captive power plants to third parties pursuant to commercial arrangements. For example, Vedanta Limited entered into a letter of intent dated 16 November 2011 with GRIDCO for the sale of excess power from its captive power plant at Jharsuguda. Similar agreements have been entered into with third parties for the excess power at Vedanta's captive power plant in Tuticorin

#### Other Activities

Vedanta's other activities include:

## Port business

Vedanta has a 100.0% interest in Vizag General Cargo Berth Private Limited or VGCB as of 30 September 2016, a joint venture between Vedanta Limited and Leighton which won the bid to mechanize the coal handling facilities and upgrade the general cargo berth for handling coal at the outer harbour of Vishakhapatnam port, on the east coast of India.

The initial capacity of the upgraded berth will be 10.2 MTPA, with flexibility to be upgraded to 12.5 MTPA. VGCB has entered into an agreement on 8 October 2010 with the port authority,

Vishakhapatnam Port Trust, to mechanize the coal handling facilities and upgrade the general cargo berth on a build-operate-transfer basis for 30 years commencing on the date of award of concession. Vishakhapatnam Port Trust will receive a royalty of 38.1% of the revenue earned from the cargo handling activities as set out in the concession agreement.

In January 2013, operations commenced, and construction was completed on 8 April 2013. The estimated project cost was Rs. 6,640.0 million (\$132.8 million) of which Rs. 6,304 million (\$95.2 million) was spent as on 31 March 2016.

Sterlite Ports Limited, a 100% subsidiary of Vedanta Limited has received the 'letter of award' for redevelopment of berths 8, 9, barge berths and mechanical ore handling plant at the Port of Mormugao on a Develop, Build, Finance, Operate and Transfer ("DBFOT") basis for 19 mmtpa capacity multi-cargo port terminal in Mormugao Port, Goa. The redevelopment of the berth will result in the handling of all types of cargo including iron ore, coal, lime stone, bauxite and general cargo with an expected capacity of 19.2 million tons per annum. The company is in the process of forming a special purpose vehicle which will enter into an agreement with the Mormugao Port Trust, to operate the berth on a build-operate-transfer basis for 30 years commencing from the date the concession was awarded.

## Seasonality

Vedanta's iron ore mining operations are affected by changes in weather conditions, particularly heavy rains. Goa, where the majority of Vedanta's iron ore mining operations are located, experiences monsoon seasons, which usually occurs from early June to early October. During the monsoon season, restricted barge movements result in significantly lower exports through the Mormugao port in Goa, where Vedanta's iron ore is shipped to customers. Vedanta attempts to mitigate the effects of the monsoon season by concentrating on mine development and extracting larger quantities of overburden waste during the monsoon season in order to permit speedier extraction of iron ore during the dry season. In addition, during the monsoon season, Vedanta typically conducts annual maintenance at its processing plants and its other mining machinery.

Vedanta's oil and gas, zinc, copper, aluminium and commercial power business segments are not subject to seasonality.

## **Intellectual Property**

Vedanta, through Vedanta Limited, owns one patent in India and another in Europe that relates to a system for producing metallurgical coke. Vedanta Limited also has a patent in the United States relating to the reduction of sulphur-based gases during the production of iron ore. Vedanta, through Vedanta Limited, owns an additional patent in India that relates to a system for enhancing the quality of cathodes. Vedanta through Vedanta Limited owns a new pig iron product. Vedanta also has a number of patents in the process of being granted in India related to mining, refining and smelting processes. Vedanta owns a number of trademarks that are used to identify its businesses and products. Vedanta has also acquired certain intellectual property rights under licences from third parties for use in its businesses. Cain India has entered into various agreements with Cairn Energy and its subsidiaries (the "Cairn Energy Group") in connections with trademarks and corporate logos, which are registered in EU, UK, India and Benelux. Vedanta's patents, licences and trademarks constitute valuable assets. Vedanta has a patent for the manufacture of energy recovery based metallurgical coke. However, Vedanta does not depend on any single patent, licence or trademark in a material manner in the conduct of its sales and operations viewed as a whole.

#### Awards

In 2016, Vedanta was recognized a one of the top companies to work for in Asia, by ACES. Cairn India was also ranked as the world's fastest growing energy company by Platts in 2013.

# Litigation

Save as disclosed below, there are no outstanding governmental, legal or arbitration proceedings, including any such proceedings which are pending or threatened of which Vedanta is aware, which Vedanta believes could reasonably be expected to have a material adverse effect on its results of operation or financial condition.

Vedanta Limited has commenced proceedings against the GoI, which has disputed Vedanta Limited's exercise of the call option to purchase its remaining 29.5% ownership interest in HZL.

Under the terms of the shareholders' agreement between the GoI and Sterlite Opportunites and Ventures Limited ("SOVL") (which has been merged into Vedanta Limited with effect from 1 April 2012), Vedanta Limited was granted two call options to acquire all the shares in HZL held by the GoI at the time of exercise. Vedanta Limited exercised the first call option on 29 August 2003. Arbitration is on-going in relation to a dispute between the GoI and Vedanta Limited, with respect to Vedanta Limited's exercise of its second call option to acquire the remaining shares in HZL held by the GoI, pursuant to the shareholders' agreement between the parties. The GoI has refused to act upon the second call option, stating that Vedanta Limited's second call option violates the provisions of the Indian Companies Act, 1956, by restricting the right of the GoI to transfer its shares. The next date of hearing by the arbitral tribunal is on 25 February 2017.

Vedanta Limited has commenced proceedings against the GoI which has disputed Vedanta Limited's exercise of the call option to purchase its remaining 49.0% ownership interest in BALCO.

Arbitration proceedings have been concluded in relation to a dispute between the GoI and Vedanta Limited, with respect to Vedanta Limited's exercise of its second call option to acquire the remaining shares in BALCO held by the GoI, pursuant to the shareholders' agreement between the parties. In January 2011, the arbitration tribunal rejected Vedanta Limited's claims on the grounds that the clauses relating to the call option, the right of first refusal, the "tag-along" rights and the restriction on the transfer of shares violate the provisions of the Indian Companies Act, 1956. In April 2011, Vedanta Limited filed an application under section 34 of the Arbitration and Conciliation Act, 1996 in the High Court of Delhi to set aside the award dated 25 January 2011 to the extent that it holds these clauses ineffective and inoperative. The GoI also filed an application before the High Court of Delhi to partially set aside the arbitral award dated 25 January 2011 in respect of certain matters involving valuation. The High Court of Delhi passed an order dated 10 August 2011 directing Vedanta's application and the application by the GoI to be heard together as they arise from a common arbitral award. The matter is currently pending before the High Court of Delhi and the next date of hearing is on 10 July 2017.

Appeal proceedings in the High Court of Bombay brought by SEBI to overrule a decision by the Securities Appellate Tribunal of India that Vedanta Limited has not violated regulations prohibiting fraudulent and unfair trading practices.

In April 2001, SEBI ordered prosecution proceedings to be brought against Sterlite (now Vedanta Limited), alleging that it violated regulations prohibiting fraudulent and unfair trading practices, and also passed an order prohibiting Sterlite from accessing the capital markets for a period of two years. SEBI's order was overruled by the Securities Appellate Tribunal of India in 22 October 2001 on the basis of a lack of sufficient material evidence to establish that Sterlite had, directly or indirectly, engaged in market manipulation and that SEBI had exercised its jurisdiction incorrectly in prohibiting Sterlite from accessing the capital markets. In November 2001, SEBI appealed to the High Court of Bombay. No further action or procedures have taken place since 2001.

SEBI's order was based on its finding that Sterlite had manipulated the price of its shares in connection with its proposed acquisition of shares in Indian Aluminium Company Limited ("INDAL") and its proposed open offer to the shareholders of INDAL in 1998. SEBI also alleged that MEL provided funds to an entity Vedanta allegedly controlled to enable its associate to purchase Sterlite's shares, as part of a connected price manipulation exercise.

In addition to the civil proceedings, SEBI also initiated criminal proceedings in 2001 before the Court of the Metropolitan Magistrate, Mumbai, against Sterlite, Vedanta's Executive Chairman, Mr. Anil Agarwal, Sterlite's Director of Finance, Mr. Tarun Jain, and the chief financial officer of MEL at the time of the alleged price manipulation. When SEBI's order was overturned in October 2001, Sterlite filed a petition before the High Court of Bombay to defend those criminal proceedings on the grounds that the Securities Appellate Tribunal of India had overruled SEBI's order on price manipulation. An order has been passed by the High Court of Bombay in Sterlite's favour, granting an interim stay of the criminal proceedings.

## Criminal proceedings against former directors of SIL.

Ms. Krishna Bajaj filed a complaint against the former directors of Sesa Industries Limited ("SIL") (which has since been amalgamated with Sesa Goa) before the Magistrate at Mumbai in 2000, in relation to shares issued on a preferential basis by Sesa Industries Limited in 1993 to Sesa Goa's shareholders, alleging that the shares of Sesa Industries Limited were not listed within 12 to 18 months of the offer as stated in the offering document. The four directors appeared before the court on 16 June 2009 and pleaded not guilty to the charges. The four directors filed a criminal application in the High Court of Bombay challenging the Magistrate's order of framing charges, before the High Court of Bombay. The High Court of Bombay admitted the criminal application and stayed the proceedings pending before Magistrate at Mumbai.

## Criminal proceedings against certain directors and employees of BALCO

Criminal proceedings were initiated by Mr. Ajay Padia before the Court of the Judicial Magistrate First Class, Pune against Mr. Anil Agarwal, Mr. Navin Agarwal, Mr. Tarun Jain and certain of our other former directors and employees in 2002 alleging that an assurance that was given by the above mentioned directors regarding payment of all amounts owed to him for the damaged material supplied by BALCO was not honored. An application under was filed in the High Court of Bombay for quashing the proceedings in the Judicial Magistrate First Class and to dispose the matter directing that alternative remedies were available before the Sessions Court, Pune, which was the appropriate Court. The High Court of Bombay stayed the criminal proceedings and the application was listed for disposal. The next date of hearing has not been fixed.

# BALCO is involved in litigation in relation to the illegal felling of trees situated on forest land.

Petitions have been filed in public interest before the Supreme Court of India by various individuals and Sarthak, a non-governmental organization alleging that illegal possession and use of forest land, which has been proposed to be leased by Chattishgarh Government, for non-forest activities by BALCO. The Supreme Court of India referred the matter to the Central Empowered Committee, which recommended an ex post-facto diversion of forest land with payment of net present value on land for which forest compensation was not paid prior to the year 1980. Subsequently, it was alleged that BALCO had cut trees in violation of the Supreme Court order and one of the petitioners filed a contempt petition and the matter was again referred to the Central Empowered Committee. The Central Empowered Committee submitted its report on June 30, 2012 to the Court recommending that a detailed survey should be conducted through Forest Survey of India (MoEF) using high quality remote sensing technique to find out whether any tree felling and/or non-forest use has taken place after February 29, 2008 in the revenue forest land and/or deemed forest in possession of BALCO. In order to expedite the proceedings, BALCO filed an application in the Supreme Court seeking direction to pay the net present value on forest land as per the recommendation of the Central Empowered Committee providing an ex-post facto diversion of the 1,751 acres forest land held by BALCO.

Writ petitions filed against Vedanta alleging violation of certain air, water and hazardous waste management regulations at Vedanta's Tuticorin plant.

On 24 March 2013, the TNPCB issued a show cause notice to Vedanta alleging violation of environmental laws and conditions imposed by the TNPCB and releasing pollutants from the Tuticorin plant. Further, TNPCB issued an order dated 29 March 2013 ordering the closure of the Tuticorin plant. Vedanta filed an appeal before the NGT, Chennai against the order of closure by the TNPCB on 1 April 2013. The matter was transferred to the NGT Principal Bench at New Delhi and in a hearing in May 2013, Vedanta was directed to provide certain information to the Tribunal.

The Tribunal passed an interim order in May 31, 2013 allowing the smelter to recommence operations subject to certain conditions, and consequently Vedanta recommenced operations on June 16, 2013. The expert committee constituted by the Tribunal submitted a report on the operation of the plant on July 10, 2013 stating that the plant's emissions were within the prescribed standards. Based on this report, the Tribunal on July 15, 2013 ordered that the interim order dated 31 May 2013 shall continue to operate. On August 8, 2013, the Tribunal confirmed its 31 May 2013 order with directions to comply with the recommendations made by the committee to further improve the working of the plant within a time bound schedule.

Vedanta implemented all the recommendations during fiscal year 2013. However, the TNPCB filed Civil Appeals in 2013 against the Tribunal's interim order dated May 31, 2013 and final order and judgment dated August 8, 2013. V Gopalaswamy, General Secretary of a Political Party, MDMK, also filed Civil Appeals in 2013. These Civil Appeals are pending before the Supreme Court of India. In the meanwhile, TNPCB has renewed Consent to Operate for the existing Copper smelter, which is valid till March 31, 2017. The appeals are pending before the Green bench of the Supreme Court of India.

# The Enforcement Directorate has levied penalty of approximately Rs. 347 million on Vedanta Limited.

The Enforcement Directorate ("ED") by an order in August 2004 alleged that Twin Star had remitted approximately \$46 million through Sterlite (now Vedanta Limited) and MALCO in the past without prior permission from the Reserve Bank of India ("RBI"). By this order, the ED levied penalties on Vedanta Limited and certain directors of Vedanta Limited of approximately Rs. 347.0 million.

Vedanta Limited filed an appeal against the order of ED before Appellate Tribunal of Foreign Exchange seeking waiver of pre-deposit, which was allowed by the Appellate Tribunal of Foreign Exchange. The ED challenged this order before Delhi High Court. The Delhi High Court remanded the matter back to the Appellate Tribunal of Foreign Exchange for deciding the issue of waiver of pre-deposit afresh.

# Proceedings against Vedanta relating to Niyamgiri mining project and expansion plans of refinery in Lanjigarh

In 2004, a writ petition was filed by a private individual against Vedanta, the Government of Odisha, India, the Odisha Mining Corporation Limited ("OMC"), and others before the High Court of Odisha, alleging that the grant of a mining lease by the OMC to Vedanta to mine bauxite in the Niyamgiri Hills at Lanjigarh, in the State of Odisha, would violate the provisions of the Forest (Conservation) Act, 1980 of India. The petition alleged that the felling of trees, construction of the alumina refinery by Vedanta and the development of the mine was in violation of the Forest (Conservation) Act, 1980 and would have an adverse impact on the environment. The petition sought,

among other things, to restrain the grant of the mining lease to mine bauxite, to declare the joint venture agreement entered into between Vedanta and the OMC void, a court direction for the immediate cessation of construction of the Lanjigarh alumina refinery and an unspecified amount of compensation from Vedanta for damage caused to the environment. This petition was also filed before the Supreme Court of India by certain non-governmental organizations and individuals. The Supreme Court granted Vedanta the clearance to mine in and around the Niyamgiri Mines on terms and conditions as specified in the Court order. Consequent to the order of the Supreme Court, the proceedings before the High Court of Odisha became redundant as the issues were already determined.

Thereafter, the MoEF on August 24, 2010 declined to grant the forest clearance for the Niyamgiri Mines to the OMC, and rendered the environmental clearance non-operational. On March 8, 2011, the OMC challenged the order of the MoEF by a special leave petition in the Supreme Court of India. On April 1, 2011, the Court admitted the OMC's plea against the MoEF. The Supreme Court in its order dated April 18, 2013 ordered the Government of Odisha to place any unresolved issues and claims of the local communities under the Forest Rights Act and applicable rules before the Gram Sabha, the council representing the local community. The Gram Sabha was ordered to consider these claims and communicate its decision to the MoEF through the Government of Odisha within three months of the order. The Government of Odisha completed the process of conducting Gram Sabha meetings and submitted its report on the proceedings to the MoEF.

Further the MoEF, based on the report submitted by the Government of Odisha rejected the grant of stage II forest clearance for the Niyamgiri project of OMC on January 8, 2014, which is one of the sources of supply of bauxite to the alumina refinery at Lanjigarh in terms of the joint venture agreement with the government of Odisha (through the OMC). Under the terms of the joint venture agreement, 150 million tonnes of bauxite is required to be made available to Vedanta. Prior to the joint venture agreement coming into force, the same terms were incorporated in a Memorandum of Understanding between Vedanta and OMC. Assets under construction as at March 31, 2016 was after an impairment charge of Rs. 668 million (\$11.0 million) which relates to impairment of mining assets of Jharsuguda Aluminium at Lanjigarh as the MoEF has rejected the Stage II forest clearance for the Niyamgiri mining project. The OMC has issued a show cause notice dated February 20, 2015 on Vedanta to show reason for why the joint venture agreement for the supply of 150 million tonnes of bauxite will not be cancelled in view of the failure to achieve certain milestones set out in the joint venture agreement. Vedanta replied to the notice substantiating all facts on the project followed by an in-person meeting. Vedanta noted that the joint venture agreement was contingent on OMC obtaining necessary mining licenses. It stated that it did not have any objection to the Joint Venture agreement being terminated as mining leases could not be secured, but with the caveat that Vedanta should not be held responsible for not fulfilling its obligations under the agreement, and requested an assurance that the MoU for the supply of 150 million tons of bauxite should remain in force. On April 15, 2015, the OMC informed MoEF that it intends to undertake bauxite mining independently at Niyamgiri mines and make available bauxite to the open market in view of approval from the Department of Steel and Mines, Government of Odisha for the cancellation of the joint venture agreement dated February 18, 2009. Subsequently, the OMC terminated the joint venture agreement. Vedanta has sought a request for modification of the joint venture agreement or an amendment to the joint venture agreement with a standalone long-term linkage agreement for the supply of 150 MT of bauxite. The matter is pending with the OMC.

On October 20, 2010, the MoEF ordered Vedanta to maintain the status quo on the expansion of the refinery at Lanjigarh. Against this order, Vedanta filed a writ petition in the High Court of Odisha and the High Court dismissed the petition. Vedanta made an application to the MoEF to reconsider the grant of the environmental clearance for the expansion of the alumina refinery. By its letter dated February 2, 2012, the MoEF issued fresh terms of reference to Vedanta for preparation of the environment impact assessment report. Vedanta submitted this report to the Odisha Pollution Control Board and simultaneously submitted various representations to the MoEF as well as the Project Monitoring Group established under the Cabinet Committee on Investments. The Expert Appraisal

Committee of the MoEF reconsidered the project and revalidated the terms of reference for 22 months effective January 2014. Thereafter the suspension imposed on the expansion of Vedanta's alumina refinery was lifted. The public hearing was held on July 30, 2014 and the expansion of the Lanjigarh refinery was considered by the Expert Appraisal Committee in its meeting dated January 9, 2015 for the grant of environmental clearance. In line with the Expert Appraisal Committee's recommendation, the MoEF on November 20, 2015 granted environmental clearance for the alumina refinery expansion from 1 to 6 MTPA in a phased manner and subject to certain conditions being met. For the 6 MTPA expansion, the company is required to obtain an amendment of environmental clearance after the completion of land acquisition of the balance area of 666.03 HA. Subsequent to the grant of environmental clearance for expansion, the Odisha State Pollution Control Board has revalidated the consent to establish the alumina refinery expansion on January 2, 2016, and has granted the consent to operate for the 2 MTPA on December 31, 2015.

On February 18, 2016 an individual challenged the environmental clearance grant for the alumina refinery expansion at Lanjigarh before the National Green Tribunal Kolkata wherein MoEF, Odisha State Pollution Control Board and Vedanta Limited have been made parties.

# Demands against HZL by the Department of Mines and Geology and Ministry of Mines.

The Department of Mining and Geology, Rajsamvad of the State of Rajasthan issued several show cause notices in August, September and October 2006, aggregating Rs. 3,339 million (\$50.1 million) to HZL, claiming unlawful occupation and unauthorized mining of associated minerals other than zinc and lead at HZL's Rampura Agucha, Rajpura Dariba and Zawar mines in Rajasthan, during the period from July 1968 to March 2006. In response, HZL filed a writ petition against these show cause notices. In October 2006, the High Court issued an order granting a stay and restrained the Department of Mines and Geology from undertaking any coercive measures to recover the penalty. In January 2007, the High Court issued another order granting the Department of Mines and Geology additional time to file their reply and also ordered the Department of Mines and Geology not to issue any orders canceling the lease. The next date of hearing has not yet been fixed.

## Demands against HZL by the State of Rajasthan

The State of Rajasthan issued a notification in Feburary 2008 notifying the Rajasthan Environment and Health Cess Rules, 2008, imposing environment and health cess on major minerals including lead and zinc. HZL and other mine operators resisted this notification and the imposition thereunder before the High Court of Rajasthan on the ground that the imposition of such cess and all matters relating to the environment fall under the competence of the Central government as opposed to the state government. In October 2011, the High Court of Rajasthan disposed the writ petitions and upheld the validity of the Rajasthan Environment and Health Cess Rules, 2008. HZL challenged this order by a special leave petition in December 2011 before the Supreme Court of India. The Supreme Court of India issued a notice for stay. Further direction was issued by the Supreme Court on March 23, 2012 not to take any coercive action against HZL for recovery of cess. The matter is still pending and is not yet listed for hearing.

# Vedanta is involved in proceedings related to mining operations in the State of Goa.

Pursuant to findings in the Justice M.B. Shah Commission Report dated March 15, 2012 on the allegations of illegal mining in the State of Goa, the state government had banned iron ore mining operations in Goa on September 10, 2012 and the Ministry of Environment and Forest ("MOEF") had suspended environmental clearances of all mining leases within the State of Goa. A writ petition was filed before the Supreme Court of India to initiate action based on the Justice M.B. Shah Commission Report and an interim order was passed by the Supreme Court of India on October 5, 2012 suspending mining operations within Goa.

The Supreme Court of India passed an interim order on November 11, 2013 directing that the inventory of the excavated mineral ores be verified by the Directorate of Mines and Geology ("DMG") and the Monitoring Committee was constituted to sell the materials through an e-auction. The Monitoring Committee is e-auctioning the ore and the proceeds from the auction will go to the state government.

On April 21, 2014, the Supreme Court passed judgment in the matter lifting the ban with certain stipulations including directions on mining by the lessees after November 22, 2007 as being illegal, dumping outside the leased area as being impermissible; interim buffer zone fixed at one kilometer from the boundaries of National Parks and Sanctuaries, ad-hoc cap on annual excavation at 20 million tonnesother than from dumps until the final report of Expert Committee is submitted, appropriation of the sale value of e-auctioned inventorized ores by the state government as per stipulated conditions, payment of 10% of the sale proceeds to the Goan Iron Ore Permanent Fund. The Supreme Court has held that all mining leases in the State of Goa, including those of the Company, had expired in 2007 and consequently, no mining operations can be carried out until renewal/execution of mining lease deeds by the state government. The petition filed by Vedanta in May 2014 for the review of the aforesaid judgment in the Supreme Court of India on certain limited issues was subsequently withdrawn by Vedanta in September 2014.

On August 13, 2014, the High Court of Bombay, Goa Bench passed a common order directing the State of Goa to renew the mining leases for which stamp duty was collected in accordance with the Goa Mineral Policy (2013) and to decide the other applications for which no stamp duty was collected within three months thereof.

In January 2015, the government of Goa revoked the order suspending mining operations in the State of Goa and MOEF revoked suspension of environmental clearances in March 2015. Subsequently, the lease deeds for all working leases were executed and registered as of August 2015. Vedanta obtained consent to operate under the Air Act and Water Act from the Goa State Pollution Control Board ("GSPCB") and mining plan approval from the Indian Bureau of Mines for these leases, and the Company resumed operations of its mines on 10 August 2015.

On 10 September, 2014, the Goa Foundation challenged the High Court order directing the renewal of mining by way of a Special Leave Petition (SLP) before the Supreme Court of India, challenging the judgment of the High Court dated 13 August 2014 directing renewal of mining leases. No stay has yet been granted by the Supreme Court. Another set of SLPs on an identical issue were filed by Rama Velip. Two writ petitions have also been filed before Supreme Court by Goa Foundation and Sudip Tamankar in September 2015 for setting aside the second renewal of iron ore mining leases in Goa made under section 8 (3) of MMDR Act and challenging the revocation of suspension on mining in State of Goa.

The Expert Committee has filed its reports on dump handling and ceiling on annual extraction before the Supreme Court recommending enhancement of annual extraction ceiling immediately to 30 million MT nd subsequently to 37 million MT after infrastructure development. Vedanta filed an application before the Supreme Court of India, requesting clarification on whether any contributions to the Goa Permanent Iron Ore Fund should be made as per the Supreme Court's orders, as the Central government has introduced a provision to set up social fund known as District Mineral Foundation in states for similar objectives.

Proceedings against Vedanta challenging environmental consents received for expansion project of pig iron, metallurgical coke, sinter plants and power plant in Goa

Cairn India is working in partnership with its joint operation partner, ONGC, in the Rajasthan Block. The Rajasthan production sharing contract (the "Rajasthan Block PSC") was signed on 15 May 1995 between the GoI and a consortium consisting of ONGC and Shell India Production Development BV.

Cairn India acquired its interest in the Rajasthan Block PSC in three stages, eventually acquiring a 100 per cent. beneficial interest in the assets and liabilities as of May 2002 and acquiring legal title to this interest on 20 June 2003. Under the Rajasthan Block PSC, the GoI has an option to acquire a participating interest of 30 per cent. in any development area containing a commercial discovery. The GoI exercised its right in all three development areas, specifically DA 1 in 2005, DA 2 in 2007 and DA 3 in 2009, acting through its nominee, ONGC, and acquired a 30 per cent. participating interest.

Under the Rajasthan Block PSC, until such time as India attains self-sufficiency in its crude oil supply, Cairn India is required to sell to the GoI, or its nominee, all of Cairn India's entitlement to crude oil and condensate extracted from the Rajasthan Block to assist in satisfying domestic Indian crude oil demand. The GoI has the option but not an obligation to purchase the entire or part of the crude oil produced from the Rajasthan Block. However, the GoI has granted permission to Cairn India to sell the remaining quantities of crude oil, over and above those allocated to government nominees, to other domestic private refineries. As of 31 September 2016, Cairn India sells the crude oil to both private refineries and, the public sector undertakings refineries. As of 31 March 2016, commercial sales arrangements were in place for over 200,000 bopd with public sector undertakings and private refineries. Any additional sales to the public sector undertakings refineries, special economic zone refineries and overseas are subject to approval from the GoI.

The Rajasthan Block PSC established a management committee for the Rajasthan Block, which consists of four members, two of whom are nominated by and represent the GoI and the licensee, ONGC, together, and two of whom are nominated by and represent Cairn India. The management committee must unanimously approve annual work programmes, budgets, proposals for the declaration of a discovery as commercial, field development plans, and the delineation of or additions to a development area, whereas all other matters only require a majority vote.

The Rajasthan Block PSC is currently due to expire in May 2020, but it may be extended by mutual agreement among the parties for up to an additional ten years in the case of commercial production of natural gas or, in other cases, up to five years. There is also a provision to further extend the production sharing contract by agreement of the parties if production of crude oil or natural gas is expected to continue after the relevant period.

The Rajasthan Block benefitted from a tax holiday of seven years from the fiscal 2009 (being the year of commencement of commercial production in the Rajasthan Block) to 31 March 2016. However, during this seven year period, minimum alternate tax rules applied resulting in a taxation of book profits calculated in accordance with the generally accepted accounting principles used in India. Any minimum alternate tax paid can be carried forward for a total period of ten years from the year of credit and used to reduce corporate tax due in future years in excess of minimum alternate tax payable in those years.

Separately, an application was filed by the village panchayat head of Navelim, Goa before the National Green Tribunal against the GSPCB, MoEF, State of Goa, others and Vedanta alleging that (i) GSPCB had issued its approval in a piecemeal manner to Vedanta, even though the environmental clearance order issued by the MoEF and the approval are for all four plants thereby violating the MoEF order, (ii) the no-objection certificate issued in relation to this project in 2007 was forged and fabricated, and (iii) the CN5 bridge at Maina-Navelim junction falls outside the notified industrial area. The application sought cancellation of the approval and the order of the MoEF. On March 1, 2013, the National Green Tribunal gave directions to issue notices to all the parties. Vedanta

responded on April 11, 2013, denying all contentions and submissions made by the village head and requested that the application be dismissed. Pleadings in the matter have been completed. Subsequently on February 10, 2014 the matter was transferred from the Principal Bench of the National Green Tribunal at New Delhi to the Western Bench of the National Green Tribunal at Pune. On July 31, 2014, the National Green Tribunal held that owing to an identical issue pending before the Supreme Court of India, the proceeding before the National Green Tribunal is adjourned pending determination by the Supreme Court of India.

# Vedanta has challenged the imposition of forest development tax by Government of Karnataka.

In October 2008, Vedanta filed a writ petition in the High Court of Karnataka against the Government of Karnataka and others, challenging the imposition of a forest development tax at a rate of 8.0% (a subsequent demand was made for the payment of tax at the rate of 12.0%) on the value of iron ore sold by Vedanta from the mining leases in the forest area, pursuant to the notification by the Government of Karnataka and the memorandum/common order issued by the Deputy Conservator of Forests. In August 2009, the High Court of Karnataka permitted the Government of Karnataka to levy the forest development tax and ordered that the demand be restricted to 50.0% of the forest development tax as an interim arrangement pending disposal of the writ petition.

Vedanta filed an application before the High Court of Karnataka, seeking modification of the order in August 2009. However, the application was not taken up for hearing. Subsequently, Vedanta filed a special leave petition before the Supreme Court of India against the High Court's order. In November 2009, the Supreme Court of India ordered the High Court of Karnataka to dispose the application for modification of the order given in August 2009 and ordered Vedanta to furnish a bank guarantee towards payment of the forest development tax. In April 2010, High Court of Karnataka ordered to pay 25.0% of the demand in cash and furnish a bank guarantee for the remaining 25.0%.

On January 3, 2016, the High Court of Karnataka passed its final order quashing the forest development tax notification, holding that the rate of forest development tax levied to be 8% and directing a refund of the amount collected from mining leases other than state government owned companies. The state government of Karnataka appealed against the order before the Supreme Court of India, and another mining lessee also filed a counter appeal in the matter. The matter is pending before the Supreme Court and next hearing date is scheduled on August 3, 2016. In the interim, the Supreme Court has stayed the refund of the forest development tax amount as ordered by the High Court.

In the meantime, the Govt. of Karnataka enacted the FDT Amendment Act which empowers the State to collect FDT at 12%, with retrospective effect from 2008, on the sale price of iron ore sold by Vedanta. Vedanta filed a writ petition in the High Court of Karnataka challenging constitutional validity of the FDT Amendment Act. The High Court granted temporary relief by directing the State government to not take any coercive action against Vedanta based on the newly enacted law.

### Vedanta is involved in a tax dispute with the Indian Tax Department.

The Group through its subsidiaries Richter Holdings Limited and Westglobe Limited in 2007 acquired the entire stake in Finsider International Company Limited (FICL) based in the United Kingdom which was holding 51 percent shares of Sesa Goa Ltd, an Indian Company. In October 2013, the Indian Tax Authorities (Tax Authorities) have served an order on Richter and Westglobe for alleged failure to deduct withholding tax on capital gain on the indirect acquisition of shares in April 2007.

The Tax Authorities determined the liability for such non-deduction of tax as Rs. 8,751.8 million (US\$131.3 million) in the case of Richter and Rs.5,834.5 million (US\$87.5 million) in the case of Westglobe, comprising tax and interest. Being aggrieved, Richter and Westglobe filed appeals before the first appellate authority. Writ petitions were filed in the High Court of Karnataka challenging the constitutional validity of retrospective amendments made by the Finance Act 2012 and in particular the imposition of obligations to deduct tax on payments made against an already concluded

transaction. The Karnataka High Court passed interim orders and directed that the adjudication of liability (TDS quantum and interest) shall no more remain in force since tax department passed the orders on merits travelling beyond the limited issue of jurisdiction. The high court will hear on jurisdiction issue. The next hearing is scheduled for January 25, 2017.

# The Cairn India Group is involved in a special leave petition relating to income tax

Cairn India Energy West BV ("Cairn Energy") filed a writ petition with the High Court of Gujarat in December 2008 challenging the restriction of section 80-IB (9) of the Indian Income Tax Act, 1961 ("Section 80-IB (9)") to the production of oil. Section 80-IB(9) allows the deduction of 100% of profits from the commercial production or refining of mineral oil. The term "mineral oil' is not defined but has always been understood to refer to both oil and gas, either separately or collectively. The 2008 Indian Finance Bill appeared to remove this deduction by stating (without amending section 80-IB (9)) that "for the purpose of section 80-IB(9), the term "mineral oil' does not include petroleum and natural gas, unlike in other sections of the Act". Subsequent announcements by the Indian Finance Minister and the MoPNG have confirmed that a tax holiday would be available on production of crude oil but have continued to exclude gas. The High Court of Gujarat, by its order dated July 29, 2009 did not admit the writ petition on the ground that the matter needs to be first decided by the lower tax authorities. A special leave petition has been filed before the Supreme Court of India against the decision of the High Court of Gujarat. In the event that this challenge is unsuccessful, the potential liability for tax and related interest on the tax holiday claimed on gas production for all periods to March 31, 2016 is approximately Rs.3,201 million

Seperately, the Commissioner of Income Tax (Appeals) by an order dated June 17, 2010 has understood natural gas as falling within the ambit of the term "mineral oil" in relation to an assessment of Cairn Energy for the assessment year 2005-2006.

### Cairn India has filed certain writ petitions relating to sales tax

Cairn has filed two writ petitions before the Rajasthan High Court seeking to set aside the letters and show cause notice issued by the Rajasthan Sales Tax Department and others demanding 4% VAT on sales of crude oil on the basis of an intra-state sale (as opposed to an inter-state sale). A 2% Central States Tax is currently being paid. A stay against the show cause notices has been issued. The potential liability for tax and related interest for all periods until 31 Dec 2016 is approximately Rs.41,581 million (US\$623.7 million) (Tax Rs.29,591 million (US\$443.9 million) & Interest Rs.11,990 million (US\$179.8 million)). The matter was last heard on May 17, 2016 and the judgement dated July 13, 2016 allowed the petition and held that sale of crude oil should be regarded as interstate sale subject to central states tax and that Rajasthan VAT should not be applicable. The Rajasthan Sales Tax Department has filed a petition before the Division Beench of the Rajasthan High Court against the order dated 13 July 2016 of the Rajasthan High Court. The Rajasthan Sales Tax Department has filed a writ petition before the division bench of the Rajasthan High Court against the order dated 13 July 2016 of the Rajasthan High Court.

# Claim against BALCO for energy development cess

In December 2006, the High Court of Chhattisgarh on a writ filed by BALCO and others, declared the provisions relating to imposition of energy development cess of Rs. 4,379 million (\$65.7 million) on the captive power plants to be unconstitutional and ordered refund of the cess already collected by the state government. The State of Chhattisgarh filed a special leave petition in the Supreme Court against the order of the High Court. The Supreme Court has issued notice and stayed the refund of the cess already collected, pending the disposal of the special leave petition and restrained the tax department from taking any corrective step for the collection of the cess. The matter is expected to be listed in due course.

# The Amalgamation and Re-organization Scheme has been challenged by the Indian tax authorities and others

Subsequent to the effectiveness of the Amalgamation and Re-organization Scheme, special leave petitions challenging the orders of the High Court of Bombay at Goa were filed before the Supreme Court of India by the Commissioner of Income Tax, Goa and the Ministry of Corporate Affairs in July 2013 and in April 2014, respectively. Further, a creditor and a shareholder have challenged the Amalgamation and Re-organization Scheme in the High Court of Madras in September 2013. Further, the Ministry of Mines, GoI have challenged the Amalgamation and Reorganisation Scheme before the High Court of Madras and the High Court of Bomaby, Goa Bench, respectively. These petitions are pending for hearing and admission.

## Arbitration proceedings on issues related to the cost recovery of the Ravva block

Cairn along with other joint operation partners (the "Contractor Parties") are involved in a dispute against GoI relating to the recovery of contractual costs in terms of calculation of payments that the Contractor Parties were required to make in connection with the Ravva field.

The Ravva production sharing contract obliges the Contractor Parties to pay a proportionate share of ONGC's exploration, development, production and contract costs in consideration for ONGC's payment of costs related to construction and other activities it conducted in Ravva prior to the effective date of the Ravva production sharing contract (the "ONGC Carry"). The question as to how the ONGC Carry was to be recovered and calculated, along with other issues, was submitted to an international arbitration tribunal in August 2002 which rendered a decision on the ONGC Carry in favor of the Contractor Parties whereas four other issues were decided in favor of GoI in October 2004 (the "Partial Award").

The GoI then proceeded to challenge the ONGC Carry decision before the Malaysian courts, as Kuala Lumpur was the seat of the arbitration. On October 11, 2011, the Federal Court of Malaysia adjudicated the matter and upheld the Partial Award. Per the decision of the arbitral tribunal with regards to Partial Award, the Contractor Parties and the GoI were required to arrive at a quantification of the sums relating to each of the issues under the Partial Award. Also, the arbitral tribunal retained the jurisdiction for determination of any remaining issues in the matter.

Pursuant to the decision of the Federal Court, the Contractor Parties approached the Ministry of Petroleum and Natural Gas ("MoPNG") to implement the Partial Award while reconciling the statement of accounts as outlined in the Partial Award. GoI failed to implement the Partial Award by way of reconciling accounts as provided in the Partial Award.

However, on 10 July 2014, MoPNG issued a show cause notice alleging that since the Partial Award had not been enforced the profit petroleum share of the GoI had been short-paid. MoPNG threatened to recover that amount from the sale proceeds payable by the oil marketing companies to the Contractor Parties. The Contractor Parties replied to the show cause notice taking various legal contentions. On 9 March 2015, a personal hearing took place between MoPNG and the Contractor Parties whereby the Contractor Parties expressed their concerns against such alleged unilateral recoveries and filed further written submissions on March 12, 2015.

Because the Partial Award did not quantify the sums, the Contractor Parties approached the same arbitral tribunal to pass a final award in the subject matter since the arbitral tribunal had retained the jurisdiction to do so. The arbitral tribunal was reconstituted. The reconstituted tribunal commenced hearings at the Hague on February 23, 2015, and the claimants approached the tribunal for interim relief to maintain the status quo against the MoPNG's show cause notice and alleged unilateral recoveries directly through Ravva crude oil and gas buyers and the tribunal granted the interim-relief on June 26, 2015. The final hearing took place on June 26, 2016, and the parties were ordered to make their submissions, if any with respect to the cost of arbitration proceedings. The final award was passed by the tribunal on 26 October 2016, upholding that no further amounts are due from the

claimants. With respect to arbitration costs, the award specifies that each party should bear costs equally. GoI has the right to challenge the final award and may also challenge its enforcement. While Cairn does not believe so, however if GOI is finally successful in its challenge, Cairn could be liable for approximately Rs. 4,259.55 million (US\$63.98 million) and interest.

# Proceedings related to the Imposition of Entry Tax

BALCO challenged the constitutional validity of a local statute levying entry tax on the entry of goods brought into the State of Chhattisgarh, India from outside and other notifications, as being in violation of certain provisions of the Indian Constitution. BALCO paid the entry tax of Rs. 2,318 million (\$34.8 million) under protest to the state government of Chhattisgarh until 31 October 2016. By its order dated 10 September 2009, the Chattisgarh High Court upheld the constitutional validity of the impugned statute.

Vedanta also filed a writ petition before the High Court of Odisha, challenging the constitutionality of the Odisha Entry Tax Act. On February 18, 2008, the Odisha High Court held that (i) the Odisha entry tax is not compensatory, (ii) there should not be any entry tax on goods coming into Odisha which are not manufactured in Odisha, and (iii) that the Odisha Entry Tax Act is valid. This challenge was with regard to levy of entry tax on indigenous goods. The High Court order was challenged before the Supreme Court of India wherein the court ordered Vedanta to pay the entry tax amount towards earlier dues amounting to Rs. 35 million (\$0.5 million) and amounts accruing from October 2009 on a monthly basis i.e. Rs. 0.8 million per month, until the matter is finally disposed. These amounts have been fully paid under protest.

In a related matter in respect of challenging the levy of entry tax on imported goods, on April 9, 2013 the Supreme Court of India ordered the deposit of 50% of the entry tax amount accrued until September 30, 2012, which amounted to Rs.1,196 million (\$17.9 million). The amounts were paid as per the court order. However, as the entry tax demand was also partially on the SEZ operation, the same was challenged separately before the High Court of Odisha, Cuttack wherein Vedanta paid 50% of the demand under protest as per the court order. The matter is pending adjudication. Meanwhile, the Government of Odisha notified its SEZ Policy 2015 in December 2015, exempting entry tax levy on SEZ operations and Vedanta is seeking exemptions relying on the same.

Furthermore, there was a demand of entry tax on March 26, 2012 for Rs. 727 million and interest of Rs. 492 million for the period from August 2007 to January 2012 on power business of the then SEL. Vedanta has paid the amount in accordance with the interim order of Supreme Court of India which was given pursuant to the holding of the Odisha High Court.

Vedanta is in compliance with the interim orders passed by the Supreme Court of India on both indigenous and imported goods. The challenges were heard by a nine judge bench of the Supreme Court and the court in its order rejected the compensatory nature of tax as a ground of challenge. The order maintains status quo with respect to all other issues which have been left open for adjudication by regular benches hearing the matters.

# Ravva Joint Venture Arbitration proceedings: Base Development Cost

The Ravva joint venture had received a notice from Ministry of Petroleum & Natural Gas, Government of India (GOI) for the period from 2000-2005 for USD 129 million for an alleged underpayment of profit petroleum to the Indian Government, out of which, Cairn India's share is USD 29 million plus potential interest at applicable rate (LIBOR plus 2% as per PSC).

This claim relates to the Indian Government's allegation that the Ravva JV had recovered costs in excess of the Base Development Costs ("BDC") cap imposed in the PSC and that the Ravva JV had also allowed these excess costs in the calculation of the Post Tax Rate of Return (PTRR). The Ravva joint operation partners (excluding ONGC) initiated arbitration proceedings and the arbitral tribunal announced its award on 18 January 2011, broadly allowing companies including Cairn India to recover

base development cost spent amounting to \$278 million and disallowed an over-run of \$22.3 million spent in respect of base development cost and directed 50.0% legal cost on the GoI. The High Court of Kuala Lumpur, on 30 August 2012, dismissed the GoI's application for setting aside the award with costs.. The GoI further filed an appeal before the Court of Appeal, Kuala Lumpur, which was dismissed on June 27, 2014. The GoI thereafter filed an application for a leave to appeal against the Court of Appeal's order before the Federal Court, which was dismissed by the Federal Court of Malaysia on 17 May 2016. Meanwhile, GoI issued a show-cause notice in this matter which Cairn India Limited replied to and subsequently also filed an application for enforcement of the award before the Delhi High Court as an additional measure of caution. The next hearing in the matter is scheduled for 15 February 2017. Additionally, on 14 August 2015, the GoI filed a suit and obtained an ex-parte 'stay-order' from the Delhi High Court against the determination of 'quantum of costs' by the arbitral tribunal. Cairn India filed an appeal before the Court against the 'stay order' and the 'stay-order' obtained by the GoI in this matter was set aside on 3 May 2016. The next hearing before the Court in the GoI's civil suit is scheduled for 21 April 2017. GoI has also filed an SLP before the Supreme Court against the Division Bench Order of the High Court, dated 3 May, 2016, setting aside the 'stay-order' obtained by the GoI, which is due for hearing on 31 January 2017

#### Proceedings, notices and enquires initiated by the Central Excise

The Central Excise department of the GoI had issued in June 2010 an ex-parte notice for reversal of Cenvat credit of Rs. 3,150 million (\$47.3 million) along with interest of Rs. 88 million (\$1.3 million) for the non-compliance of Rules 4(5a) and 4(6) of the Cenvat Credit Rules, in respect of non-return of job work challans for the period March 1, 2009 to September 30, 2009 within a stipulated time. In addition, it also alleged that Vedanta violated the advance license conditions from 2005 to 2009. In 2010, Vedanta filed four writ petitions WP No. 8123, 8135, 9744 and 9755 in the High Court of Madras against the Central Excise department along with an associated contempt petition. All the above petitions were heard on 29 July 2010 and pursuant to the order dated 8 June 2010, the High Court of Madras in relation to WP No. 8123, remanded the matter to be heard and determined afresh by a new set of officers of the Central Excise department. The High Court of Madras further granted a stay in relation to WP No. 8135 in so far as relates to job work challan matter and until a fresh enquiry was made. Further, pursuant to the order dated 29 April 2011 the High Court of Madras dismissed WP No. 9744, 9755 and the contempt petition.

The Central Excise department deputed the Assistant Commissioner of Central Excise to conduct an enquiry for the alleged non-compliance of Rules 4(5a) and 4(6) of the Cenvat Credit Rules in respect of non-return of job work challans. The Assistant Commissioner of Central Excise served a show cause notice on September 9, 2011. Vedanta filed a response before the Assistant Commissioner of Central Excise. After conducting a personal hearing, the Assistant Commissioner passed a favorable order on 1 January 2012 and dropped the entire demand for duty and interest. The department went into appeal before the Commissioner (Appeals) against this order, but the appeal was restricted only to the demand of interest. The Commissioner (Appeals) allowed the appeal on 25 February 2013 on the condition that interest would become applicable only in those cases where goods have not been sent back or cleared from the premises within 180 days from the date of dispatch from the Tuticorin unit. The verification whether any interest is payable or not has been completed and department raised the interest liability of Rs. 2.4 million which Vedanta has challenged before Tribunal on April 7, 2015 and the case has yet to be listed for hearing.

Vedanta filed two writ appeals no. 704 and 705 of 2011 in the High Court of Madras, Division Bench challenging the orders passed with respect to the writ petitions no. 8135 and 9744 of 2010. The writ petitions were admitted on August 1, 2011 and the Court ordered other party to maintain the status quo. In the meanwhile, the Commissioner of Customs Tuticorin issued a show cause notice in January, 2015 based on alleged violation of advance license conditions from 2005 to 2009 expressly mentioning that this show cause notice shall be kept pending and not be adjudicated unless and until directions are obtained from the High Court enabling such adjudication. The show cause notice also sought explaination as to why (i) a sum of Rs. 3,996.08 million along with interest for alleged violation of condition of export obligation should not be demanded as duties of customs; and (ii) the

quantity of 77,241.0 metric tonnes of copper should not be held liable for confiscation for violation of export obligation. Vedanta filed writ petition no. 626 of 2015 against this show cause notice, which was tied up with writ appeals no. 704 and 705 of 2011 and heard together. Thereafter, regular hearings took place in the High Court, and on 12 March 2015 the High Court gave an interim order, allowing one of the prayers in writ in form of injunction to the Directorate General of Foreign Trade actions in pursuit of the show cause notice received from customs department. During the course of the hearings, writ appeal no. 704 was withdrawn as it has become infructuous as it relates to the job work challan matter which has already been concluded.

Writ appeal no. 705 of 2011 and writ petition no. 626 of 2015 were heard on 11 March 2016, and were both dismissed in terms of the final judgment of the High Court dated 1 August 2016. The court held that it did not find any impediment to custom authorities issuing show cause notice on basis of material gathered / input received from excise authorities. The court also held that company shall respond to the show cause notice dated 13 January 2015 within two weeks from receipt of the order and directed the Commissioner of Customs to conduct proceedings as expeditiously as possible. Vedanta has filed a Special Leave Petition against the High Court's order before the Supreme Court. The final hearing before the Supreme Court on the Special Leave Petition, as well as the accompanying stay application is awaited.

# Ravva Joint Venture Arbitration proceedings involving Cairn India

The Ravva joint venture had received a notice from Ministry of Petroleum & Natural Gas, Government of India (GOI) for the period from 2000-2005 for USD129 million for an alleged underpayment of profit petroleum to the Indian Government, out of which, Cairn India's share is USD29 million plus potential interest at applicable rate (LIBOR plus 2% as per PSC).

This claim relates to the Indian Government's allegation that the Ravva JV had recovered costs in excess of the Base Development Costs ("BDC") cap imposed in the PSC and that the Ravva JV had also allowed these excess costs in the calculation of the Post Tax Rate of Return (PTRR). The Ravva joint operation partners (excluding ONGC) initiated arbitration proceedings and the arbitral tribunal announced its award on 18 January 2011, broadly allowing companies including Cairn India to recover base development cost spent amounting to \$ 278 million and disallowed an over-run of \$22.3 million spent in respect of base development cost and directed 50.0% legal cost on the GoI. The High Court of Kuala Lumpur, on 30 August 2012, dismissed the GoI's application for setting aside the award with costs. The GoI further filed an appeal before the Court of Appeal, Kuala Lumpur, which was dismissed on June 27, 2014. The GoI thereafter filed an application for a leave to appeal against the Court of Appeal's order before the Federal Court, which was dismissed by the Federal Court of Malaysia on 17 May 2016. Meanwhile, GoI issued a show-cause notice in this matter which Cairn India Limited replied to and subsequently also filed an application for enforcement of the award before the Delhi High Court as an additional measure of caution. The next hearing in the matter is scheduled for 15 February 2017. Additionally, on 14 August 2015, the GoI filed a suit and obtained an ex-parte 'stay-order' from the Delhi High Court against the determination of 'quantum of costs' by the arbitral tribunal. Cairn India filed an appeal before the Court against the 'stay order' and the 'stay-order' obtained by the GoI in this matter was set aside on 3 May 2016. The next hearing before the Court in the GoI's civil suit is scheduled for 21 April 2017. GoI has also filed an SLP before the Supreme Court against the Division Bench Order of the High Court, dated 3 May, 2016, setting aside the 'stay-order' obtained by the GoI, which is due for hearing on 31 January 2017.

Following various rounds of exchange of information, ONGC accorded its consent on July 8, 2016, agreeing to the extension of the PSC by 10 years, on the existing terms. On September 9, 2016, Court gave time to GoI to give their decision by October 14, 2016, and listed the matter for hearing on November 7, 2016. On November 7, 2016, the Court granted additional time to the GoI to submit its decision by January 6, 2017 and listed this matter for hearing on January 9, 2017. This matter did not come up for hearing on January 9, 2017 and is now listed for hearing on January 31, 2017. In the meantime, GoI has sought additional time until February 28, 2017 for taking a decision in this matter.

Writ petition filed in the Delhi High Court by Cairn India Limited relating to extension of tenure of the Production Sharing Contract for the Rajasthan block

Cairn India Limited filed a writ petition before the High Court of Delhi against the MoPNG, the DGH and ONGC regarding the extension of the tenure for the Production Sharing Contract ("PSC") for the RJ-ON-90/1 Block ("RJ Block").

The RJ Block PSC is valid until May 14, 2020. Consistent with the terms of the PSC, given that the RJ Block is also producing natural gas, Cairn India Limited has been requesting an extension of the tenure of the RJ Block PSC for a period of up to 10 years, i.e., until May 14, 2030. ONGC, Cairn India Limited's joint venture partner in the RJ Block, is technically aligned on the recoverable resources potential of the RJ Block beyond the PSC period, until the proposed extension period up to 2030. Cairn India Limited has been making regular requests to the MoPNG for extension of the tenure of the RJ Block PSC since the past few years. However, apart from seeking further technical and financial details, the MoPNG has not yet made a final decision in the matter.

With regards to the MoPNG's delay, a writ petition was filed by Cairn India Limited on December 11, 2015, seeking relief from the High Court of Delhi. During the Court hearing held on December 14, 2015, the MoPNG and DGH contended that no decision had been taken in the matter as the requisite data had not been provided by Cairn India Limited and ONGC. ONGC further contended that it had sought certain commercial particulars from Cairn India Limited which had not been furnished by Cairn India Limited. Through its order dated December 14, 2015, the High Court of Delhi ordered all parties to exchange the requisite information and documents to enable the GoI to make a decision in the matter. The High Court of Delhi imposed timelines on the parties for the exchange of information, namely the GoI, DGH and ONGC to seek data and information within four weeks, Cairn India Limited to provide the requisite information within two weeks thereafter, ONGC to review and revert with commercial alignment on the projects within six weeks thereon and the GoI to take a decision within three months from the date of consensus between Cairn India Limited and ONGC. Following the December 14, 2015 court order, information has been exchanged between Cairn India Limited and ONGC for obtaining ONGC's commercial alignment.

Notwithstanding the above, MoPNG's and ONGC's stance so far has been that due to insufficient data provided by Cairn India Limited, ONGC has not been able to conclude its commercial assessment. In view of this, the High Court of Delhi through its order dated April 5, 2016, ordered ONGC to give a final opportunity to Cairn India Limited to furnish the requisite documents within 2 weeks from the date of the aforesaid order and thereafter to make a final decision on commercial alignment within an additional 2 weeks, in order to enable the GoI to take its decision in the matter as per the timeline stated in the High Court of Delhi's order dated 14 December 2015. On 7 November 2016, the Court granted time to the GoI to submit its decision by 6 January 2017. The next date of hearing is scheduled on 9 January 2017, which has now been rescheduled for 31 January 2017. GoI has sought additional time until 28 Feburary 2017 from the court.

Writ petition filed in the Delhi High Court by Cairn India Limited relating to export of crude oil from RJ Block.

Cairn India Limited has filed a writ petition before the High Court of Delhi against the Directorate General of Foreign Trade ("DGFT"), the MoPNG, and Indian Oil Corporation Limited ("IOCL") for the export of crude oil from the RJ Block.

Due to its nature and composition, RJ Block crude has the potential to be valued higher by refineries in other markets, beyond the prices being received from the GoI nominated buyers, namely IOCL and private refiners Reliance Industries Limited and Essar Oil Limited. Since 2009, Cairn has been receiving bids from international buyers and refiners offering prices that are an additional US\$3-4 per bbl more than the domestic sale prices for RJ Block crude.

In accordance with the provisions of the RJ Block PSC and the applicable GoI policies for crude oil export, Cairn India Limited repeatedly requested IOCL and MoPNG to allow it to export RJ Block crude oil, to which there has been no firm response. Cairn India Limited also made written requests to the DGFT to intervene in the matter, which again proved unsuccessful.

In view of the aforesaid, Cairn filed a writ petition in the High Court of Delhi on December 11, 2015 to obtain relief in the form of orders to the DGFT, MoPNG and IOCL for approvals and authorizations to permit and facilitate the export of RJ Block crude oil, to the extent GoI nominated buyers are unable to cover the entire production. Through its order dated December 14, 2015, the High Court ordered the MoPNG, DGFT and IOCL to obtain necessary instructions on whether the GoI was willing to pick up the entire crude oil production from the RJ Block, or in the alternative was ready to grant permission to Cairn to directly export the crude oil not covered by the GoI nominees.

The GoI's stance thus far has been to deny Cairn India Limited's request for export, although it has yet to present its complete arguments to the High Court of Delhi justifying such denial. Relying on the lack of consent from the GoI, DGFT also rejected Cairn's request for export permission on February 16, 2016. During the course of arguments, the High Court of Delhi disagreed with GOI's observations on the construct of Article 18 and observed that there was no embargo on export neither in the PSC nor in the policy. On October 18, 2016, the writ petition was dismissed with liberty to refer the matter to dispute resolution as per PSC. Cairn has filed an appeal before the division bench of the High Court.

# Shenzhen Shandong Nuclear Power Construction Co. Limited has commenced arbitration proceedings against Vedanta

On March 19, 2012, Shenzhen Shandong Nuclear Power Construction Co. Limited ("SSNP") filed a petition before the Bombay High Court under section 9 of the Arbitration and Conciliation Act, 1996, that Vedanta had suppressed the fact that it had failed to obtain environmental clearances in relation to a 210 MW co-generation power plant for a refinery expansion project at Lanjigarh and further alleged the non-payment of dues for construction and other services in relation to the same. This was subsequent to SSNP's notice for termination of the contract dated February 25, 2011 and legal notice dated February 23, 2012 for recovery of its alleged dues. SSNP also made a request for interim relief. Under the petition, SSNP sought for a restraining order on encashment of the advance bank guarantee, injunction from disposing or creating third party right over plant and machinery at the project site and security for the amount due under the contract. During the pendency of the petition, SSNP invoked arbitration by way of a notice dated April 18, 2012. SSNP sought an award for the sums of Rs. 4472.11 million, USD 2380million and Euro 121 million. On April 25, 2012, the High Court of Bombay dismissed SSNP's petition. SSNP appealed against this order before a division bench of the High Court of Bombay, which, by its order of December 12, 2012 ordered Vedanta to deposit a bank guarantee for an amount of Rs. 1,870 million (\$28.2 million) until completion of the arbitration proceedings.

On April 5, 2013, Vedanta also filed a counterclaim for delays in operations caused arguing that SSNP was responsible. Subsequently SSNP filed an application for an interim award of Rs. 2,020 million (\$30 million) before the arbitral tribunal, which was not allowed. The proceedings are ongoing and the final hearing is scheduled for March 2017.

## Proceedings against TSPL relating to its delay in commissioning various units of the power plant

TSPL entered into a long term power purchase agreement with the Punjab State Power Corporation Limited ("PSPCL") for supply of power. TSPL has a contractual obligation to commence commercial operation of various units of the power plant according to the scheduled timelines agreed in terms of the agreement. However, there were delays in implementing the project as compared to the scheduled timelines under the agreement. TSPL received letter from PSPCL, seeking payment of liquidated damages of Rs.3,176.42 million (\$47.9 million) for each delay in commissioning of Units I, II and III totaling Rs.9,529.25 million (\$143.8 million).

Subsequently, PSPCL invoked the bank guarantee of Rs. 1,500 million (\$22.6 million) towards payment of the liquidated damages on account of delay in completion of the commissioning of Unit I. TSPL filed a petition with the Punjab State Electricity Regulatory Commission ("PSERC") for quashing of the claim of liquidated damages and grant of extension of time to complete the commissioning of various units of the power plant. It claimed that the highlighted delays arose due to PSPCL's delay in the fulfilment of certain obligations under the power purchase agreement, such as those in relation to procuring interconnection and transmission facilities and arranging supply of adequate quantity of fuel for the project, as well as other force majeure reasons. On 22 October 2014, PSERC ordered the matter to be settled through arbitration and the Punjab & Haryan high court allowed the stay on encashment of bank guarantee allowed the stay on encashment of the bank guarantee until further orders. PSPCL submitted an appeal in Appellate Tribunal for Electricity (APTEL) against the PSERC order and on May 13, 2015, APTEL disposed the appeal by directing that the matter will be adjudicated by an arbitral tribunal. The proceedings are ongoing and are listed for arguments on 24 January 2017 and 25 January 2017.

## Proceedings against TSPL relating to mega power project benefits

Sterlite Energy Limited (now Vedanta Limited) ("SEL") submitted its bid for setting up a 1980 MW thermal power plant in the state of Punjab under a tariff based international competitive bidding process under a Case-II competitive bidding mechanism on June 2008, which was ultimately awarded to SEL. A power purchase agreement (PPA was entered between TSPL and PSEB on September 2008, which is now known as PSPCL. According to the power purchase agreement, any increase or decrease in the capital cost of the project on the occurrence of any "Change in Law" (as defined therein) after the cut-off date of June 16, 2008, had to be passed on to PSPCL.

Because TSPL intended to sell all of the generated electricity to the state of Punjab, it did not meet one of the requirements for the mega power project at the time of bidding, namely that the project had to sell electricity to more than one state. However, the said requirement was amended in October 2009, making TSPL eligible for the mega power project status. Accordingly, TSPL was given the mega power project status in 2010 and thereafter has been receiving the customs and excise exemption.

In July 2013, PSCPL filed a petition before the PSERC, alleging that a TSPL had become entitled to the mega power project status after the cut-off date, the mega power project benefits received by TSPL had to be passed on to PSPCL pursuant to the power purchase agreement's "Change in Law" clause. TSPL in its reply stated that as of the cut-off date, similar benefits were available to it under India's the foreign trade policy as a non-mega power project and accordingly, that its economic position had not altered pursuant to the grant of mega power project status to warrant the passing on of such benefits to PSPCL. TSPL has also produced a number of approval letters issued by various Director General of Foreign Trade offices across India, which extended such benefits to non-mega power projects including government power projects or other public sector undertakings.

PSERC passed an order dated December 2, 2014, holding against TSPL. TSPL thereafter filed an appeal on January 2015 along with a stay application before the APTEL, challenging the order of PSERC. The stay application was rejected by APTEL without considering the submissions of TSPL. TSPL then filed a stay application before the Supreme Court, appealing against APTEL's order on the stay application. The Supeme Court granted a stay on April 24, 2015 and subsequently on July 28, 2015, the Supreme Court ordered the stay to continue until given any further orders. The next hearing is scheduled for 19 January 2017.

# Cairn received a show cause notice from the Indian tax authorities for not withholding tax on payments made while acquiring a subsidiary

In March 2015, Cairn India Limited received a notice from the Indian Tax Authorities ("Tax Authorities") alleging failure by Cairn India Limited to withhold tax on the consideration paid to Cairn UK Holdings Limited ("CUHL") on a transaction which took place in the year 2007-08. The said transaction relates to the acquisition of the shares of Cairn India Holdings Limited ("CIHL"), a 100%

subsidiary of Cairn India Limited as of 30 September 2016, from CUHL during the financial year 2006-2007 as a part of group reorganization by the then ultimate parent company Cairn Energy Plc. Based upon the retrospective amendment(s) made in the year 2012 by inserting explanation 5 of section 9(1)(i) of the Income Tax Act, 1961, the Tax Authorities vide its order dated March 11, 2015, raised a demand of approximately Rs.204,947 million (\$3,074.5 million) comprising tax of approximately Rs.102,474 million (\$1,537.3 million) and interest of an equivalent amount) for not withholding tax on the consideration paid to CUHL, for shares of CIHL. The Tax Authorities stated in the said order that a short term capital gain of Rs. 245,035 million (\$3,676 million) accrued to CUHL on transfer of the shares of CIHL to Cairn India Limited in financial year 2006-2007, on which tax should have been withheld by Cairn India Limited. Cairn India Limited understands that a tax demand has also been raised by the Tax Authorities on CUHL with respect to taxability of alleged capital gain earned by CUHL.

In this regard, Vedanta Resources Plc. filed a Notice of Claim against the GoI under the UK-India bilateral investment treaty in order to protect its legal position and shareholder interests. Management was advised that Vedanta Resources Plc. has a good case to defend as per provisions of UK-India bilateral investment treaty, the benefit of which would ultimately accrue to Cairn India Limited. Further, Cairn India Limited has sought independent advice on this issue and has been advised that there could be no liability on Cairn India Limited for the failure to withhold the taxes in the year 2006-07 based on provisions of law prevailing at the time of transaction as the aforesaid retrospective amendment has cast an impossible obligation on Cairn India Limited to deduct tax by having to predict and anticipate that the retrospective amendment will be made by the legislature on a future date. Cairn India Limited has approached the Hon'ble Delhi High Court against the said order and also filed an appeal before the Commissioner of Income Tax (Appeals) to defend its position. The next hearing date before Delhi High Court is scheduled on 23 January 2017.

# Class actions against KCM on behalf of Zambian nationals

Two separate proceedings were issued in England and Wales by two English law firms, Hausfeld and Leigh Day, on behalf of Zambian nationals who allege that they have suffered loss and damages as a result of KCM's operation of the Konkola copper mine.

One 31 July 2015, Leigh Day issued proceedings on behalf of 1813 individual claimants from the Shimulala, Kakosa, Hellen and Hippo Pool communities in the Chingola district in Zambia. The allegations made against the Company and KCM pertain to alleged incidents occurring over an 11 year time period and include claims of personal injury, significant pollution, environmental damage and claims for aggravated and exemplary damages and for injunctive relief. These allegations are currently being investigated by KCM. There has been no hearing or proceeding in any court on the merits of any of these claims to date, none has been scheduled, and the amount of the claims has not been specified.

The Company and KCM have challenged the jurisdiction of the High Court of Justice of England and Wales, *inter alia*, on the basis that (a) there are already existing proceedings in Zambia which have been brought by multiple claimants against KCM in respect of the operation of the Konkola copper mine, (b) some of the claimants have already brought claims in Zambia, (c) the Konkola copper mine is situated, operated and regulated by Zambian regulators pursuant to Zambian law, (d) it is where KCM, the operator of the mine, is domiciled, (e) it is where the minority shareholder of KCM (controlled by the Government of the Republic of Zambia) is domiciled, (f) it is where the claimants are situated; (g) it is where the damage is alleged to have occurred, (h) it is the where the relevant witnesses are based, the relevant evidence is based, and (i) it is Zambian law which applies to these claims and Zambia has a fully functional legal system which can also accommodate group actions (or class actions) claims.

On 28 May 2016, the English High Court of Justice, Queen's Bench Division, Technology and Construction Court released a judgment disallowing the applications from the Company and KCM, respectively, ruling that the English courts have jurisdiction to hear and adjudicate the claims. The Company and KCM were granted permission to appeal the order before the Court of Appeal which has been allowed. The hearing for the appeal has been fixed for the first week of July 2017.

Hausfeld issued a claim form on 16 July 2015 in the Queen's Bench Division on behalf of 347 claimants in relation to alleged pollution from the Konkola copper mine which was alleged to have led to, amongst other things, personal injury. Whilst no particulars of claim were produced, the claims by Hausfeld appeared to cover materially the same facts and matters as those which form the substance of the claim being brought against the Company and KCM by Leigh Day (referred to above). It subsequently became clear that Leigh Day and Hausfeld were claiming to act for some of the same claimants and, following a case management conference in the English High Court on 24 November 2015, it appears to have been established between Leigh Day and Hausfeld that those "overlapping" claimants wished to instruct Leigh Day rather than Hausfeld, increasing the number of claimants represented by Leigh Day to 1826. The Hausfeld claim form was therefore allowed to lapse without service. That claim on behalf of 347 claimants is therefore at an end.

On 25 January 2016, Hausfeld informed the High Court that they are assessing the viability of potential new claims relating to alleged environmental pollution against KCM and Vedanta, involving 1,099 individuals in the Copperbelt region in Zambia. Hausfeld told the Court that the alleged pollution appeared to emanate from a different source than that which is the subject of the Leigh Day claim, though Hausfeld have indicated that they are awaiting the outcome of Vedanta and KCM's jurisdiction challenges in the Leigh Day claim (referred to below) before deciding whether to pursue those claims. Hausfeld have not yet commenced pre-action correspondence, or taken any other steps, in respect of those potential new claims.

The claim amount is not currently quantifiable.

# Proceedings against KCM by Zambia Consolidated Copper Mines Investment Holdings

KCM and its shareholder, majority State-owned Zambia Consolidated Copper Mines Investment Holdings (ZCCM-IH) have been engaged in discussions with regard to the price participation settlement agreement entered into in December 2012 ("Price Participation Agreement"). In June 2016, ZCCM-IH filed a claim before the English High Court of Justice, Queen's Bench Division, Commercial Court in relation to alleged outstanding amounts pursuant to the terms of the settlement agreement. The Court handed down a judgment on 16 December 2016, allowing ZCCM-IH's application and ruling that \$103,327,244 including contractual interest is payable to ZCCM. ZCCM's application for additional sums under the settlement agreement will be subject to a hearing post March 2017. KCM and ZCCM-IH have engaged in settlement discussions about the payment and have filed a consent order before the court on 13 January 2016.

# **Sustainability**

In fiscal year 2012, Vedanta introduced a series of policies and technical and management standards (the "Sustainability Framework") aligned to international sustainability standards, such as the International Finance Corporation Performance Standards, the International Council on Mining and Metals Sustainable Development Framework and the United Nations Global Compact Principles. In fiscal year 2013, Vedanta took further steps to implement the Sustainability Framework by requiring its operating subsidiaries to have clear action plans in place with supporting documentation to guide them to further implement the Sustainability Framework, based on self-assessment. In addition to the self-assessment requirement, Vedanta has also adopted an evaluation and internal assurance process and programmes to train and develop its employees and contractors in the Sustainability Framework.

In fiscal year 2015, Vedanta introduced safety performance standards, formal safety risk assessment, industrial hygiene baseline assessment and safety leadership coaching. In fiscal year 2016, Vedanta incorporated safety performance standards into executive remuneration. These standards now form integral part of internal assurance process, known as Vedanta Sustainability Assurance Program (VSAP) and the businesses performance is tracked against these standards on regular basis.

Vedanta's Board, particularly the Sustainability Committee, is responsible for ensuring the implementation of the Sustainability Framework and to otherwise assist the Board in meeting its responsibilities in relation to sustainability related matters arising out of the activities and operations of Vedanta. See "Management — The Board — Sustainability Committee". The committee which is headed by independent director meets on a quarterly basis and takes stock of Vedanta's sustainability performance and provides guidance on related strategic and policy decisions.

As of 31 December 2016, 100% of existing & running operations are certified to ISO 14001 and OHSAS 18001 standards. Further 44 plants are certified to ISO 9001, 17 plants are certified to ISO 50001 and 10 plants are certified to SA 8000. Vedanta procures required approvals from suppliers and the local community, before it sources its raw materials for its operations.

In its effort to promote health and safety, Vedanta has adopted the Experience Based Risk Quantification & Bow Tie and Making Better Risk Decision approach to enhance its risk assessment, incident investigations and decision making capabilities. Additionally, Vedanta has adopted Consequence Management technique to instill discipline amongst people and avoid repeat incidents. Despite three employee fatilities in fiscal year 2017, Vedanta's target is to eliminate fatalities.

During fiscal 2017 Vedanta engaged an independent agency to conduct a stability assessment of some of its large structures including the tailing dams and fly ash ponds. Vedanta has a tailing dam related business risk as a part of its group risk register and its businesses regularily provide updates.

Vedanta's operations are aligned with regulatory requirements, as applicable, such as the IFC performance standards. With recent developments in relation to climate change and environment protection, Vedanta is in the process of updating its policies and is taking steps to implement measures for environment protection, such as conservation of forests and biodiversity enhancement. Vedanta also engages with third party consultants to effectively mitigate, manage and resolve environment pollution, if any, in locations where it operates.

As of 30 September 2016, Vedanta employed, directly or through contractors, more than 70,000 people. During fiscal year 2016, Vedanta held more than 4,100 stakeholder engagement meetings and approximately 250 partnerships with non-governmental organisations, academic institutions, governments and government bodies were in place.

Vedanta also develops local infrastructure, including roads, sanitation, education and medical facilities, in the communities where it operates, investing \$37 million during fiscal year 2016 to provide support for schools, hospitals, health centres and farmers which benefited approximately 2.25 million people.

Additionally, Vedanta paid \$3.2 billion to the various governments during fiscal year 2016 through direct and indirect taxes, royalty and oil tax.

# **Indian Regulatory Matters**

# Mining Laws

The MMDR Act, the Mineral Concession Rules, 1960 of India, as amended, and the Mineral Conservation and Development Rules, 1988 of India, as amended governs the mining rights and operations of mines in India. The MCD Rules outline the procedures for obtaining a prospecting

license or the mining lease, the terms and conditions of such licenses and the model form in which they are to be issued. The GoI announced the National Mineral Policy in 1993 which was replaced by the National Mineral Policy of 2008 ("NMP 2008"). NMP 2008 provides for a change in the role of the GoI and the state governments to incentivize private sector investment in exploration and mining and for ensuring level playing field and transparency in the grant of concessions and promotion of scientific mining within a sustainable development framework so as to protect the interest of local population in mining areas. The Mines and Minerals (Development and Regulation) Amendment Act, 2015 was promulgated on March 27, 2015 and has brought about significant changes in the legal regime for the mining sector including defining bauxite, iron ore, limestone and manganese ore as notified minerals, creation of a new category of mining license i.e. the prospecting license-cum-mining lease, grant of mining lease for a period of 50 years for all minerals other than coal, lignite and atomic minerals, establishment of District Mineral Foundation for the benefit of persons in districts affected by mining related operations, auction of notified and other minerals by competitive bidding, including e-auction etc. The MMDR Act was further amended by the Mines and Minerals (Development and Regulation) Amendment Act, 2016 which permits the transfer of captive mine leases (granted before January 12, 2015) without having to go through an auction processed and also allows the dumping of waste outside of the mining area by including dumping sites within the definition of lease area. The amendment received presidential assent on May 6, 2016.

Working conditions of mine laborers are regulated by the Mines Act, 1952, as amended ("Mines Act") and it sets forth standards of work, including number of hours of work, leave requirements, medical examination, weekly days of rest, night shift requirements and other requirements to ensure the health and safety of mine workers. The Mines (Amendment) Bill, 2011 proposes several amendments to the Mines Act, including significant enhancement to the monetary penalties and terms of imprisonment for violations.

#### Oil and Gas Laws

The MoPNG is the principal regulator of oil and natural gas exploration and production in India. The MoPNG established the Directorate General of Hydrocarbons in 1993 to promote the sound management of Indian petroleum and natural gas resources with due regard to the environmental, safety, technological and economic aspects of petroleum activities. The Directorate General of Hydrocarbons is responsible for, *inter alia*, ensuring correct reservoir management practices, reviewing and monitoring exploratory programs, the development plans of oil companies, and monitoring the production and the optimal utilization of gas fields.

The MoPNG oversees the Oil Industry Safety Directorate, which develops standards for safety, fire-fighting, training programs and information dissemination, and conducts periodic safety audits of all petroleum-handling facilities. It also oversees the Oil Industry Development Board, which provides financial and other assistance for the conductive development of the oil industry. The safety standards prescribed by the Oil Industry Safety Directorate, and the safety regulations prescribed by the Directorate General of Mines Safety in respect of onshore petroleum mining installations, must be complied with.

Oil and natural gas exploration activities are governed by The Oilfields (Regulation and Development) Act, 1948, as amended ("ORDA Act"). This legislation provides for the regulations of oilfields and for the development of mineral oil resources, including natural gas and petroleum. The ORDA Act empowers the GoI to frame rules on the granting of mining leases and petroleum exploration or prospecting licenses, the conservation and development of mineral oils, the production of oil, and the regulation of oilfields.

The Petroleum Exploration License and Petroleum Mining Lease under the Petroleum and Natural Gas Rules, 1959, as amended ("PNG Rules") provide the framework for the granting of petroleum exploration licenses and petroleum mining leases. The PNG Rules prohibits the prospecting or exploitation of any oil or gas unless a license or lease has been granted under the PNG Rules. A

petroleum mining lease entitles the lessee to an exclusive right to extract oil and gas from the relevant contract area. Petroleum exploration licenses and petroleum mining leases are granted by the MoPNG for offshore areas and by the relevant state governments, with the prior approval of the GoI, for onshore areas.

The Territorial Waters, Continental Shelf, Exclusive Economic Zone and other Maritime Zones Act, 1976, as amended regulates the exploration and exploitation of resources of the continental shelf and exclusive economic zone.

The Essential Commodities Act, 1955, as amended makes provisions controlling the production, supply and distribution of certain essential commodities, which include petroleum and petroleum products.

The Petroleum Act, 1934, as amended ("Petroleum Act") provides that no person shall produce, refine, blend, store or transport petroleum except in accordance with the rules framed by the GoI under the Petroleum Act. The Petroleum Rules, 2002, as amended now regulate these activities.

The Petroleum and Natural Gas Regulatory Board Act, 2006, as amended provides for the establishment of the Petroleum and Natural Gas Regulatory Board. The board regulates the refining, processing, storage, transportation, distribution, marketing and sale of petroleum products and natural gas (excluding production of crude oil and natural gas).

The Petroleum and Minerals Pipelines (Acquisition of Right of User in Land) Act, 1962, as amended provides the framework governing the acquisition of right of user in land for laying pipelines for the transportation of petroleum and minerals and other matters connected therewith. This law is limited to the acquisition procedure, restrictions on use of land and compensation payable to the persons interested in the land.

The MoPNG through its notification no. O-32011/4/2013-ONG-I dated March 30, 2016 introduced a new exploration and licensing policy named Hydrocarbon Exploration and Licensing Policy ("HELP"). This is a fundamental change in the Indian oil and gas sector, which introduces a new contractual and fiscal model for the award of hydrocarbon acreages. Four main facets of HELP are: single license, open acreages, revenue sharing model and marketing and pricing freedom.

The MoPNG through its notification no. O-22013/27/2012-ONG-D-V(Vol-II) dated March 21, 2016 introduced the policy for marketing including pricing freedom for the gas to be produced from discoveries in deepwater, ultra-deepwater and high pressure temperature areas. This policy is applicable to all discoveries in deep water/ultra-deep water/high temperature-high pressure areas which are yet to commence commercial production as of January 1, 2016 and to all future discoveries in such areas. As per the policy the producers will be allowed marketing freedom including pricing freedom subject to a ceiling price on the basis of landed price of alternative fuels.

## Power Sector

Under the Electricity Act, 2003, as amended ("Electricity Act"), transmission and distribution of, and trading in, electricity require licences from the appropriate Central or State Electricity Regulatory Commissions (respectively, "CERCs" and "SERCs", and collectively, "ERCs"), unless exempted in accordance with the Electricity Act. CERC has jurisdiction over generating companies owned or controlled by the GoI or which have a composite scheme for generation and sale in more than one State. SERCs have jurisdiction over generating stations within State boundaries, except those under CERC's jurisdiction. The respective ERC determines the tariff for supply of electricity from a generating company to a licencee, transmission, wheeling, and retail sale of electricity. The Electricity Act was amended in 2007 to exempt captive power generation plants from licencing requirements.

The Electricity Act allows generating companies open access to transmission lines. The provision of open access is subject to the availability of adequate transmission capacity as determined by the Central or State Transmission Utility. Under the Electricity Act, ERCs determine tariff for supply of electricity by a generating company (as well as for transmission, wheeling and retail sale of electricity).

The Electricity (Amendment) Bill 2014 seeks to segregate the distribution network business and the electricity supply business, and introduce multiple supply licensees in the market. The Bill introduces a supply licensee who will supply electricity to consumers. The distribution licensee will maintain the distribution network and enable the supply of electricity for the supply licensee.

#### Environmental Laws

Vedanta's business is subject to environmental laws and regulations. The applicability of these laws and regulations varies from operation to operation and depends on jurisdiction in which Vedanta operates. Vedanta's operations require environmental and other permits covering, amongst other things, water use and discharges, stream diversions, solid waste disposal and air and other emissions. Major environmental laws applicable to Vedanta's operations, as amended from, include the Environment (Protection) Act, 1986, Forest (Conservation) Act, 1980 of India as amended, and the Forest Conservation Rules, 2003, Hazardous Wastes (Management and Handling) Rules, 1989 of India, Water Act, Water (Prevention and Control of Pollution) Cess Act, 1977, Air Act, The Coal Mines (Nationalization) Act, 1973, or Coal Nationalization Act, Coking Coal Mines (Nationalization) Act, 1972, Coal Mines (Taking Over of Management) Act, 1973, Coking Coal Mines (Emergency Provision) Act, 1971, Coal Bearing Areas (Acquisition and Development) Act, 1957, Coal Mines (Conservation and Development) Act, 1974 and the New Coal Distribution Policy, 2007.

The Environmental Protection Act, 1986, the Water (Prevention and Control of Pollution) Act, 1974 and the Air (Prevention and Control of Pollution) Act, 1981 provide for the prevention, control and abatement of pollution. Pollution control boards have been set up in states in India to exercise the powers under these statutes to prevent and control pollution. Companies must obtain the clearance of state pollution control boards before emitting or discharging effluents into the environment.

In case the project value exceeds Rs. 1 billion for a new project or Rs. 500 million for the expansion of existing oil and gas exploration and production project, the project also requires the approval of the Ministry of Environment and Forest.

The Hazardous Waste (Management and Handling) Rules, 1989 was superseded by the Hazardous Wastes (Management, Handling and Transboundary Movement) Rules, 2008 which came into force on September 24, 2008. The 2008 Rules was also superseded by the Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 ("HWMTM Rules 2016"). The HWMTM Rules 2016, as amended, encourages disposal of waste farther away from the source of generation. It promotes transboundary movement of hazardous wastes.

# Employment and Labor Laws

Vedanta is subject to various labor, health and safety laws which govern the terms of employment of Vedanta's laborers at the mining and manufacturing facilities, their working conditions, the benefits available to them and the general relationship between the management and such laborers. These include the Industrial Disputes Act, 1947, Factories Act, 1948, Contract Labor (Regulation and Abolition) Act, 1970, Employee State Insurance Act, 1948, Payment of Wages Act, 1936, Minimum Wages Act, 1948, Workmen's Compensation Act, 1923, Payment of Gratuity Act, 1972, Payment of Bonus Act, 1965, and Employees' Provident Funds and Miscellaneous Provisions Act, 1952.

### Other Laws

In addition to the above, Vedanta is required to comply with the provisions of the Companies Act, 2013, as amended, Companies Act, 1956, to the extent applicable, and rules framed thereunder and other applicable statutes imposed by the central or the state government and authorities for the day-to-day business and operations. Vedanta is also subject to various central and state tax laws.

Moreover, there are various rules and regulations which are framed and amended from time to time by the SEBI in order to regulate the functioning of the securities market, which we are required to comply with. Vedanta is also required to comply with the Foreign Exchange Management Act, 1999 and the rules and regulations made thereunder, which primarily governs foreign investment in India.

# Regulation of Foreign Investment

Foreign investment in India is governed primarily by the provisions of the Foreign Exchange Management Act, 1999, as amended (FEMA) which relates to regulation primarily by the Reserve Bank of India (RBI) and the rules, regulations and notifications thereunder, and the policy prescribed by the Department of Industrial Policy and Promotion, Government of India, which is regulated by the Foreign Investment Promotion Board. The FEMA regulates transactions involving foreign exchange and provides that certain transactions cannot be carried out without the general or specific permission of the RBI.

Dividends are freely repatriable without any restrictions (net after Tax deduction at source or Dividend Distribution Tax, if any, as the case may be). The repatriation is governed by the provisions of the Foreign Exchange Management (Current Account Transactions) Rules, 2000, as amended from time to time.

Further, RBI has placed certain restrictions and conditions for the use of debt funds in India which are raised in the overseas market by overseas holding/group companies of Indian companies where such Indian companies account for sole/major operations of the group. Indian companies are also not allowed to issue any direct or indirect guarantee or offer any security in any form for borrowings by their overseas holding/group companies.

# **MANAGEMENT**

The following table sets forth certain information regarding Vedanta's Directors and executive officers and senior management as of 30 September 2016.

Name	Nationality	Age	Position
<b>Board of Directors</b>			
Anil Agarwal	Indian	64	Executive Chairman
Navin Agarwal	Indian	55	Executive Vice Chairman
Tom Albanese <sup>(2)</sup>	American	59	Chief Executive Officer
Geoffrey Green	British	67	Non-Executive Director
Aman Mehta	Indian	70	Non-Executive Director
Deepak Parekh	Indian	72	Non-Executive Director
Ekaterina (Katya) Zotova	Dutch	38	Non-Executive Director
Ravi Rajagopal	British	61	Non-Executive Director
<b>Executive Committee</b>			
Tarun Jain	Indian	53	Director of Finance and Director, Vedanta Limited
Arun Kumar GR	Indian	45	Chief Financial Officer and Whole Time Director <sup>(1)</sup> , Vedanta Limited
Dilip Golani	Indian	47	Director, Management Assurance
Roma Balwani	Indian	64	President — Group Communications, Sustainability and Corporate Social Responsibility
Samir Cairae	Indian	52	Chief Executive Officer of
			Diversified Metals (India)
Steven Din	British	50	Chief Executive Officer and Director, KCM
P. Ramnath	Indian	58	Chief Executive Officer, Copper Business
Sunil Duggal	Indian	54	Chief Executive Officer, HZL
Deshnee Naidoo	South Africa	41	CEO Zinc Internaltional & CMT
Abhijit Pati	Indian	52	Chief Executive Officer, Aluminium
Rajagopal Kishore Kumar	Indian	51	Chief Executive Officer, Iron Ore
Sudhir Mathur	Indian	56	Acting Chief Executive Officer and Chief Financial Officer — Cairn India
Ajay Kumar Dixit	Indian	56	Chief Executive Officer, Power
Mansoor Siddiqi	Indian	60	Group Director — Projects

<sup>(1)</sup> A "Whole Time Director" is a Director who is employed full-time in rendering services to the management of the company with respect to which he is a Director. An individual can be a Whole Time Director with respect to only one company, although he or she may accept the position of non-whole time director in other companies.

<sup>(2)</sup> Tom Albanese is also a member of the Executive Committee.

# **Directors and Senior Management**

Other than those interests and relationships disclosed in "Principal Shareholders" and "Related Party Transactions", no conflicts of interest exist between the private interests of the management team and the interests of the Company.

### **Directors**

The Company's Board is chaired by Mr. Anil Agarwal. The other members of the Board are Messrs. Navin Agarwal, Tom Albanese, Geoffrey Green, Aman Mehta, Deepak Parekh, Ekaterina (Katya) Zotova and Ravi Rajagopal. The business address of each of the Directors is 16 Berkeley Street, London WIJ 8DZ.

#### Executive Directors

Mr. Anil Agarwal founded Vedanta in 1976 and has over three decades of entrepreneurial and mining experience. He has helped to shape Vedanta's strategic vision and under his leadership, Vedanta has grown from an Indian domestic miner into a global natural resources group with a world class portfolio of large, diversified, structurally low-cost assets which are capable of generating strong cash flow.

Mr. Navin Agarwal has over 25 years of senior management experience within Vedanta and is currently the Chairman of the Company's principal subsidiary Vedanta Limited and Cairn India Limited. He is the Chairman of Vedanta's Human Resources Council and has championed personnel training and development initiatives to grow the talent pipeline for senior management succession planning within Vedanta. He has also been instrumental in promoting a culture of continuous improvement in business processes and nurtured the Management Assurance practice across Vedanta. He is a member of the Procurement, Marketing and Sustainable Development and Communications Advisory Committees. Mr Agarwal was formerly the Chairman of the Executive Committee until 31 August 2013.

Mr. Tom Albanese is the Chief Executive Officer of Vedanta Resources plc, a leading global diversified resources company listed on the London Stock Exchange, with metals and mining, oil and gas, and commercial power operations primarily in India and Africa. In addition, Tom is the Chief Executive Officer of Vedanta Limited and Chairman of Konkola Copper Mines, both subsidiaries of Vedanta Resources plc. Tom brings a wealth of mining experience from Rio Tinto, the second largest global diversified mining company, where he was appointed a member of the Rio Tinto Board in March 2006 and the Chief Executive for the period between May 2007 and January 2013. For the period June 2009 — June 2015, Tom served on the Board of Visitors for the Fuqua School of Business at Duke University in North Carolina. In August 2013, Tom was appointed to the Board of Directors of Franco Nevada Corporation, a Toronto-based gold-focused royalty and metal streaming company with assets around the world. In March 2016, Tom was appointed as Co-Chair of the Confederation of Indian Industry (CII) National Committee on Mining for the year 2016 - 2017. Tom was conferred with the 'Mining Foundation of the Southwest' 2009 American Mining Hall of Fame Award, for his dedication, knowledge, leadership and inspiration to his peers in the mining industry. Tom holds a Bachelor's degree in Mineral Economics and a Master's in Mining Engineering from the University of Alaska.

# Non-Executive Directors

Mr. Aman Mehta is currently a Non-Executive Director of Jet Airways (India) Limited, Tata Consultancy Services Limited, PCCW Limited, Wockhardt Limited, Max Financial Services Limited, Godrej Consumer Products Limited Cairn India Limited and HKT Limited, Hong Kong. He is also a member of the Board of Governors of the Indian School of Business in Hyderabad, India. Mr Mehta had an long career spanning over three decades at Hong Kong and Shanghai Banking Corporation (HSBC) where he held a number of executive positions such as chairman and chief executive officer

of HSBC USA Inc, deputy chairman of HSBC Bank, Middle East and chief executive officer of HSBC Asia Pacific, a position he held until his retirement. He was also previously a non-executive director of Raffle Holdings Ltd, ING Group N.V. and a director of the Indian Council for research on international economic relations. Mr Mehta has a degree in economics from Delhi University. His strong financial background and global executive experience have been beneficial in providing effective oversight through rigorous challenge to the Board and the Audit Committee. He was appointed as a director of Vedanta in November 2004 and is the Chairman of Vedanta's Audit Committee and is also a member of Vedanta's Nomination and Remuneration Committee.

Mr. Geoffrey Green was a partner of the leading international law firm, Ashurst LLP from 1983 to 2013 and served as Ashurst's senior partner and chairman of its management board for 10 years until 2008. He was subsequently appointed as head of the firm's expanding Asian practice from 2009 to 2013, based in Hong Kong. Mr Green is currently also the non-executive chairman of the Financial Reporting Review Panel, one of the main subsidiary bodies of the Financial Reporting Council. Mr Green has a wealth of knowledge in respect of UK corporate governance, regulatory and strategic matters, having been an adviser to several major UK listed companies and their boards on a wide variety of corporate and governance issues. He has a degree in law from Cambridge University and qualified as a solicitor at Ashurst LLP. He was appointed as a director of Vedanta in August 2012 and is the Chairman of the Company's Remuneration Committee. He is also a member of the Audit Committee.

Mr. Deepak Parekh is the chairman of Housing Development Finance Corporation, India's leading financial services conglomerate with a presence in banking, asset management, life insurance, general insurance, real estate, venture funds and education loans. He is the non-executive chairman of GlaxoSmithkline Pharmaceuticals and Siemens, in India. Mr Parekh also serves as a director on the Boards of Exide, Mahindra & Mahindra, Indian Hotels and the international Board of DP World in the UAE. In addition, he is on the advisory boards of several Indian and multinational corporations. Mr Parekh was the first international recipient of the Institute of Chartered Accounts in England and Wales outstanding achievement award in 2010. He was appointed a director of Vedanta in June 2013 and is a member of Vedanta;s Audit Committee, Remuneration and Nomination Committees.

Ms. Katya Zotova has a wide range of commercial experience in the oil & gas industry including strategy, portfolio management, finance and mergers and acquisitions. She was a Principal at L1 Energy LLP. Prior to this, Ms Zotova was Head of International Acquisitions and Divestments for Citigroup's oil and gas division focusing on oil majors and national oil companies. She has also previously held a variety of upstream commercial roles during a 14 year career at Royal Dutch Shell including Head of Portfolio Management for upstream International. She has a summa cum laude degree in finance and management from the Academy of National Economy in Moscow and an MBA from Rotterdam School of Management/Columbia Business School. She was appointed as a director of Vedanta in August 2014 and is the Chairman of Vedanta's Sustainability Committee and is a member of the Nomination and Remuneration Committee.

Mr. Rajagopal joined Vedanta Resources Plc in July 2016, and is currently a member of Vedanta's Audit and Sustainability Committees. He has worked in a variety of senior finance and operational roles, including CFO for Europe and Group Financial Controller in Diageo plc since December 1996, where he was the Global Head of Business Development of Diageo plc from July 2010 until 2015. Prior to joining Diageo plc, Mr. Rajagopal worked with ITC India (a BAT plc associate in India), where he held a variety of senior positions both in finance and general management. Mr. Rajagopal is also a Non-Executive Director of United Spirits, India and is a Senior Advisor to JM Financial Institutional Securities Limited, a leading Investment Bank in India. He has a degree in Commerce from Madras University and is a fellow of the Institute of Chartered Accountants of India and the Cost and Works Accountants of India. He has also completed the Advanced Management Program at Harvard Business School. He was appointed as a director of Vedanta in July, 2016 and is a member of the Company's Audit and Sustainability Committees.

Mr. Tarun Jain joined Vedanta in 1984 and has over 32 years of executive experience in finance, accountancy, audit, taxation and corporate governance. He is responsible for corporate finance, business development and mergers and acquisitions at Vedanta Limited. Mr Jain is a graduate of the Institute of Cost and Works Accountants of India and a fellow of the Institute of Chartered Accountants of India and the Institute of Company Secretaries of India.

Mr. Arun Kumar GR was appointed as the Chief Financial Officer of Vedanta in September 2016. Arun joined Vedanta in 2013 as Chief Financial Officer for the company's Aluminum & Power business. In 2014, he moved into the role of Executive Vice President Finance & Deputy Chief Financial Officer, as part of which he was responsible for enhancing the capability of the finance function in the areas of accounting, risk management, driving value creation, strategic planning, re-financing, board reporting and governance and direct taxation. As a Chartered Accountant, Arun has over 21 years of experience at global companies such as Hindustan Unilever and General Electric. Prior to joining Vedanta, Arun was the Chief Financial Officer for General Electric's Asia-Pacific Lighting & Appliances business based out of Shanghai.

Mr. Dilip Golani currently heads Vedanta's Management Assurance function. He previously headed the Sales and Marketing function at Hindustan Zinc Limited and Vedanta Performance Management function. Prior to joining Vedanta in April 2000, Mr. Golani was part of Unilever Corporate Audit team responsible for auditing the Unilever group companies in Central Asia, Middle East and Africa region. Earlier, he was responsible for managing operations and marketing functions for one of the export businesses at Unilever India. Mr Golani has over 25 years of experience and had previously worked with Union Carbide India Limited and Ranbaxy Laboratories as well. Mr Golani has a degree in mechanical engineering and a post graduate degree in industrial engineering and management from NITIE.

Ms. Roma Balwani was appointed as President-Group Communications, Sustainability and Corporate Social Responsibility in April 2014. Prior to joining Vedanta, she was Chief Communications Officer at Mahindra & Mahindra Limited. With over 3 decades of experience, she has won several Indian and International awards and accolades and she speaks at several summits on Sustainable Development & Communications in India and overseas. Roma has the distinction of being included in the PR Week Global Power Book 2015, South East Asia and from the Holmes Global Report, USA, a recognition in the Global Influence 100. Recently she received the accolade of being one of the 100 Most Impactful Leaders in CSR at the World CSR Congress. Ms Balwani is a director of CMI FPE, and the Indian subsidiary of the Belgian company CMI. She also chairs the CSR committee as a board member.

Mr. Samir Cairae was appointed as CEO Diversified Metals in January 2016. He provides operational and strategic leadership for Vedanta Limited's Aluminum, Copper India, Power, Iron Ore divisions in addition to Commercial and Asset optimization functions. Prior to his appointment at Vedanta, Mr. Cairae held various senior leadership positions in global operations at Lafarge and Schlumberger. He has a rich and varied experience of a mix of line and corporate roles in strategy, M&A, industrial operations, in managing industrial operations and Business CEO roles in both growth and turnaround situations, in India, China, Philippines, France and has led complex businesses, including listed companies. In his last role before joining Vedanta, He was heading the global industrial function for Lafarge's 150 cement operations in over 45 countries and was based in Paris. Mr. Cairae holds a graduate degree in Electrical Engineering from Indian Institute of Technology or IIT, Kanpur, and a Masters in Management from the Hautes Etudes Commerciales or HEC School of Management, Paris.

Mr. Steven Din was appointed Chief Executive Officer of KCM in May 2014. He has over 20 years of experience in the natural resources industry, with over 15 years' experience in African mining and oil & gas. Prior to joining Vedanta, Mr Din was chief executive officer of Essar Minerals in Zimbabwe. Mr Din spent a large part of his mining career with Rio Tinto where he was managing

director and president for Simandou in Guinea, managing director of Strategic Projects for Rio Tinto in Senegal and chief financial officer and executive director of Palabora Copper Mines in South Africa and senior vice president and chief financial officer for Rio Tinto Iron & Titanium based in London.

Mr. P. Ramnath joined the Company in September 2011 and is the Chief Executive Officer of Vedanta's Copper business in Tuticorin and Silvassa and Fujairah in the UAE and is also a board member for MALCO Energy Limited a subsidiary company of Vedanta Resources plc. Prior to joining the Company, he was the Chief Operating Officer of JK Paper Ltd. He has over 30 years of experience across many varied sectors which include chemicals, specialty chemicals, manufacturing and paper industries which include Jubilant Life Sciences Ltd, Praxair India, SNF Ion Exchange Ltd, Bakelite Hylam Limited and Reliance Industries Limited. Mr. Ramnath holds a Bachelor's degree in Chemical Engineering from Osmania University, Hyderabad and has a Post Graduate Diploma from the Indian Institute of Management Bangalore.

Mr. Sunil Duggal joined the company in August 2010 and has been a significant driver of Hindustan zinc's growth over the years. His dedicated efforts on sustainability has enhanced safety awareness and helped building a robust safety culture. His thrust on adopting best-in-class mining and smelting techniques, machineries, state of art environment friendly technologies and mechanisation & automation of operational activities has added great value.

Mr. Dashnee Naidoo joined the Group in 2014 in the role of CEO, Zinc International and as CEO Copper Mines of Tasmania in February 2015. Ms. Naidoo has over 20 years of extensive experience in the natural resources industry, including platinum, thermal coal, manganese and zinc. Piror to joining Vedanta, Ms. Naidoo was part of the Anglo American leadership where she held positions across operations in various capacities. Ms. Naidoo holds a bachelor degree in Chemical Engineering from the University of Natal and Certification in Finance and Accounting from the University of Witwatersrand, Johannesburg.

Mr. Abhijit Pati was appointed as Chief Executive Officer of Vedanta's aluminium business in March 2015 and is responsible for the Jharsuguda Aluminium complex, Lanjigarh refinery & Balco. He joined Vedanta in 2008 and, with his wealth of knowledge over 27 years in the industry, has been a significant driver of the company's Aluminium growth. Mr Pati is a two times gold medallist holder & an honours graduate in Chemical Engineering from prestigious Calcutta University & MBA from IMI Delhi.

Mr. Rajagopal Kumar joined Vedanta in April 2003 and has held various executive roles including Chief Executive Officer of Sterlite Copper from 2007 to 2008, Chief Executive Officer of KCM from 2008 to 2011, Chief Executive Officer of Zinc International from 2011-2013 and Chief Executive Officer, Africa (Base Metals) from 2013 to 2015. He was appointed as Chief Executive Officer of Vedanta's Iron Ore businesses with effect from February 2015 and is leading the revival of profitable, low cost iron ore mining operations in Goa and Karnataka as well as developing the Liberian Project. Mr Kumar has nearly 32 years of experience and expertise in accountancy, commerce, marketing, supply chain management, mergers and acquisitions human capital development, Business Turnaround, and Policy Advocacy. Prior to joining Vedanta, Mr Kumar worked at Hindustan Lever Limited for 12 years.

Mr. Sudhir Mathur was appointed Acting Chief Executive Officer of Cairn India Limited in June 2016, bringing nearly thirty years of senior management experience to the role. Since joining Cairn in 2012 as Chief Financial Officer and Member of the Executive Committee, he has been instrumental in the continuing growth and success of the Group. During his career, which has spanned a number of sectors, he has had responsibility for Strategy, Restructuring, Supply Chain, Corporate Finance, Treasury, M&A and External Affairs. Prior to Cairn, Sudhir was the CFO of Aircel Cellular Limited and Business Head of Netco, where he was instrumental in the roll out of its Pan India Operations. He was Chief Commercial Officer of Delhi International Airport Limited where he was oversaw the positioning of the airport as an international and domestic passanger and cargo hub post privatisation.

Following a number of years within the Management Consultancy division of PriceWaterhouseCoopers India, he also held senior management positions at Idea Cellular and Ballarpur Industries.Sudhir is a Bachelor of Economics from Shriram College of Commerce, Delhi University and MBA from Cornell University, New York.

Mr. Ajay Kumar Dixit was appointed as CEO Power for Vedanta Limited in May 2015. Prior to joining the company, Mr. Dixit worked at Siemens for almost three-and-a-half decades, in various profiles in the industry and energy sectors before taking over as CEO - Energy sector for South Asia. At Vedanta, he is leading the power plant units vertical with a capacity of over 9 GW and driving strategies to achieve the full potential of the business. Mr. Dixit is an Electrical engineer from Delhi College of Engineering.

Mr. Mansoor Siddiqi joined Vedanta in 1991 and rising through several operational roles, he led the set-up of Vedantas large aluminium and power projects including BALCO smelters and captive power plants. He also played a key role in setting up the copper smelter at Tuticorin and copper refinery at Silvassa. Prior to his appointment as Group Director of Projects he was chief executive officer of Vedantas Aluminium division. Prior to joining Vedanta, Mr Siddiqi held senior positions in Hindustan Copper Limited. He has over 38 years of industry experience. Mr Siddiqi has a mechanical engineering degree from the Indian Institute of Technology, New Delhi and a PG Diploma in Management from AIMA, New Delhi.

## **Corporate Governance**

The Company's shares were listed on the LSE in 2003. Most of Vedanta's assets and management are located in India. Three of Vedanta's subsidiary companies, namely Vedanta Limited, HZL and Cairn India are listed on stock exchanges in India and maintain their own corporate governance arrangements in compliance with Indian regulations. Vedanta Limited also has ADSs listed on the NYSE and is thus subject to NYSE listing requirements. In addition, BALCO, HZL and KCM have government appointees on their boards of directors to represent wider shareholder interests.

Vedanta's Executive Chairman, Mr. Anil Agarwal, is Vedanta's original promoter and founder having built Vedanta from its inception in 1976. Volcan Investments Limited, remains the Company's controlling shareholder with a 69.39% voting shares interests as of 30 September 2016. The relationship between Volcan, Mr. Agarwal and Vedanta is governed by a relationship agreement which was entered into at the time of the Listing and amended in November 2014 due to changes in the Listing Rules (the "Relationship Agreement") to ensure the Company is able to operate independently of the controlling shareholder. See "Relationship with the Major Shareholder — Transactions and arrangements with the Major Shareholder — Relationship Agreement — The Company, Volcan, Conclave and Mr. Anil Agarwal". Under the terms of the Relationship Agreement, the Board, and Nominations Committee will at all times consist of a majority of Directors who are all independent of Volcan and the Agarwal family, whilst the Remuneration and Audit Committees shall at all times comprise solely of Non-Executive Directors. Volcan is entitled to nominate for appointment as Director such number of persons as is one less than the number of Directors who are independent of Volcan, the Agarwal family and their associates. The Board considers these to be adequate safeguards in that Directors who are independent of Volcan make up a majority of the Board and the Company's ability to operate independently of Volcan is protected by the Relationship Agreement.

Vedanta does not provide for any benefits to its officers and directors upon the termination of their services.

# Statement of Compliance

The Board has sought to achieve the standards of corporate governance as set out in the UK Corporate Governance Code issued by the Financial Reporting Council of the UK (the "Code") and believes that the Company has complied with the provisions of the Code throughout the financial year ended 31 March 2016, except as follows:

#### Code Provision A.3.1

Anil Agarwal was appointed Executive Chairman of the Company in 2005, having previously been Chief Executive Officer of the Company. In addition, through Volcan, members of his family have a controlling interest in the shares of the Company. Therefore, on his appointment as Chairman, Mr. Agarwal did not meet the independence criteria defined under Code Provision A.3.1. It is the board's view that Mr. Agarwal is pivotal in helping to develop the strategic direction of Vedanta, and the Company has achieved significant growth through acquisitions and organically.

#### Code Provision B.2.1

The Relationship Agreement put in place at the time of the Company's Listing and subsequently amended in November 2014 stipulates that Volcan be consulted on all appointments to the board of directors. Accordingly, the Nominations Committee which leads the process for board appointments consults with Volcan prior to recommending any candidates for appointment to the board. To this extent, the Company's approach differs from the principle in Code Provision B.2.1.

#### The Board

## Role and Responsibilities of the Board

The role of the Board is to provide leadership to maximize opportunities to develop the Company's portfolio of businesses profitably while assessing and managing the associated risks. The boards of directors of Vedanta's individual businesses are responsible for managing their businesses profitably while controlling risks. The Board assesses the strategic objectives of each business, monitors performance, ensures the availability of financial, management and other resources required to meet the objectives, sets Vedanta's standards of conduct and ensures that effective controls are in place to manage risk and that the interests of shareholders and other investors are observed. For example, in 2011 a new code of conduct and ethics (the "Code of Conduct and Ethics") was approved to provide overarching standards for Vedanta's individual businesses.

The Board has adopted a schedule of matters reserved for its consideration to ensure that it is in a position to assess strategy, monitor performance and maintain effective controls while delegating operational management to the Executive Committee and Vedanta's businesses. Such matters reserved to the Board include, amongst other things, approving Vedanta's overall strategy and annual budgets, major capital expenditures, acquisitions, appointments, disposals and changes to capital structure and dividend policy.

As part of its decision making processes the Board considers the long-term consequences of its decisions, the interests of various stakeholders including employees, the impact of Vedanta's operations on the environment and the need to maintain high standards of business. This is achieved through a prudent and robust risk management framework and internal controls and strong governance processes. Vedanta's corporate governance framework involves coordination and cooperation amongst shareholders, the board, board committees and management committees.

The Board meets on a regular basis and throughout fiscal year ended 31 March 2016 met 6 times. The Chairman also met with the Non-Executive Directors without the Executive Directors present on several occasions throughout the same period. All of the committees are authorised to obtain legal or other professional advice as necessary, to secure the attendance of external advisers at their meetings and to seek information from any employee of the Company in order to perform their duties.

There are four Board Committees: Nominations, Remuneration, Audit, and Sustainability. Each committee reports directly to the Board.

# Board Balance and Independence

The Board comprises the following members as of 30 September 2016

Mr. Anil Agarwal	Executive Chairman
Mr. Navin Agarwal	Executive Vice Chairman
Mr. Tom Albanese	Chief Executive Officer
Mr. Aman Mehta	Non-Executive Director
Mr. Geoffrey Green	Non-Executive Director
Mr. Deepak Parkh	Non-Executive Director
Mr. R Rajagopal	Non-Executive Director
Ms. Ekaterina Zotova	Non-Executive Director

With the exception of Ravi Rajagopal who was appointed to the board on 1 July 2016, all the Non-Executive Directors served throughout the fiscal year 2016 and up to the date of this Offering Circular.

The Board consists of the Executive Chairman, the Deputy Executive Chairman, Chief Executive Officer and five Non-Executive Directors. The Company regards this as an appropriate board structure. The Company considers all of its Non-Executive Directors as independent Non-Executive Directors within the meaning of "independent" as defined in the Code and free from any business or other relationship which could materially interfere with the exercise of their independent judgment. Aman Mehta has served on the Board for over nine years and his independence was therefore subject to a particularly rigorous review. As Mr Mehta also serves as Non-Executive Director on the Board of Cairn India Limited, the Board considered the potential conflicts of interest arising from that appointment. As Mr Mehta absents himself from discussions in the event of any conflict of interest and continues to actively participate in Board discussions and provides robust challenge to management, the Board concluded that his independent judgement was not compromised and he remains impartial. Mr Aman Mehta has agreed to continue for a further one year on the request of the Board following a recommendation from the Nomination Committee.

Mr. Aman Mehta is the Senior Independent Director. His primary responsibilities are to lead discussions at meetings of the Non-Executive Directors, provide an effective channel of communication between the Chairman and Non-Executive Directors ensure that the views of the Non-Executive Directors are given due consideration and provide a point of contact for any shareholder who wishes to raise concerns which the normal channels of communication through the Executive Chairman and Chief Executive Officer have failed to resolve, or for which contact is inappropriate.

There is a clear division of the responsibilities between the running of the Board and executive responsibility for running the business, so that no one person should have undue power of decision. In 2005, the Board approved a policy to ensure a clear separation is maintained between the responsibilities of the Executive Chairman and the Chief Executive Officer, as detailed below:

Executive Chairman Chief Executive Officer

- The Chief Executive Officer is responsible for:
- Leading the Board and ensuring that it has the resources required to function • effectively;
- Developing succession plans for Board appointments for Board approval;
- Helping to identify strategic priorities to enhance shareholder value;
- Formulating strategic plans for the Board's consideration and approval;
- Identifying new business opportunities in line with the strategic plans approved by the Board;
- Engaging with the Company's shareholders and other stakeholders such as governments, communities and employees to ensure that an • appropriate balance is maintained between the various interests;
- Providing leadership to the senior management team;
- Upholding the highest standards of integrity,
   probity and governance at Board level and throughout the Group;
- Facilitating active engagement by all Directors and fostering an environment in which Non-Executive Directors can freely provide constructive challenge;
- Evaluating the performance of the Board,
   Board committees and individual Directors and acting on the results of such evaluation;
- Reviewing the training needs of the Directors for the fulfilment of their duties;
   and
- Ensuring that new Directors participate in a full, formal and tailored induction programme.

- Ensuring effective implementation of Board decisions;
  - Developing operational business plans for Board approval;
  - Providing leadership to the senior management team for the delivery of the Group's operational business plans following Board approval;
  - Providing oversight and management of all of the Group's operations, business activities and performance including environmental, social, governance, health and safety, sustainability, investor relations and external communications;
  - Managing the Group's risk profile in line with the risk appetite set by the Board;
- Ensuring that prudent and robust risk management and internal control systems are in place throughout the Group;
  - Recommending annual budgets to the Board for approval;
- Making recommendations to the Remuneration Committee on remuneration policy and executive remuneration;
- Supporting the Executive Chairman in maintaining effective communications with various stakeholders;
  - Maintaining a close working relationship with the Chairman; and
  - Leading the Executive Team.

#### Executive Committee

The Executive Committee, comprising the Executive Directors and the senior management within Vedanta who head the principal businesses and corporate functions, meets on a monthly basis to consider the operating performance of each of the principal subsidiaries. Mr. Tom Albanese chairs the Executive Committee and keeps the Board informed of the Executive Committee's activities. The Board's role is to set Vedanta's values and standards, determine its strategic objectives and monitor operational performance.

The Executive Committee supports the Board in fulfilling this role and is essentially responsible for operational performance including: implementing and delivering the strategic plans formulated by the Board, monitoring operational and financial performance, prioritising and allocating resources and developing and reviewing objectives and budgets with subsidiary company boards to ensure that these fall within agreed targets and parameters set by the Board. In addition, the Executive Committee approves capital expenditure and reviews the Vedanta's Human Resources Policy and Treasury Policy.

# Nominations Committee

In conjunction with the consultation of Volcan pursuant to the Relationship Agreement, the Committee is responsible for leading the process for Board appointments and for keeping under review the balance of skills, experience, independence, knowledge and diversity, including gender, on the Board to ensure the orderly evolution of the membership of the Board and its Committees. In identifying and nominating candidates for approval by the Board, the Committee continues to take account of the Board's aims in relation to diversity, whilst ensuring that the right people with the right range of skills and experience are on the Board and in senior management positions in the coming years.

Mr. Anil Agarwal is Chairman of the Nominations Committee. The other members are Messrs. Aman Mehta, Deepak Parekh and Ekaterina Zotova and the Nominations Committee met two times in fiscal year 2016.

The 2016 Code requires that all directors be re-elected on an annual basis and that Non-Executive Directors should be appointed for specific terms. Accordingly, during fiscal year 2016, all the directors were re-elected.

The Company's Articles of Association require that at every annual general meeting, all the directors stand for reelection/election. Non-Executive Directors are only put forward for re-election if, following performance evaluation, the Board believes the Director's performance continues to be effective and demonstrates commitment to the role.

#### Remuneration Committee

Mr. Geoffrey Green is Chairman of the Remuneration Committee. The other members are Messrs. Aman Mehta, Ekaterina Zotova and Deepak Parekh. The Remuneration Committee is responsible for setting the remuneration policy and remuneration packages for the Executive Directors and for maintaining an awareness of the overall remuneration of the key operational and financial heads within Vedanta. In the Remuneration Committee's terms of reference approved by the Board the Remuneration Committee is required to consider and give due regard to the recommendations of the Code and other guidelines published in respect of the remuneration of directors of listed companies such as that produced by the Association of British Insurers and National Association of Pension Funds. A significant proportion of the Executive Directors' remuneration is performance related through the annual bonus and long term incentive schemes. The fees of the Non-Executive Directors are independently reviewed and take into account the time commitments and responsibilities of the role. The Remuneration Committee met four times in the fiscal year 2016.

### Audit Committee

Strong corporate governance and risk management is a key part of Vedanta's business model and the Board and the Audit Committee continues to be focused on maintaining high standards of governance and risk management across Vedanta. The Audit Committee oversees the financial reporting process in order to ensure that that the information provided to its shareholders is fair, balanced and understandable and allows assessment of the Company's position, performance, business model and strategy.

In line with best practice, the Board has reviewed the internal control system in place for Vedanta up to the period ended 30 September 2016. During the course of its review of the system of internal control, the Board has not identified nor been advised of any weaknesses or control failure that is significant.

In addition to the requirements of the UK Corporate Governance Code issued in April 2016, certain of the Company's subsidiaries, by virtue of their listings on the Indian stock exchanges or the NYSE, have their own audit committees which are established in accordance with Indian or NYSE corporate governance requirements, as applicable. This provides a second level of financial oversight below Vedanta's Audit Committee which also monitors the discussions and findings of the audit committees of the Company's subsidiaries.

Mr. Aman Mehta is the Chairman of the Audit Committee. The other members are Messrs. Ravi Rajagopal Deepak Parekh and Geoffrey Green. The Audit Committee met four times in fiscal 2016.

# Sustainability Committee

Miss Ekaterina Zotova is the Chairman of Vedanta's Sustainability Committee. The other members are Messrs. Tom Albanese, Kishore Kumar and Ravi Rajagopal. The Chief Sustainability Officer acts as the secretary to the committee. The Sustainability Committee met four times in fiscal 2016.

The role of the Sustainability Committee is to assist the Board in meeting its responsibilities in relation to sustainability-related matters arising out of the activities and operations of Vedanta. For more information on sustainability-related matters arising out of the activities and operations of Vedanta, please see "Business — Sustainability".

The principal duties and responsibilities of the Sustainability Committee are to:

- advise on sustainability policies and framework, clearly setting out the commitments of the Company to manage matters of sustainable development effectively;
- review and approve targets for sustainability performance and report to the Board with respect to their appropriateness and assess progress towards achieving those targets;
- recommend initiatives required to institutionalise a sustainability culture through involvement of leadership, employees and communities at all levels;
- review and report to the Board, the performance of the Company and Vedanta companies
  with respect to the implementation of the Vedanta Sustainability Framework through the
  Sustainability Assurance Programme so that sustainability and reputation related risks are
  assessed, controlled and managed effectively; and
- approve the Sustainable Development Report prior to publication.

The aggregate compensation the Company paid to its executive directors and executive officers for fiscal year 2016 was \$23.20 million, which includes \$20.02 million paid towards short term benefits comprising salary, bonuses and allowances, \$0.86 million paid towards post-employment benefits and \$2.33 million in non-cash payments relating to the LTIP. The total compensation paid to the Company's most highly compensated executive during fiscal year 2016 was \$4.03 million, of which \$3.29 million comprised salary, bonus and benefits in kind and \$0.74 million comprised non-cash payments relating to the LTIP.

# The aggregate compensation the Company paid its Non-Executive Directors in fiscal year 2016 was £589,000.

The following table sets forth the pre-tax remuneration for fiscal year 2016 for individual Directors who held office in the Company during this period. Payment is generally made in UK pounds sterling although payments in India under service contracts with Vedanta Limited are paid in Indian Rupees. The table below indicates the salary paid to the Company's Directors for fiscal year 2016. The table below, does not provide the salary details of Mr. Rajgopal as he was appointed in fiscal year 2017.

				Annual	Total for	Total for
	Base	Taxable		Performance	fiscal year	fiscal year
	Compensation	benefits	Pensions	Bonus	2016	2015(8)
			(GBP in th	ousands <sup>(9)</sup> )		
<b>Executive Directors</b>						
Anil Agarwal <sup>(1)</sup>	1,608	124	_	894	2,625	2,634
Navin Agarwal <sup>(2)(3)</sup> (7)	969	67	153	533	1,723	1,707
Tom Albanese <sup>(4)(7)</sup>	1,000	90	251	556	1,897	1,682
Non-Executive <sup>(6)</sup> Directors						
Geoffrey Green <sup>(10)</sup>	95	_	_	_	95	95
Aman Mehta <sup>(5)</sup>	140	_	_	_	140	140
Euan Macdonald <sup>(11)</sup>	140	_	_	_	140	140
Deepak Parekh <sup>(10)</sup>	102	_	_	_	102	102
Katya Zotova <sup>(10)</sup>	112	_	_	_	112	68
Total	4,166	281	404	1,983	6,834	6,568

Notes:

<sup>(1)</sup> Mr. Anil Agarwal's taxable benefits in kind include provision of medical benefits, car and fuel in the UK for business purposes.

<sup>(2)</sup> For the financial year ended 31 March 2016, Mr. Navin Agarwal received a Vedanta Limited salary of Rs. 85,618,845 excluding medical and leave travel allowances, Vedanta Resources plc fees of £85,000, HZL fees of Rs. 300,000 and Commission of Rs. 10,00,000 and Cairn India fees of Rs. 400,000.

<sup>(3)</sup> Mr. Navin Agarwal's taxable benefits in kind include housing and related benefits, and use of a car and driver.

<sup>(4)</sup> Mr. Tom Albanese's taxable benefits in kind include housing and related benefits, and use of a car and driver in India and medical benefits in UK.

<sup>(5)</sup> The fee paid to Mr. Aman Mehta does not include the fees of £85,204 paid by Cairn India.

<sup>(6)</sup> Non-Executive Directors are reimbursed for expenses incurred while on Company business. No other benefits are provided to Non-Executive Directors.

- (7) All of Vedanta's pension schemes are based on cash contribution and do not confirm an entitlement to a defined benefit. Pension contributions are made into the Deputy Executive Chairman and Chief Executive Officer's personal pension schemes (or local provident fund) and will become payable on retirement, normally at age 58. The Executive Chairman does not receive pension benefits.
- (8) Amounts shown for fiscal year 2016 relate to the payment of the annual bonus for the year ended 31 March 2016. 50% of the annual bonus figures shown in the table are paid in cash and the balance 50% is deferred in shares. Details of this payment are set out in the relevant sections of the report.
- (9) The exchange rate applicable as at 31 March 2016 was Rs. 98.7645 to £1, and at 31 March 2015 was Rs. 98.5614 to £1.
- (10) The annual fees paid to Mr Green, Mr Parekh and Ms Zotova changed on 5 August 2016 following changes made to the composition of the board committees.
- (11) Euan Macdonald retired at the last AGM of Vedanta.

# Employee Share Schemes

# Vedanta Performace Share Plan

The Company operates the Vedanta Resources Performance Share Plan ("PSP") which was adopted to grant share options to its employees or employees of its subsidiaries. Awards are made to certain senior employees and executive directors on an annual basis. Awards under the PSP may be granted to any employee of the Company or any of its subsidiaries.

The PSP is consistent with the Company's reward philosophy, which aims to provide superior rewards for outstanding performance, and to provide a high proportion of "at risk" remuneration for Executive Directors and senior employees. The maximum value of the Ordinary Shares which may be conditionally awarded in any fiscal year to a participant in the PSP who is an executive director is restricted to 150% of that Executive Director's annual base salary (including fees).

As of 30 September 2016, the number of options outstanding under the PSP was 9,664,726.

### ESOP Scheme

In 2012, the shareholders of the Company adopted a plan named the "ESOP Scheme", that allows the Company to issue share options to the executive directors, senior management and certain select employees across Vedanta.

Each share option is exercisable in the form of a nil cost option or a right to acquire shares, at any time and the options are required to be exercised within six months following the vesting date. As of 30 September 2016, the number of options outstanding under the ESOP Scheme was 234,083.

The following table sets forth the options granted to the Company's Directors and executive officers during fiscal year 2016:

Granted

			Granteu						
		31 March 2015 Number of shares	in 2015/16 Number of shares	2015/16 Number	Lapsed in 2015/16 Number of shares	2016 Number	Exercise price US cents	Award price £	Earliest/latest exercise date
Anil Agarwal									
30 December 2015	PSP	_	275,000	_	_	275,000	_	0.1	29 Dec 18 — 29 Jun 19
4 January 2016	$DSBP^1$	_	68,661	_	_	68,661	_	0	22 May 16 — 22 May 18
Navin Agarwal									
30 December 2015	PSP	_	130,000	_	_	130,000	_	0.1	30 Dec 18 — 30 Jun 19
4 January 2016	$DSBP^1$	_	60,362	_	_	60,362	_	0	12 Aug 16 — 12 Aug 18
Tom Albanese									
30 December 2015	PSP	_	200,000	_	_	200,000	_	0.1	30 Dec 18 — 30 Jun 19
4 January 2016	DSBP		41,939			41,939		0	12 Aug 16 — 12 Aug 18
Total			775,962			775,962			

Mr. Anil Agarwal's and Navin Agarwal's interest over ordinary shares of US\$0.10 each in the Company includes their interest over 68,661 and 60,362 forfeitable shares, which were awarded to them under the Company's Deferred Share Bonus Plan or DSBP on 4 January 2016, of which for Mr. Anil Agarwal 27,465, and for Mr. Navin Agarwal 24,145 shares fully vested and ceased to be subject to restrictions and risk of forfeiture on 22 May 2016 and 12 August 2016 respectively. The remaining 41,196 and 36,217 forfeitable shares held by Mr. Anil Agarwal and Navin Agarwal under the DSBP will vest and cease to be subject to restrictions and at risk of forfeiture in two equal tranches on 22 May 2017 and 2018 and 12 August 2017 and 2018 respectively. On the 12 September 2016 Mr Anil Agarwal and Navin Agarwal were granted a further forfeitable share awards under the Company's DSBP plan which were 119,084 and 57,697 respectively which is included as part of their interests.

### Directors Dealings in Shares

The Company has a policy based on the Market Abuse Regulation, which covers dealings in securities and applies to directors and senior management. A comprehensive insider list is maintained and all participants are notified of closed periods.

# Limitations on Liability and Indemnification Matters

Section 201 of the Indian Companies Act provides that a company may indemnify any director, officer or auditor against any liability incurred by such director, officer or auditor in defending any civil or criminal proceedings, in which a judgment is given in favour of such director, officer or auditor or in which he or she is acquitted or discharged or in connection with application made by a director or an officer to the High Court of the relevant state for relief, because he or she has reason to apprehend that any proceeding will or might be brought against him in respect of any negligence, default, breach of duty, misfeasance or breach of trust, in which relief has been granted by the High Court of the relevant state.

Section 201 also provides that, except for such indemnity described above, any provision, whether contained in the articles of association of a company or in an agreement with the company or in any other instrument, for exempting any director, officer or auditor of the company from, or indemnifying him or her against, any liability which, by any rule of law, would otherwise attach to such director, officer or auditor in respect of any negligence, default, misfeasance, breach of duty or breach of trust of which he or she may be guilty in relation to the company, shall be void.

## PRINCIPAL SHAREHOLDERS

The following table sets forth information regarding beneficial ownership of Vedanta's Ordinary Shares as of 30 September 2016 held by:

- each person who is known to Vedanta to have more than 5% beneficial share ownership;
- each of Vedanta's Directors and executive officers having more than 1% beneficial share ownership; and
- all of the Vedanta's Directors and executive officers as a group.

Each Ordinary Share is entitled to one vote on all matters that require a vote of shareholders, and none of the Vedanta's shareholders has any contractual or other special voting rights.

As used in this table, beneficial ownership means the sole or shared power to vote or direct the voting or to dispose of or direct the sale of any security. A person is deemed to be the beneficial owner of securities that can be acquired within 60 days upon the exercise of any option, warrant or right. Ordinary Shares subject to options, warrants or rights that are currently exercisable or exercisable within 60 days are deemed outstanding for computing the ownership percentage of the person holding the options, warrants or rights, but are not deemed outstanding for computing the ownership percentage of any other person. The amounts and percentages as of 30 September 2016 are based upon 270,043,526 voting Ordinary Shares (excluding 6,904,995 Ordinary Shares held through global depository receipts, with no voting rights, 22,502,483 treasury shares held by the Company and a further 1,704,333 shares which were purchased pursuant to the Company's buyback programme by an independent company, Gorey Investments Ltd). The Company will not vote on these shares and such shares purchased by Gorey Investments Ltd will be treated in the consolidated accounts of the Company as treasury shares outstanding as of that date.

	Number of Ordinary	Percentage of Issued Voting
Shareholders' Name	Shares	Share Capital
5% shareholders		
Volcan and affiliates <sup>(1)</sup>	187,488,102	69.39%
Loyalist Plaza,		
Don Mackay Boulevard		
P O Box AB-20377		
Marsh Harbour, Abaco		
Bahamas		
Directors and Executive Officers (2)		
Anil Agarwal	319,985	0.01%
Navin Agarwal	330,134	0.01%*
Tom Albanese	91,569	0.03%*
Aman Mehta	_	_
Ravi Rajagopal	_	
Geoffrey Green	_	_
Deepak Parekh	_	_
Ekaterina Zotova	_	_
All of the Vedanta's directors and executive officers as a group	188,229,790	69.44%

<sup>(1)</sup> Volcan owns 187,488,102 Ordinary Shares, or 69.39% of the issued voting share capital, of Vedanta as of 30 September 2016. Volcan is owned and controlled by the Anil Agarwal Discretionary Trust (the "Trust"). Conclave PTC Limited ("Conclave") is the trustee of the Trust and controls all voting and investment decisions of the Trust. As a result, shares beneficially owned by Volcan may be deemed to be beneficially owned by the Trust and, in turn, by Conclave. Mr. Anil Agarwal, the Executive Chairman of the Company and the Non-Executive Chairman of Vedanta Limited, may be deemed to have beneficial ownership of shares that may be owned or deemed to be beneficially owned by Conclave. The Company, Volcan, Conclave and Mr. Anil Agarwal are parties to a relationship agreement that regulates the ongoing relationship among them.

<sup>(2)</sup> Those directors and executive officers of the Company that hold shares.

<sup>\*</sup> Represents beneficial ownership of less than 1.0%.

## RELATED PARTY TRANSACTIONS

The following is a summary of material transactions that Vedanta has engaged in with its controlling shareholder, Volcan, and its subsidiaries and other related parties, including those in which Vedanta or its management has a significant equity interest. In addition, the following contains a discussion of how Vedanta intends to handle conflicts of interest and allocations of business opportunities between itself and its affiliates, Directors and executive officers. For further discussion of related party transactions, see the consolidated financial statements appearing elsewhere in this Offering Circular.

### **Related Parties**

### Volcan and the Agarwal Family

Volcan owns 69.39% of the issued ordinary shares of Vedanta as of 30 September 2016. Volcan is 100% owned and controlled by the Trust. Conclave is the trustee of the Trust and controls all the voting and investment decisions of the Trust. As a result, securities beneficially owned by Volcan may be regarded as being beneficially owned by the Trust and, in turn, by Conclave. Mr. Anil Agarwal, the Executive Chairman of Vedanta and the Chairman emeritus of Vedanta Limited, may be deemed to have beneficial ownership of securities that are owned by Conclave. Vedanta, Volcan, Conclave and Mr. Agarwal are parties to the Relationship Agreement, which regulates the ongoing relationship among them. See "- Related Transactions - Relationship Agreement - Vedanta, Volcan, Conclave and Mr. Anil Agarwal". Mr. Agarwal, his father, Mr. Dwarka Prasad Agarwal, and his son, Mr. Agnivesh Agarwal, the Non-Executive Chairman of HZL, also have a controlling interest in Sterlite Technology Limited ("STL"), a publicly-listed company in India, except for nominal interests in STL held by MEL and Vedanta Limited. In addition, Mr. Anil Agarwal holds is a director of Vedanta with other members of Vedanta and will continue to hold such cross directorships. Mr. Agarwal is also the non-executive chairman of Vedanta Limited. These directorships and positions give rise to situations in which Mr. Agarwal could have a direct or indirect interest that conflicts, or possibly may conflict, with the interests of the Company.

### **Related Transactions**

## Relationship Agreement — Vedanta, Volcan, Conclave and Mr. Anil Agarwal

Vedanta, Volcan, Conclave and Mr. Anil Agarwal are parties to the Relationship Agreement. The principal purpose of the Relationship Agreement is to enable Vedanta to carry on its business independently of Volcan and its direct and indirect shareholders, and their respective associates (the "Volcan Parties") as required by the Listing Rules of the Financial Conduct Authority of the United Kingdom (the "FCA") and to ensure that transactions and relationships, including all matters that are the subject of the Shared Services Agreement (as described below), among the Volcan Parties are at arm's length and on a normal commercial basis. The Relationship Agreement will terminate in respect of Volcan at such time as each of the Volcan Parties, acting individually or jointly by agreement, cease to be a controlling shareholder of Vedanta for the purposes of the Listing Rules of the FCA or if Vedanta is de-listed from the LSE. In addition, the Relationship Agreement will terminate in respect of Conclave and Mr. Anil Agarwal if any of them individually or acting jointly ceases to be a controlling shareholder of Vedanta or Volcan. Currently, a controlling shareholder of a company for the purposes of the Listing Rules of the FCA is any person (or persons acting jointly by agreement whether formal or otherwise) who is entitled to exercise, or to control the exercise of, 30% or more of the rights to vote at general meetings of such company or is able to control the appointment of directors who are able to exercise a majority of the votes at board meetings of such company.

## Under the Relationship Agreement:

• the parties agree to ensure that Vedanta is capable, at all times, of carrying on its business independently of the Volcan Parties as required by the Listing Rules of the FCA;

- the Board and Nominations Committee and any other committee of the Board (other than the Audit Committee or the Remuneration Committee or any committee which may be established by the Board in connection with a specific transaction, the constitution of which is approved by the Board) to which significant powers, authorities or discretions are delegated shall at all times comprise a majority of Directors who are independent of the Volcan Parties and who are free from any business or other relationship with the Volcan Parties which could materially interfere with the exercise of the Director's judgment concerning Vedanta;
- Vedanta's Remuneration Committee and Audit Committee shall at all times consist only of Non-Executive Directors;
- Volcan is entitled to nominate for appointment to the Board such number of persons as is one less than the number of Directors who are independent of the Volcan Parties and who are free from any business or other relationship with the Volcan Parties which could materially interfere with the exercise of the director's judgment concerning Vedanta;
- neither Mr. Anil Agarwal nor any non-independent Directors shall be permitted, unless the independent Directors agree otherwise, to vote on any resolutions of the Board or of a committee of the Board to approve the entry into, variation, amendment, novation or abrogation or enforcement of any contract, arrangement or transaction with any of the Volcan Parties;
- Volcan shall not exercise voting rights attaching to its shares in Vedanta or any resolution to approve the entry into, variation, amendment, novation or abrogation of any transactions or arrangements between Vedanta and the Volcan Parties;
- the Volcan Parties represented and warranted to Vedanta that at the time of the execution of the Relationship Agreement they did not own directly or indirectly any interests in the smelting, refining, mining or sale of any base metals or mineral otherwise than through Vedanta or any member of Vedanta;
- the Volcan Parties agreed to, and agreed to cause each member of the Volcan group, the Agarwal family and their respective associates to, directly or indirectly, acquire or otherwise invest in any company, business, business operation or other enterprise which engages in the smelting, refining or mining of base metals or minerals only through the Company or other member of Vedanta. However, this Relationship Agreement does not prevent, restrict or limit the acquisition or ownership by the Volcan Parties of:
  - a) not more than 5% in aggregate of any class of shares, debentures or other securities in issue from time to time of any company which engages in the smelting, refining or mining of base metals or minerals which is for the time being listed on any stock exchange; or
  - b) of, or of any interest in, a base metal or mineral property or asset (together with any associated property, plant and equipment), which is not adjacent or geographically proximate to an existing property or operation of Vedanta so as to give them operational synergies, where the acquisition cost (including assumed indebtedness), including any related capital expenditures committed at the date of acquisition for the following 12 months, is equal to \$50 million or less, for which purpose any acquisitions of two or more related or adjacent base metal or mineral properties or assets shall be aggregated when calculating the acquisition cost, provided that the relevant interested party (i) is not an officer or director of Vedanta; and (ii) before acquiring such property or asset, first made the opportunity to acquire such property or asset available to Vedanta, with a reasonable period for the independent directors

of Vedanta to consider the opportunity, on terms no less favourable than those on which they are proposed to be acquired by the interested party and a majority of the independent directors has determined that Vedanta should not make the acquisition; and

c) transactions and relationships between Vedanta and the Volcan Parties must be conducted at arm's length and on a normal commercial basis, including those to be provided under the Shared Services Agreement.

### STL

Vedanta entered into a shared services agreement dated 5 December 2003 with STL (the "Shared Services Agreement") as part of the Listing. Under this Shared Services Agreement, Vedanta Limited (then Sterlite) and Vedanta agreed to continue to provide STL with various commercial services in relation to STL's businesses on an arm's length basis and at normal commercial terms.

	*7	1 124 14			ths ended
_	Year ended 31 March			30 September	
_	2014	2015	2016	2015	2016
Sales to STL	102.3	126.0	140.4	79.9	41.1
Recovery of expenses	0.3	0.0	0.2	0.2	_
Purchases	0.0	2.9	1.1	0.4	1.5
Net Interest Received	0.2	0.6	0.2	0.1	0.2
Net amounts receivable at year					
end	5.4	3.7	0.2		0.0
Net amounts payable at year end	_	_	1.4	0.2	1.5
Dividend Income	_	_	0.0		0.1
Investment in Equity Share	1.7	4.2	6.5	6.4	5.5

In fiscal years 2014, 2015 and 2016, services provided to STL \$0.03 million, \$0.02 million and \$0.02 million from STL, respectively.

### **SPTL**

Sterlite Power Transmission limited ('SPTL') is related by virtue of having the same controlling party as Vedanta, namely Volcan.

				Six mont	ths ended
_	Year ended 31 March			30 September	
_	2014	2015	2016	2015	2016
Sales to STL	_	_	_	_	28.6
Purchases	_	_			0.4
Net Interest Received	_	_	_		0.0
Net amounts receivable at year					
end	_	_	_	_	0.9
Investment in Equity Share	_	_	_	_	1.6

#### Vedanta Foundation

Vedanta Foundation is a registered not-for-profit entity engaged in computer education and other related social and charitable activities. The Vedanta Foundation is a related party as it is controlled by members of the Agarwal family who control Volcan, the majority owner of Vedanta. During fiscal years 2014, 2015, and 2016 Vedanta paid were \$0.7 million, \$0.7 million and \$0.5 million to Vedanta Foundation, respectively.

### Sesa Goa Community Foundation Limited

Following the acquisition of SGL (now Vedanta Limited), the Sesa Goa Community Foundation Limited, a charitable institution, became a related party of Vedanta on the basis that key management personnel of Vedanta have significant influence on the Sesa Goa Community Foundation Limited. During the years ended 31 March 2014, 2015 and 2016, Vedanta paid \$0.8 million, \$0.4 million and \$0.4 million to Sesa Goa Community Foundation Limited.

#### Loans to Sterlite Iron and Steel Limited

As of 30 September 2016, Vedanta had an outstanding loan balance receivable from Sterlite Iron and Steel Limited of \$0.7 million. Sterlite Iron and Steel Limited is a related party by virtue of having the same controlling party as the Company, namely Volcan.

#### Vedanta Medical Research Foundation

In fiscal years 2014, 2015 and 2016, Vedanta gave donations of \$0.9 million, \$0.7 million and \$2.7 million to Vedanta Medical Research Foundation, which is a related party of Vedanta on the basis that key management personnel of Vedanta exercise significant influence.

#### Volcan Investments Limited

				Six mont	ths ended
-	Year ended 31 March			30 September	
_	2014	2015	2016	2015	2016
Dividend paid	102.1	115.6	75.0	75.0	56.2
Net amount receivable at the					
period/year end	0.2	0.4	0.2	0.0	0.3
Recovery of expenses	_	0.3	0.3	0.1	0.1
Guarantees given	19.1	18.4	17.3	17.5	17.3

Volcan is a related party of Vedanta by virtue of being an ultimate controlling party of Vedanta.

## **MATERIAL CONTRACTS**

The following is a summary of each of the Vedanta's material contracts.

### HZL call options

On 11 April 2002, Vedanta Limited acquired a 26.0% interest in HZL from the GoI through its subsidiary, SOVL (which has since merged into Vedanta Limited). Upon Vedanta Limited's acquisition of the 26.0% interest in HZL, the GoI and Vedanta Limited entered into a shareholders' agreement to regulate, among other things, the management of HZL and dealings in HZL's shares.

Under the shareholders' agreement, the GoI granted Vedanta Limited two call options to acquire all the shares in HZL held by the GoI at the time of exercise. Vedanta Limited exercised the first call option on 29 August 2003 and acquired an additional 18.9% on 12 November 2003, taking Vedanta Limited's interest in HZL to 64.9%.

The shareholders' agreement provides that prior to selling shares in HZL to a third party, either party must first issue a sale notice offering those shares to the other party at the price it intends to sell them to the third party. However, a transfer of shares, representing not more than 5.0% of the equity share capital of HZL, by the GoI to the employees of HZL is not subject to such right of first refusal by Vedanta Limited. The GoI has transferred shares representing 1.5% of HZL's share capital to the employees of HZL. The shareholders' agreement also provides that if the GoI proposes to make a sale of its shares in HZL by a public offer prior to the exercise of Vedanta Limited's second call option, then Vedanta Limited shall have no right of first refusal.

The second call option provides Vedanta Limited a right to acquire the GoI's remaining 29.5% shareholding in HZL, subject to the right of the GoI to transfer up to 3.5% of the issued share capital of HZL to employees of HZL, in which case the number of shares that Vedanta may purchase under the second call option will be reduced accordingly. The exercise price for the second call option will be equal to the fair market value of the shares as determined by an independent appraiser. By a letter dated 21 July 2009, Vedanta Limited exercised the second call option.

## BALCO call option

On 2 March 2001, Vedanta Limited acquired a 51.0% interest in BALCO from the GoI. On the same day, Vedanta Limited entered into a shareholders' agreement with the GoI and BALCO to regulate, among other things, the management of BALCO and dealings in BALCO's shares. The shareholders' agreement provides that as long as Vedanta Limited holds at least 51.0% of the share capital of BALCO, it is entitled to appoint one more director to the board of BALCO than the GoI and is also entitled to appoint the managing director.

Under the shareholders' agreement, if either the GoI or Vedanta Limited wishes to sell its shares in BALCO to a third party, the selling party must first offer the shares to the other party at the same price at which it is proposing to sell the shares to the third party. The other party shall then have the right to purchase all, but not less than all, of the shares so offered. If a shareholder does not exercise its right of first refusal, it shall have a tag along right to participate in the sale pro rata and on the same terms as the selling party, except that if the sale is by the GoI by way of a public offer, the tag along right will not apply. However, a transfer of shares representing not more than 5.0% of the equity share capital of BALCO by the GoI to the employees of BALCO is not subject to such right of first refusal by Vedanta Limited. The GoI also granted to Vedanta Limited an option to acquire the remaining shares in BALCO held by the GoI at the time of exercise.

# Volcan relationship agreement between Vedanta, Volcan, the Anil Agarwal Discretionary Trust, Conclave and Anil Agarwal

For details on the Volcan relationship agreement, please see the section "Related party Transactions — Related Transactions — Relationship Agreement — Vedanta, Volcan, Conclave and Mr. Anil Agarwal".

### Cairn India Purchase Agreement

On 15 August 2010, THL Aluminium Limited, which was at the time in the process of changing its name to Twin Star Energy Holdings Limited ("TSEHL"), entered into the Cairn India Share Purchase Deed with CUKHL and others. Pursuant to the Cairn India Share Purchase Deed, TSEHL agreed to purchase a maximum of 51.0% of the fully diluted share capital of Cairn India at a price of Rs. 355 per Cairn India share. This was subject to an open offer to the shareholders of Cairn India shareholders, of not less than Rs. 355, for up to 20.0% of the issued shares in Cairn India (the "Open Offer"), in accordance with the requirements of the Takeover Code.

Depending on the results of the Open Offer, the number of ordinary shares in Cairn India ("Cairn India Shares") acquired under the Cairn India Share Purchase Deed was therefore subject to a maximum reduction of 11.0% to 40.% of Cairn India's fully diluted share capital on completion.

The Cairn India Share Purchase Deed contained a non-compete clause that required TSEHL to pay to CUKHL on completion a fee of Rs. 50 per Cairn India share acquired, as consideration for the Cairn Energy Group and CUKHL undertaking not to engage in the business of oil or gas extraction and/or its transport or processing in India, Sri Lanka, Pakistan and Bhutan or any other business competing with the business of the Cairn India Group. Please refer to the amendment deed dated 27 June 2011 summarised in paragraph (b) below.

TSEHL and CUKHL agreed reciprocal put and call option arrangements for up to 5.0% of the issued share capital of Cairn India as calculated at the date of exercising the option. The put and call options were exercisable for a period of six months from 31 July 2012 and 31 July 2013.

The maximum aggregate number of shares that TSEHL would be obliged or entitled to acquire under the put and call options was capped at the number of Cairn India Shares equal to 51.0% of the fully diluted share capital of Cairn India at completion minus the aggregate of:

- the number of Cairn India Shares actually acquired at completion;
- the number of Cairn India Shares acquired under the exercise of any of the options; and
- the number of Cairn India Shares sold by CUKHL (and/or members of CUKHL's Group to any person at any price, provided that these shares were first offered to TSEHL at Rs. 405 per share (payable in US dollars at completion of such pre-emptive purchase based on a fixed exchange rate of Rs. 46.765:\$ 1) within six months of completion.

On 27 June 2011, the Cairn India Share Purchase Deed was amended to provide for:

- 191,920,207 Cairn India Shares to be acquired by TSEHL on or before 11 July 2011, with the balance of the fully diluted equity share capital of Cairn India to be acquired by TSEHL on completion after satisfaction or waiver of the relevant conditions precedent set out in the Cairn India Share Purchase Deed:
- extension of the long stop date for satisfaction of the conditions precedent to completion to 15 December 2011, after which either Vedanta or Cairn Energy may terminate the Cairn

India Share Purchase Deed (save for certain provisions relating to the sale of 10.0% of the fully diluted share capital of Cairn India to Vedanta pursuant to the terms of the Cairn India Share Purchase Deed, which completed on 11 July 2011 by giving five business days' notice; and

• removal of all provisions relating to the Rs. 50 per Cairn India share non- compete fee and removal of the associated non-compete undertakings of the Cairn Energy Group.

### Information agreement between Cairn Energy and Cairn India dated 8 December 2011

In accordance with the Cairn India Purchase Agreement, the Cairn Energy Group and Cairn India have entered into an agreement pursuant to which Cairn Energy Group has certain rights to information on the Cairn India Group. This agreement replaces the previous relationship agreement between Cairn Energy, Cairn India and CUKHL. This information agreement requires subject to other conditions that:

- all related party transactions between Cairn India and the Cairn Energy Group, respectively, be on an arm's length basis and approved by the board of directors of Cairn India;
- Cairn India provide, to the extent permitted under applicable law, the information Cairn Energy Group requires in order to comply with its financial and regulatory reporting requirements; and
- Cairn India will provide reasonable assistance and information in the form of marketing material, road shows and presentations for any sale of shares in Cairn India by the Cairn Energy Group.

## Cairn relationship agreement between Cairn India and the Company dated 8 December 2011

In accordance with the Cairn India Purchase Agreement, Vedanta and Cairn India have entered into a relationship agreement which is substantially on similar terms as the relationship agreement which previously existed between Cairn Energy, Cairn India and CUKHL. This relationship agreement requires Vedanta and Cairn India to each exercise all of their respective powers and, so far as they are respectively able to do so, procure that the directors of Cairn India exercise their respective powers to ensure that: (i) the business of Cairn India is at all times carried on independently of any other member of Vedanta; (ii) all dealings between Cairn India and the rest of Vedanta are approved by the Cairn India audit committee; and (iii) the business of Cairn India is managed for the benefit of its shareholders as a whole. The parties also agreed to use their reasonable endeavours to ensure that they can comply with their respective obligations under applicable law or under the rules of the stock exchanges on which their securities are traded. This relationship agreement requires Cairn India to provide Vedanta with such information as it may require in order to comply with its legal, regulatory and reporting obligations for so long as Vedanta's holding in Cairn India is of a level that requires Vedanta to account for the holding as a subsidiary or associated undertaking under IFRS. This relationship agreement requires that any offer, allotment or issue of securities in Cairn India be approved by a securities committee of the board of Cairn India. Any meeting of the securities committee must be quorate, and any decision of that committee is only valid if the majority of the members present are directors of Cairn India who have been nominated in accordance with the articles of association of Cairn India. For so long as Vedanta holds at least 10.0% of the issued equity share capital of Cairn India, Cairn India has agreed that, subject to certain limitations and subject to applicable law, Vedanta has the right to require Cairn India to take such steps as may be reasonably required by it in connection with a proposed sale or disposal of Cairn India Shares by any member of Vedanta. Cairn India is required to comply with such best practice principles, standards, policies and provisions with Vedanta reasonably requires it to comply with and has approved from time to time.

Mineral Development Agreement executed relating to the rehabilitation and development of the Western Cluster iron ore deposits with the Government of Liberia

On 3 August 2011, Sesa Goa, BFL, Elenilto, WCL and the Government of Liberia entered into a Mineral Development Agreement relating to the exploration and development of the Western Cluster iron ore deposits (the "MDA"). The MDA became effective on 22 August 2011 (the "Effective Date") following satisfaction of certain conditions, including ratification of the MDA by the Legislature of the Republic of Liberia. The initial term of the MDA is 25 years from the Effective Date and will automatically be extended to match any extensions of the term of any mining licence granted by the Government of Liberia to WCL pursuant to the MDA.

The MDA provides that exploration licences are to be granted to WCL for the exclusive exploration of iron ore deposits in the Bomi, Mano River and Bea Mountain exploration areas. The MDA provides that WCL be granted land use rights in relation to the land subject to any exploration licence or mining licence; provided WCL pays reasonable compensation to landowners and occupants of the land for loss of or diminution in value of the land. These land use rights terminate at the end of the term of the MDA.

WCL must pay the Government of Liberia a royalty of 4.5.0% multiplied by the fair market value determined in accordance with the Liberian revenue code. WCL must also pay the Government of Liberia a fee of \$25 million. In addition, WCL is required to develop programmes for the development and maintenance of the communities that have formed and that may form as a result of its operations in the exploration areas and to also make annual contributions ranging from \$2 million to \$3.1 million to a specially managed fund for the benefit of communities in affected counties.

In the event of a transfer of an interest in WCL, WCL or the transferor of such interest must pay a withholding tax to the Government of Liberia of 15.0% of the value of all cash and other consideration received by the transferor or any other entity with respect to the transfer. No change of control of WCL is permitted by the MDA unless the prior written consent of the Government of Liberia is obtained or is otherwise permitted under the MDA. The MDA provides that a change of control of a shareholder of WCL (including Elenilto, BFL and any person who acquires an interest in WCL) will constitute a change of control of WCL. Due to a change in control of WCL pursuant to the share purchase agreement dated 20 December 2012, the Legislature of Liberia is required to approve the amendment to the MDA which is currently in progress.

WCL agreed to indemnify the Government of Liberia and its officers and agents from all losses and liabilities incurred as a direct consequence of death or injury to persons or damage to property directly resulting from the conduct of WCL. Sesa Goa, BFL and Elenilto jointly and severally guaranteed the performance of the obligations of BFL and WCL under the MDA. Furthermore, Sesa Goa agreed to maintain a net worth of at least \$100 million. The MDA is governed by Liberian law.

## Rajasthan Production Sharing Contract

Cairn India is working in partnership with its joint operation partner, ONGC, in the Rajasthan Block. The Rajasthan production sharing contract (the "Rajasthan Block PSC") was signed on 15 May 1995 between the GoI and a consortium consisting of ONGC and Shell India Production Development BV.

Cairn India acquired its interest in the Rajasthan Block PSC in three stages, eventually acquiring a 100 per cent. beneficial interest in the assets and liabilities as of May 2002 and acquiring legal title to this interest on 20 June 2003. Under the Rajasthan Block PSC, the GoI has an option to acquire a

participating interest of 30 per cent. in any development area containing a commercial discovery. The GoI exercised its right in all three development areas, specifically DA 1 in 2005, DA 2 in 2007 and DA 3 in 2009, acting through its nominee, ONGC, and acquired a 30 per cent. participating interest.

Under the Rajasthan Block PSC, until such time as India attains self-sufficiency in its crude oil supply, Cairn India is required to sell to the GoI, or its nominee, all of Cairn India's entitlement to crude oil and condensate extracted from the Rajasthan Block to assist in satisfying domestic Indian crude oil demand. The GoI has the option but not an obligation to purchase the entire or part of the crude oil produced from the Rajasthan Block. However, the GoI has granted permission to Cairn India to sell the remaining quantities of crude oil, over and above those allocated to government nominees, to other domestic private refineries. As of 31 September 2016, Cairn India sells the crude oil to both private refineries and, the public sector undertakings refineries. As of 31 March 2016, commercial sales arrangements were in place for over 200,000 bopd with public sector undertakings and private refineries. Any additional sales to the public sector undertakings refineries, special economic zone refineries and overseas are subject to approval from the GoI.

The Rajasthan Block PSC established a management committee for the Rajasthan Block, which consists of four members, two of whom are nominated by and represent the GoI and the licensee, ONGC, together, and two of whom are nominated by and represent Cairn India. The management committee must unanimously approve annual work programmes, budgets, proposals for the declaration of a discovery as commercial, field development plans, and the delineation of or additions to a development area, whereas all other matters only require a majority vote.

The Rajasthan Block PSC is currently due to expire in May 2020, but it may be extended by mutual agreement among the parties for up to an additional ten years in the case of commercial production of natural gas or, in other cases, up to five years. There is also a provision to further extend the production sharing contract by agreement of the parties if production of crude oil or natural gas is expected to continue after the relevant period.

The Rajasthan Block benefitted from a tax holiday of seven years from the fiscal 2009 (being the year of commencement of commercial production in the Rajasthan Block) to 31 March 2016. However, during this seven year period, minimum alternate tax rules applied resulting in a taxation of book profits calculated in accordance with the generally accepted accounting principles used in India. Any minimum alternate tax paid can be carried forward for a total period of ten years from the year of credit and used to reduce corporate tax due in future years in excess of minimum alternate tax payable in those years.

# Ravva Block Production Sharing Contract for the exploration, development and production of the Ravva field.

The production sharing contract for the exploration, development and production of the Ravva field (the "Ravva PSC") was signed on 28 October 1994 between the GoI and a consortium consisting of ONGC, Videocon Petroleum Limited, Ravva Oil and Cairn Energy India Pty Limited (formerly known as Command Petroleum (India) Pty Limited) ("Command Petroleum") with Command Petroleum being designated as the operator. In 1996, Cairn Energy Plc acquired Command Petroleum, including its interest in the Ravva field, and Cairn India became the operator.

Cairn India holds a 22.5 per cent. working interest in the Ravva field, with the remaining interests currently held by ONGC (40 per cent.), Videocon Petroleum Limited (25 per cent.) and Ravva Oil (12.5 per cent.) (together, the "Ravva joint operation"). The Ravva PSC is valid until 27 October 2019, but may be extended by the GoI for up to an additional ten years in the case of commercial production of non-associated natural gas or, in other cases, up to five years.

Under the Ravva PSC, Cairn India is entitled to recover 100 per cent. of exploration, development and costs of production from crude oil and natural gas sales before any profit is allocated among the parties.

Under the Ravva PSC, until such time as India attains self-sufficiency in its crude oil supply, Cairn India is required to sell in the domestic Indian market all of its entitlement to crude oil extracted from the Ravva field to assist in satisfying domestic Indian crude oil demand.

#### Cambay basin production sharing contract

Exploration, development and production of the Cambay basin block is governed by a production sharing contract between the GoI and a consortium consisting of ONGC, Tata Petrodyne Limited and Cairn India, (the "Cambay basin joint operation") which was signed on 30 June 1998 and expires in 2023. The production sharing contract can be extended for a period of 35 years in case of commercial production of non-associated natural gas or for a period not exceeding five years. Cairn India's participating interest in the Cambay basin joint operation consists of a 40 per cent. interest in the Lakshmi, Gauri and CB-X development areas. The remaining interests in these development areas are held by ONGC (50 per cent.) and Tata Petrodyne (10 per cent.).

#### **Conflicts of Interest**

From time to time, conflicts of interest have in the past and will in the future arise between the Company and its affiliates. With respect to transactions between the Company and its affiliates, Directors and executive officers that involve conflicts of interests, the Company has in the past undertaken and will continue in the future to undertake such transactions in compliance with the rules for interested or related party transactions of the LSE on which the Company is listed, the NYSE on which Vedanta Limited is listed and the Indian stock exchanges.

The rules applicable to LSE listed companies require that the details of a related party transaction be notified to a regulatory information service and disclosed to the FCA as soon as possible after the terms of the transaction are agreed upon. There is also a requirement that a circular containing information about the related party transaction be sent to all shareholders and that their approval of the related party transaction be obtained either before the transaction is entered into or, if the transaction is conditional on shareholder approval, before the transaction is completed. The related party and its associates must be excluded from voting on the related party transactions. The requirement of shareholder approval does not apply to transactions where the gross assets of the transaction as a percentage of the gross assets of the listed company, the profits attributable to the assets of the transaction as a percentage of the profits of the listed company, the consideration for the transaction as a percentage of the aggregate market value of all the ordinary shares (excluding treasury shares) of the listed company and the gross capital of the company or business being acquired as a percentage of the gross capital of the listed company, does not exceed 5%. However, the listed company must, before entering into the related party transaction, inform the FCA of the details of the proposed related party transaction, provide the FCA with a written confirmation from an independent adviser acceptable to the FCA that the terms of the proposed related party transaction with the related party are fair and reasonable as far as the shareholders of the listed company are concerned and undertake in writing to the FCA to include details of the related party transaction in the listed company's next published annual financial statements, including, if relevant, the identity of the related party, the value of the consideration for the transaction or arrangement and all other relevant circumstances. Related party transactions where all the above percentage ratios are 0.25% or less have no requirements under the rules applicable to LSE-listed companies. Where several separate transactions occur between a company and the same related party during a 12-month period, the transactions must be aggregated for the purpose of applying the percentage ratio tests.

As part of Vedanta Limited's listing on the NYSE, Vedanta Limited was required to confirm to the NYSE that it will appropriately review and oversee related party transactions on an ongoing basis. Such related party transactions include transactions between Vedanta Limited and the Company, and the Company's affiliates. The NYSE reviews the proxy statements and other public filings of its listed companies as to related party transactions. Under the rules of the NYSE, Vedanta Limited was required to have an independent audit committee comprised of a majority of independent directors within 90 days of listing and comprised entirely of independent directors within one year of listing. Vedanta

Limited currently has an independent audit committee comprised entirely of independent directors and expects to continue to do so following the Listing. One of the functions of its independent audit committee is to review any related party transactions by Vedanta Limited or any of its subsidiaries or affiliates. In addition, under the rules of the NYSE, Vedanta Limited is required to obtain shareholder approval for any issuance of its equity shares, or securities convertible into or exercisable for the Company's equity shares, to any related party, except that such approval would not be required for sales of the Company's equity shares to the Company's controlling shareholder or its affiliates in an amount not to exceed 5% of the number of the Company's equity shares outstanding prior to such issuance and at a price equal to or greater than the higher of the book or market value of the Company's equity shares.

Under the listing agreements that the Company's Indian subsidiaries have entered into with the Indian stock exchanges, these subsidiaries are required to ensure that their disclosures in relation to material and significant related party transactions in their annual reports are in compliance with Indian GAAP. Specifically, these subsidiaries are required to place before their audit committee and publish in their annual reports a statement in summary form of the related party transactions entered into by them during the previous fiscal year, providing details of whether such transactions were undertaken in the ordinary course of business and details of material individual transactions with related parties or others which were not on an arm's length basis, together with their management's justification for such transactions. Under the listing agreements, their audit committee is required to review and discuss with the management the disclosures of any related party transactions, as defined under Indian GAAP, in the Company's annual financial statements.

The Company also has used and will continue to use independent appraisers in appropriate circumstances to help determine the terms of related party transactions. The Company has had and will continue to have an Audit Committee comprised entirely of independent directors which is responsible for reviewing any related-party transaction by the Company or any of its subsidiaries or affiliates.

## **DESCRIPTION OF MATERIAL INDEBTEDNESS**

Set forth below is a summary of the terms and conditions of certain of Vedanta's debt instruments that Vedanta considers to be the most material as of the date of this Offering Circular. The summary may not contain all of the information that is important to you. You should read the notes to the financial statements for additional information about the indebtedness of Vedanta.

As of 30 September 2016 Vedanta had \$16,333.3 million of debt outstanding including term loans and working capital facilities. Vedanta expects to use a portion of the proceeds of the offering to fund the concurrent tender Offers for its any and all outstanding 2018 Bonds and 2019 bonds.

In addition, Vedanta had \$485.1 million of undrawn credit facilities. Set forth below is information regarding Vedanta's material debt outstanding as of 30 September 2016.

### **Material Indebtedness**

Issue of \$1,200.0 million 6% bonds due 2019 and \$500.0 million 7.125% bonds due 2023 by the Company with Barclays Bank Plc, BofA Merrill Lynch, Citi, JP Morgan, The Royal Bank of Scotland and Standard Chartered Bank as joint global co-ordinators

In June 2013, the Company issued \$1,200.0 million bonds bearing a coupon rate of 6% and \$500.0 million at a coupon rate of 7.125%. The same are due for repayment in January 2019 and May 2023 respectively.

The 2021 Bonds were offered by Barclays Bank Plc, BofA Merrill Lynch, Citi, JP Morgan, The Royal Bank of Scotland and Standard Chartered Bank as joint lead managers, outside of and within the United States in accordance with Regulation S and Rule 144A, respectively, under the Securities Act.

The issue price of the bonds was 100% of the principal amount. The interest is payable semi-annually payable on (i) with respect to the 2019 Bonds, 3 June and 3 December of each year and (ii) with respect to the 2023 Bonds, 3 June and 3 December of each year. 2019 Bonds will mature on 31 January 2019 and the 2023 Bonds will mature on 31 May 2023.

Under the terms and conditions of the Bonds, the Company is subject to certain covenants restricting it and its material subsidiaries (as defined in the terms and conditions of the bonds) from creating or permitting to subsist any mortgage, charge, pledge, lien or other form of encumbrance or security interest upon the whole or any part of their respective undertaking, assets or revenues, present or future to secure any indebtedness or debt or any guarantee or indemnity in respect of the Company's indebtedness or relevant debt (as defined in the terms and conditions of the bonds) of its material subsidiaries, unless the bonds are secured equally and ratably therewith or otherwise benefit identically or not materially less beneficial to the bondholders. Concurrent with this offering of the Bonds, Vedanta is conducting a Tender Offer for the 2019 Bonds. Vedanta plans to use a portion of the proceeds from the offering of the Bonds to fund the Tender Offer.

Issue of \$900.0 million 8.25% bonds due 2021 by the Company with Barclays Bank Plc, Citi, Credit Suisse, The Royal Bank of Scotland and Standard Chartered Bank as joint global co-ordinators

On 7 June 2011, the Company issued \$900.0 million 8.25% bonds due 2021 ("2021 Bonds"). The 2021 Bonds were offered by Barclays Bank Plc, Citi, Credit Suisse, The Royal Bank of Scotland and Standard Chartered Bank as joint lead managers, outside of and within the United States in accordance with Regulation S and Rule 144A, respectively, under the Securities Act. The issue price of the bonds was 100% of the principal amount. The interest on the 2021 Bonds is payable semi-annually in arrear on 7 June and 7 December each year, at a rate of 8.25% per annum. The 2021 Bonds will mature on 7 June 2021.

Under the terms and conditions of the 2021 Bonds, the Company is subject to certain covenants restricting it and its material subsidiaries (as defined in the terms and conditions of the bonds) from creating or permitting to subsist any mortgage, charge, pledge, lien or other form of encumbrance or security interest upon the whole or any part of their respective undertaking, assets or revenues, present or future to secure any indebtedness or debt or any guarantee or indemnity in respect of the Company's indebtedness or relevant debt (as defined in the terms and conditions of the bonds) of its material subsidiaries, unless the bonds are secured equally and rateably therewith or otherwise benefit identically or not materially less beneficial to the bondholders.

# Issue of \$750.0 million 9.50% bonds due 2018 by the Company with JPMorgan and Morgan Stanley as joint global co-ordinators

On 2 July 2008, the Company issued \$750.0 million 9.50% bonds due 2018 ("2018 Bonds"). The 2018 Bonds were offered by JPMorgan and Morgan Stanley as joint global co-ordinators, outside of and within the United States in accordance with Regulation S and Rule 144A, respectively, under the Securities Act.

The interest on the 2018 Bonds is payable semi-annually in arrear on 18 January and 18 July each year, at a rate of 9.5% per annum. The 2018 Bonds will mature on 18 July 2018.

Under the terms and conditions of the 2018 Bonds, the Company is subject to certain covenants restricting it and its material subsidiaries (as defined in the terms and conditions of the bonds) from creating or permitting to subsist any mortgage, charge, pledge, lien or other form of encumbrance or security interest upon the whole or any part of their respective undertaking, assets or revenues, present or future to secure any indebtedness or debt (as defined in the trust deed dated 2 July 2008 between the Company and Deutsche Trustee Company Limited), or any guarantee or indemnity in respect of the Company's indebtedness or any relevant debt (as defined in the terms and conditions of the bonds) of its material subsidiaries, unless the bonds are secured equally and rateably therewith or otherwise benefit identically or not materially less beneficial to the bondholders.

Concurrent with this offering of the Bonds, Vedanta is conducting a Tender Offer for the 2018 Bonds. Vedanta plans to use a portion of the proceeds from the offering of the Bonds to fund the Tender Offer.

\$1.2 billion Term Loan Facility between TSMHL as borrower and Bank of America, N.A., Barclays Bank PLC, Citigroup Global Markets Asia Limited, JPMorgan Chase Bank N.A., Singapore Branch, The Royal Bank of Scotland plc and Standard Chartered Bank as arrangers

On 15 May 2013, TSMHL entered into a Term Loan facility agreement with Bank of America, N.A., Barclays Bank PLC, Citigroup Global Markets Asia Limited, JPMorgan Chase Bank N.A., The Royal Bank of Scotland plc and Standard Chartered Bank for an amount of \$1.2 billion (the "2013 Term Loan Facility").

The proceeds of the 2013 Term Loan Facility were used to partly refinance \$2,664.4 million drawn to meet the funding requirements for the acquisition of 28.5% stake in Cairn India Limited in December 2011. The facility is due for repayment in four equal annual instalments starting June 2015. The first two instalments due in June 2015 and June 2016 have been duly repaid. As at 30 September 2016, the principal amount outstanding is \$600.0 million.

The interest payable is LIBOR plus 2.75% and the facility is secured against Cairn India Shares held by TSMHL (subject to RBI approvals), the shares of TSMHL held by Twin Star Energy Limited and a segregated deposit account of TSMHL.

# \$500.0 million Term Loan Facility between TSMHL as borrower and Standard Chartered Bank and First Gulf Bank PJSC as arrangers

In August 2014, TSMHL tied up a \$500.0 million facility with Standard Chartered Bank and First Gulf Bank PJSC of which \$250.0 million is under a commodity murabaha structure (Islamic financing) and balance \$250 million is under a conventional loan structure. Out of the said facility \$287.5 million bears an interest rate of LIBOR plus 275 basis points with an average maturity of about five years from the date of first drawdown in August 2014 and balance amount of \$212.5 million bears an interest rate of LIBOR plus 340 basis points with an average maturity of about six years from the date of first drawdown in August 2014. As at 30 September 2016, the principal amount outstanding is \$475.0 million.

## \$180.0 million Term Loan Facility between Vedanta Finance (Jersey) Limited and ICICI Bank Limited, Hong Kong Branch

In March 2013, Vedanta Finance (Jersey) Limited entered into a term loan agreement arranged by ICICI Bank, Hong Kong branch for an amount of \$180.0 million. The interest payable is 4.27% above three month US dollar LIBOR. The term loan is unsecured and has a balance average maturity of 1.4 years. As of 30 September 2016, principal amount of \$180.0 million was outstanding under this facility.

# \$170.0 million Term Loan Facility between Valliant Jersey Limited and ICICI Bank Limited, DIFC Branch

In March 2013, Valliant Jersey Limited entered into a term loan agreement with ICICI Bank Limited, DIFC Branch for an amount of \$170.0 million. The interest payable is 4.3% above three month US dollar LIBOR. The term loan is unsecured and with a balance average maturity of 2.8 years. As of 30 September, \$170.0 million was the principal amount outstanding under this facility.

# \$500.0 million Term Loan Facility between Monte Cello Corporation NV and ICICI Bank Limited Bahrain and DIFC Dubai Branch

In July 2011, Monte Cello Corporation NV entered into a term loan agreement with ICICI Bank for an amount of \$500.0 million. The interest payable is 3.9% above three month US dollar LIBOR. The term loan is not secured and is repayable in two equal instalments at the end of six and a half years and seven years of the loan. As of 30 September 2016, \$500.0 million was the principal amount outstanding under this facility.

# \$500.0 million Term Loan Facility between Welter Trading Limited as borrower and Standard Chartered Bank as arrangers

In October 2013, the Company entered into a syndicated facility agreement with Standard Chartered Bank as facility agent for borrowing up to \$500.0 million bearing an interest rate of US\$LIBOR plus 357 basis points. The same is repayable as two equal instalments of \$250.0 million each in October 2017 and January 2018. As at 30 September 2016, the principal amount outstanding under this facility was \$500.0 million.

# \$500.0 million Term Loan Facility dated March 2014 between Twinstar Holding Limited as borrower and Standard Chartered Bank as arrangers

In March 2014, the Company has entered into a \$500.0 million syndicated facility agreement with Axis Bank as the lead arranger. The facility bears an interest rate of \$LIBOR plus 352 basis points. The facility was fully drawn in September 2014. The same is repayable as \$100.0 million in December 2018, \$150.0 million in March 2019 and \$250.0 million in September 2019. As at 30 September 2016, the principal amount outstanding under this facility was \$500.0 million.

## \$350.0 million Term Loan Facility between Vedanta Resources Plc with SBI (London Branch)

In March 2015, the Company entered into a facility agreement with State Bank of India for \$350.0 million. Out of said facility \$100.0 million bears an interest rate of \$LIBOR plus 370 basis points and is repayable in March 2020. \$250.0 million bears an interest rate of \$LIBOR plus 403 basis points repayable in two instalments of \$100.0 million and \$150.0 million in June 2021 and June 2022 respectively. As at 30 September 2016, the principal amount outstanding was \$350.0 million under this facility.

### \$300.0 million Term Loan Facility between Vedanta Resources Plc with SBI (London Branch)

In January 2016, the Company entered into a facility agreement with State Bank of India for \$300.0 million. Out of which \$120.0 million bears an interest rate of \$LIBOR plus 450 basis points and is repayable in February 2022. Balance \$180.0 million bears an interest rate of 454 basis points. As at 30 September 2016, the principal amount outstanding was \$300.0 million under this facility.

### \$820.0 million Term Loan Facility to KCM from Standard Bank

A term loan facility of US\$820.0 million has been obtained by KCM from Standard Bank. In November, 2015 the loan agreement was amended and restated with Standard Bank and got a moratorium period for testing of financial covenants. First testing will be done on 30 September 2017. The loan consists of 2 tranches: Facility A (repayable in 11 quarterly installments commencing from 30 September 2016) and Facility B (repayable in 14 quarterly installments commencing from 31 March 2017). The loan is secured against the fixed assets of KCM and a corporate guarantee from Vedanta Resources plc for the amount equivalent to the total outstanding loan. Interest is payable quarterly at LIBOR plus 350 basis points for Facility A and LIBOR plus 300 basis points for Facility B. As at 30 September 2016, the principal amount outstanding was \$546.4 million under this facility.

### Vedanta Limited

Axis Bank Limited's Rupee Term Loan of INR 30.0 billion

In June 2016, Vedanta Limited entered into common rupee loan agreement with Axis Bank Limited to avail rupee term loan of INR 30.0 billion at an interest rate of the bank's 1 year MCLR plus 45 basis points. The facility is secured by hypothecation of movable fixed assets of 1 MTPA of refinery at Langigarh (along with captive power plant of 75 MW) and aluminium smelter of 1.6 MTPA along with a 1,215 MW CPP at Jharsuguda, Odisha and the mortgage by deposit of title deeds of the land pertaining to the project. The facility is repayable in 10 equal semi-annual instalments up to 30 April 2021. As at 30 September 2016, the principal amount outstanding under this facility was \$445.5 million.

### Axis Bank Limited's rupee corporate loan of INR 50.0 billion

In November 2015, Vedanta Limited entered into common rupee loan agreement with Axis Bank Limited to avail rupee term loan of INR 50 billion at an interest rate of bank's base rate plus 30 basis points. The facility is secured by first pari passu mortgage and charge over the fixed assets of Vedanta Limited in respect of the aluminium manufacturing facilities in Odisha. The facility is repayable in 60 quarterly instalments up to 31 December 2030. As at 30 September 2016, the principal amount outstanding was \$295.5 million (including the amount outstanding on the portion of loan novated to other banks).

Axis Bank Limited novated a part of facility to the following banks:

- a) Loan amount of INR 2.0 billion, at an interest rate of bank's base rate plus 5 basis points per annum, have been novated to State Bank of Hyderabad. As at 30 September 2016, the principal amount outstanding was \$29.6 million.
- b) Loan amount of INR 5.0 billion, at an interest rate of bank's base rate plus 15 basis points per annum, have been novated to Vijaya Bank. As at 30 September 2016, the principal amount outstanding was \$73.9 million.
- c) Loan amount of INR 3.0 billion, at an interest rate of bank's base rate plus 15 basis points per annum, have been novated to State Bank of Patiala. As at 30 September 2016, the principal amount outstanding was \$44.3 million.

State Bank of India's rupee corporate loan of INR 12.5 billion

In December 2015, Vedanta Limited entered into corporate loan agreement with State Bank of India to avail corporate loan of INR 12.50 billion at an interest rate of bank's base rate plus 20 basis points. The facility is secured by first pari passu mortgage and charge over the fixed assets of aluminium division of Vedanta Limited. The facility is repayable in 29 quarterly instalments up to 31 March 2025. As at 30 September 2016, the principal amount outstanding was \$187.5 million.

State Bank of India's rupee corporate loan of INR 50 billion

In July 2014, Vedanta Limited entered into corporate loan agreement with State Bank of India to avail corporate loan of INR 50 billion at an interest rate of bank's base rate plus 30 basis points. The facility is secured by first pari passu mortgage and charge over the fixed assets of aluminium division of Vedanta Limited. The facility is repayable in 30 quarterly instalments up to 31 March 2022. As at 30 September 2016, the principal amount outstanding was \$693.8 million.

Bank of Baroda's rupee term loan of INR 20 billion

In April 2014, Vedanta Limited entered into rupee loan agreement with Bank of Baroda to avail term loan of INR 20 billion at an interest rate of bank's base rate plus 10 basis points. The facility is secured by first pari passu hypothecation over the movable fixed assets and mortgage over immovable fixed assets of the Aluminium division of Vedanta Limited. The facility is repayable in 25 equal quarterly instalments up to 31 December 2020. As at 30 September 2016, the principal amount outstanding was \$246.0 million.

Bank of India's rupee term loan of INR 20 billion

In April 2014, Vedanta Limited entered into rupee loan agreement with Bank of India to avail term loan of INR 20 billion at an interest rate of bank's base rate plus 15 basis points. The facility is secured by first pari passu hypothecation over the movable fixed assets and mortgage over immovable fixed assets of the Aluminium division of Vedanta Limited. The facility is repayable in 25 equal quarterly instalments up to 31 December 2020. As at 30 September 2016, the principal amount outstanding was \$234.8 million.

### Talwandi Sabo Power Limited:

Yes Bank Limited's Rupee Term Loan facility of INR 12.5 billion

In July 2016, the TSPL has entered into a loan agreement with Yes Bank Limited to avail term loan of INR 12.5 million at an interest rate of bank's 1 year MCLR plus 25 basis points. The facility is secured by first pari passu charge on the movable and immovable assets of the company along with the corporate guarantee from Vedanta Limited. The facility is repayable in 10 semi-annual instalments starting from January 2018. As at 30 September 2016, the principal amount outstanding was \$187.5 million.

State Bank Of India's Rupee Term Loan facility of INR 20.0 billion

In December 2015, TSPL has entered into a term loan facility agreement with State Bank of India to avail term loan of INR 20 billion at an interest rate of bank's base rate plus 40 basis points. The facility is secured by pari passu charge on the assets of TSPL pertaining to the project envisaging development of 1,980 MW coal based thermal power plant, both present and future, with an unconditional and irrevocable corporate guarantee by Vedanta Limited. The facility is repayable in 48 quarterly instalments starting in June 2018. As at 30 September 2016, the principal amount outstanding was \$300.0 million.

### **Non-Convertible Debentures**

Vedanta has non-convertible debentures ("NCDs") aggregating to INR 118.3 billion principal outstanding as at 30 September 2016. These NCDs were issued by Vedanta between October 2012 and September 2016. The details of the material NCDs are as follows:

# Principal Outstanding as at September 30, 2016

Issuer of NCDs	(US\$ million) Interest Rate		Date of Maturity	
Vedanta Limited	202.5	9.1%	5 April 2018	
Vedanta Limited	300.0	9.7%	17 August 2020	

In addition to the above indebtedness, Vedanta has entered into various arrangements with lenders in relation to its long-term and short-term borrowings (which includes commercial paper and credit lines) to fund its working capital requirements. Certain of these financing arrangements are secured by movable and immovable assets of the Company, including the capital stock of its subsidiaries and, in certain instances, guarantees by the Company.

## TERMS AND CONDITIONS OF THE BONDS

The following, other than the paragraphs in italics, is the text of the terms and conditions of the Bonds which will be endorsed on the individual certificates ("Individual Certificates") issued in respect of the Bonds.

The issue of the U.S.\$1,000,000,000 6.375% Bonds due 2022 (the "Bonds", which expression shall, unless the context requires, include any bonds issued pursuant to Condition 15 and forming a single series with the Bonds issued on the Closing Date) was authorised by a resolution of the Board of Directors of Vedanta Resources plc (the "Issuer" or "Vedanta") on 13 January 2017 and 24 January 2017. The Bonds are constituted by a Trust Deed (the "Trust Deed") to be dated on or about the Closing Date between the Issuer and Citicorp International Limited (the "Trustee" which expression shall include all persons for the time being acting as trustee or trustees under the Trust Deed) as trustee for the Bondholders. These terms and conditions (the "Conditions") include summaries of, and are subject to, the detailed provisions of the Trust Deed, which includes the form of the Bonds. The Issuer will enter into a paying agency agreement to be dated on or about the Closing Date (the "Paying Agency Agreement") among the Issuer, the Trustee, Citibank, N.A., London Branch, as principal paying agent, Citigroup Global Markets Deutschland AG as transfer agent and registrar, and the other paying and transfer agents appointed under it. The principal paying agent, transfer agent, registrar, paying agents and transfer agents for the time being are referred to herein as the "Principal Agent", the "Registrar", the "Paying Agents" (which expression shall include the Principal Agent) and the "Transfer Agents" (which expression shall include the Registrar), respectively, each of which expressions shall include the successors from time to time of the relevant persons, in such capacities, under the Paying Agency Agreement, and are collectively referred to herein as the "Agents". Copies of the Trust Deed and the Paying Agency Agreement are available for inspection during usual business hours at the specified office of the Principal Paying Agent. The Bondholders (as defined in Condition 1(b)) are entitled to the benefit of, are bound by, and are deemed to have notice of, all the provisions of the Trust Deed and are deemed to have notice of the provisions of the Paying Agency Agreement applicable to them.

## 1. Form, Denomination, Title and Status

(a) **Form and denomination**: The Bonds are in registered form in the minimum denomination of U.S.\$200,000 each and in integral multiples of U.S.\$1,000 in excess thereof, without coupons attached. A bond certificate (each, a "Certificate") will be issued to each Bondholder in respect of its registered holding of Bonds. Each Bond and each Certificate will have an identifying number which will be recorded on the relevant Certificate and in the Register (as defined in Condition 2(a)).

Certificates issued with respect to Rule 144A Bonds will bear the Securities Act Legend (as defined in the Trust Deed), unless determined otherwise in accordance with the provisions of the Paying Agency Agreement by reference to applicable law. Certificates issued with respect to the Regulation S Bonds will not bear the Securities Act Legend. Upon issue, the Rule 144A Bonds will be represented by the Restricted Global Certificate and the Regulation S Bonds will be represented by the Unrestricted Global Certificate. The Restricted Global Certificate will be deposited with a custodian for, and registered in the name of Cede & Co. as nominee of, The Depository Trust Company ("DTC") and the Unrestricted Global Certificate will be deposited with a custodian for, and registered in the name of Cede & Co. as nominee of, DTC for the accounts of Euroclear Bank SA/NV ("Euroclear") and Clearstream Banking, S.A. ("Clearstream, Luxembourg"). The Conditions are modified by certain provisions contained in the Global Certificates. See "Summary of Provisions relating to the Bonds while in Global Form."

Except in the limited circumstances described in the Global Certificates and "Summary of Provisions relating to the Bonds while in Global Form," owners of interests in Bonds represented by the Global Certificates will not be entitled to receive Individual Certificates in respect of their individual holdings of Bonds. The Bonds are not issuable in bearer form.

- (b) **Title:** Title to the Bonds passes only by transfer and registration in the Register (as defined in Condition 2(a)). The holder of any Bond will (except as otherwise required by law or as ordered by a court of competent jurisdiction) be treated as its absolute owner for all purposes (whether or not it is overdue and regardless of any notice of ownership, trust or any interest in it or the theft or loss of, the Certificate (if any) issued in respect of it or anything written on it or on the relevant Certificate) and no person will be liable for so treating the holder. In these Conditions, "Bondholder" and (in relation to a Bond) "holder" mean the person in whose name a Bond is registered in the Register from time to time.
- (c) **Status:** The Bonds constitute senior, unsubordinated, direct, unconditional and (subject to Condition 3(a)) unsecured obligations of the Issuer and shall at all times rank pari passu and without any preference among themselves. The payment obligations of the Issuer under the Bonds shall, save for such exceptions as may be provided by applicable legislation and subject to Condition 3(a), at all times rank at least equally with all its other present and future unsecured and unsubordinated obligations.

### 2. Transfer of Bonds

- (a) **The Register:** The Issuer will cause to be kept at the specified office of the Registrar and in accordance with the terms of the Paying Agency Agreement a register (the "Register") on which shall be entered, on behalf of the Issuer, the names and addresses of the Bondholders from time to time and the particulars of the Bonds held by them and of all transfers and redemptions of Bonds. Each Bondholder shall be entitled to receive only one Certificate in respect of its entire holding.
- (b) **Transfers:** Subject to the terms of the Paying Agency Agreement and to Conditions 2(e) and 2(f), a Bond may be transferred by delivering the Certificate issued in respect of it, with the form of transfer on the back duly completed and signed, to the specified office of the Registrar or any of the Transfer Agents. No transfer of a Bond will be valid unless and until entered on the Register.

Transfers of interests in the Bonds evidenced by the Global Certificates will be effected in accordance with the rules of the relevant clearing systems.

Upon the transfer, exchange or replacement of a Rule 144A Bond, a Transfer Agent will only deliver Certificates with respect to Rule 144A Bonds that bear the Securities Act Legend unless there is delivered to such Transfer Agent such satisfactory evidence, which may include an opinion of legal counsel, as may be reasonably required by the Issuer, that neither the Securities Act Legend nor the restrictions on transfer set forth therein are required to ensure compliance with the provisions of the US Securities Act of 1933, as amended (the "Securities Act").

Interests in Bonds represented by the Restricted Global Certificate may be transferred to a person who wishes to take delivery of any such interest in the form of an interest in Bonds represented by the Unrestricted Global Certificate only if a Transfer Agent receives a written certificate from the transferor (in the form provided in the Paying Agency Agreement) to the effect that such transfer is being made in accordance with Rule 903 or 904 of Regulation S under the Securities Act ("Regulation S") or Rule 144 under the Securities Act ("Rule 144A") (if available).

Prior to the 40th day after the day of issue of the Bonds (the "Restricted Period"), an interest in Bonds represented by the Unrestricted Global Certificate may be exchanged for an interest in Bonds represented by the Restricted Global Certificate only if a Transfer Agent receives a written certificate from the transferee of the interest in Bonds represented by the Unrestricted Global Certificate (in the form provided in the Paying Agency Agreement) to the effect that the transferee is a qualified institutional buyer (as defined in Rule 144A) and is obtaining such interest in a transaction meeting the requirements of Rule 144A and any applicable securities laws of any state of the United States or any other jurisdiction. After the expiration of the Restricted Period, this certification requirement will no longer apply to such transfers.

Transfers of Bonds are also subject to the restrictions described under "Plan of Distribution" and "Transfer Restrictions" below.

(c) **Delivery of new Certificates:** Each new Certificate to be issued on transfer of a Bond or Bonds will, within five Business Days of receipt by the relevant Transfer Agent of the duly completed and signed form of transfer, be made available for collection at the specified office of the relevant Transfer Agent or, if so requested in the form of transfer, be mailed by uninsured mail at the risk of the holder entitled to the Bonds transferred (free of charge to the holder), to the address specified in the form of transfer.

Except in the limited circumstances described in "Summary of Provisions relating to the Bonds while in Global Form — Registration of Title", owners of interests in Bonds represented by the Global Certificates will not be entitled to receive physical delivery of Individual Certificates. Issues of Certificates upon transfers of Bonds are subject to compliance by the transferor and transferee with the certification procedures described above and in the Paying Agency Agreement and, in the case of Rule 144A Bonds, compliance with the Securities Act Legend.

Where some but not all of the Bonds in respect of which a Certificate is issued are to be transferred or redeemed, a new Certificate in respect of the Bonds not so transferred or redeemed, will, within five Business Days of delivery or surrender of the original Certificate to the relevant Transfer Agent or Registrar, be made available for collection at the specified office of the relevant Agent or, if so requested by the holder, be mailed by uninsured mail at the risk of the holder of the Bonds not so transferred or redeemed (free of charge to the holder), to the address of such holder appearing on the Register.

In this Condition 2, "Business Day" means a day (other than a Saturday or a Sunday) on which banks are open for business in the city in which the specified office of the Registrar and the relevant Transfer Agent to which the Certificate in respect of the Bonds to be transferred or relevant form of transfer is delivered is situated.

- (d) Formalities free of charge: Registration of transfer of Bonds will be effected without charge by or on behalf of the Issuer or any of the Transfer Agents, but only upon the person making such application for transfer, paying or procuring the payment (or the giving of such indemnity as the Issuer or any of the Transfer Agents may require) of any tax, duty or other governmental charges which may be imposed in relation to such transfer.
- (e) **Closed periods:** No Bondholder may require the transfer of a Bond to be registered during the period of 15 days ending on (and including) the due date for any payment of principal of that Bond or seven days ending on (and including) any Interest Record Date (as defined in Condition 6(a)).
- (f) **Regulations:** All transfers of Bonds and entries on the Register will be made subject to the detailed regulations concerning transfer of Bonds scheduled to the Paying Agency Agreement. The regulations may be changed by the Issuer with the prior written approval of the Trustee and the Registrar. A copy of the current regulations will be mailed (free of charge) by the Registrar to any Bondholder upon written request.

#### 3. Covenants

- (a) Negative Pledge: So long as any Bond remains outstanding (as defined in the Trust Deed):
- (i) the Issuer will not create or permit to subsist any mortgage, charge, pledge, lien or other form of encumbrance or security interest ("Security") upon the whole or any part of its undertaking or assets, present or future, to secure any Indebtedness or any guarantee or indemnity in respect of any Indebtedness; and

(ii) the Issuer will not permit any of its Material Subsidiaries to create or permit to subsist any Security upon the whole or any part of its undertaking or assets, present or future, to secure any Relevant Debt, or any guarantee of or indemnity in respect of any Relevant Debt;

unless, at the same time or prior thereto, the Issuer's obligations under the Bonds and the Trust Deed (x) are secured equally and rateably therewith in substantially identical terms thereto, in each case to the satisfaction of the Trustee; or (y) have the benefit of such other security or other arrangement as the Trustee in its absolute discretion shall deem to be not materially less beneficial to the Bondholders or as shall be approved by an Extraordinary Resolution (as defined in the Trust Deed) of the Bondholders;

provided that sub-clause (i) above shall not apply to Security (x) arising by operation of law or (y) created in respect of Indebtedness (which for this purpose shall exclude Relevant Debt) in an aggregate principal amount not exceeding 10% of Total Assets.

As used in these Conditions:

"Excluded Indebtedness" means any Indebtedness to finance or refinance the ownership, acquisition, development and/or operation of projects, assets or installations (the "Relevant Property") in respect of which the person or persons (in this definition the "Lender") to whom any Indebtedness is or may be owed by the relevant borrower (whether or not a member of Vedanta) has or have no recourse whatsoever to any member of Vedanta for the repayment of all or any portion of such indebtedness other than recourse to:

- (i) such borrower for amounts limited to the present and future cash flow or netcash flow from the Relevant Property; and/or
- (ii) the proceeds of enforcement of any Security given by such borrower over the Relevant Property or the income, cash flow or other proceeds deriving therefrom (or given by any shareholder or the like in the borrower over its shares or the like in the capital of the borrower) to secure such Indebtedness, provided that (A) the extent of such recourse to such borrower is limited solely to the amount of any recoveries made on any such enforcement, and (B) such Lender is not entitled, by virtue of any right or claim arising out of or in connection with such Indebtedness, to commence proceedings for the winding-up or dissolution of such borrower or to appoint or procure the appointment of any receiver, trustee or similar person or officer in respect of such borrower generally or any of its projects, assets or installations (save for the Relevant Property the subject of such security); and/or
- (iii) such borrower generally, or directly or indirectly to a member of Vedanta, under any form of assurance, undertaking or support, which recourse is limited to a claim for damages (other than liquidated damages and damages required to be calculated in a specified way) for breach of an obligation (not being a payment obligation or an obligation to procure payment by another person or an indemnity in respect thereof or an obligation to comply or to procure compliance by another person with any financial ratios or other tests of financial condition) by the person against whom such recourse is available; and/or
- (iv) any Subsidiary of the Issuer by way of guarantee of such Indebtedness (but not benefiting from any security or quasi-security from that Subsidiary of the Issuer);

"Group" means the Issuer and its Subsidiaries;

"Indebtedness" means any obligation (whether present or future, actual or contingent, secured or unsecured, as principal, surety or otherwise) for the payment or repayment of money;

"Material Subsidiary" has the meaning specified in Condition 8;

"Relevant Debt" means any present or future indebtedness (other than Excluded Indebtedness) of the Issuer or any other person in the form of, or represented by, bonds, notes, debentures, loan stock or other securities, which are for the time being, or are capable of being, quoted, listed or ordinarily dealt in on any stock exchange, over-the-counter or other securities market, have an original maturity of more than one year from their date of issue and are denominated, payable or optionally payable in a currency other than Rupees or are denominated in Rupees and more than 50% of the aggregate principal amount of which is initially distributed outside India by or with the authority of the Issuer;

"Subsidiary" means any company or other business entity of which the Issuer owns or controls (either directly or through one or more other Subsidiaries) more than 50% of the issued share capital or other ownership interest having ordinary voting power to elect directors, managers or trustees of such company or other business entity or any company or other business entity which at any time has its accounts consolidated with those of the Issuer or which, under English or other applicable law or regulations, or International Financial Reporting Standards, as the case may be, from time to time, should have its accounts consolidated with those of the Issuer; and

"Total Assets" means the aggregate of consolidated total current assets and consolidated total non-current assets of (i) the Issuer as shown in the balance sheet of the latest available audited consolidated financial statements of the Issuer; and (ii) any Subsidiary of the Issuer acquired by the Issuer or any Subsidiary of the Issuer since the date of the latest available audited consolidated financial statements of the Issuer as shown in the balance sheet of the latest available audited consolidated financial statements of such Subsidiary.

- (b) Dividend restriction: The Issuer shall not, and shall procure that each of its Material Subsidiaries shall not, create or otherwise cause or permit to exist or become effective any consensual encumbrance or restriction on the ability of any Material Subsidiary to pay dividends or make any other distribution with respect to its Share Capital or to make or repay loans to the Issuer or any other Material Subsidiary of the Issuer, other than (v) the subordination of any Indebtedness made to the Issuer or any of its Material Subsidiaries to any other Indebtedness of the Issuer or any of its Material Subsidiaries; provided that (i) such other Indebtedness is permitted under these Conditions and (ii) such subordination would not singly or in the aggregate have a materially adverse effect on the ability of the Issuer to meet its obligations under the Bonds, (w) such encumbrance or restriction in relation to any Indebtedness of any Material Subsidiary or other assurance against financial loss where such encumbrance or restriction relates to payment of dividends or other distributions during the continuance of an event of default (howsoever described) which has occurred pursuant to the terms of that Indebtedness; (x) such encumbrance or restriction arising by operation of law; (y) such encumbrance or restriction as is in existence on the date of issue of the Bonds; or (z) in respect of any Person (including any existing Subsidiary of the Issuer) which becomes a Material Subsidiary after the date of issue of the Bonds, any encumbrance or restrictions on such Person as may be in existence on the date such Person becomes a Material Subsidiary provided such restrictions were not imposed in contemplation of such Person becoming a Material Subsidiary; provided that this Condition 3(b) shall not restrict any Material Subsidiary from issuing Preferred Stock otherwise in accordance with these terms of the Conditions.
- (c) Limitation on Borrowings: The Issuer shall not, and shall procure that each of its Subsidiaries shall not, Incur directly or indirectly any Borrowings, and the Issuer shall procure that each of its Subsidiaries shall not issue any Preferred Stock; provided that (x) the Issuer may Incur Borrowings if, after giving pro forma effect to the Incurrence of such Borrowings and the application of the proceeds thereof, the Fixed Charge Coverage Ratio would be not less than 3.0 to 1.0 and (y) any Subsidiary of the Issuer may Incur Borrowings or issue Preferred Stock if, after giving pro forma effect to the Incurrence of such Borrowings or issuance of Preferred Stock and the application of the proceeds thereof, the Fixed Charge Coverage Ratio would be not less than 3.5 to 1.0.

- (d) Limitation on distribution of Net Proceeds of Asset Sales: The Issuer shall not, and shall procure that each of its Subsidiaries shall not pay any dividend in respect of or otherwise distribute the Net Proceeds from any Asset Sale to any Person (other than to the Issuer or any of its Subsidiaries) if such dividend or distribution, individually or when aggregated with all other dividends or distributions in respect of the Net Proceeds from any Asset Sales in the twelve month period prior to the date of the declaration of such dividend or distribution, exceeds U.S.\$250,000,000 or its equivalent in other currencies.
- (e) **Material Subsidiaries:** So long as any of the Bonds are outstanding (as defined in the Trust Deed), the Issuer or any of its Subsidiaries shall retain Control over, or, directly or indirectly, own more than 50% of the issued equity share capital of, each of its Material Subsidiaries.
- (f) Accounts: The Issuer agrees that (i) as soon as reasonably practicable after the issue or publication thereof and in any event within 180 days after the end of each financial year (beginning with 31 March 2017) it will deliver to the Trustee and the specified office of each of the Paying Agents three copies of its annual report and audited Accounts as at the end of and for the financial year ending on such 31 March and will establish, announce and conduct one conference call with all the holders of Bonds (including the beneficial owners thereof), the contents of which will be limited to such annual report and audited Accounts and any other publicly available information regarding the Issuer and its Subsidiaries; (ii) as soon as reasonably practicable after the issue or publication thereof, it will deliver to the Trustee and the specified office of each of the Paying Agents three copies of its unaudited interim Accounts as of the end of the six month period ending on 30 September (beginning with 30 September 2017), provided that if and to the extent that the financial statements are not prepared or adjusted on a basis consistent with that used for the preceding relevant semi-annual or annual fiscal period, that fact shall be stated, and will establish, announce and conduct one conference call with all the holders of Bonds (including the beneficial owners thereof), the contents of which will be limited to such unaudited interim Accounts and any other publicly available information regarding the Issuer and its Subsidiaries; and (iii) with each set of Accounts delivered by it under this Condition 3 or otherwise within 14 days of the request of the Trustee, the Issuer will deliver to the Trustee and the specified office of each of the Paying Agents the Compliance Certificate.
- (g) **Covenant suspension:** If, on any date following the date of the Trust Deed, the Bonds have an Investment Grade rating from any two of the Rating Agencies and no Event of Default or Potential Event of Default (as defined in the Trust Deed) has occurred and is continuing (a "Suspension Event"), then, beginning on that day and continuing until such time, if any, at which the Bonds cease to have an Investment Grade rating from either of the Rating Agencies, the provisions of the Trust Deed summarised under the following captions will not apply to the Bonds:
  - (a) Condition 3(c) "Limitation on Borrowings"; and
  - (b) Condition 3(d) "Limitation on distribution of Net Proceeds of Asset Sales."

Such covenants will be reinstituted and apply according to their terms as at and from the first day on which a Suspension Event ceases to be in effect. Such covenants will not, however, be of any effect with regard to actions of the Issuer properly taken in compliance with the provisions of the Trust Deed during the continuance of the Suspension Event.

#### (h) **Definitions:** As used in these Conditions:

"Accounts" means (i) as of each 31 March and for the twelve month period then ending, the audited consolidated profit and loss account and balance sheet of the Issuer prepared in accordance with Applicable Accounting Principles and (ii) as of each 30 September and for the six month period then ending, the unaudited consolidated profit and loss account and balance sheet of the Issuer prepared in accordance with Applicable Accounting Principles.

"Adjusted Treasury Rate" means, with respect to any redemption date, the rate per annum equal to the semi-annual equivalent yield in maturity of the Comparable Treasury Issue, assuming a price for the Comparable Treasury Issue (expressed as a percentage of its principal amount) equal to the Comparable Treasury Price for such redemption date.

"Affiliate" means, with respect to any Person, any other Person, directly or indirectly controlling, controlled by, or under direct or indirect common control with, such Person. For purposes of this definition, "control" (including, with correlative meanings, the terms "controlling," "controlled by" and "under common control with"), as applied to any Person, means the possession, directly or indirectly, of the power to direct or cause the direction of the management and policies of such Person, whether through the ownership of voting securities, by contract or otherwise.

"Applicable Accounting Principles" means the accounting principles and provisions of International Financial Reporting Standards applicable to the Issuer and its Subsidiaries as in effect from time to time.

"Applicable Premium" means with respect to a Bond at any redemption date, the greater of (i) 1.0% of the principal amount of such Bond and (ii) the excess of (A) the present value at such redemption date of 100% of the principal amount of such Bond, plus all required remaining scheduled interest payments due on such Bond through the stated maturity of the Bond (but excluding accrued and unpaid interest to the redemption date), computed using a discount rate equal to the Adjusted Treasury Rate plus 50 basis points, over (B) the principal amount of such Bond.

"Assets" of any Person means all or any of its shares, business, undertaking, property, assets, revenues (including any right to receive revenues) and uncalled capital.

"Asset Sale" means any sale, transfer or other disposition (including by way of merger, consolidation or sale leaseback transactions) in one or a series of transactions in any twelve month period by the Issuer or any Subsidiary to any Person other than the Issuer or any of its Subsidiaries of a material part of the consolidated Assets of the Issuer.

"Balance Sheet Date" means each 30 September and 31 March or other semi-annual date at which the Issuer prepares its audited or unaudited Accounts.

"Borrowings" means, with respect to any Person at any date, without duplication, (i) all obligations of such Person for borrowed money, (ii) all obligations of such Person to pay the deferred purchase price of property or services, except trade accounts payable arising in the ordinary course of business, (iii) all obligations of such Person as lessee which are capitalised in accordance with Applicable Accounting Principles, (iv) all non-contingent obligations of such Person to reimburse any bank or other Person in respect of amounts paid under a letter of credit or similar instrument, except in respect of trade accounts payable arising in the ordinary course of business, (v) all obligations of such Person representing Disqualified Stock valued at the greater of its voluntary or involuntary liquidation preference and its maximum fixed repurchase price, plus accrued dividends, if any, (vi) all Borrowings of others guaranteed by such Person, (vii) all Borrowings of others secured by Security on any Asset of such Person (whether or not such Borrowings are assumed by such Person); provided that the amount of such Borrowings will be the lesser of (A) the fair market value of such Asset at such date of determination and (B) the amount of such Borrowings, and (viii) in the case of a Subsidiary of the Issuer, all obligations representing Preferred Stock valued at the greater of its voluntary or involuntary maximum fixed repurchase price, plus accrued dividends, if any; provided that for the purposes of Condition 3(c), Borrowings shall not include (A) Borrowings of the Issuer or any of its Subsidiaries owed to the Issuer or any of its Subsidiaries; provided that where (1) any Subsidiary of the Issuer to which such Borrowing is owed ceases to be a Subsidiary of the Issuer or (2) there is a subsequent transfer of such Borrowing to any Person (other than the Issuer or any of its Subsidiaries), then such Borrowing shall be deemed to constitute a Borrowing for the purposes of Condition 3(c) and (B) Preferred Stock or Disqualified Stock issued by any Subsidiary of the Issuer to the Issuer or any other Subsidiary of the Issuer; provided further that for the purposes of clause (y) of the proviso in Condition 3(c), Borrowings shall not include the Borrowings of any Subsidiary (which is established as a special purpose entity for the sole purpose of engaging in financing activities) of the Issuer, which are guaranteed by the Issuer and have no recourse, directly or indirectly, to any other member of Vedanta.

"Business Day" means a day (other than a Saturday or Sunday) on which commercial banks are open for business in New York City and London.

"Capital Stock" means, with respect to any Person, any and all shares, interests, participations or other equivalents (however designated, whether voting or non-voting) in equity of such Person, whether outstanding on the date of the Trust Deed or issued thereafter, including, without limitation, all Common Stock and Preferred Stock.

"Change of Control" means the occurrence of either of the following events:

- (1) the Permitted Holders are the beneficial owners of less than 35% of the total voting power of the Voting Stock of the Issuer; or
- (2) any "person" or "group" (as such terms are used in Sections 13(d) and 14(d) of the United States Securities Exchange Act of 1934, as amended (the "Exchange Act")) is or becomes the "beneficial owner" (as such term is used in Rule 13d-3 of the Exchange Act), directly or indirectly, of total voting power of the Voting Stock of the Issuer greater than such total voting power held beneficially by the Permitted Holders.

"Change of Control Triggering Event" means the occurrence of both a Change of Control and a Rating Decline.

"Common Stock" means, with respect to any Person, any and all shares, interests or other participations in, and other equivalents (however designated and whether voting or non-voting) of such Person's common stock or ordinary shares, whether or not outstanding at the date of the Trust Deed, and include, without limitation, all series and classes of such common stock or ordinary shares.

"Comparable Treasury Issue" means any United States Treasury security having a maturity comparable to the remaining term of the Bonds to be redeemed that would be utilised, at the time of selection and in accordance with customary financial practice, in pricing new issues of corporate debt securities of comparable maturity to the remaining term of such Bonds.

"Comparable Treasury Price" means, with respect to any redemption date:

- (1) the average of the bid and asked prices for the Comparable Treasury Issue (expressed in each case as a percentage of its principal amount) on the fifth Business Day preceding such redemption date, as set forth in the daily statistical release (or any successor release) published by the Federal Reserve Bank of New York and designated "Composite 3:30 p.m. Quotations for U.S. Government Securities;" or
- (2) if such release (or any successor release) is not published or does not contain such prices on such Business Day, (a) the average of the Reference Treasury Dealer Quotations for such redemption date, after excluding the highest and lowest of such Reference Treasury Dealer Quotations, or (b) if fewer than three such Reference Treasury Dealer Quotations are available, the average of all such quotations.

"Compliance Certificate" means a certificate signed by each of (i) the chief financial officer and (ii) either a director or other authorised signatory of the Issuer confirming compliance with the financial ratios set out in this Condition 3, in each case as of each Balance Sheet Date and in respect

of the whole of the financial year for each Balance Sheet Date falling on 31 March and in respect of the whole of the six month period ending on the Balance Sheet Date for each Balance Sheet Date falling on 30 September, and setting out in reasonable detail the computations necessary to demonstrate such compliance.

"Consolidated EBITDA" means, for any period, the amount equal to (i) "operating profit" plus (ii) "depreciation" plus (iii) "special items" reducing "operating profit" minus (iv) "special items" increasing "operating profit," in each case as it is presented on consolidated financial statements of the Issuer and its Subsidiaries prepared in accordance with the Applicable Accounting Principles for such period.

"Consolidated Fixed Charges" means, for any period, the sum (without duplication) of (i) Consolidated Net Interest Expense for such period and (ii) all cash and non-cash dividends accrued or accumulated during such period on any Disqualified Stock or Preferred Stock of the Issuer or any of its Subsidiaries held by Persons other than the Issuer or any of its Subsidiaries.

"Consolidated Net Interest Expense" means, for any period, the amount equal to "finance costs" minus "investment revenue," in each case as it is presented on a consolidated income statement of the Issuer and its Subsidiaries prepared in accordance with the Applicable Accounting Principles for such period.

"Control", "Controlling" or "Controlled" means the right to appoint and/or remove all or the majority of the members of the board of directors or other governing body or the right to direct or cause the direction of the management and policies, in each case whether obtained directly or indirectly, and whether obtained by ownership of share capital, the possession of voting rights, contract or otherwise.

"Disqualified Stock" means any class or series of Capital Stock of any Person that by its terms or otherwise is (1) required to be redeemed prior to the stated maturity of the Bonds, (2) redeemable at the option of the holder of such class or series of Capital Stock at any time prior to the stated maturity of the Bonds or (3) convertible into or exchangeable for Capital Stock referred to in clause (1) or (2) above or Borrowing having a scheduled maturity prior to the stated maturity of the Bonds.

"Fitch" means Fitch Ratings Limited, its affiliates and any successor to its ratings business.

"Fixed Charge Coverage Ratio" means, on any Transaction Date, the ratio of (1) the aggregate amount of Consolidated EBITDA for the then most recent two semi-annual periods prior to such Transaction Date for which consolidated financial statements of the Issuer prepared in accordance with the Applicable Accounting Principles (which the Issuer shall use its best efforts to compile in a timely manner) are available (the "Two Semi-annual Period") and have been provided to the Trustee to (2) the aggregate Consolidated Fixed Charges during such Two Semi-annual Period.

"Incur" means, as applied to any obligation, to directly or indirectly, create, incur, issue, assume, guarantee or in any other manner become directly or indirectly liable, contingently or otherwise. Such obligation and "Incurred", "Incurrence" and "Incurring" shall each have a correlative meaning.

"Investment Grade" means a long term credit rating of "AAA," "AA," "A" or "BBB," as modified by a "+" or "-" indication, or an equivalent rating representing one of the four highest rating categories, by S&P or any of its successors or assigns or a long term credit rating of "Aaa," or "Aa," "A" or "Baa," as modified by a "1," "2" or "3" indication, or an equivalent rating representing one of the four highest rating categories, by Moody's or any of its successors or assigns or assigns or a long term credit rating of "AAA," or "AA," "A" or "BBB," as modified by a "+," or "-" indication, or an equivalent rating representing one of the four highest rating categories, by Fitch or any of its successors or assigns or the equivalent long term credit ratings of any internationally recognised rating agency or agencies, as the case may be, which shall have been designated by the Issuer as having been substituted for S&P, Moody's or Fitch or all of them, as the case may be.

"Moody's" means Moody's Investors Service, Inc., its affiliates and any successor to its ratings business.

"Net Proceeds" means the aggregate cash proceeds received by the Issuer or any Subsidiary of the Issuer in respect of any Asset Sale (including, without limitation, any cash received upon the sale or other disposition of any non-cash consideration received in any Asset Sale), net of the direct costs relating to such Asset Sale.

"Offer to Purchase" means an offer to purchase the Bonds by the Issuer from the Bondholders commenced by mailing a notice by first class mail, postage prepaid, to the Trustee and each Bondholder of Bonds at its last address appearing in the Register stating:

- (1) the provision of the Trust Deed pursuant to which the offer is being made and that all Bonds validly tendered will be accepted for payment on a pro rata basis;
- (2) the purchase price and the date of purchase (which shall be a Business Day no earlier than 30 days nor later than 60 days from the date such notice is mailed) (the "Offer to Purchase Payment Date");
- (3) that any Bond not tendered will continue to accrue interest pursuant to its terms;
- (4) that, unless the Issuer defaults in the payment of the purchase price, any Bond accepted for payment pursuant to the Offer to Purchase shall cease to accrue interest on and after the Offer to Purchase Payment Date;
- (5) that Bondholders electing to have a Bond purchased pursuant to the Offer to Purchase will be required to surrender the Bond, together with the form entitled "Option of the Holder to Elect Purchase" on the reverse side of the Bond completed, to the Paying Agent at the address specified in the notice prior to the close of business on the Business Day immediately preceding the Offer to Purchase Payment Date;
- (6) that Bondholders will be entitled to withdraw their election if the Paying Agent receives, not later than the close of business on the third Business Day immediately preceding the Offer to Purchase Payment Date, a facsimile transmission or letter setting forth the name of such Bondholder, the principal amount of Bonds delivered for purchase and a statement that such Bondholder is withdrawing his election to have such Bonds purchased; and
- (7) that Bondholders whose Bonds are being purchased only in part will be issued new Bonds equal in principal amount to the unpurchased portion of the Bonds surrendered; provided that each Bond purchased and each new Bond issued shall be in a minimum principal amount of U.S.\$200,000 or integral multiples of U.S.\$1,000 in excess thereof.

On the Offer to Purchase Payment Date, the Issuer shall (a) accept for payment on a pro rata basis Bonds or portions thereof tendered pursuant to an Offer to Purchase; (b) deposit with the Paying Agent money sufficient to pay the purchase price of all Bonds or portions thereof so accepted; and (c) deliver, or cause to be delivered, to the Trustee all Bonds or portions thereof so accepted together with a certificate signed by two directors of the Issuer specifying the Bonds or portions thereof accepted for payment by the Issuer. The Paying Agent shall promptly mail to the Bondholders so accepted payment in an amount equal to the purchase price, and the Registrar shall promptly authenticate and mail to such Bondholders a new Bond equal in principal amount to any unpurchased portion of the Bond surrendered; provided that each Bond purchased and each new Bond issued shall be in a principal amount of U.S.\$200,000 or integral multiples of U.S.\$1,000 in excess thereof. The Issuer will publicly announce the results of an Offer to Purchase as soon as practicable after the Offer to Purchase Payment Date. The Issuer will comply with all applicable securities laws and regulations, in the event that the Issuer is required to repurchase Bonds pursuant to an Offer to Purchase.

The materials used in connection with an Offer to Purchase are required to contain or incorporate by reference information concerning the business of the Issuer and its Subsidiaries which the Issuer in good faith believes will assist such Bondholders to make an informed decision with respect to the Offer to Purchase, including a brief description of the events requiring the Issuer to make the Offer to Purchase, and any other information required by applicable law to be included therein. The offer is required to contain all instructions and materials necessary to enable such Bondholders to tender Bonds pursuant to the Offer to Purchase.

"Permitted Holders" means any or all of the following:

- (1) Mr. Anil Agarwal, Mr. D.P. Agarwal and Mr. Agnivesh Agarwal, individually or collectively;
- (2) Any Affiliate or a direct family member of any of the Persons specified in clause (1) of this definition; and
- (3) Any Person both the Capital Stock and the Voting Stock of which (or in the case of a trust, the beneficial interests in which) are more than 80% owned by Persons specified in clauses (1) and (2) of this definition.

"Person" means any individual, firm, corporation, partnership, association, joint venture, tribunal, limited liability company, trust, government or political subdivision or agency or instrumentality thereof, or any other entity or organisation.

"Preferred Stock" as applied to the Capital Stock of any Person means Capital Stock of any class or classes that by its term is preferred as to the payment of dividends, or as to the distribution of assets upon any voluntary or involuntary liquidation or dissolution of such Person, over any other class of Capital Stock of such Person.

"Rating Agencies" means (i) S&P, (ii) Moody's, (iii) Fitch and (iv) if any or all of them shall not make a rating of the Bonds publicly available, an internationally recognised securities rating agency or agencies, as the case may be, selected by the Issuer, which shall be substituted for such Rating Agency or Rating Agencies, as the case may be.

"Rating Date" means the date which is 90 days prior to the earlier of the date of consummation of Change of Control and a public announcement of a Change of Control.

"Rating Decline" means the occurrence on, or within six months after, the earlier of the date of consummation of Change of Control or public announcement of a Change of Control (which period shall be extended so long as the rating of the Bonds is under publicly announced consideration for possible ratings change by any of the Rating Agencies) of any of the events listed below:

- (1) In the event the Bonds are rated by Moody's, S&P and Fitch on the Rating Date as Investment Grade, the rating of the Bonds by at least two such Rating Agencies shall be below Investment Grade;
- (2) In the event the Bonds are rated by two of the three Rating Agencies on the Rating Date as Investment Grade, the rating of the Bonds by either such Rating Agency shall be below Investment Grade;
- (3) In the event the Bonds are rated by one of the three Rating Agencies on the Rating Date as Investment Grade, the rating of the Bonds by such Rating Agency shall be below Investment Grade; or

(4) In the event the Bonds are rated by Moody's, S&P and Fitch on the Rating Date as below Investment Grade, the rating of the Bonds by any such Rating Agency shall be below the rating it provided on the Rating Date.

"Reference Treasury Dealer" means each of any three investment banks of recognised standing that is a primary United States Government securities dealer in The City of New York, selected by the Issuer in good faith.

"Reference Treasury Dealer Quotations" means, with respect to each Reference Treasury Dealer and any redemption date, the average as determined by the Issuer or any of its agents of the bid and asked prices for the Comparable Treasury Issue (expressed in each case as a percentage of its principal amount) quoted in writing to the Issuer or such agent by such Reference Treasury Dealer at 5:00 p.m. on the fifth Business Day preceding such redemption date.

"S&P" means Standard & Poor's Ratings Services, a division of the McGraw Hill Companies, Inc., its affiliates and any successor to its ratings business.

"Share Capital" means any and all shares, interests (including joint venture and partnership interests), participations or other equivalents of capital stock of a corporation or any and all equivalent ownership interests in a Person.

"Transaction Date" means, with respect to the Incurrence of any Borrowing, the date such Borrowing is to be Incurred.

"Voting Stock" means, with respect to any Person, Capital Stock of any class or kind ordinarily having the power to vote for the election of directors, managers or other voting members of the governing body of such Person.

#### 4. Interest

The Bonds will bear interest from the Closing Date at the rate of 6.375% per annum, payable semi-annually in arrear on January 30 and July 30 of each year, commencing on 30 July 2017 (each such interest payment date, an "Interest Payment Date"). Interest on the Bonds shall accrue from (and including) the most recent date to which interest has been paid and ending on (but excluding) the next Interest Payment Date for the Bonds. Each Bond will cease to bear interest from the due date for redemption unless, upon surrender in accordance with Condition 6, payment of the full amount of principal is improperly withheld or refused or unless default is otherwise made in respect of any such payment. In such event each Bond shall continue to bear interest at the applicable rate (both before and after judgment) until, but excluding whichever is the earlier of (a) the day on which all sums due in respect of such Bond up to that day are received by or on behalf of the relevant holder, and (b) the day which is seven calendar days after the Trustee or the Principal Agent has notified Bondholders of receipt of all sums due in respect of all the Bonds up to that seventh calendar day (except to the extent that there is failure in the subsequent payment to the relevant holders under these Conditions). If interest is required to be calculated for a period of less than one year, it will be calculated on the basis of a 360-day year consisting of 12 months of 30 days each and, in the case of an incomplete month, the number of days elapsed.

## 5. Redemption and Purchase

(a) **Final redemption:** Unless previously redeemed, or purchased and cancelled as provided herein, the Bonds will be redeemed at their principal amount on 30 July 2022. The Bonds may not be redeemed at the option of the Issuer other than in accordance with this Condition 5.

- (b) **Redemption at the option of the Issuer:** The Bonds may be redeemed at the option of the Issuer in whole, but not in part, at any time on giving not less than 30 nor more than 60 calendar days' written notice to the Trustee and the Bondholders (which notice shall be irrevocable), at a redemption price equal to 100% of the principal amount of the Bonds plus the Applicable Premium, plus accrued and unpaid interest, if any, to, the redemption date. For the avoidance of doubt, none of the Agents or the Trustee have any responsibility with respect to the calculation of the Applicable Premium.
- (c) Redemption for taxation reasons: The Bonds may be redeemed at the option of the Issuer in whole, but not in part, at any time on giving not less than 30 nor more than 60 calendar days' written notice to the Trustee and the Bondholders (which notice shall be irrevocable), at their principal amount (together with interest accrued and unpaid to the date fixed for redemption), if (i) the Issuer has or will become obliged to pay additional amounts as provided or referred to in Condition 7 as a result of any change in, or amendment to, the laws or regulations of the United Kingdom or any authority therein or thereof having power to tax, or any change in the application or official interpretation of such laws or regulations, which change or amendment becomes effective on or after the date hereof, and (ii) such obligation cannot be avoided by the Issuer taking reasonable measures available to it (provided that changing the jurisdiction of organisation of the Issuer is not a reasonable measure for purposes of this section), provided that no such notice of redemption shall be given earlier than 90 calendar days prior to the earliest date on which the Issuer would be obliged to pay such additional amounts were a payment in respect of the Bonds then due. Prior to the publication of any notice of redemption pursuant to this paragraph, the Issuer shall deliver to the Trustee a certificate signed by two directors of the Issuer stating that the obligation referred to in (i) above cannot be avoided by the Issuer taking reasonable measures available to it and the Trustee shall be entitled to accept such certificate as sufficient evidence of the satisfaction of the condition precedent set out in (ii) above in which event it shall be conclusive and binding on the Bondholders.
- (d) Repurchase of Bonds Upon a Change of Control Triggering Event: Not later than 30 days following the occurrence of a Change of Control Triggering Event, the Issuer will make an Offer to Purchase all outstanding Bonds (a "Change of Control Offer") at a purchase price equal to 101.0% of the principal amount thereof plus accrued and unpaid interest, if any, to (but not including) the Offer to Purchase Payment Date.

Notwithstanding the above, the Issuer will not be required to make a Change of Control Offer following a Change of Control if a third party makes the Change of Control Offer in the same manner and at the same time and purchases all Bonds validly tendered and not withdrawn under such Change of Control Offer.

Except as described above with respect to a Change of Control, the Trust Deed does not contain provisions that permit the Bondholders to require that the Issuer purchase or redeem the Bonds in the event of a takeover, recapitalisation or similar transaction.

- (e) **Purchase:** Subject to the requirements (if any) of any stock exchange on which the Bonds may be listed at the relevant time the Issuer and any of its Subsidiaries may at any time purchase Bonds in the open market or otherwise at any price. Any purchase of Bonds by tender shall be made available to all Bondholders alike and such Bonds may be retained for the account of the relevant purchaser or otherwise dealt with at its discretion (but may not be resold). The Bonds so purchased, while held by or on behalf of the Issuer or any such Subsidiary, shall not entitle the holder to vote at any meetings of the Bondholders and shall not be deemed to be outstanding for the purposes of calculating quorums at meetings of the Bondholders or for the purposes of Condition 12(a).
- (f) **Cancellation:** All Bonds so redeemed will be cancelled and may not be re-issued or resold. All Bonds purchased pursuant to this Condition may be cancelled at the discretion of the relevant purchaser. Bonds may be surrendered for cancellation by surrendering each such Bond to the Principal Agent and if so surrendered shall be cancelled forthwith (and may not be reissued or resold) and the obligations of the Issuer in respect of any such Bonds shall be discharged.

## 6. Payments

(a) **Principal and Interest:** Payment of principal and interest due other than on an Interest Payment Date will be made in United States dollars by transfer to the registered account of the Bondholder. Payment of principal will only be made after surrender of the relevant Certificate at the specified office of any of the Paying Agents.

Interest on Bonds due on an Interest Payment Date will be paid in United States dollars on the due date for the payment of interest to the holder shown on the Register at the close of business on the fifteenth day before the due date for the payment of interest (the "Interest Record Date"). Payments of interest on each Bond will be made by transfer to the registered account of the Bondholder.

- (b) **Registered accounts:** For the purposes of this Condition, a Bondholder's registered account means the United States dollar account maintained by or on behalf of it with a bank in New York City, details of which appear on the Register at the close of business on the second business day (as defined below) before the due date for payment, and a Bondholder's registered address means its address appearing on the Register at that time.
- (c) **Payments subject to fiscal laws:** All payments are subject in all cases to (i) any applicable fiscal or other laws and regulations in the place of payment, but without prejudice to the provisions of Condition 7; and (ii) any withholding or deduction required pursuant to an agreement described in Section 1471(b) of the U.S. Internal Revenue Code of 1986 (the "Code") or otherwise imposed pursuant to Sections 1471 through 1474 of the Code, any regulations or agreements thereunder, any official interpretations thereof, or any law implementing an intergovernmental approach thereto. No commissions or expenses shall be charged to the Bondholders in respect of such payments.
- (d) **Payment initiation:** Where payment is to be made by transfer to a registered account, payment instructions (for value on the due date or, if that is not a business day (as defined below), for value on the first following day which is a business day) will be initiated on the due date for payment (or, if it is not a business day, the first following day which is a business day) or, in the case of a payment of principal, if later, on the business day on which the relevant Certificate is surrendered at the specified office of a Paying Agent.

Bondholders will not be entitled to any interest or other payment for any delay after the due date in receiving the amount due if the due date is not a business day or if the Bondholder is late in surrendering its Certificate (if required to do so).

- (e) **Business Day:** In this Condition, "business day" means: (i) in the case of payment by transfer to a registered account, a day (other than a Saturday or Sunday) on which commercial banks are open for business in New York City; and (ii) in the case of the surrender of a Certificate, a day in which commercial banks are open for business in the place of the specified office of the Paying Agent to whom the Certificate is surrendered. If an amount which is due on the Bonds is not paid in full, the Registrar will annotate the Register with a record of the amount (if any) in fact paid.
- (f) Paying Agents: The initial Paying Agents, Transfer Agents and Registrar and their initial specified offices are listed below. The Issuer reserves the right at any time with the approval of the Trustee to vary or terminate the appointment of any Paying Agent, Transfer Agents or Registrar and appoint additional or other Paying Agents, Transfer Agents or Registrar; provided that it will maintain: (i) a Principal Agent; (ii) a Paying Agent in Singapore so long as the Bonds are listed on the SGX-ST and the rules of the SGX-ST so require; and (iii) a Registrar. Notice of any change in the Paying Agents, Transfer Agents or Registrar or their specified offices will promptly be given to the Bondholders and the SGX-ST (so long as the Bonds are listed on the SGX-ST and the rules of the SGX-ST so require).

### 7. Taxation

All payments of principal and interest by or on behalf of the Issuer in respect of the Bonds shall be made free and clear of, and without withholding or deduction for, any taxes, duties, assessments or governmental charges of whatever nature imposed, levied, collected, withheld or assessed by or within the United Kingdom or any authority therein or thereof having power to tax, unless such withholding or deduction is required by law. In the event that such withholding or deduction is required is required by law, the Issuer shall pay such additional amounts as will result in receipt by the Bondholders of such amounts as would have been received by them had no such withholding or deduction been required, except that no such additional amounts shall be payable in respect of any Bond:

- (a) to a holder (or to a third party on behalf of a holder) who is liable to such taxes, duties, assessments or governmental charges in respect of such Bond by reason of his having some connection with the United Kingdom other than the mere holding of the Bond;
- (b) in the case of payment of principal or interest (other than interest due on an Interest Payment Date) if the Certificate in respect of such Bond is presented for payment more than 30 days after the Relevant Date except to the extent that the holder of it would have been entitled to such additional amounts on presenting such Certificate for payment on the last day of such period of 30 days;
- (c) with respect to taxes, duties, assessments or governmental charges in respect of such Bond imposed as a result of the failure of the holder or beneficial owner of the Bond to comply with a written request of the Issuer before any such withholding or deduction would be payable to provide timely or accurate information concerning the nationality, residence or identity of the holder or beneficial owner or to make any valid or timely declaration or similar claim or satisfy any certification, information or other reporting requirement, which is required or imposed by a statute, treaty, regulation or administrative practice of the United Kingdom or any authority therein or thereof having the power to tax as a condition to exemption from all or part of such taxes;
- (d) for any estate, inheritance, gift, sale, transfer, personal property or similar tax or assessment;
- (e) for any Taxes imposed or required to be withheld under Sections 1471 to 1474 (or any successor provisions or amendments thereof) of the Code, any regulations or other official guidance thereunder, any intergovernmental agreement entered into in connection therewith or any law or regulation (or any official interpretation thereof) implementing an intergovernmental approach thereto, or any agreements entered into pursuant to Section 1471(b) of the Code; or
- (f) for any taxes, duties, assessments or governmental charges payable otherwise than by deduction or withholding on payments under the Bonds.

Such additional amounts shall also not be payable where, had the beneficial owner of the Bond been the holder of the Bond, it would not have been entitled to payment of additional amounts by reason of clauses (a) through (f) inclusive above.

"Relevant Date" means whichever is the later of (i) the date on which such payment first becomes due and (ii) if the full amount payable has not been received in New York City by the Principal Agent or the Trustee on or prior to such due date, the date on which, the full amount having been so received, notice to that effect shall have been given to the Bondholders and payment made.

Any reference in these Conditions to principal and/or interest in respect of the Bonds shall be deemed to include any additional amounts which may be payable under this Condition or any undertaking given in addition to or substitution for it under the Trust Deed.

### 8. Events of Default

The Trustee at its discretion may, and if so requested by holders of not less than 25% in principal amount of the Bonds then outstanding or if so directed by an Extraordinary Resolution shall (subject in each case to it being indemnified and/or secured (including by way of payment in advance) to its satisfaction), give notice in writing to the Issuer that the Bonds are, and they shall immediately become, due and payable at their principal amount together with accrued interest, if applicable, if any of the following events (each an "Event of Default") shall have occurred:

- (a) **Non-Payment:** (i) the Issuer fails to pay all or any part of the principal of any of the Bonds when the same shall become due and payable, whether at maturity, upon redemption or otherwise and such failure continues for a period of seven calendar days; or (ii) the Issuer fails to pay any instalment of interest upon any of the Bonds as and when the same shall become due and payable, and such failure continues for a period of 14 calendar days; or
- (b) **Breach of Other Obligations:** (i) the Issuer fails to make or consummate an Offer to Purchase with respect to any of the Bonds in the manner set out in Condition 5(d); or (ii) the Issuer defaults in the performance or observance of or compliance with any of its other obligations set out in the Bonds or the Trust Deed, which default is incapable of remedy or, if in the opinion of the Trustee such default is capable of remedy, is not in the opinion of the Trustee remedied within 45 calendar days after the date on which written notice specifying such failure, stating that such notice is a "Notice of Default" under the Bonds and demanding that the Issuer remedy the same, shall have been given to the Issuer by the Trustee; or
- (c) **Cross-Default:** (i) any other present or future indebtedness of the Issuer or any of its Material Subsidiaries for or in respect of moneys borrowed or raised becomes due and payable prior to its stated maturity (otherwise than at the option of the Issuer or such Material Subsidiary, as the case may be) by reason of any actual or potential default, event of default or the like (howsoever described); or (ii) any such indebtedness is not paid when due or, as the case may be, within any applicable grace period originally provided for; or (iii) the Issuer or any of its Material Subsidiaries fails to pay when due (or within any applicable grace period originally provided for) any amount payable by it under any present or future guarantee for, or indemnity in respect of, any moneys borrowed or raised; provided that the aggregate amount of the relevant indebtedness, guarantees and indemnities in respect of which any one or more of the events mentioned above in this Condition 8(c) has or have occurred equals or exceeds U.S.\$100,000,000 or its equivalent in other currencies; or
- (d) **Enforcement Proceedings:** a distress, attachment, execution or other legal process (other than distraint or attachment imposed by any government, authority or agent prior to enforcement foreclosure) is levied, enforced or sued out, as the case may be, on or against a substantial part of the property, assets or revenues of the Issuer or all or a substantial part of the property, assets or revenues of any of its Material Subsidiaries and is not (i) either discharged or stayed within 60 calendar days or in circumstances where the levy, enforcement or suing out, as the case may be, of such legal process is not, or does not become, materially prejudicial to the interests of the Bondholders, within 120 calendar days; or (ii) being contested in good faith on the basis of appropriate legal advice provided by reputable independent counsel in the relevant jurisdiction or jurisdictions and by appropriate proceedings; or
- (e) **Security Enforced:** an encumbrancer takes possession or a receiver, administrative receiver, administrator, manager or other similar person is appointed over, or an attachment order is issued in respect of, the whole or a substantial part of the undertaking, property, assets or revenues of the Issuer or any of its Material Subsidiaries and in any such case such possession or appointment is not stayed or terminated or the debt on account of which such possession was taken or appointment made is not discharged or satisfied within 60 calendar days of such appointment or the issue of such order; or

- (f) Insolvency: the Issuer or any of its Material Subsidiaries (i) is insolvent or bankrupt or is deemed to be insolvent as a result of the court being satisfied that the value of the Issuer's or such Material Subsidiary's assets is less than the amount of its liabilities, taking into account contingent and prospective liabilities or unable to pay its debts or stops, suspends or threatens to stop or suspend payment of all or a substantial part of (or of a particular type of) its debts as they mature; or (ii) applies for or consents to or suffers the appointment of an administrator, administrative receiver, liquidator, manager or receiver or other similar person in respect of the Issuer or any of its Material Subsidiaries or over the whole or a substantial part of the undertaking, property, assets or revenues of the Issuer or any of its Material Subsidiaries; or (iii) proposes or makes or enters into a general assignment or an arrangement or composition with or for the benefit of its creditors in respect of any of such debts or a moratorium is agreed or declared or comes into effect in respect of or affecting all or a substantial part of (or of a particular type of) the debts of the Issuer or any of its Material Subsidiaries, except, in any such case, for the purpose of and followed by a reconstruction, amalgamation, reorganisation, merger or consolidation on terms approved by the Trustee or by an Extraordinary Resolution; or
- (g) Winding-up, Disposals: an administrator or an administrative receiver is appointed, an order is made or an effective resolution passed for the winding-up or dissolution or administration of the Issuer or any of its Material Subsidiaries, or the Issuer or any of its Material Subsidiaries ceases or threatens to cease to carry on all or a substantial part of its business or operations, or the Issuer or any of its Material Subsidiaries sells or disposes of all or a substantial part of its assets or business whether as a single transaction or a number of transactions, related or not; except, in any such case, for the purpose of and followed by a reconstruction, amalgamation, reorganisation, merger, consolidation or other similar arrangement (i) on terms previously approved in writing by the Trustee or by an Extraordinary Resolution, or (ii) in the case of a Material Subsidiary, not including arising out of the insolvency of such Material Subsidiary and under which all or substantially all of its assets are transferred to another member or members of Vedanta or to a transferee or transferees which immediately upon such transfer become(s) a Subsidiary of Subsidiaries of Vedanta; or
- (h) **Expropriation:** any governmental authority or agency condemns, seizes, compulsorily purchases or expropriates (excluding any distraint or attachment prior to enforcement or foreclosure) all or a substantial part of the assets or shares of the Issuer or any of its Material Subsidiaries; or
- (i) Analogous Events: any event occurs which under the laws of England or, in the case of the Issuer's Material Subsidiaries, the laws of the relevant Material Subsidiary's place of incorporation or principal place of business has an analogous effect to any of the events referred to in paragraphs (d) to (h) above.

Upon any such notice being given to the Issuer, the Bonds will immediately become due and payable at their principal amount together with accrued interest as provided in the Trust Deed, provided that no such notice may be given unless an Event of Default shall have occurred and provided further that, in the case of paragraphs (b)(ii), (d), (e) and (h), the Trustee shall have certified that in its opinion such event is materially prejudicial to the interests of the Bondholders.

For the purposes of paragraph (c) above, any indebtedness which is in a currency other than US dollars shall be translated into US dollars at the middle spot rate for the sale of US dollars against the purchase of the relevant currency quoted by any leading bank selected by the Trustee on any day when the Trustee requests a quotation for such purposes.

"Material Subsidiary" means, at any particular time, a Subsidiary of the Issuer:

(a) whose (i) total assets or (ii) gross revenues (in each case on an unconsolidated basis) attributable to the Issuer are equal to or greater than 10% of the consolidated total assets or consolidated gross revenues of the Issuer, as applicable (in each case as calculated based on the latest annual unconsolidated financial statements of the Subsidiary and the latest audited annual consolidated financial statements of the Issuer); or

(b) to which is transferred all or substantially all of the business, assets and undertaking of a Subsidiary of the Issuer which immediately prior to such transfer is a Material Subsidiary, whereupon the transferor Subsidiary of the Issuer shall immediately cease to be a Material Subsidiary and the transferee Subsidiary shall immediately become a Material Subsidiary (subject to the provisions of paragraph (a) above).

A report by two directors of the Issuer certified by the Issuer's auditor that in their opinion a Subsidiary of the Issuer is or is not, or was or was not, at any particular time or throughout any specified period a Material Subsidiary shall, in the absence of manifest error, be conclusive and binding on the Trustee and the Bondholders.

#### 9. Consolidation, Amalgamation or Merger

The Issuer will not consolidate with, merge or amalgamate into, or transfer its properties and assets substantially as an entirety to, any corporation or convey or transfer its properties and assets substantially as an entirety to any person (the consummation of any such event, a "Merger"), unless:

- (a) the corporation formed by such Merger or the person that acquired such properties and assets shall expressly assume, by a supplemental trust deed in form and substance satisfactory to the Trustee, all obligations of the Issuer under the Trust Deed and the Bonds and the performance of every covenant and agreement applicable to it contained therein;
- (b) the corporation formed by such Merger, or the person that acquired such properties and assets, if not organised under the law of the United Kingdom, shall expressly agree, by a supplemental trust deed in form and substance satisfactory to the Trustee, that its jurisdiction of organisation (or any authority therein or thereof having power to tax) will be added to Condition 7 and clause (c) of Condition 5 in each place therein in which reference is made to the United Kingdom, subject to clause (d) of this Condition 9;
- (c) immediately after giving effect to any such Merger, no Event of Default or Potential Event of Default (as defined in the Trust Deed) shall have occurred or be continuing or would result therefrom as confirmed to the Trustee by (i) a certificate signed by two directors of the Issuer and (ii) a certificate signed by two directors of the corporation that would result from such Merger or, as the case may be, a certificate from any such person referred to above; and
- (d) the corporation formed by such Merger, or the person that acquired such properties and assets, shall expressly agree, among other things, not to redeem the Bonds pursuant to Condition 5(c) as a result of it becoming obliged to pay any additional amounts (as provided or referred to in Condition 7) arising solely as a result of such Merger.

## 10. Prescription

Claims in respect of principal and interest will become void unless made as required by Condition 6 within a period of 10 years in the case of principal and five years in the case of interest from the appropriate Relevant Date.

## 11. Replacement of Certificates

If any Certificate representing a Bond is lost, stolen, mutilated, defaced or destroyed it may be replaced at the specified office of the Registrar subject to all applicable laws and stock exchange or other relevant authority requirements, upon payment by the claimant of the costs and expenses incurred in connection with such replacement and on such terms as to evidence, security, indemnity and otherwise as the Issuer may require (provided that the requirement is reasonable in the light of prevailing market practice). Mutilated or defaced Certificates must be surrendered before replacements will be issued.

# 12. Meetings of Bondholders, Modification and Waiver

(a) Meetings of Bondholders: The Trust Deed contains provisions for convening meetings of Bondholders to consider matters affecting their interests, including the sanctioning by Extraordinary Resolution of a modification of any of these Conditions or any provisions of the Trust Deed or the Paying Agency Agreement. Such a meeting may be convened by the Issuer or the Trustee at any time and shall be convened by the Trustee if it receives a written request by Bondholders holding not less than 15% in principal amount of the Bonds for the time being outstanding. The quorum for any such meeting convened to consider an Extraordinary Resolution will be two (2) or more persons holding or representing a clear majority in principal amount of the Bonds for the time being outstanding, or at any adjourned meeting two (2) or more persons being or representing Bondholders whatever the principal amount of the Bonds held or represented, unless the business of such meeting includes consideration of proposals, inter alia, (i) to modify the maturity of the Bonds or the dates on which interest is payable in respect of the Bonds, (ii) to reduce or cancel the principal amount of, or interest on, the Bonds, (iii) to change the currency of payment of the Bonds or (iv) to modify the provisions concerning the quorum required at any meeting of Bondholders or the majority required to pass an Extraordinary Resolution, in which case the necessary quorum will be two (2) or more persons holding or representing not less than two-thirds, or at any adjourned meeting not less than one-third, in principal amount of the Bonds for the time being outstanding. Any Extraordinary Resolution duly passed shall be binding on Bondholders (whether or not they were present at the meeting at which such resolution was passed and whether or not they voted in favour).

The expression "Extraordinary Resolution" means a resolution passed at a meeting of Bondholders duly convened and held in accordance with these provisions by a majority consisting of not less than two-thirds of the votes cast.

- (b) **Modification and Waiver:** The Trustee may agree, without the consent of the Bondholders, to (i) any modification to these Conditions or to the provisions of the Trust Deed or the Paying Agency Agreement which is in its opinion of a formal, minor or technical nature or is made to correct a manifest error, and (ii) any other modification (except as provided for in the Trust Deed), and any waiver or authorisation of any breach or proposed breach, of any of the provisions of these Conditions, the Trust Deed or the Paying Agency Agreement which is in the opinion of the Trustee not materially prejudicial to the interests of the Bondholders. Any such modification, authorisation or waiver shall be binding on the Bondholders and such modification shall be notified to the Bondholders as soon as practicable.
- (c) Written resolutions of 90% holders: The Trust Deed provides that a written resolution signed by or on behalf of the holders of not less than 90% of the aggregate principal amount outstanding of Bonds who for the time being are entitled to receive notice of a meeting in accordance with the provisions of the Trust Deed shall be as valid and effective as a duly passed Extraordinary Resolution.
- (d) Entitlement of the Trustee: In connection with the exercise of its powers, trusts, authorisations or discretions (including but not limited to those referred to in this Condition), the Trustee shall have regard to the interests of the Bondholders as a class and shall not have regard to the consequences of such exercise for individual Bondholders (including as a result of their being for any purpose domiciled or resident in, or otherwise connected with, or subject to the jurisdiction of, any particular territory) and the Trustee shall not be entitled to require, nor shall any Bondholder of Bonds be entitled to claim, from the Issuer any indemnification or payment in respect of any tax consequence of any such exercise upon individual Bondholders.

#### 13. Enforcement

At any time after the Bonds become due and payable, the Trustee may, at its discretion and without further notice, institute such proceedings against the Issuer as it may think fit to enforce the terms of the Trust Deed and the Bonds, but it need not take any such proceedings unless (a) it shall have been so directed by an Extraordinary Resolution or so requested in writing by Bondholders holding at least one-quarter in principal amount of the Bonds outstanding, and (b) it shall have been indemnified and/or secured (including by way of payment in advance) to its satisfaction. No Bondholder may proceed directly against the Issuer unless the Trustee, having become bound so to proceed, fails to do so within a reasonable time and such failure is continuing.

#### 14. Indemnification of the Trustee

The Trust Deed contains provisions for the indemnification of the Trustee and for its relief from responsibility, including provisions relieving it from taking proceedings to enforce repayment unless indemnified and/or secured (including by way of payment in advance) to its satisfaction. The Trustee is entitled to enter into business transactions with the Issuer and any entity related to the Issuer without accounting for any profit.

The Trustee may rely without liability to Bondholders on any certificate or report prepared by the auditors or any other person pursuant to these Conditions and/or the Trust Deed, whether or not addressed to the Trustee and whether or not the auditors liability in respect thereof is limited by a monetary cap or otherwise; any such certificate shall be conclusive and binding on the Issuer, the Trustee, and the Bondholders.

#### 15. Further Issues

The Issuer may from time to time without the consent of the Bondholders create and issue further securities either having the same terms and conditions as the Bonds in all respects (or in all respects except for the first payment of interest on them) and so that such further issue shall be consolidated and form a single series with the outstanding securities (including the Bonds) or upon such terms as the Issuer may determine at the time of their issue, provided that, if the securities of such further issue are not fungible with the Bonds for U.S. federal income tax purposes, such securities will have a separate CUSIP or ISIN. References in these Conditions to the Bonds include (unless the context requires otherwise) any other securities issued pursuant to this Condition and forming a single series with the Bonds. Any further securities forming a single series with the outstanding securities (including the Bonds) constituted by the Trust Deed or any deed supplemental to it shall, and any other securities may (with the consent of the Trustee), be constituted by a deed supplemental to the Trust Deed.

#### 16. Notices

Notices to Bondholders will be valid if published in a leading newspaper having general circulation in Singapore (which is expected to be the Business Times). Any such notice shall be deemed to have been given on the date of such publication or, if published more than once, on the first date on which publication is made.

So long as the Bonds are represented by the Global Certificates and the Global Certificates are held on behalf of DTC or the alternative clearing system (as defined in the Global Certificates), notices to Bondholders may be given by delivery of the relevant notice to DTC or the alternative clearing system, for communication by it to entitled accountholders in substitution for notification as required by the Conditions.

# 17. Contracts (Rights of Third Parties) Act 1999

No person shall have any right to enforce any term or condition of the Bonds under the Contracts (Rights of Third Parties) Act 1999.

### 18. Governing Law and Jurisdiction

- (a) **Governing Law:** The Trust Deed, the Bonds and all non-contractual matters arising from or connected with the Bonds and the Trust Deed, are governed by and are construed in accordance with English law.
- (b) **Jurisdiction:** The courts of England have exclusive jurisdiction to settle any dispute (a "Dispute") arising from or connected with the Trust Deed or the Bonds and all non-contractual matters arising from or in connection therewith (including a dispute regarding the existence, validity or termination of the Trust Deed or the Bonds or the consequences of their nullity). The submission to the jurisdiction of the courts of England is for the benefit of the Trustee and the Bondholders only and shall not (and shall not be construed so as to) limit the right of the Trustee or any Bondholder to take proceedings relating to a Dispute ("Proceedings") in any other courts with jurisdiction nor shall the taking of Proceedings in any one or more jurisdictions preclude the taking of Proceedings in any other jurisdiction (whether concurrently or not) if any to the extent permitted by law.

# SUMMARY OF PROVISIONS RELATING TO THE BONDS WHILE IN GLOBAL FORM

The Global Certificates contain provisions which apply to the Bonds while they are in global form, some of which modify the effect of the Conditions of the Bonds set out in this Offering Circular. Terms defined in the Conditions have the same meaning in the paragraphs below. The following is a summary of certain of those provisions.

## Book-Entry; Delivery and Form

The certificates representing the Bonds will be issued in fully registered form without interest coupons attached. The Regulation S Bonds will initially be represented by the Unrestricted Global Certificate and will be deposited with a custodian for, and registered in the name of a nominee of, DTC for the accounts of Euroclear and Clearstream. Prior to the 40th day after the date of issue of the Bonds, beneficial interests in the Regulation S Bonds may only be held through Euroclear or Clearstream, and any resale or transfer of such interests to United States persons shall not be permitted during such period unless such resale or transfer is made pursuant to Rule 144A or Regulation S under the Securities Act.

The Rule 144A Bonds will be represented by the Restricted Global Certificate and will be deposited with a custodian for, and registered in the name of a nominee of, DTC.

Each Global Certificate (and any Bonds issued for exchange therefor) will be subject to certain restrictions on transfer set forth therein as described under "Transfer Restrictions".

Ownership of beneficial interests in a Global Certificate will be limited to persons who have accounts with DTC ("participants") or persons who hold interests through participants. Ownership of beneficial interests in a Global Certificate will be shown on, and the transfer of that ownership will be effected only through, records maintained by DTC or its nominee (with respect to interests of participants) and the records of participants (with respect to interests of persons other than participants). QIBs may hold their interests in a Restricted Global Certificate directly through DTC if they are participants in such system, or indirectly through organisations which are participants in such system.

Investors may hold their interests in a Regulation S Bond directly through Euroclear or Clearstream, if they are participants in such systems, or indirectly through organisations that are participants in such system. On or after the 40th day following the date of issue of the Bonds, investors may also hold such interests through organisations other than Euroclear or Clearstream that are participants in the DTC system. Euroclear and Clearstream will hold interests in the Regulation S Bonds on behalf of their participants through DTC.

So long as DTC, or its nominee, is the registered owner or holder of a Global Certificate, DTC or such nominee, as the case may be, will be considered the sole owner or holder of the Bonds represented by such Global Certificate for all purposes under the Trust Deed and the Bonds. No beneficial owner of an interest in a Global Certificate will be able to transfer that interest except in accordance with DTC's applicable procedures, in addition to those provided for under the Trust Deed and the Paying Agency Agreement and, if applicable, those of Euroclear and Clearstream.

#### Registration of Title

Individual Certificates will not be issued in exchange for interests in the Bonds in respect of which the Global Certificates are issued, except in the event that (where they shall be issued free of charge to the holder) DTC (or any clearing system as shall have been designated by the Company and approved by the Trustee (the "Alternative Clearing System") on behalf of which the Bonds evidenced by the Restricted Global Certificate may be held) notifies the Company that it is no longer willing or

able to discharge properly its responsibilities as depositary with respect to the Bonds, or ceases to be a "Clearing Agency" registered under the Exchange Act or is at any time no longer eligible to act as such and the Company is unable to locate a qualified successor within 90 days of receiving notice of such ineligibility on the part of DTC (or, as the case may be, such Alternative Clearing System).

So long as the Bonds are listed on the SGX-ST and the rules of the SGX-ST so require, the Company shall appoint and maintain a paying agent in Singapore in the event that the Global Certificate is exchanged for Individual Certificates. In addition, in the event that the Global Certificate is exchanged for Individual Certificates, an announcement of such exchange shall be made through the SGX-ST (so long as the Bonds are listed on the SGX-ST and the rules of the SGX-ST so require) and such announcement will include all material information with respect to the delivery of the Individual Certificates, including details of the paying agent in Singapore.

In such circumstances, the Company will cause sufficient Individual Certificates to be executed and delivered to the Registrar for completion, authentication and despatch to the relevant Bondholders. A person with an interest in the Bonds in respect of which the Global Certificate is issued must provide the Registrar with a written order containing instructions and such other information as the Company and the Registrar may require to complete, execute and deliver such Individual Certificates and, in the case of a person with an interest in the Bonds represented by the Restricted Global Certificate, a fully completed, signed certification substantially to the effect that the exchanging holder is not transferring its interest at the time of such exchange, or in the case of a simultaneous sale pursuant to Rule 144A, Regulation S or Rule 144 under the Securities Act ("Rule 144"), a certification that the transfer is being made in compliance with the provisions of Rule 144A, Regulation S or Rule 144, as the case may be, in accordance with the Paying Agency Agreement. Restricted individual certificates issued in respect of the Rule 144A Bonds shall bear the Securities Act Legends applicable to transfers pursuant to Rule 144A.

### **Payments and Transfers**

Payments of principal and interest in respect of Bonds represented by a Global Certificate will be made to DTC or its nominee, as the case may be, and will be made without presentation or, if no further payment falls to be made in respect of the Bonds, against presentation and surrender, of the Global Certificate to or to the order of the Principal Agent or such other Paying Agent as shall have been notified to the Bondholders for such purpose. None of the Company, the Trustee nor any Paying Agent will have any responsibility or liability for any aspect of the records relating to or payments made on account of beneficial ownership interests in a Global Certificate or for maintaining, supervising or reviewing any records relating to such beneficial ownership interests.

The Company expects that DTC or its nominee, upon receipt of any payment of principal or interest in respect of a Global Certificate, will credit participants' accounts with payments in amounts proportionate to their respective beneficial interests in the principal amount of such Global Certificate as shown on the records of DTC or its nominee. The Company also expects that payments by participants to owners of beneficial interests in such Global Certificate held through such participants will be governed by standing instructions and customary practices, as is now the case with securities held for the accounts of customers registered in the names of nominees for such customers. Such payments will be the responsibility of such participants.

Transfers between participants in DTC will be effected in the ordinary way in accordance with DTC rules and will be settled in same-day funds. Transfers between participants in Euroclear and Clearstream will be effected in the ordinary way in accordance with their respective rules and operating procedures.

The Company expects that DTC will take any action permitted to be taken by a Bondholder (including the presentation of Bonds for exchange as described below) only at the direction of one or more participants to whose account the DTC interests in a Global Certificate is credited and only in respect of such portion of the aggregate principal amount of Bonds as to which such participant or participants has or have given such direction.

The Company understands that DTC is a limited purpose trust company organised under the laws of the State of New York, a "banking organisation" within the meaning of New York Banking Law, a member of the Federal Reserve System, a "clearing corporation" within the meaning of the Uniform Commercial Code and a "Clearing Agency" registered pursuant to the provisions of Section 17A of the Exchange Act. DTC was created to hold securities for its participants and to facilitate the clearance and settlement of securities transactions between participants through electronic book-entry changes in accounts of its participants, thereby eliminating the need for physical movement of securities certificates. Indirect access to the DTC system is available to others such as banks, brokers, dealers and trust companies and certain other organisations that clear through or maintain a custodial relationship with a participant, either directly or indirectly ("indirect participants").

Although DTC, Euroclear and Clearstream are expected to follow the foregoing procedures in order to facilitate transfers of interests in a Global Certificate among participants of DTC, Euroclear and Clearstream, they are under no obligation to perform or continue to perform such procedures, and such procedures may be discontinued at any time. None of the Company, the Trustee or any Paying Agent will have any responsibility for the performance by DTC, Euroclear or Clearstream or their respective participants or indirect participants of their respective obligations under the rules and procedures governing their operations.

#### **Notices**

So long as the Bonds are listed on the SGX-ST and the rules of the SGX-ST so require, notices will be published in a leading newspaper having general circulation in Singapore (which is expected to be the Business Times). Any such notice shall be deemed to have been given on the date of such publication. So long as the Bonds are represented by a Global Certificate and such Global Certificate is held on behalf of DTC or an Alternative Clearing System, notices to Bondholders may be given by delivery of the relevant notice to that clearing system for communication by it to entitled account holders in substitution for publication as required by the Conditions.

#### **Meetings**

The registered holder of each Global Certificate will be treated as being two persons for the purposes of any quorum requirements of a meeting of Bondholders and, at any such meeting, as having one vote in respect of each \$1,000 in principal amount of the Bonds for which the Global Certificates may be exchanged. The Trustee may allow a person with an interest in the Bonds in respect of which a Global Certificate has been issued to attend and speak at a meeting of Bondholders on appropriate proof of his identity and interest.

# **Purchase and Cancellation**

Cancellation of any Bond required by the Conditions to be cancelled following its purchase will be effected by reduction in the principal amount of the Bonds in the register of Bondholders.

## **Trustee's Powers**

In considering the interests of Bondholders while a Global Certificate is registered in the name of a nominee for a clearing system, the Trustee may have regard to any information provided to it by or on behalf of the relevant clearing system or its operator as to the identity (either individually or by category) of its account holders with entitlements to the Bonds and may consider such interests as if such account holders were the Bondholders.

# The Clearing Systems

#### General

DTC, Euroclear and Clearstream have advised the Company as follows:

DTC. DTC is a limited-purpose trust company organised under the laws of the State of New York, a "banking organisation" within the meaning of New York Banking Law, a member of the Federal Reserve System, a "clearing corporation" within the meaning of the New York Uniform Commercial Code, and a "clearing agency" registered pursuant to the provisions of Section 17A of the Exchange Act. DTC was created to hold securities of its participants and to facilitate the clearance and settlement of securities transactions among its participants in such securities through electronic book entry changes in accounts of its participants, thereby eliminating the need for physical movement of securities certificates. DTC's participants include securities brokers and dealers, banks, trust companies, clearing corporations, and certain other organisations, some of whom own DTC, and may include the Joint Bookrunners. Indirect access to the DTC system is also available to others that clear through or maintain a custodial relationship with a DTC participant, either directly or indirectly. Transfers of ownership or other interests in Bonds in DTC may be made only through DTC participants. In addition, beneficial owners of Bonds in DTC will receive all distributions of principal of and interest on the Bonds from the Trustee through such DTC participant.

Euroclear and Clearstream. Euroclear and Clearstream hold securities for participating organisations and facilitate the clearance and settlement of securities transactions between their respective participants through electronic book-entry changes in accounts of such participants. Euroclear and Clearstream provide to their participants, among other things, services for safekeeping, administration, clearance and settlement of internationally traded securities and securities lending and borrowing. Euroclear and Clearstream interface with domestic securities markets. Euroclear and Clearstream participants are financial institutions such as underwriters, securities brokers and dealers, banks, trust companies and certain other organisations. Indirect access to Euroclear or Clearstream is also available to others such as banks, brokers, dealers and trust companies that clear through or maintain a custodial relationship with a Euroclear or Clearstream participant, either directly or indirectly.

## Initial Settlement

Initial settlement for the Bonds will be made in immediately available funds. All Bonds issued in the form of global certificates will be deposited with Cede & Co., as custodian for DTC. Investors' interests in Bonds held in book-entry form by DTC will be represented through financial institutions acting on their behalf as direct and indirect participants in DTC. As a result, Euroclear and Clearstream will initially hold positions on behalf of their participants through DTC.

Investors electing to hold their Bonds through DTC (other than through accounts at Euroclear or Clearstream) must follow the settlement practices applicable to United States corporate debt obligations. The securities custody accounts of investors will be credited with their holdings against payment in same day funds on the settlement date.

Investors electing to hold their Bonds through Euroclear or Clearstream accounts will follow the settlement procedures applicable to conventional Eurobonds in registered form. Bonds will be credited to the securities custody accounts of Euroclear holders and of Clearstream holders on the business day following the settlement date against payment for value on the settlement date.

# Secondary Market Trading

Because the purchaser determines the place of delivery, it is important to establish at the time of trading of any Bonds where both the purchaser's and seller's accounts are located to ensure that settlement can be made on the desired value date.

Trading between DTC participants. Secondary market trading between DTC participants will occur in the ordinary way in accordance with DTC rules and will be settled using the procedures applicable to United States corporate debt obligations in same-day funds using DTC's Same-Day Funds Settlement System.

Trading between Euroclear and Clearstream participants. Secondary market trading between Euroclear participants and Clearstream participants will occur in the ordinary way in accordance with the applicable rules and operating procedures of Clearstream and Euroclear and will be settled using the procedures applicable to conventional Eurobonds in same-day funds.

Trading between DTC seller and Euroclear or Clearstream purchaser. When Bonds are to be transferred from the account of a DTC participant to the account of a Euroclear participant or a Clearstream participant, the purchaser must send instructions to Euroclear or Clearstream through a participant at least one business day prior to settlement. Euroclear or Clearstream, as the case may be, will receive the Bonds against payment. Payment will then be made to the DTC participant's account against delivery of the Bonds. Payment will include interest accrued on the Bonds from and including the last interest payment date to and excluding the settlement date, on the basis of a calendar year consisting of twelve 30-day calendar months. For transactions settling on the 31st day of the month, payment will include interest accrued to and excluding the first day of the following month. Payment will then be made to the DTC participant's account against delivery of the Bonds. After settlement has been completed, the Bonds will be credited to the respective clearing system and by the clearing system, in accordance with its usual procedures, to the Euroclear participant's or Clearstream participant's account. Credit for the Bonds will appear on the next day (European time), and cash debit will be backvalued to, and the interest on the Bonds will accrue from, the value date (which would be the preceding day when settlement occurs in New York). If settlement is not completed on the intended value date (i.e., the trade date fails), the Euroclear or Clearstream cash debit will be valued instead on the actual settlement date.

Euroclear participants or Clearstream participants will need to make available to the respective clearing systems the funds necessary to process same-day funds settlement. The most direct means of doing so is to pre-position funds for settlement, either from cash on hand or existing lines of credit, as they would for any settlement occurring within Euroclear or Clearstream. Under this approach, they may take on credit exposure to Euroclear or Clearstream until the Bonds are credited to their accounts one day later.

As an alternative, if Euroclear or Clearstream has extended a line of credit to them, participants can elect not to pre-position funds and allow that credit line to be drawn upon to finance settlement. Under this procedure, Euroclear participants or Clearstream participants purchasing Bonds would incur overdraft charges for one day, assuming they cleared the overdraft when the Bonds were credited to their accounts. However, interest on the Bonds would accrue from the value date. Therefore, in many cases, the investment income on Bonds earned during that one-day period may substantially reduce or offset the amount of such overdraft charges, although this result will depend on each participant's particular cost of funds.

The sale proceeds will be available to the DTC seller on the settlement date. Thus, to the DTC participant, a cross-market transaction will settle no differently than a trade between two DTC participants.

Finally, day traders that use Euroclear or Clearstream and that purchase Bonds from DTC participants for credit to Euroclear participants or Clearstream participants should note that these trades will automatically fail on the sale side unless affirmative action is taken. At least three techniques should be readily available to eliminate this potential problem:

(1). borrowing through Euroclear or Clearstream for one day (until the purchase side of the day trade is reflected in their Euroclear account or Clearstream account) in accordance with the clearing system's customary procedures;

- (2). borrowing the Bonds in the United States from a DTC participant no later than one day prior to settlement, which would give the Bonds sufficient time to be reflected in the borrower's Euroclear account or Clearstream account in order to settle the sale side of the trade; or
- (3). staggering the value dates for the buy and sell sides of the trade so that the value date for the purchase from the DTC participant is at least one day prior to the value date for the sale to the Euroclear participants or Clearstream participants.

Trading between Euroclear or Clearstream seller and DTC purchaser. Due to the time zone differences in their favour, Euroclear participants or Clearstream participants may employ their customary procedures for transactions in which Bonds are to be transferred by the respective clearing system to another DTC participant. The seller must send instructions to Euroclear or Clearstream through a participant at least one business day prior to settlement. In these cases, Euroclear or Clearstream will credit the Bonds to the DTC participant's account against payment. Payment will include interest accrued on the Bonds from and including the last interest payment date to and excluding the settlement date, on the basis of a calendar year consisting of twelve 30-day calendar months. For transactions settling on the 31st day of the month, payment will include interest accrued to the Bonds excluding the first day of the following month. Payment will then be made to the DTC participant's account against delivery of the Bonds. The payment will then be reflected in the account of the Euroclear participant or Clearstream participant the following day, and receipt of the cash proceeds in the Euroclear or Clearstream participant's account will be back-valued to the value date (which would be the preceding day when settlement occurs in New York). If the Euroclear participant or Clearstream participant has a line of credit with its respective clearing system and elects to draw on such line of credit in anticipation of receipt of the sale proceeds in its account, the back-valuation may substantially reduce or offset any overdraft charges incurred over the one-day period. If settlement is not completed on the intended value date (i.e., the trade fails), receipt of the cash proceeds in the Euroclear or Clearstream participant's account would instead be valued on the actual settlement date.

As in the case with respect to sales by a DTC participant to a Euroclear or Clearstream participant, participants in Euroclear and Clearstream will have their accounts credited the day after their settlement date. See "— Trading between DTC seller and Euroclear or Clearstream purchaser" above.

## TRANSFER RESTRICTIONS

Because of the following restrictions, purchasers are advised to consult legal counsel prior to making any offer, resale, pledge or other transfer of the Regulation S Bonds or the Rule 144A Bonds.

This offering is being made in reliance on Rule 144A under the Securities Act and Regulation S under the Securities Act. The Bonds have not been, and will not be, registered under the Securities Act or with any securities regulatory authority of any State in the United States or any other jurisdiction, and may only be offered or sold (a) within the United States to QIBs in reliance on the exemption from the registration requirements of the Securities Act provided by Rule 144A and (b) to non-US persons outside the United States in reliance on Regulation S under the Securities Act, and in each case in accordance with any other applicable law.

#### Rule 144A Bonds

Each purchaser of the Bonds within the United States pursuant to Rule 144A, by accepting delivery of this Offering Circular, will be deemed to have represented, agreed and acknowledged that it has received such information as it deems necessary to make an investment decision and that:

- It is (a) a QIB within the meaning of Rule 144A, (b) acquiring such Bonds for its own account or for the account of one or more QIBs, (c) not acquiring the Bonds with a view to further distribute such Bonds, and (d) aware, and each beneficial owner of such Bonds has been advised, that the sale of such Bonds to it is being made in reliance on Rule 144A.
- It understands that such Bonds have not been and will not be registered under the Securities Act or with any securities regulatory authority of any state or other jurisdiction of the United States and may not be offered, resold, pledged or otherwise transferred except (a) in accordance with Rule 144A to a person that the holder and any person acting on its behalf reasonably believe is a QIB purchasing for its own account or for the account of a QIB, (b) in an offshore transaction in accordance with Rule 903 or Rule 904 of Regulation S, (c) pursuant to an exemption from registration under the Securities Act provided by Rule 144 thereunder (if available) or (d) pursuant to an effective registration statement under the Securities Act, in each case in accordance with all applicable securities laws of the States of the United States; and the purchaser will, and each subsequent holder is required to, notify any subsequent purchaser of the Bonds of the resale restrictions referred to in this clause (2).
- It acknowledges that the Bonds offered and sold hereby in the manner set forth in paragraph (1) above are "restricted securities" within the meaning of Rule 144(a)(3) under the Securities Act, are being offered and sold in a transaction not involving any public offering in the United States within the meaning of the Securities Act and that no representation is made as to the availability of the exemption provided by Rule 144 for resales of the Bonds.
- It understands that any offer, sale, pledge or other transfer of the Bonds made other than in compliance with the above-stated restrictions may not be recognised by the Company.
- The Company, the Registrar, the Joint Bookrunners and their respective affiliates, and others will rely upon the truth and accuracy of the foregoing acknowledgments, representations and agreements. If it is acquiring any Bonds for the account of one or more QIBs, it represents that it has sole investment discretion with respect to each such account and that it has full power to make (and does make) the foregoing acknowledgments, representations and agreements on behalf of each such account.
- It understands that the Bonds offered in reliance on Rule 144A will be represented by the Restricted Global Certificate. Before any interest in the Restricted Global Certificate may

be offered, sold, pledged or otherwise transferred to a person who takes delivery in the form of an interest in the Unrestricted Global Certificate, it will be required to provide a Transfer Agent with a written certification (in the form provided in the Paying Agency Agreement) as to compliance with applicable securities laws.

• It understands that such Bonds, unless otherwise agreed between the Company and the Trustee in accordance with applicable law, will bear a legend to the following effect:

This bond has not been and will not be registered under the United States Securities Act of 1933, (the "Securities Act") or with any securities regulatory authority of any state or other jurisdiction of the United States and may not be offered, sold, pledged or otherwise transferred except (1) pursuant to a registration statement that has been declared effective under the Securities Act, (2) in accordance with Rule 144A under the Securities Act to a person that the holder and any person acting on its behalf reasonably believes is a qualified institutional buyer within the meaning of Rule 144A under the Securities Act purchasing for its own account or for the account of a qualified institutional buyer, (3) in an offshore transaction in accordance with Rule 903 or Rule 904 of RegulationS under the Securities Act, (4) pursuant to Rule 144 under the Securities Act (if available) or (5) pursuant to any other available exemption from the registration requirements of the Securities Act, in each case in accordance with any applicable securities laws of any state of the United States. The holder of this bond will, and each subsequent holder is required to, notify any purchaser of this bond of the resale restrictions referred to above.

## Regulation S Bonds

Each purchaser of Bonds offered hereby in reliance on Regulation S under the Securities Act, by accepting delivery of this Offering Circular and the Bonds, will be deemed to have represented, agreed and acknowledged that it has received such information as it deems necessary to make an investment decision and that:

- It understands that such Bonds have not been and will not be registered under the Securities Act, and such Bonds are being offered and sold in reliance on Regulation S.
- It is, or at the time the Bonds are purchased will be, the beneficial owner of such Bonds and (a) it is purchasing the Bonds in an offshore transaction (within the meaning of Regulation S); (b) it is not an affiliate of the Company or a person acting on behalf of such an affiliate and (c) it is not a US person (as defined in Regulation S under the Securities Act) and is located outside the United States and will continue to be located outside the United States at the time the buy order is originated.
- It will not offer, sell, pledge or transfer Bonds, except in accordance with the Securities Act and any applicable laws of the states of the United States and any other jurisdiction.
- The Company, the Registrar, the Joint Bookrunners and their affiliates, and others will rely upon the truth and accuracy of the foregoing acknowledgments, representations and agreements.

It understands that the Bonds offered in reliance on Regulation S will be represented by the Unrestricted Global Certificate. For the period until and including the 40th day after the commencement of the offering, any interest in the Unrestricted Global Certificate may be offered, sold, pledged or otherwise transferred to a US person or a person located in the United States or a person who takes delivery in the form of an interest in the Restricted Global Certificate, provided that it will be required to provide a Transfer Agent with a written certification (in the form provided in the Paying Agency Agreement) to the effect that the transferee is a "qualified institutional buyer" (as defined in Rule 144A) and as to compliance with applicable securities laws.

It understands that such Bonds will, unless otherwise agreed between the Company and the Trustee in accordance with applicable law, will bear a legend to the following effect:

This bond has not been and will not be registered under the United States Securities Act of 1933 (the "Securities Act") or with any securities regulatory authority of any state or other jurisdiction of the United States and may not be offered, sold, pledged or otherwise transferred in the United States or to, for the account or benefit of, any united states person except pursuant to an available exemption from the registration requirements of the Securities Act and all applicable state securities laws. Terms used above have the meanings given to them in Regulation S under the Securities Act.

## **TAXATION**

## **Certain United Kingdom Taxation Considerations**

The following is a general description of certain UK tax considerations relating to the Bonds. It does not purport to be a complete analysis of all tax considerations relating to the Bonds and it does not generally deal with the tax position of prospective Bondholders who may be subject to tax in a jurisdiction other than the UK. It relates to the position of persons who hold Bonds as an investment and who are the absolute beneficial owners of the same and some aspects do not apply to certain classes of taxpayer (such as dealers in securities, Bondholders who are connected with the Company for relevant tax purposes or those who are treated for tax purposes as having received their Bonds by reason of their employment). Prospective Bondholders should seek their own professional advice as to their tax position. This summary is based on the Company's understanding of UK tax law and HM Revenue & Customs practice as in effect on the date of this Offering Circular and is subject to any change in such law or practice that may take effect after such date (possibly with retrospective effect).

PROSPECTIVE PURCHASERS OF BONDS WHO MAY BE SUBJECT TO TAX IN ANY JURISDICTION OTHER THAN THE UK, OR WHO HAVE ANY DOUBT WHATSOEVER AS TO THEIR TAX POSITION SHOULD CONSULT AN APPROPRIATE PROFESSIONAL ADVISER.

#### Interest on the Bonds

The Bonds will constitute "quoted Eurobonds" within the meaning of section 987 of the Income Tax Act 2007 (the "Act") as long as they are and continue to be listed on a "recognised stock exchange" within the meaning of section 1005 of the Act. SGX-ST is a "recognised stock exchange" for these purposes. The Bonds will be treated as listed on SGX-ST if the Bonds are included in the official list of, and are admitted to trading on (which, in the case of SGX-ST, means quoted on), the Main Board of SGX-ST.

Provided, therefore, that the Bonds are and remain so listed and quoted, payments of interest on the Bonds will be made without deduction or withholding for or on account of UK income tax.

If the Bonds are not, or cease to be, so listed, generally an amount must be deducted or withheld for or on account of UK income tax at the basic rate (currently 20%), subject to any direction to the contrary by HM Revenue & Customs under an applicable double taxation treaty, and except that the deduction or withholding obligation is disapplied in respect of payments of interest to Bondholders who the Company reasonably believes are either UK resident companies or non-UK resident companies carrying on a trade in the UK through a permanent establishment which is, in each case, within the charge to UK corporation tax and to which the interest is attributable, or are partnerships consisting entirely of such persons (unless, in each such case, HM Revenue & Customs directs otherwise), or where any other relevant exception, exemption or relief applies. Any premium payable on redemption may be treated as a payment of interest for UK tax purposes and may accordingly be subject to the withholding tax treatment described above.

Interest on the Bonds will constitute UK source income for UK tax purposes and may be subject to UK income tax or UK corporation tax (as appropriate) by assessment (including self-assessment) even where paid without deduction or withholding for or on account of UK tax. However, interest with a UK source received without deduction or withholding for or on account of UK income tax will not be chargeable to UK tax in the hands of a Bondholder who is not resident for tax purposes in the UK unless that Bondholder: (i) is not a company and carries on a trade, profession or vocation in the UK through a UK branch or agency, or is a company and carries on a trade in the UK through a UK permanent establishment and the interest is received in connection with, or the Bonds are attributable

to, that branch or agency or permanent establishment (as applicable); or (ii) is a trustee in certain circumstances. There are exemptions for interest received by certain categories of agent (such as some brokers and investment managers). The provisions of an applicable double tax treaty may also be relevant for such Bondholders.

## Provision of information

In certain circumstances, HM Revenue & Customs has the power to require any person in the UK (i) paying interest to, or receiving interest on behalf of another person who is an individual; or (ii) paying amounts due on redemption of any Bonds which constitute deeply discounted securities as defined in Chapter 8 of Part 4 of the Income Tax (Trading and Other Income) Act 2005 to, or receiving such amounts on behalf of, another person who is an individual, to disclose the name and address of that Bondholder and to provide information regarding the amounts paid to him or received on his behalf. In relation to the payment or receipt of interest, these provisions will apply whether or not the interest has been paid subject to withholding or deduction for or on account of UK income tax and whether or not the Bondholder is resident in the UK for UK taxation purposes. Where the Bondholder is not so resident, the details provided to HM Revenue & Customs may, in certain cases, be passed on to the tax authorities of the jurisdiction in which the Bondholder is resident for taxation purposes.

#### Transfer and redemption of the Bonds

## UK corporation taxpayers

In general, Bondholders who are within the charge to UK corporation tax in respect of the Bonds will be treated for tax purposes as realising profits, gains or losses (including exchange gains and losses) in respect of the Bonds on a basis which is broadly in accordance with their statutory accounting treatment so long as that accounting treatment is in accordance with generally accepted accounting practice as that term is defined for the relevant tax purposes. Such profits, gains and losses will be taken into account in computing taxable income for UK corporation tax purposes.

## Other UK taxpayers

It is not entirely certain whether or not the Bonds will be treated as "deeply discounted securities" for the purposes of Chapter 8 of Part 4 of the Income Tax (Trading and Other Income) Act 2005. Accordingly, Bondholders are advised to consult their own professional advisers in respect of this issue.

If the Bonds are treated as "deeply discounted securities" for the purposes of Part 4, Chapter 8 of the Income Tax (Trading and Other Income) Act 2005, Bondholders who are not within the charge to UK corporation tax and who are resident for tax purposes in the United Kingdom, or who carry on a trade, profession or vocation in the UK through a branch or agency to which the Bonds are attributable, may be subject to UK tax on income on a disposal of the Bonds (including a disposal occurring on redemption of Bonds). In such a case, no chargeable gain or allowable loss would arise on a disposal of a Bond by a Bondholder (including a disposal occurring on redemption) nor should the accrued income profits and losses regime (as set out below) apply to Bondholders on such a disposal.

If the Bonds are not treated as "deeply discounted securities" for the purposes of Part 4, Chapter 8 of the Income Tax (Trading and Other Income) Act 2005, a disposal of the Bonds (including a disposal occurring on redemption) by an individual Bondholder who is resident for tax purposes in the United Kingdom, or who carries on a trade, profession or vocation in the UK through a branch or agency to which the Bonds are attributable, may give rise to a chargeable gain or allowable loss for the purposes of the UK taxation of chargeable gains. In calculating any gain or loss accordingly, a

taxable profit can arise even where the amount received in a non-sterling currency is the same as, or less than, the amount paid in that currency for the Bond. Special rules may apply to individuals who have ceased to be resident in the United Kingdom and who dispose of their Bonds before becoming once again resident in the United Kingdom.

The provisions of the "accrued income profits and losses" regime (formerly known as the "accrued income scheme") (the "Regime") may apply to Bondholders who are subject to UK income tax in relation to the Bonds. On a transfer of securities with accrued interest, the Regime can, in certain circumstances, apply to deem the transferor to receive an amount of income equal to the accrued interest and to treat the deemed or actual interest subsequently received by the transferee as reduced by a corresponding amount. Generally, persons who are not resident in the UK and who do not carry on a trade in the UK through a branch or agency to which the Bonds are attributable will not be subject to the provisions of these rules. Bondholders are advised to consult their own professional advisers for further information about the rules relating to the Regime.

Stamp duty and stamp duty reserve tax. No UK stamp duty or stamp duty reserve tax should be payable on issue, transfer or redemption of the Bonds.

#### US Federal Income Tax Considerations

The following discussion is a summary of certain material US federal income tax consequences of the purchase, ownership and disposition of the Bonds by a US holder (defined below), (except for discussions on FATCA (as defined below under "- Foreign Account Tax Compliance Act"), which apply to all holders), but does not purport to be a complete analysis of all potential tax effects. This summary is based upon the US Internal Revenue Code of 1986, as amended (the "Internal Revenue Code"), Treasury regulations issued or proposed thereunder, and judicial and administrative interpretations thereof, each as in effect on the date hereof, and all of which are subject to change, possibly with retroactive effect. This discussion does not address all of the US federal income tax consequences that may be relevant to a US holder in light of such US holder's particular circumstances, including the impact of the unearned income Medicare contribution tax or the alternative minimum tax, or to US holders subject to special rules, such as certain financial institutions, US expatriates, insurance companies, dealers in securities or currencies, traders in securities, US holders whose functional currency is not the US dollar, tax-exempt organisations, regulated investment companies, real estate investment trusts, partnerships or other pass-through entities and persons holding the Bonds as part of a "straddle," "hedge," "conversion transaction" or other integrated transaction. In addition, this discussion is limited to persons who purchase Bonds for cash pursuant to this Offering Circular at original issue, at their "issue price" (the first price at which a substantial part of the Bonds are sold to the public for cash, excluding sales to bond houses, brokers or similar persons or organisations acting in the capacity of underwriters, placement agents or wholesalers) and who hold the Bonds as capital assets within the meaning of Section 1221 of the Internal Revenue Code.

For purposes of this discussion, a "US holder" is a beneficial owner of a Bond that is, for US federal income tax purposes:

- an individual who is a citizen or resident of the United States;
- a corporation created or organised in the United States or under the laws of the United States, any state thereof or the District of Columbia;
- any estate the income of which is subject to US federal income taxation regardless of its source; or

• any trust if (i) a court within the United States is able to exercise primary supervision over the administration of the trust and one or more United States persons have the authority to control all substantial decisions of the trust, or (ii) a valid election is in place to treat the trust as a United States person.

If an entity treated as a partnership for US federal income tax purposes holds Bonds, the tax treatment of a partner in the partnership will generally depend upon the status of the partner and the activities of the partnership. A holder that is a partnership, and partners in such partnerships, should consult their tax advisers regarding the tax consequences of the purchase, ownership and disposition of Bonds.

Prospective purchasers of Bonds should consult their tax advisers concerning the tax consequences of the purchase, ownership and disposition of the Bonds in light of their particular circumstances, including the application of the US federal income tax considerations discussed below, as well as the application of state, local, foreign or other tax laws.

#### Payments of Interest

It is expected, and the following discussion assumes, that the Bonds will not be issued with original issue discount in excess of a statutorily defined *de minimis* amount. Payments of stated interest on the Bonds generally will be taxable to a US holder as ordinary income at the time that such payments are received or accrued, in accordance with such US holder's method of accounting for US federal income tax purposes.

Interest income on a Bond generally will constitute foreign source income and generally will be considered "passive category income" or, in the case of certain US holders, "general category income" for purposes of the foreign tax credit limitation rules.

Should any foreign tax be withheld, the amount withheld and the gross amount of any additional amounts paid to a US holder as a result of such withholding as described in "Terms and Conditions of the Bonds — Taxation" (such amounts, "Additional Amounts"), will be included in such US holder's income as ordinary income at the time such amount is deemed paid, received or accrued in accordance with such US holder's method of tax accounting. Foreign withholding tax paid at the rate applicable to a US holder would, subject to limitations and conditions, be treated as foreign income tax eligible for credit against such US holder's US federal income tax liability or, at such US holder's election, eligible for deductions in computing taxable income. US holders should consult their tax advisers regarding the creditability or deductibility of any withholding taxes. Any Additional Amounts would generally constitute foreign source income.

# Sale, Exchange, Redemption or Other Disposition of Bonds

Generally, upon the sale, exchange, redemption or other disposition of a Bond, a US holder will recognise taxable gain or loss equal to the difference between the amount realised on the sale, exchange, redemption or other disposition (less any amount attributable to accrued but unpaid interest not previously included in income, which will be taxable as such) and such US holder's adjusted tax basis in the Bond. A US holder's adjusted tax basis in a Bond generally will equal the cost of such Bond to such US holder, less any principal payments received by the US holder.

Such gain or loss generally will be US source capital gain or loss, and will be long-term capital gain or loss if at the time of the sale, exchange, redemption or other disposition the Bond has been held by such US holder for more than one year. Long-term capital gain recognised by a non-corporate US holder will generally be subject to taxation at a reduced rate. The deductibility of capital losses is subject to limitation.

## Information Reporting and Backup Withholding

In general, payments made in the United States or through certain US-related financial intermediaries of interest or principal and the proceeds from sales of Bonds held by a US holder will be required to be reported to the US Internal Revenue Service (the "IRS") unless the US holder is an exempt recipient and when required, demonstrates this fact. In addition, a US holder that is not an exempt recipient may be subject to backup withholding unless it provides a taxpayer identification number and otherwise complies with applicable certification requirements.

Backup withholding is not an additional tax. Amounts withheld as backup withholding may be credited against a US holder's US federal income tax liability and may entitle the US holder to a refund, provided that the appropriate information is timely furnished to the IRS.

Individuals that own "specified foreign financial assets" with an aggregate value in excess of certain thresholds are generally required to file an information report with respect to such assets with their tax returns. The Bonds generally will constitute specified foreign financial assets subject to these reporting requirements, unless the Bonds are held in certain accounts maintained by certain financial institutions. Under certain circumstances, an entity may be treated as an individual for purposes of these rules.

## Foreign Account Tax Compliance Act

Pursuant to Sections 1471 through 1474 of the Internal Revenue Code (commonly referred to as "FATCA"), a "foreign financial institution" may be required to withhold US tax on certain "foreign passthru payments" made after December 31, 2018. Obligations issued on or prior to the date that is six months after the date on which applicable final regulations defining foreign passthru payments are filed generally would be "grandfathered" unless materially modified after such date. Accordingly, if the Issuer is treated as a foreign financial institution, FATCA could apply to payments on the Bonds if there is a significant modification of the Bonds for U.S. federal income tax purposes after the expiration of this grandfathering period. Non-U.S. governments have entered into agreements with the United States (and additional non-U.S. governments are expected to enter into such agreements) to implement FATCA in a manner that alters the rules described herein. Holders should consult their own tax advisors on how these rules may apply to their investment in the Bonds. In the event any withholding under FATCA is imposed with respect to any payments on the Bonds, there will be no additional amounts payable to compensate for the withheld amount.

## PLAN OF DISTRIBUTION

Each of the Joint Bookrunners has, pursuant to a subscription agreement dated 24 January 2017 (the "Subscription Agreement"), severally and not jointly agreed with the Company, subject to the satisfaction of certain conditions, to subscribe for the principal amount of the Bonds set forth opposite its name below.

Joint Bookrunners	Principal Amount
Barclays Bank PLC	\$ 250,000,000
Citigroup Global Markets Limited	\$ 250,000,000
J.P. Morgan Securities plc	\$ 250,000,000
Standard Chartered Bank.	\$ 250,000,000
	\$1,000,000,000

The Subscription Agreement provides that the Joint Bookrunners will purchase all the Bonds if they purchase any of the Bonds. The Subscription Agreement entitles the Joint Global Coordinators and Joint Lead Managers on behalf of the Joint Bookrunners to terminate the Subscription Agreement in certain circumstances prior to payment being made to the Company. The Company has under the Subscription Agreement agreed to indemnify the Joint Bookrunners against certain liabilities. The Joint Bookrunners may offer and sell the Bonds through certain of their affiliates. The Joint Bookrunners or certain of their affiliates may purchase Bonds and be allocated Bonds for asset management and/or proprietary purposes but not with a view to distribution.

Neither the Company nor any person acting on its behalf will, from the date of this Offering Circular until the date 30 days after the date of this Offering Circular, without the prior written consent of the Joint Bookrunners, issue, offer, sell, contract to sell, pledge or otherwise dispose of (or publicly announce any such issuance, offer, sale or disposal) non-equity-linked debt securities issued or guaranteed (other than guarantees in respect of Indian Rupee denominated non-equity linked debt securities) by the Company and having a maturity of more than one year from the date of issue.

The Bonds are a new issue of securities with no established trading market. The Company intends to apply for the listing of the Bonds on the SGX-ST. In connection with this offering, the Stabilising Manager or any of its affiliates (or persons acting on behalf of the Stabilising Manager) may, to the extent permitted by laws and regulations, over-allot or effect transactions with a view to supporting the market price of the Bonds at a level higher than that which might otherwise prevail for a limited time after the issue date of the Bonds. However, there is no assurance that the Stabilising Manager or any of its affiliates (or persons acting on behalf of the Stabilising Manager) will undertake any stabilisation action. Any stabilising action may begin on or after the date on which adequate public disclosure of the terms of the offer of the Bonds is made and, if begun, may be ended at any time, but it must end no later than the earlier of 30 days after the issue date of the Bonds and 60 days after the date of the allotment of the Bonds. Any stabilisation action must be conducted by the Stabilising Manager or any of its affiliates (or persons acting on behalf of the Stabilising Manager or any of its affiliates) in accordance with all applicable laws and rules.

The Joint Bookrunners and their respective affiliates have, in the past, provided banking, investment banking and advisory services for the Company and the group for which they have received customary fees and expenses. Any or all of the Joint Bookrunners and their respective affiliates may, from time to time, engage in transactions with and perform services for the Company, its subsidiaries and to affiliates in the ordinary course of their business for which they may receive customary fees and reimbursement of expenses. It is expected that the Joint Bookrunners and their respective affiliates will continue to provide such services to, and enter into such transactions with, the Company and its subsidiaries and affiliates in the future.

In connection with the offering of the Notes, each Joint Bookrunner and/or its affiliate(s) may act as an investor for its own account and may take up Bonds in the offering and in that capacity may retain, purchase or sell for its own account such securities and any securities of the Company or related investments and may offer or sell such securities or other investments otherwise than in connection with the offering. Accordingly, references herein to the Bonds being offered should be read as including any offering of the Bonds to the Joint Bookrunners and/or their affiliates acting in such capacity. Such persons do not intend to disclose the extent of any such investment or transactions otherwise than in accordance with any legal or regulatory obligation to do so.

It is expected that delivery of beneficial interests in the Bonds will be made through the facilities of DTC on or about 30 January 2017, which will be the fourth business day following the initial sale of the Bonds. Under Rule 15c6-1 of the Exchange Act, trades in the secondary market generally are required to settle in three business days, unless the parties to any such trade expressly agree otherwise. Accordingly, purchasers who wish to trade Bonds prior to the third business day before the delivery of the Bonds will be required, by virtue of the fact that the Bonds initially will settle on a delayed basis, to agree to a delayed settlement cycle at the time of any such trade to prevent a failed settlement. Purchasers of Bonds who wish to make such trades should consult their advisers.

## 1. Public Offer Selling Restriction under the Prospectus Directive

In relation to each Member State of the European Economic Area which has implemented the Prospectus Directive (each, a "Relevant Member State"), each Joint Bookrunner, severally and not jointly, represents and agrees that with effect from and including the date on which the Prospectus Directive is implemented in that Relevant Member State (the "Relevant Implementation Date") it has not made and will not make an offer of the Bonds which are the subject of the offering contemplated by the Offering Circular to the public in that Relevant Member State except that it may, with effect from and including the Relevant Implementation Date, make an offer of such Bonds to the public in that Relevant Member State:

- (a) at any time to any legal entity which is a qualified investor as defined in the Prospectus Directive:
- (b) at any time to fewer than 150 natural or legal persons (other than qualified investors as defined in the Prospectus Directive) subject to obtaining the prior consent of the relevant bookrunner nominated by the Issuer for any such offer; or
- (c) at any time in any other circumstances falling within Article 3(2) of the Prospectus Directive,

provided that no such offer of the Bonds referred to in subparagraphs (a) to (c) above shall require the Issuer or any Joint Bookrunner to publish a prospectus pursuant to Article 3 of the Prospectus Directive or supplement a prospectus pursuant to Article 16 of the Prospectus Directive.

For the purposes of this provision, the expression an "offer of the Bonds to the public" in relation to any of the Bonds in any Relevant Member State means the communication in any form and by any means of sufficient information on the terms of the offer and the Bonds to be offered so as to enable an investor to decide to purchase or subscribe the Bonds, as the same may be varied in that Relevant Member State by any measure implementing the Prospectus Directive in that Relevant Member State, and the expression "Prospectus Directive" means Directive 2003/71/EC (as amended, including by Directive 2010/73/EU) and includes any relevant implementing measure in the Relevant Member State.

## 2. Hong Kong

Each Manager represents and agrees that:

- (a) it has not offered or sold and will not offer or sell in Hong Kong, by means of any document, any Bonds (except for Bonds which are a "structured product" as defined in the Securities and Futures Ordinance (Cap. 571) of Hong Kong ("SFO")) other than (i) to "professional investors" as defined in the SFO and any rules made under the SFO or (ii) in other circumstances which do not result in the document being a "prospectus" as defined in the Companies (Winding Up and Miscellaneous Provisions) Ordinance (Cap. 32) of Hong Kong or which do not constitute an offer to the public within the meaning of that Ordinance; and
- (b) it has not issued or had in its possession for the purposes of issue and will not issue or have in its possession for the purposes of issue, whether in Hong Kong or elsewhere, any advertisement, invitation or document relating to the Bonds, which is directed at, or the contents of which are likely to be accessed or read by, the public in Hong Kong (except if permitted to do so under the securities laws of Hong Kong) other than with respect to Bonds which are or are intended to be disposed of only to persons outside Hong Kong or only to "professional investors" within the meaning of the SFO and any rules made under the SFO.

#### 3. India

This document has not been and will not be registered, produced or published as a prospectus or a statement in lieu of prospectus or as an offer document (in respect of a public offer or information memorandum or other offering material in respect of any private placement under the Companies Act, 1956, as amended by the Companies Act, 2013, as amended and the rules framed thereunder or any other applicable Indian laws) with any registrar of companies in India. This document has not been and will not be reviewed or approved by any statutory or regulatory authority in India, including the Securities and Exchange Board of India, Reserve Bank of India, any registrar of companies in India or any stock exchange in India or regulatory body of like nature. This document and this offering of Bonds are not and should not be construed as an invitation, offer or sale of any securities to the public in India. Other than in compliance with applicable laws and regulations in India, including the Companies Act, 1956, as amended by the Companies Act, 2013, as amended and the rules framed thereunder or any other applicable Indian laws, our Bonds have not been, and will not be, offered or sold to the public or any member of the public in India by means of any document. This document is strictly personal to the recipient and neither this document nor the offering of our Bonds is calculated to result, directly or indirectly, in our Bonds becoming available for subscription or purchase by persons other than those receiving the invitation or offer. This Offering Circular or any other offering document or material relating to the Bonds have not been and will not be circulated or distributed, directly or indirectly, to any person or to the public or any member of the public in India or otherwise generally distributed or circulated in India which would constitute an advertisement, invitation, offer, sale or solicitation of and offer to subscribe for or purchase any securities in violation of applicable Indian laws.

## 4. Indonesia

The Offering Circular may only be distributed outside Indonesia to persons who are neither citizens of Indonesia (wherever located) nor residents of Indonesia.

## 5. Japan

The Bonds have not been and will not be registered under the Financial Instruments and Exchange Act of Japan (Act No. 25 of 1948, as amended, the "FIEA") and each Joint Bookrunner represents and agrees that it will not offer or sell any Bonds, directly or indirectly, in Japan or to, or for the benefit of, any resident of Japan (as defined under Item 5, Paragraph 1, Article 6 of the Foreign

Exchange and Foreign Trade Act (Act No. 228 of 1949, as amended)), or to others for reoffering or resale, directly or indirectly, in Japan or to, or for the benefit of, a resident of Japan, except pursuant to an exemption from the registration requirements of, and otherwise in compliance with, the FIEA and any other applicable laws, regulations and ministerial guidelines of Japan.

#### 6. Malaysia

Each Manager acknowledges that no lodgement of the relevant documents with the Securities Commission Malaysia (the "SC") has been or will be made and no approval from the SC under the Capital Markets and Services Act 2007 of Malaysia ("CMSA") has been or will be obtained and the Preliminary Offering Circular or this Offering Circular have not been nor will they be registered with the SC as a prospectus under the CMSA for the offering or issuance of the Bonds on the basis that the Bonds will be offered or sold exclusively to persons outside Malaysia. Accordingly, each Manager represents and warrants that that it has not offered or sold any Bonds or caused such Bonds to be made the subject of an invitation for subscription or purchase nor will it offer or sell such Bonds or cause such Bonds to be made the subject of an invitation for subscription or purchase, nor has it circulated or distributed, nor will it circulate or distribute, either the Preliminary Offering Circular or this Offering Circular or any other document or material in connection with the offer or sale, or invitation for subscription or purchase, of the Bonds, whether directly or indirectly, to any person in Malaysia.

#### 7. Singapore

Each Joint Bookrunner acknowledges that the Offering Circular has not been registered as a prospectus with the Monetary Authority of Singapore under the Securities and Futures Act, Chapter 289 of Singapore (the "SFA"). Accordingly, each Manager represents and agrees that it has not offered or sold any Bonds or caused the Bonds to be made the subject of an invitation for subscription or purchase and will not offer or sell any Bonds or cause the Bonds to be made the subject of an invitation for subscription or purchase, and has not circulated or distributed, nor will it circulate or distribute, the Offering Circular or any document or material in connection with the offer or sale, or invitation for subscription or purchase, of any Bonds, whether directly or indirectly, to any person in Singapore other than

- (a) to an institutional investor under Section 274 of the SFA;
- (b) to a relevant person pursuant to Section 275(1) of the SFA or any person pursuant to Section 275(1A) of the SFA and in accordance with the conditions specified in Section 275 of the SFA; or
- (c) otherwise pursuant to, and in accordance with the conditions of, any other applicable provision of the SFA.

Where the Bonds are subscribed or purchased under Section 275 of the SFA by a relevant person which is:

- (a) a corporation (which is not an accredited investor (as defined in Section 4A of the SFA)) the sole business of which is to hold investments and the entire share capital of which is owned by one or more individuals, each of whom is an accredited investor; or
- (b) a trust (where the trustee is not an accredited investor) whose sole purpose is to hold investments and each beneficiary of the trust is an individual who is an accredited investor;

securities (as defined in Section 239(1) of the SFA) of that corporation or the beneficiaries' rights and interest (howsoever described) in that trust shall not be transferable for six months after that corporation or that trust has acquired the Bonds pursuant to an offer made under Section 275 of the SFA except:

(i) to an institutional investor or to a relevant person defined in Section 275(2) of the SFA, or to any person arising from an offer referred to in Section 275(1A) or Section 276(4)(i)(B) of the SFA;

- (ii) where no consideration is or will be given for the transfer;
- (iii) where the transfer is by operation of law;
- (iv) pursuant to Section 276(7) of the SFA; or
- (v) as specified in Regulation 32 of the Securities and Futures (Offers of Investments) (Shares and Debentures) Regulations 2005 of Singapore.

#### 8. United Kingdom

Each of the Joint Bookrunners represents and agrees that:

- (a) it has only communicated or caused to be communicated and will only communicate or cause to be communicated an invitation or inducement to engage in investment activity (within the meaning of Section 21 of the FSMA) received by it in connection with the issue or sale of any Bonds in circumstances in which Section 21(1) of the FSMA does not apply to the Issuer; and
- (b) it has complied and will comply with all applicable provisions of the FSMA with respect to anything done by it in relation to the Bonds in, from or otherwise involving the United Kingdom.

#### 9. United States

The Bonds have not been and will not be registered under the Securities Act and may not be offered, sold, pledged or transferred within the United States or to, or for the account or benefit of, U.S. persons, except that the Bonds may be offered or sold to qualified institutional buyers in reliance on an exemption from registration under the Securities Act or outside the United States in accordance with Regulation S. The Bonds are being offered and sold outside the United States to non-US persons in reliance on Regulation S and within the United States to qualified institutional buyers in reliance on Rule 144A or another exemption from registration under the Securities Act. In addition, until 40 days after the commencement of the offering, an offer or sale of the Bonds within the United States (whether or not as part of the offering) may violate the registration requirements of the Securities Act if such offer or sale is made otherwise than in accordance with Rule 144A under the Securities Act.

The Bonds have not been approved or disapproved by the United States Securities and Exchange Commission, any state securities commission in the United States or any other United States regulatory authority, nor have any of the foregoing authorities passed upon or endorsed the merits of the offering or the accuracy or adequacy of the Offering Circular. Any representation to the contrary is a criminal offence in the United States.

# **LEGAL MATTERS**

Certain legal matters with respect to the Bonds will be passed upon for Vedanta Resources plc by Latham & Watkins LLP as to matters of English law and US federal securities law. Certain legal matters will be passed upon for the Joint Bookrunners by Allen & Overy LLP with respect to English law and US federal securities law. Certain legal matters with respect to the Bonds will be passed upon for Vedanta Resources plc by Khaitan & Co as to Indian law.

# INDEPENDENT AUDITORS

The consolidated financial statements of Vedanta Resources plc as of and for the years ended 31 March 2015 and 2016 incorporated in this Offering Circular have been audited by Deloitte LLP, independent auditors, as stated in their reports incorporated else where in this Offering Circular. Deloitte LLP is a member of the Institute of Chartered Accountants in England and Wales. The interim financial statements for the 6 months ended 30 September 2016 have been reviewed by Ernst & Young. Ernst & Young is a member of the Institute of Chartered Accountants in England & Wales.

The audit reports of Deloitte LLP, with respect to the Company's consolidated financial statements in accordance with guidance issued by The Institute of Chartered Accountants in England and Wales, include the following limitations: "This report is made solely to the Company's members, as a body, in accordance with Chapter 3 of Part 16 of the Companies Act 2006. Our audit work has been undertaken so that we might state to the Company's members those matters we are required to state to them in an auditors' report and for no other purpose. To the fullest extent permitted by law, we do not accept or assume responsibility to anyone other than the Company and the Company's members as a body, for our audit work, for this report, or for the opinions we have formed".

The Review Report of Ernst & Young, with respect to the unaudited interim financial statements for the six months ended 30 September 2016, in accordance with guidance issued by The Institute of Chartered Accountants in England & Wales, include the following limitations: "This Report is made solely to the Company in accordance with guidance contained in International Standard on Review Engagements 2410 (UK and Ireland) "Review of Interim Financial Information Performed by the Independent Auditor of the Entity" issued by the Auditing Practices Board. To the fullest entent permitted by law, we do not accept or assume responsibility to anyone other than the Company, for our work, for this report, or for the conclusions we have formed."

## **EXPERTS**

The information included in this Offering Circular regarding Ore Reserves is based on estimates determined by Vedanta and;

- The Mineral Resources and Ore Reserves of KCM's Konkola, Nchanga and Nampundwe mines were audited as of 31 March 2016, by SRK Consulting (South Africa) (Pty) Ltd and are reported in accordance with the terms and definitions of the SAMREC Code (2009). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- The Mineral Resources of CMT's copper mines are derived from management estimates as of 31 March 2016 and are reported in accordance with the terms and definitions of the JORC Code (2012). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- The Mineral Resources and Ore Reserves of HZL's mines were audited as of 31 March 2016 by SRK Consulting (UK) Limited and are reported in accordance with the terms and definitions of the JORC Code (2012). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- The Mineral Resources and Ore Reserves of Black Mountain Mining's mines are derived from management estimates as of 31 March 2016 and are reported in accordance with the terms and definitions of the SAMREC Code (2009). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- The Ore Reserves of Skorpion were audited by Axe Valley Mining Consultants Ltd. as of 31 March 2016 and are reported in accordance with the terms and definitions of the JORC Code (2012). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- The Ore Reserves of BALCO's mines were audited by Geo Solutions Private Limited as of 31 March 2016 and are reported in accordance with the terms and definitions of the JORC Code (2012). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- The Mineral Resources and Ore Reserves of the iron ore mines of Vedanta Limited and its subsidiary, SRL, were audited as of 31 March 2016 by Roscoe Postle Associates Inc. and are reported in accordance with the terms and definitions of the JORC Code (2012). The details of the responsible Competent Persons are included in Annex C of the Offering Circular.
- During the year ended 31 March 2016, the Group recognised an impairment charge in respect of the exploratory assets in West Africa (Western Cluster, Liberia) on account of low iron ore prices, geo-political factors and no plans for any substantive expenditure resulting in continued uncertainty in the project. Therefore, the Company did not get certification of reserves and resources for the current period.
- The Ore Reserves of Vedanta Limited's bauxite mines are derived from management estimates as of 31 March 2016. There has been no bauxite mining in these mines during fiscal years 2014, 2015 and 2016 and are reported in accordance with the terms and definitions of the JORC Code (2012). The details of the responsible Competent Persons are included in Annexure C of the Offering Circular.

DeGolyer and MacNaughton has independently estimated the information included in this Offering Circular regarding the proved, probable, and possible reserves and contingent resources of Cairn India as of 31 March 2016 according to the PRMS approved in March 2007 by the Society of Petroleum Engineers, the World Petroleum Council, the American Association of Petroleum Geologists, and the Society of Petroleum Evaluation Engineers.

The information included in this Offering Circular regarding the proved, probable and possible oil, condensate, and sales gas reserves and the contingent and prospective resources owned by Cairn India in India is based on estimates determined by Cairn India.

## **DEFINITIONS AND GLOSSARY OF TECHNICAL TERMS**

#### **Definitions**

The following definitions apply throughout this Offering Circular unless the context requires otherwise:

"2019 Bonds" US\$1,200,000,000 6.00% Bonds due 2019

"2018 Bonds" US\$750,000,000 9.50% Bonds due 2018

"AAI" Aluminium Association of India

"Act" Income Tax Act 2007 of the UK

"ADSs" American Depositary Shares

"Affiliate" a person that directly, or indirectly through one or more

intermediaries, controls, or is controlled by, or is under common control with, a specified person. A person shall be deemed to control another person if such first person possesses, directly or indirectly, the power to direct, or cause the direction of, the management and policies of such other person, whether through the ownership of voting securities,

by contract or otherwise

"Agarwal family" Messrs. Anil Agarwal, Dwarka Prasad Agarwal and Agnivesh

Agarwal, any of their parents, spouses, children, siblings and their children of Vedanta, and the families of any such person

"Air (Prevention and Control of Pollution) Act, 1981 of India,

as amended

"Alcoa" Alcoa Inc.

"aluminium business" the business of Vedanta comprising the aluminium operations

as further described in "Business - Description of the

Businesses — Aluminium Business"

"Annual Financial Statements" the consolidated audited financial information for the

Company as of and for fiscal years ended 31 March 2014,

2015 and 2016.

"associated undertakings" has the meaning ascribed to it under paragraph 20(1) of

Schedule 4A to the Companies Act

"AT&C" Aggregate Technical and Commercial

"Aurubis" The Aurubis Group

"Australia" The Commonwealth of Australia, its possessions and

territories and all areas subject to its jurisdiction or any

political subdivision thereof

"BALCO" Bharat Aluminium Company Limited, a company

incorporated in India

"BHP Billiton" BHP Billiton Limited

"Binani Zinc" Binani Zinc Limited

"Bloomberg" Bloomberg L.P.

"Board" the board of Directors of the Company

"Bondholders" Holders of the Bonds

**"Bonds"** \$1,000,000,000 6.375% Bonds due 2022

"BSE" the Bombay Stock Exchange Limited

"CAGR" Compound annual growth rate

"Cairn Energy" Cairn Energy plc, a company incorporated in England &

Wales

"Cairn Energy Group" Cairn Energy and its subsidiaries

"Cairn India" Cairn India Limited, a company incorporated in India

"Cairn India Group" Cairn India and its subsidiaries

"Cairn India Shares" Ordinary shares of Rs. 10 each in the share capital of Cairn

India

"Canada, its possessions and territories and all areas subject to

its jurisdiction or any political subdivision thereof

"CEA" the Central Electricity Authority of India

"CEC" Copperbelt Energy Corporation PLC, a public company in

Lusaka, Zambia

"CGU" Cash generating unit

"CHALCO" Aluminium Corporation of China Limited

"CIS" Commonwealth of Independent States

"Clearstream" Clearstream Banking, société anonyme

"Closing Date" on or about 30 January 2017

"CMT" Copper Mines of Tasmania Pty Ltd, a company incorporated

in Tasmania, Australia

"Coal India" Coal India Limited, the government-owned coal monopoly in

India

"Code" "The Combined Code on Corporate Governance" issued by

the Financial Reporting Council of the UK

"Codelco" Corporación Nacional del Cobre

"Command Petroleum" Command Petroleum (India) Pty Ltd.

"Commission" US Securities and Exchange Commission

"Companies Act" the United Kingdom Companies Act 1985, as amended

"Conclave" Conclave PTC Limited, the trustee of the Trust

"copper business" the business of Vedanta comprising the copper operations as

further described in "Business — Description of the

Businesses — Copper Business"

"CRISIL" Credit Rating Information Services of India Limited

"CRO" Chingola Refractory Ore

"CUKHL" Cairn UK Holdings Limited, a company incorporated in

England & Wales

"Development Agreement" the development agreement dated 5 November 2004 between

KCM and the Government of Zambia

"DGH" Directorate General of Hydrocarbons

"Directors" the Executive Directors and Non-executive Directors of the

Company

"DTC" The Depository Trust Company

"Essel" Essel Mining & Industries Ltd

"EU" the European Union as established by the Treaty on European

Union

"Euroclear" Euroclear Bank S.A./N.V.

"Exchange Act" United States Securities Exchange Act of 1934, as amended

"Executive Directors" Messrs. Anil Agarwal, Navin Agarwal and Tom Albanese

"Factories Act" Factories Act, 1948, as amended, of India

"Finsider" Finsider International Company Limited, a company

incorporated in England and Wales

"fiscal" the financial year ended or ending 31 March of that year

"Freeport-McMoran" Freeport McMoran Copper and Gold Corporation

"FCA" Financial Conduct Authority of the United Kingdom

"FSMA" the United Kingdom Financial Services and Markets Act

2000, as amended

"GDP" gross domestic product

"GEL" Goa Energy Limited, an independent power producer

"Global Certificate" the Restricted Global Certificate and the Unrestricted Global

Certificates

"GoI" Government of India

"GRIDCO" Grid Corporation of Odisha Limited, a nominee of the State

Government of Odisha

Vedanta and its subsidiaries on a consolidated basis "Group"

"GSPCB" Goa State Pollution Control Board

"Hindalco" Hindalco Industries Limited

"HZL" Hindustan Zinc Limited, a company incorporated in India

"IAS" International Accounting Standards

"IFRS" International Financial Reporting Standards

"ILZDA" India Lead Zinc Development Association

"Income Tax Act" Income Tax Act, 1961, as amended of India

"INDAL" Indian Aluminium Company Limited

"India" Republic of India

"Indian GAAP" generally accepted accounting principles as used in India

"Interest Payment Day" with respect to the 2019 Bonds, 3 June and 3 December of

> each year, commencing 3 December 2013, except that the 3 December 2018 interest payment date will be replaced with an interest payment date on 31 January 2019, and (ii) with respect to the 2023 Bonds, 3 June and 3 December of each year, commencing 3 December 2013, except that the last

interest payment date will be on 31 May 2023

"Internal Revenue Code" US Internal Revenue Code of 1986, as amended

"IOCL" Indian Oil Corporation Limited

"iron ore business" the business of Vedanta comprising the iron ore operations as

further described in "Business — Description of the

Businesses — Iron Ore Business"

US Internal Revenue Service "IRS"

"ISO" International Standards Organisation. ISO 14001 refers to the

international standard for environmental management systems

published by the ISO in 1996

"Issuer" Vedanta Resources Plc.

"Joint Bookrunners" Barclays Bank PLC, Citigroup Global Markets Limited, J.P.

Morgan Securities plc; Standard Chartered Bank.

"Joint Global Coordinators, Barclays Bank PLC, Citigroup Global Markets Limited, J.P. and Joint Lead Managers"

Morgan Securities plc; Standard Chartered Bank.

"JPY" Japanese Yen

"Kapasan Project" The implementation of a 100,000 tpa greenfield zinc smelter

plan at Kapasan, State of Rajasthan, by HZL under the terms

of SOVL's shareholders' agreement

"KCM" Konkola Copper Mines plc, a company incorporated in

Zambia

"KDMP" Konkola Deep Mining Project

"LIBOR" London Interbank Offering Rate

"Lisheen" Lisheen Mine Partnership and its subsidiaries

"Listing" The Company's listing of the Ordinary Shares on the Official

List and admission to trading on the LSE's main market for

listed securities on 10 December 2003

"Listing Rules" the rules relating to admission to the Official List, made in

accordance with Section 73A(2) of FSMA

"LME" the London Metal Exchange Limited

"LML" the four large-scale mining licences granted to KCM by the

Republic of Zambia on 31 March 2000, each of which has a

term of 25 years

"LOB" Lower Ore Body, a stratigraphic horizon for mineralisation

"LTIP" Vedanta Resources Long-Term Incentive Plan

"MALCO" Madras Aluminium Company Ltd, a company incorporated in

India

"MBA Fields" the Mangala, Bhagyam and Aishwariya fields located in the

Rajasthan Block

"MCLR" Marginal Cost of Funds based Lending Rate

"MCD Rules" Mineral Conservation and Development Rules, 1988, as

amended, of India

"Mitsui" Mitsui & Co.

"MLMC" Mt. Lyell Mining Company Limited, formerly Gold Mines of

Australia

"MMDR Act" Mines and Minerals (Development and Regulations) Act,

1957 of India, as amended

"MoEF" Ministry of Environment and Forest of the GoI

"Monte Cello" Monte Cello BV, a company incorporated in The Netherlands

"Moody's Investors Service, Inc.

"MoP" Ministry of Power of the GoI

"MoPNG" Ministry of Petroleum and Natural Gas of the GoI

"MOU" Memorandum of Understanding

"MPT" Mangala Processing Terminal

"MSPL" Mineral Sales Private Limited

"NELP" New Exploration Licensing Policy

"NMDC" National Mineral Development Corporation

"No. 1 shaft" the mining operations by underground methods focusing on

the shaft system of the Kirila Bombwe South ore body

"No. 3 shaft" the mining operations by underground methods focusing on

the shaft system of the Kirila Bombwe North ore body

"Non-executive Directors" Messrs. Aman Mehta, Geoffrey Green, Deepak Parekh, Raj

Rajgopal and Ekaterina Zotova

"Noon Buying Rate" the noon buying rate in New York City for cable transfer of

such foreign currency as certified for customs purposes by the

Federal Reserve Bank of New York

"NOP" Nchanga open-pit

"NSE" the National Stock Exchange of India Limited

"NTPC" National Thermal Power Corporation Limited

"NYSE" New York Stock Exchange

"Official List" the official list maintained by the UK Listing Authority for

the purposes of Part VI of the FSMA

"OHSAS" Occupational Health and Safety Assessment Series

"OIDA Cess" Indian Oil Industry (Development) Act 1974, as amended

"OMC" Odisha Mining Corporation Limited

"ONGC" The Oil and Natural Gas Corporation Limited

"Open Offer" the purchase of Cairn India Shares pursuant to an open offer

made to Cairn India Shareholders (other than members of the

Cairn Energy Group)

"Ordinary Shares" ordinary shares of \$0.10 each in the Company

"Paying Agency Agreement" the paying agency agreement to be dated on or about the

Closing Date among the Issuer, the Trustee and the Principal

Agent

"PGCIL" Power Grid Corporation India Limited

"Phase II" the second phase of development of the Rajasthan Block,

including the development of Bhagyam and Aishwariya fields and the construction and installation of the Salaya to Bhogat

section of the Pipeline

"Pipeline" the heated pipeline for the transportation of crude oil

produced at the Rajasthan Block of approximately 600 km

"Platts" Platts, McGraw Hill Financial, a global provider of energy,

petrochemicals, metals and agriculture information, including

benchmark price assessments for commodity markets

"PPAs" power purchase agreements

"Principal Agent" Citibank, N.A., London Branch

"PRMS" Petroleum Resources Management System

"QIB" qualified institutional buyer within the meaning of Rule 144A

"Rajasthan Block" Block RJ-ON-90/1

"Rajasthan Block PSC"

The PSC between the GoI and a consortium consisting of

ONGC, SIPD and Cairn India in relation to the Rajasthan

Block

"Ravva Block" Block PKGM-1

"Ravva PSC"

The production sharing contract fot the exploration,

development and production of the Ravva Block

"RBI" Reserve Bank of India

"RBI Reference Rate" the exchange rates certified by the Reserve Bank of India

"Readmission" Admission of the Ordinary Shares to the Official List and to

trading on the LSE's main market for listed securities becoming effective in accordance with, respectively, the Listing Rules and the Admission and Disclosure Standards

"Registrar" Citigroup Global Markets Deutschland AG

"Regulation S" Regulation S under the Securities Act

"Regulation S Bonds" the Bonds which are offered and sold outside the United

States to non-US persons in reliance on Regulation S

"Relationship Agreement" the relationship agreement dated 5 December 2003 entered

into by the Company, Volcan, Conclave and Anil Agarwal

"Restricted Global Certificate" the restricted global certificate in restricted form initially

representing the Rule 144A Bonds

"Richter" Richter Holding Ltd.

"Rio Tinto" Rio Tinto plc

"Rio Tinto Alcan" Rio Tinto Alcan Ltd.

"Rule 144A" Rule 144A under the Securities Act

"Rule 144A Bonds" the Bonds which are offered and sold in the United States to

QIBs in reliance on Rule 144A

"RPA" Roscoe Postle Associates Inc., an independent consulting firm

"SEBI" Securities and Exchange Board of India

"SEBs" State Electricity Boards in India

"Securities Act" United States Securities Act of 1933, as amended

"Securities Act Legend" has the meaning as ascribed to in the Trust Deed

"SEPCO" Shandong Electric Power Construction Corporation

"SFA" Securities and Futures Act, Chapter 289 of Singapore

"SFIO" Serious Fraud Investigation Office

"SGL" Sesa Goa Limited, a company incorporated in India

"SGX-ST" Singapore Exchange Securities Trading Limited

"SIL" Sesa Industries Limited, a company incorporated in India,

which was formerly the subsidiary of SGL, which has since amalgamated with SGL with effect from 14 February 2011

and the appointment date of 1 April 2005

"SIPD" Shell India Production Development B.V.

"Skorpion" Skorpion Mining Company (Pty) Ltd and its subsidiaries

"SOVL" Sterlite Opportunities and Ventures Limited, now merged with

and into Sterlite

"SRK SA" independent consulting firm SRK Consulting (South Africa)

Pty Ltd.

"SRK UK" independent consulting firm SRK Consulting (UK) Limited

"SRL" Sesa Resources Limited (previously known as V.S. Dempo &

Co. Private Limited)

"Standard & Poor's" Standard & Poor's Ratings Services, a division of

McGraw-Hill Companies, Inc.

"Sterlite" Sterlite Industries (India) Limited, now merged into Vedanta

Limited

"Sterlite Energy" Sterlite Energy Limited, a company incorporated in India

"STL" Sterlite Technologies Limited, a company incorporated in

India

"Subscription Agreement" dated 24 January 2017

"Tax Department" the Indian Income Tax Department

"TCM" Thalanga Copper Mines Pty Ltd, a company incorporated in

Victoria, Australia

"TLP" tailings leach plant

"TNPCB" Tamil Nadu Pollution Control Board

"Trust" Anil Agarwal Discretionary Trust

"Trust Deed" the trust deed to be dated on or about the Closing Date

between the Company and the Trustee

"Trustee" Citicorp International Limited

"TSEHL" Twin Star Energy Holdings Limited, a company incorporated

in Mauritius

"TSMHL" Twin Star Mauritius Holdings Limited, a company

incorporated in Mauritius

"Twin Star" Twin Star Holdings Limited, a company incorporated in

Mauritius

"UC RUSAL" United Company RUSAL Ltd.

"TSPL" Talwandi Sabo Power Limited

Code"

"UK Corporate Governance The UK Corporate Governance Code issued by the Financial

Reporting Council of the UK in June 2014

"UK GAAP" generally accepted accounting principles as used in the UK

"UK Listing Authority" the FCA acting in its capacity as the competent authority for

the purpose of Part VI of the FSMA and in the exercise of its functions in respect of admission to the Official List otherwise than in accordance with Part VI of the FSMA

"United Kingdom" or "UK" the United Kingdom of Great Britain and Northern Ireland

"United States" or "US" the United States of America, its territories and possessions,

any state of the United States of America and the District of

Columbia

"Unrestricted Global the unrestricted global certificate is registered form initially

Certificate" representing the Regulation S Bonds

"US GAAP" generally accepted accounting principles as used in the US

"USGS" US Geological Survey, a science agency for the US

Department of the Interior with a mission to provide for the provision of reliable scientific information to describe and understand the Earth; minimise loss of life and property from natural disasters; manage water, biological, energy, and Mineral Resources; and enhance and protect quality of life

"Vedanta" Vedanta and its subsidiaries and "member of Vedanta" shall

be construed accordingly

"Vedanta Limited" Vedanta Limited, a company incorporated in India

"Vedanta Limited Group" Vedanta Limited and its subsidiaries

"Volcan" Volcan Investments Limited, a company incorporated in the

Bahamas

"VRHL" Vedanta Resources Holdings Limited, a company

incorporated in England and Wales

"Water Act" Water (Prevention and Control of Pollution) Act, 1974 of

India

"Water Cess Act" Water (Prevention and Control of Pollution) Cess Act, 1977 of

India

"WCA" Workmen's Compensation Act, 1923 of India

"Xstrata" Xstrata AG

"Zambia" the Republic of Zambia

"ZCI" Zambia Copper Investments Ltd, a company incorporated in

Zambia

"ZESCO" Zambia Electricity Supply Corporation Limited

"zinc business" the business of Vedanta comprising the zinc operations as

further described in "Business — Description of the

Businesses — Zinc Business"

Terms and Definitions of the SAMREC Code (2009)

"Mineral (Ore) Reserve" the economically mineable material derived from a Measured

or Indicated Mineral Resource or both. It includes diluting and contaminating materials and allows for losses that are expected to occur when the material is mined. Appropriate assessments to a minimum of a Pre-Feasibility Study for a project and a Life of Mine Plan for an operation must have been completed, including consideration of, and modification by, realistically assumed mining, metallurgical, economic, marketing, legal, environmental, social and governmental

factors.

"Proved Mineral (Ore) Reserve"

the economically mineable material derived from a Measured Mineral Resource. It is estimated with a high level of confidence. It includes diluting and contaminating materials and allows for losses that are expected to occur when the material is mined. Appropriate assessments to a minimum of a Pre-Feasibility Study for a project or a Life of Mine Plan for an operation must have been carried out, including consideration of, and modification by, realistically assumed mining, metallurgical, economic, marketing, legal, environmental, social and governmental factors. Such modifying factors must be disclosed.

"Probable Mineral (Ore) Reserve" the economically mineable material derived from a Measured or Indicated Mineral Resource or both. It is estimated with a lower level of confidence than a Proved Mineral Reserve. It includes diluting and contaminating materials and allows for losses that are expected to occur when the material is mined. Appropriate assessments to a minimum of a Pre-Feasibility Study for a project or a Life of Mine Plan for an operation must have been carried out, including consideration of, and modification by, realistically assumed mining, metallurgical, economic, marketing, legal, environmental, social and governmental factors. Such modifying factors must be disclosed.

"Mineral Resource"

a concentration or occurrence of material of economic interest in or on the earth's crust in such form, quality and quantity that there are reasonable and realistic prospects for eventual economic extraction. The location, quantity, grade, continuity and other geological characteristics of a Mineral Resource are known, or estimated from specific geological evidence, sampling and knowledge interpreted from an appropriately constrained and portrayed geological model. Mineral Resources are subdivided, and must be so reported, in order of increasing confidence in respect of geoscientific evidence, into Inferred, Indicated or Measured categories.

"Measured Mineral Resource"

that part of a Mineral Resource for which tonnage, densities, shape, physical characteristics, grade and mineral content can be estimated with a high level of confidence. It is based on detailed and reliable information from exploration, sampling and testing of material from locations such as outcrops, trenches, pits, workings and drill holes. The locations are spaced closely enough to confirm geological and grade continuity.

"Indicated Mineral Resource"

that part of a Mineral Resource for which tonnage, densities, shape, physical characteristics, grade and mineral content can be estimated with a reasonable level of confidence. It is based on information from exploration, sampling and testing of material gathered from locations such as outcrops, trenches, pits, workings and drill holes. The locations are too widely or inappropriately spaced to confirm geological or grade continuity but are spaced closely enough for continuity to be assumed.

"Inferred Mineral Resource"

that part of a Mineral Resource for which volume or tonnage, grade and mineral content can be estimated with only a low level of confidence. It is inferred from geological evidence and sampling and assumed but not verified geologically or through analysis of grade continuity. It is based on information gathered through appropriate techniques from locations such as outcrops, trenches, pits, workings and drill holes that may be limited in scope or of uncertain quality and reliability.

## Terms and Definitions of the JORC Code (2012)

"Ore Reserves"

those portions of Mineral Resources that, after the application of all Modifying Factors, result in an estimated tonnage and grade which, in the opinion of the Competent Person making the estimates, can be the basis of a technically and economically viable project, after taking account of material relevant Modifying Factors. Deriving an Ore Reserve without a mine design or mine plan through a process of factoring of the Mineral Resource is unacceptable.

"Proved Ore Reserve"

the economically mineable part of a Measured Mineral Resource. A Proved Ore Reserve implies a high degree of confidence in the Modifying Factors.

"Probable Ore Reserve"

the economically mineable part of an Indicated, and in some circumstances, a Measured Mineral Resource. The confidence in the Modifying Factors applying to a Probable Ore Reserve is lower than that applying to a Proved Ore Reserve.

"Mineral Resource"

a concentration or occurrence of solid material of economic interest in or on the Earth's crust in such form, grade (or quality), and quantity that there are reasonable prospects for eventual economic extraction. The location, quantity, grade (or quality), continuity and other geological characteristics of a Mineral Resource are known, estimated or interpreted from specific geological evidence and knowledge, including sampling. Mineral Resources are sub-divided, in order of increasing geological confidence, into Inferred, Indicated and Measured categories.

"Measured Mineral Resource"

that part of a Mineral Resource for which quantity, grade (or quality), densities, shape, and physical characteristics are estimated with confidence sufficient to allow the application of Modifying Factors to support detailed mine planning and final evaluation of the economic viability of the deposit.

"Indicated Mineral Resource"

that part of a Mineral Resource for which quantity, grade (or quality), densities, shape and physical characteristics are estimated with sufficient confidence to allow the application of Modifying Factors in sufficient detail to support mine planning and evaluation of the economic viability of the deposit.

## "Inferred Mineral Resource"

that part of a Mineral Resource for which quantity and grade (or quality) are estimated on the basis of limited geological evidence and sampling. Geological evidence is sufficient to imply but not verify geological and grade (or quality) continuity. It is based on exploration, sampling and testing information gathered through appropriate techniques from locations such as outcrops, trenches, pits, workings and drill holes. An Inferred Mineral Resource has a lower level of confidence than that applying to an Indicated Mineral Resource and must not be converted to an Ore Reserve. It is reasonably expected that the majority of Inferred Mineral Resources could be upgraded to Indicated Mineral Resources with continued exploration.

## **Glossary of Technical Terms**

The following definitions shall apply to the technical terms used herein:

"2D" two dimensional

"2P" gross proved plus probable reserves

"3D" three dimensional

"4D" four dimensional

"alloy" a compound of two or more metals

"alumina" the calcined product from an alumina refinery containing at

least 98% aluminium oxide (Al2O3)

"anode" the electrode by which current enters the cell. For copper

refining, the impure copper is used as an anode. For zinc refining, lead anodes are used. For aluminium refining, a

carbon anode is used

"anode slime" a deposit of insoluble residue formed from the dissolution of

the anode in commercial electrolysis. In copper refining, this slime contains the precious metals that are recovered from it

"API" a specific gravity scale developed by the American Petroleum

Institute for measuring the relative density of various

petroleum liquids

"AS" acid soluble (pertaining to copper)

"ASP" alkaline surfactant polymer

"assay" a test to determine the level of a particular element in a

sample

"asset capacity" the maximum throughput of fixed facilities such as a

processing plant or material handling system, which can vary over the life of the facility from the initial nameplate capacity

"bboe" billion barrels of oil equivalent

**'boepd"** barrels of oil equivalent per day

"bopd" barrels of oil per day

"bauxite" a general term for a rock composed of a mixture of hydrated

aluminium oxides and hydroxides and generally contaminated with compounds of iron; it is the main ore from which

aluminium is produced

"Bayer process"

this is the principal industrial means of refining bauxite to produce alumina. In the Bayer process, bauxite is washed with a hot solution of sodium hydroxide at 175°C (digestion). This converts the alumina to aluminium hydroxide which dissolves in the hydroxide solution. The other components of bauxite do not dissolve and are filtered from the solution as solid impurities (clarification). The mixture of solid impurities is called red mud, and presents a disposal problem. Next, the hydroxide solution is cooled, and the dissolved aluminium hydroxide precipitates out as a white, fluffy residue. When then heated to 1,050°C, the aluminium hydroxide decomposes to alumina (calcination), giving off water vapour in the process. A large amount of the alumina so produced is then subsequently smelted in order to produce aluminium

"beneficiation"

beneficiation is a variety of processes whereby minerals suitable for further processing or direct use are separated from extracted ore

"Blast Hole Mining method"

this mining method involves the drilling of blast holes within an ore block in an upward and/or downward direction which are then filled with explosives. These explosives are set off in stages to break up the ore block in order to extract it from the mine. The broken ore is removed by loading and transportation equipment at the mine. The cavity in the ore block is filled with mill tailing and cement to maintain the stability of the mine

"brownfield"

development project to upgrade, modify or further develop an existing property

"bwpd"

barrels of water per day

"calcined"

to be heated to a high temperature, but below the melting or fusing point causing loss of moisture, reduction or oxidation or thermal decomposition (a chemical reaction where a single compound breaks up into two or more simpler compounds or elements when heated)

"cathode"

the cathode is the conductor through which electricity leaves the cell. For copper refining, the cathode is where the refined copper is deposited. For aluminium smelting, the cathode is known as the pot lining

"cells"

cells are the containers in which the electrolytic process for formation of metal takes place. For aluminium smelting, these are known as pots

"concentrate"

material which has been processed to increase the percentage of the valuable mineral to facilitate transportation and downstream processing

"copper concentrate"

a product of the flotation process with a copper content typically ranging between 24% and 40%

"CPP"

captive power plant

"cut-off grade"

the lowest grade of mineralised material considered economic to mine; cut-off grade is used in the calculation of the Ore

Reserves for a given deposit

"Darcy"

A darcy unit, a unit to measure permeability

"DCQ"

daily contract quantity

"de-bottlenecking"

the removal of a constraint on production by increasing the productivity of one part of an operation

"deposit"

a deposit is a concentration (or occurrence) of material ofpossible economic interest, in or on the earth's crust, that may includemineralized material that cannot be estimated with sufficientconfidence to be classified in the Inferred category. Portions of adeposit, that do not have reasonable and realistic prospects foreventual eonomic extraction are not alincluded in a Mineral Resource

"Development"

activities related to a mineral deposit commencing at the point economically recoverable reserves can reasonably be estimated to exist and generally continuing until commercial production begins

"dmt"

dry metric tonnes

"dmtu"

dry metric tonne unit. Iron ore prices are quoted in dmtu

"DOC"

declaration of commerciality

"DORS II"

Dynamic Ore Reserve System II; an in-house system developed to calculate the Nchanga underground reserves by applying the grade factor to the resource based on the percentage of ore drawn and forecasts of the grades to be mined

"Draft"

with respect to a ship's hull, the vertical distance between the waterline and the bottom of the hull (keel), with the thickness of the hull included

"DTH"

down the hole; a drilling method in all application segments including blasthole, water well, foundation, oil and gas, cooling systems, and drilling for heat exchange pumps

"dwt"

dead weight tonnes; refers to the maximum amount of tonnes of cargo a ship is able to carry

"economic feasibility of the reserves"

the degree on the other hand categorising the resources under economic, marginally economic and sub-economic according to the relationship between prices and extraction costs and technological exploitability

"EOR"

enhanced oil recovery

"exploration"

prospecting, sampling, mapping, drilling and other work Involved in searching for ore

"EUR" estimated ultimate recovery

"g/t" grams per tonne

"Fe" symbol for the chemical element, iron

"flotation" a wet chemistry process by which particular minerals are

induced to become attached to bubbles and to float, while

other minerals sink

"flue gas" gas that exits to the atmosphere via a flue, which is a pipe or

channel for conveying exhaust gases from a fireplace, oven,

furnace, boiler or steam generator

"FOB" Free on Board

"footwall" the rock which lies below the ore

"frame contracts" prospecting, sampling, mapping, drilling and other work

involved in searching for ore

"GAMI technology" technology from Guiyang Aluminium — Magnesium Design

& Research Institute of China. In the GAMI technology, pots are cut into the circuit by taking complete power outage. This involves loss of production as well as regular operational disturbances to pot operation. Fuses are designed to bypass the line current, until the pot was cut into the circuit. After a calculated safe period of time, the fuses melted resulting in the pot coming into potline circuit. The GAMI technology potline has a capacity for producing initially 245,000 tpa

aluminium

"GBA" gas balancing agreement

"Geostatistics" geostatistics is a branch of statistics used to predict

probability distributions of ore grades for mining operations

"grade" proportion (by weight) of the valuable element within the

mineralised rock

"greenfield" new development project on previously undeveloped land that

is built from scratch

"GW" gigawatt, a unit of electrical energy equal to 1 billion watts

"HG" high grade; an international standard of grading for zinc

ingots

"hydrometallurgical" the treatment of metal or the separation of metal from ores

and ore concentrates by liquid processes, such as leaching, extraction and precipitation to extract and recover metals

from their ores

"IPP" independent power plant

"IsaProcess(TM)" an electrolytic refining process developed by MIM Holdings

Ltd.'s Process Technologies

"IsaSmelt(TM)"

a lance-based intensive bath smelting technology developed by MIM Holdings Ltd.'s Process Technologies

"JORC Code (2012)"

Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves, 2012 Edition, prepared by the Joint Ore Reserves Committee of the Australasian Institute of Mining and Metallurgy, Australian Institute of Geoscientists and Minerals Council of Australia

"Kcal/kg"

thousands of calories per kilogramme, a measurement of energy per unit mass

"Koepe winder"

a system where the winding drum is replaced by a large wheel or sheave. Both cages are connected to the same rope, which passes around some 200 degrees of the sheave in a groove of friction material. The Koepe sheave may be mounted on the ground adjacent to the headgear or in a tower over the shaft. The drive to the rope is the frictional resistance between the rope and the sheave. It requires the use of a balance rope. It is often used for hoisting heavy loads from deep shafts and has the advantage that the large inertia of the ordinary winding drum is avoided. The system has been widely used in Europe for many years, and some large projects in the UK are being equipped with winders of this type

"km"

"km<sup>2</sup>" square kilometres

"kt" kilotonnes

"ktpa" kilotonnes per annum

"ktpm" thousand tonnes per month

"KV" kilovolts

"kVA" kilovolt-ampere

"kWh" kilowatt-hours

"lb" imperial pound (mass) equivalent to 0.4536 kilogrammes

kilometres

"leaching" extracting a soluble metallic compound from an ore by

selectively dissolving it in a suitable solvent

"lead concentrate" product of the flotation process with a lead content typically

ranging between 50% and 70%

"life of mine" the remaining life of a mine in years calculated by deducting

the scheduled production rates (i.e. the rate at which material will be removed from the mine, from the current defined

reserves)

"m<sup>3</sup>" cubic metres

"MAT" minimum alternate tax

"metcoke" metallurgical coke which is produced by the carbonisation of

coals or coal blends at temperatures up to 1,400 K (1,127 degrees Celsius) to produce a macroporous carbon material of

high strength and relatively large lump size.

"mill" a plant in which ore is treated and metals are recovered or

prepared for smelting; also a revolving drum used for the

grinding of ores in preparation for treatment

"million oz" millions of ounces

"mineral" a natural, inorganic, homogeneous material that can be

expressed by a chemical formula

"mineralisation" the process by which minerals are introduced into a rock.

More generally, a term applied to accumulations of potentially economic or related minerals in quantities ranging

from anomalous to economically recoverable

"Million Units" Million kilo watt hours

"mm" millimetres

"mmbbls" million barrels

"mmboe" million barrels of oil equivalent

"mmbtu" million British thermal units

"mmscfd" million standard cubic feet per day

"mt" metric tonnes

"mtpa" million tonnes per annum

"MW" megawatt, a unit of electrical energy equal to one million

watts

"OIIP" oil initially in place

"open-pit mine" a mine that is entirely on the surface. Also referred to as an

open-cut or opencast mine

"ore" a mineral or mineral aggregate containing precious or useful

minerals in such quantities, grade and chemical combination

to make extraction economic

"overburden" waste material overlying ore in an open-pit mine

"pH" potential of Hydrogen; a measure of the acidity or alkalinity

of a solution

"pig iron" pig iron is raw iron that is the immediate product of smelting

iron ore with coke and limestone in a blast furnace

"plant" fixed or moveable equipment required in the process of

winning or processing the ore

"plant load factor"

in relation to a given period, is expressed as the percentage of total kilowatt hours per unit (Kwh) generated at generator terminals to installed capacity, expressed in kilowatts (Kw) multiplied by number of hours in that period

"ppm"

parts per million (in relation to silver)

"Properzi"

technology for fabricating wire, sheets and ingots sold by Continuous Properzi S.p.A., Italy

"Properzi CCR"

Properzi Continuously Cast and Rolled; a copper rod technology from Continuous-Properzi S.p.A. to produce copper rods

"PSC"

production sharing contracts. These contracts are a common type of contract signed between a government and a resource extraction company (or group of companies) concerning how much of the resource (usually oil) extracted from the country each will receive

"PSU"

public sector undertaking

"PTRR"

post tax rate of return regime

"PW"

Prime Western; an international standard of grading for zinc

ingots

"Pyrometallurgical"

pertaining to metallurgical operations that involve processing temperatures above ambient conditions, generally involving chemical reactions as distinct from metal casting substantially which involves only a physical transformation, such as, solidification

"Rc"

refining charge; the price paid by mining companies to smelters for refining the contained precious metals (and copper) in their concentrates to produce a payable metal. The Rc is based on the payable metal content (after deductions)

"refining"

the final process of upgrading of the metal quality, although for aluminium, it is the intermediate stage of converting bauxite to alumina

"refining charge"

the fees charged by a refinery for purifying crude metallic products

"RLE"

roast-leach-electrowin; a process utilised in many hydrometallurgical zinc smelters whereby zinc concentrate is first roasted to remove the sulphur content, which comes out in the form of sulphur dioxide gas, and then subjected to leaching and electrolysis

"RoM"

run of mine, which includes all material mined including the

"SAG"

semi-autogenous

SAMREC Code (2009) the South African Code for Reporting of Exploration Results,
Mineral Resources and Mineral Reserves which sets out

minimum standards, recommendations and guidelines for public reporting of exploration results, Mineral Resources and

Mineral Reserves in South Africa

"SCF" slag cleaning furnace

"SHG" Special High Grade; an international standard of grading for

zinc ingots

"slag" the vitreous mass separated from the fused metals in the

smelting process

"SLOS" sub land open stoping

"smelting" a thermal process whereby molten metal is liberated from a

concentrate, with impurities separating into a lighter slag

"SNIF degasser" a spinning nozzle inert flotation (SNIF) in-line

degassing/filtration system for treatment of molten aluminium

"spot market" a market in which commodities are bought and sold for cash

and delivered immediately

"spot price" the current price of a metal for immediate delivery

"STOIIP" stock tank oil initially in place

"stope" the underground excavation within the ore body where the

main production takes place; depending on the ore body

qualities, stopes can range from 5 kt to 2 mt

"strip ratio" the number of units of waste material in a surface mine which

must be removed in order to extract one unit of ore

"sustaining capital expenditure" capital expenditure to maintain Vedanta's operating capacity

"SX-EW" solvent extraction/electrowinning

"synchronise"/"synchronisation" Synchronisation is the process of matching the speed and

frequency of a generator or other source to a running network necessary to commence operations at an electricity-generating

power plant

"t" or "tonne" metric tonne equivalent to 2,204.62 lb or 1,000 kilogrammes

"tailing dam" a low-lying depression used to confine tailings, the prime

function of which is to allow enough time for heavy metals to settle out or for cyanide to be destroyed before water is

discharged into the local watershed

"Tc" treatment charge

"TcRc" treatment charge and refining charge levied by smelters and

refineries for the smelting and refining of copper concentrate

from mines into copper metal

"TCu" total copper

"toll smelter" a smelter that is independent of the concentrate supplier and

charges a fee for smelting the concentrate

"total production" that part of production at mines and operations in which

subsidiaries of the Company have an interest; in this Offering Circular, unless expressly stated otherwise, production also

refers to total production

"total reserves" that part of the reserves from a mine in which subsidiaries of

the Company have an interest; in this Offering Circular, unless expressly stated otherwise, reserves also refer to total

reserves

"tpa" tonnes per annum

optimisation software"

"Vertical Crater Retreat a comparatively new method of blast hole mining in which method" only large diametre in-the-hole drills are used to blast down

only large diametre in-the-hole drills are used to blast down horizontal slices of ore into an opening below the block of ore

being mined

"VSS technology" Vertical Stud Soderberg technology; a method of primary

aluminium reduction using the Soderberg process in which the electrical current is introduced to self baking anodes by

steel rods, or studs, inserted into the top of a monolithic anode

"Whittle 4X multi-element this software is used for strategic planning and provides

information which is used to determine the life of an open pit mine. This software helps define the economically workable limits of an open pit mine and provides a template for the pit design. Using this template, the KCM Group is able to

determine the quantity of waste that is required to be mined in order to extract a known quantity of copper ore

"zinc concentrate" product of flotation process with a zinc content typically

ranging between 45% and 60%

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<sup>\*</sup> Certain references in the consolidated financial statements refer to sections in the annual reports, which are not included or incorporated by reference in this Offering Circular.

Vedanta Resources plc Interim Results For The Six Months Ended 30 September 2016

## CONDENSED CONSOLIDATED INCOME STATEMENT

For the six months ended 30 September 2016

								sn)	(US\$ million except as stated)	t as stated)
			Six mor	Six months ended		Six mont	Six months ended		(	Year ended
			30 Septe (U	30 September 2016 (Unaudited)		30 September 2015 (Unaudited)	tember 2015 (Unaudited)		31 N	31 March 2016 (Audited)
		Before			Before					
		Special	Special		Special			Before	Special	
	Note	items	items	Total	items Sp	items Special items	Total	Special items	items	Total
Revenue		4,867.8	ı	4,867.8	5,699.3	ı	5,699.3	10,737.9	1	10,737.9
Cost of sales		(3,900.0)	ı	(3,900.0)	(4,800.7)	1	(4,800.7)	(9,241.1)	1	(9,241.1)
Gross profit		8.296	1	8.796	9.868	1	9.868	1,496.8	1	1,496.8
Other operating income		40.1	ı	40.1	62.8	1	62.8	101.7	1	101.7
Distribution costs		(111.1)	ı	(111.1)	(104.2)	ı	(104.2)	(223.8)	1	(223.8)
Administrative expenses		(177.0)	ı	(177.0)	(279.4)	ı	(279.4)	(493.5)	1	(493.5)
Special items	4	1	1	1	-	1	-	1	(5,210.1)	(5,210.1)
Operating profit/ (loss)		719.8	•	719.8	577.8	1	577.8	881.2	(5,210.1)	(4,328.9)
Investment revenue		385.6	ı	385.6	372.8	1	372.8	8.769	1	8.769
Finance costs		(652.3)	ı	(652.3)	(639.1)	1	(639.1)	(1,280.4)	1	(1,280.4)
Other gains and (losses) [net]	5	(26.6)	ı	(26.6)	(67.8)	1	(67.8)	(72.5)	1	(72.5)
Profit / (loss) before taxation (a)		426.5	ı	426.5	243.7	1	243.7	226.1	(5,210.1)	(4,984.0)
Tax (charge) / credit- special items	9	1	1	1	1	(173.8)	(173.8)	1	1,737.4	1,737.4
Net tax expense – others	9	(169.2)	ı	(169.2)	(223.5)	1	(223.5)	(255.5)	1	(255.5)
Net tax credit / (expense) (b)	9	(169.2)	1	(169.2)	(223.5)	(173.8)	(397.3)	(255.5)	1,737.4	1,481.9
Profit / (loss) for the period / year (a+b)		257.3	1	257.3	20.2	(173.8)	(153.6)	(29.4)	(3,472.7)	(3,502.1)
Attributable to:			1							
Equity holders of the parent		(64.2)	ı	(64.2)	(186.5)	(138.0)	(324.5)	(392.9)	(1,444.5)	(1,837.4)
Non-controlling interests		321.5	1	321.5	206.7	(35.8)	170.9	363.5	(2,028.2)	(1,664.7)
Profit/ (loss) for the period/year		257.3	•	257.3	20.2	(173.8)	(153.6)	(29.4)	(3,472.7)	(3,502.1)
Earnings / (loss) per share (US cents) Basic earnings / (loss) per ordinary share	^	(23.2)	1	(23.2)	(67.6)	(50.1)	(117.7)	(142.4)	(523.4)	(665.8)
Diluted earnings / (loss) per ordinary share		(23.2)	1	(23.2)	(67.6)	(50.1)	(117.7)	(142.4)	(523.4)	(665.8)

## CONDENSED CONSOLIDATED STATEMENT OF COMPREHENSIVE INCOME

## For the six months ended 30 September 2016

			(US\$ million)
	Six months	Six months	Year ended
	ended 30	ended 30	31 March
	September 2016	September 2015	2016
	(Unaudited)	(Unaudited)	(Audited)
Profit / (loss) for the period / year from continuing operations	257.3	(153.6)	(3,502.1)
Items that will not be reclassified subsequently to income statement:			
Remeasurement of net defined benefit plans	(2.6)	(1.4)	8.0
Tax effects on items recognised directly in the equity	0.6	2.0	(2.5)
Total (a)	(2.0)	0.6	5.5
Items that may be reclassified subsequently to income statement:			
Exchange differences arising on translation of foreign operations	(29.5)	(666.2)	(810.2)
Gain in fair value of available-for-sale financial assets	0.8	2.0	2.3
Loss in fair value of cash flow hedges deferred in reserves	(6.9)	(18.1)	(24.5)
Tax effects arising on cash flow hedges deferred in reserves	0.5	(4.2)	(2.8)
Gain in fair value of cash flow hedges transferred to income			
statement	(3.9)	(5.4)	(3.0)
Tax effects arising on cash flow hedges transferred to income			
statement	1.4	1.9	1.6
Total (b)	(37.6)	(690.0)	(836.6)
Other comprehensive loss for the period / year (a+b)	(39.6)	(689.4)	(831.1)
Total comprehensive income / (loss) for the period / year	217.7	(843.0)	(4,333.2)
Attributable to:			
Equity holders of the parent	(83.4)	(632.3)	(2,223.6)
Non-controlling interests	301.1	(210.7)	(2,109.6)
Total comprehensive income / (loss) for the period / year	217.7	(843.0)	(4,333.2)

## CONDENSED CONSOLIDATED STATEMENT OF FINANCIAL POSITION

Godwill         16.6         16.6         16.6         10.2           Intangible asets         89.7         94.6         92.2           Property, plant and equipment         16.698.8         22.490.4         16.647.8           Financial asset investment         7.1         6.4         6.5           Other non-current assets         38.6         35.5         36.7           Other non-current assets         28.33         18.35         237.9           Financial Instruments (derivatives)         0.6         1.9         0.8           Deferred tax assets         1.500.8         1,323.2         1,550.8           Trade and other receivables         1,550.1         1,541.1         1,665.8           Trade and other receivables         1,550.1         1,541.1         1,365.8           Trade and other receivables         9         7.79.4         1.84.1         1.83.8           Current assets         0.0         34.8         35.5         1.24.1         1.86.8           Current assets         9         7.79.4         8.8.3         35.5         1.24.1         1.83.8         1.85.0         1.24.1         1.86.9         1.24.2         1.24.1         1.24.2         1.24.2         1.24.2         1.24.2 <t< th=""><th></th><th></th><th></th><th></th><th>(US\$ million)</th></t<>					(US\$ million)
Non-current assets		Note	30 September 2016	30 September 2015	31 March 2016
Goodwill Intangible asets         16.6         16.6         16.6         12.2           Intangible asets         1897         94.6         92.2           Property, plant and equipment         16.6978         22.490.4         16.647.8           Financial asset investment         7.1         6.4         6.5           Other non-current assets         381.6         351.5         361.7           Other non-current assets         283.3         183.5         227.9           Inencial Instruments (derivatives)         0.6         1.9         0.8           Deferred tax assets         1,250.8         1,31.2         1,251.8           Inventories         1,516.1         1,541.1         1,364.8           Francial instruments (derivatives)         2.4         13.1         1,364.8           Firancial instruments (derivatives)         9.0         34.8         35.5           Current axasets         0.0         34.8         35.5           Equipi investments         9         7,749.4         85.24         48.3           Equipi investments         9         7,749.9         8,844.4         85.2           Equipi investments         9         7,749.9         8,842.4         89.3         1.5	Assets		(======================================	(	(
Intangible assets   897	Non-current assets				
Property, plant and equipment         16,6698         22,490,4         16,647.8           Financial asset investment         7.1         6.4         6.5           Non-current assets         381.6         351.5         361.7           Other non-current assets         283.3         183.5         279.9           Emancial Instruments (derivatives)         0.6         1.9         0.8           Deferred tax assets         1,250.8         1,132.3         1,255.8           Inventories         1,550.1         1,541.1         1,365.8           Flancal instruments (derivatives)         2.4         13.1         1,365.8           Flancal other receivables         1,516.4         1,645.5         1,344.8           Flancal instruments (derivatives)         2.4         13.1         1,831.8           Current ax assets         0.0         34.8         35.5           Current ax assets         0.0         34.8         35.5           Cupit (application and cash equivalents)         9         7,74         382.3         482.3           Cupit (application and cash equivalents)         9         37.2         382.3         3,813.3           Tabla seets         2,965.7         1,110.4         (587.2         2,813.3         1,	Goodwill		16.6	16.6	16.6
Financial asset investment         7.1         6.4         6.5           Non-current taxasets         381.6         351.5         361.7           Other non-current assets         283.3         183.5         237.9           Financial Instruments (derivatives)         0.6         1.9         0.08           Deferred tax assets         1.520.8         1.132.3         1.255.4           Inventories         1.550.1         1.541.1         1.365.8           Trade and other receivables         1.516.4         1.624.5         1.344.3           Gurrent tax assets         0.0         34.8         35.5           Liquid investments         9         7.794.9         353.4         850.5           Liquid investments         9         7.794.9         353.4         850.2           Cash and cash equivalents         9         7.794.9         353.4         850.2           Liquid investments         9         7.794.9         353.4         850.2           Lipuid investments         9         7.794.9         353.4         850.2           Lipuid investments         9         7.794.9         354.0         351.7         1.704.0         450.2           Cash and cash equivalents         9         7.794	Intangible assets		89.7	94.6	92.2
Non-current tax assets         381.6         351.5         261.7           Other non-current assets         283.3         183.5         237.0           Efferred tax assets         1,250.8         1,132.3         1,255.4           Deferred tax assets         1,872.5         24,277.2         1,815.6           Inventories         1,550.1         1,511.1         1,364.8           Frade and other receivables         1,516.4         1,624.5         1,344.3           Financial instruments (derivatives)         2,4         13.1         1,83.2           Current assets         0,0         34.8         35.5           Equipid investments         9         7,79.9         8,534.4         8,508.2           Cash and cash equivalents         9         3,72.4         382.3         428.3           Equipid investments         9         3,72.4         3,82.3         428.3           Equipid investments         2,96.7         3,40.7         3,01.2	Property, plant and equipment		16,699.8	22,490.4	16,647.8
Other non-current assets         283.3         183.5         237.9           Financial Instruments (derivatives)         0.6         1.9         0.05           Deferred tax assets         1,252.8         1,323.2         1,255.4           Current assets         1,879.5         24,277.2         18,618.9           Turent assets         1,550.1         1,541.1         1,656.8           Trade and other receivables         1,516.4         1,624.5         1,344.3           Timacial instruments (derivatives)         2.4         13.1         1,436.3           Current tax assets         0.0         3.8         3.55.5           Liquid investments         9         7,794.9         8,534.4         8,508.2           Cash and cash equivalents         9         7,794.9         8,344.4         8,508.2           Liquid investments         9         7,794.9         8,344.4         8,508.2           Lipuid investments         9         7,794.9         8,344.4         8,508.2           Lipuid investments         9         7,794.9         8,344.4         8,508.2           Lipuid investments         9         7,794.9         1,310.2         1,374.9         1,374.9         1,374.1         1,374.9         1,374.9	Financial asset investment		7.1	6.4	6.5
Financial Instruments (derivatives)         0.6         1.9         0.8           Defered tax assets         1,250.8         1,132.3         1,256.8           Current assets         1,500.1         1,514.1         1,565.8           Inventories         1,550.1         1,541.1         1,465.8           Financial instruments (derivatives)         2.4         13.1         1,484.3           Financial instruments (derivatives)         9.7,794.9         8,534.4         8,508.2           Current tax assets         9.9         7,794.9         8,534.4         8,508.2           Cash and cash equivalents         9.9         7,794.9         8,534.4         8,508.2           Carrier and cash equivalents         9.9         7,794.9         8,714.1         1,10	Non-current tax assets		381.6	351.5	361.7
Deferred tax assets         1,250.8         1,132.3         1,255.4           Current assets         1,500.1         1,541.1         1,365.8           Trade and other receivables         1,550.1         1,541.1         1,365.8           Trade and other receivables         1,550.4         1,541.1         1,365.8           Tinancial instruments (derivatives)         2,4         13.1         1,83           Current tax assets         0,0         34.8         35.5           Liquid investments         9         7,794.9         8,534.4         85.08.2           Cash and cash equivalents         9         372.4         382.3         428.3           Cash and cash equivalents              9              372.4              382.3              428.3           Cash and cash equivalents         9              372.4              382.3              428.3           Cash and cash equivalents         9              372.4              382.3              428.5           Cash and cash equivalents              9              372.4              382.3              428.5           Cash and cash equivalents         9              4,302.2              4,113.0              3,372.6                Current liabilities              9	Other non-current assets		283.3	183.5	237.9
Current assets         Inspany         24,277.2         18,618.9           Inventories         1,550.1         1,541.1         1,365.8           Trade and other receivables         1,516.4         1,624.5         1,344.3           Financial instruments (derivatives)         2.4         13.1         18.3           Current tax assets         0.0         34.8         35.5           Liquid investments         9         7,794.9         8,534.4         8,508.2           Cash and cash equivalents         9         372.4         382.3         428.3           Liabilities         11,236.2         12,130.2         11,700.4           Total assets         29,965.7         36,407.4         30,319.3           Liabilities         2         4,303.2         (4,113.0)         (3,726.6)           Cornvertible bonds         9         (7,7)         (1,110.4)         (587.2)           Trade and other payables         (5,349.0)         (524.93)         (587.1)           Financial instruments (derivatives)         (5,349.0)         (524.93)         (587.1)           Frovisions         (117.4)         (155.0)         (132.1)           Frovisions         (117.4)         (155.0)         (132.1)	Financial Instruments (derivatives)		0.6	1.9	0.8
December   1,550.1	Deferred tax assets				1,255.4
Inventories			18,729.5	24,277.2	18,618.9
Trade and other receivables         1,516.4         1,624.5         1,344.3           Financial instruments (derivatives)         2.4         13.1         18.3           Current tax saests         0.0         34.8         35.5           Liquid investments         9         7,794.9         8,534.4         8,508.2           Cash and cash equivalents         9         372.4         382.3         428.3           Total assets         29,965.7         36,407.4         30,319.3           Liabilities         Tabilities           Current liabilities           Short-term borrowings         9         (4,303.2)         (4,113.0)         (3,726.6)           Convertible bonds         9         (7.7)         (1,110.4)         (587.2)           Trade and other payables         (5,343.0)         (5,249.3)         (5,876.1)           Financial instruments (derivatives)         (5,349.0)         (5,249.3)         (5,876.1)           Retirement benefits         (7.1)         (6.7)         (4.9)           Provisions         (117.4)         (15.5)         (13.21)           Current tax liabilities         (1,202.4)         (10,211.6)         (10,411.6)           Non-current liabilities         (2,98.2)					
Financial instruments (derivatives)         2.4         13.1         18.3           Current tax assets         0.0         34.8         35.5           Liquid investments         9         7.794.9         8.534.4         8.508.2           Cash and cash equivalents         9         372.4         382.3         428.3           Total assets         29,965.7         36,407.4         30,319.3           Liabilities         Use of the control liabilities           Corrent liabilities         Soft term borrowings         9         (4,303.2)         (4,113.0)         (3,726.6)           Convertible bonds         9         (7.7)         (1,110.4)         (587.2)           Trade and other payables         (5349.3)         (5,249.3)         (5,876.1)           Financial instruments (derivatives)         (53.9)         (28.5)         (67.7)           Retirement benefits         (7.1)         (6.67)         (4.9)           Provisions         (117.4)         (155.0)         (132.1)           Current tax liabilities         (8,78.5)         (10,75.7)         (10,411.6)           Non-current liabilities         (9,878.5)         (10,75.7)         (10,411.6)           Non-current liabilities         (9,878.5)			•	,	*
Current tax assets         0.0         34.8         35.5           Liquid investments         9         7.794.9         8,534.4         8,508.2           Cash and cash equivalents         9         3.724.2         382.3         428.3           Total assets         29,965.7         36,407.4         30,319.3           Liabilities         Use of the payables           Short-term borrowings         9         (4,303.2)         (4,113.0)         (3,726.6)           Convertible bonds         9         (7.7)         (1,110.4)         (587.2)           Financial instruments (derivatives)         (534.9)         (28.5)         (67.7)           Retirement benefits         (7.1)         (6.7)         (4.9)           Provisions         (17.4)         (6.7)         (4.9)           Provisions         (17.4)         (6.7)         (4.9)           Provisions         (13,57.7)         1,345.5         1,28.8           Non-current tax liabilities         (46.2)         (92.8)         (17.0)           Long-term borrowings         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         (2,022.4)         (11,220.6)         (11,949.5)				•	•
Liquid investments         9         7,794.9         8,534.4         8,508.2           Cash and cash equivalents         9         372.4         382.3         428.3           Total assets         29,965.7         36,407.4         30,319.3           Liabilities           Current liabilities           Short-term borrowings         9         (4,303.2)         (4,113.0)         (3,726.6)           Convertible bonds         9         (7.7)         (1,110.4)         (587.2)           Trade and other payables         (5,343.0)         (5,249.3)         (5,876.1)           Financial instruments (derivatives)         (53.9)         (28.5)         (67.7)           Retirement benefits         (71)         (6.7)         (4.9)           Provisions         (117.4)         (155.0)         (132.1)           Current tax liabilities         (31.1)         (155.0)         (132.1)           Very colsions         1,357.7         1,374.5         1,288.8           Non-current liabilities         (13.2)         (10.2)         (11.19           Long-term borrowings         9         (2.02.2)         (11.20.6)         (11.949.5)           Convertible bonds         9         (2.02	· · · · · · · · · · · · · · · · · · ·				
Cash and cash equivalents         9         372.4         382.3         428.3           Total assets         29,965.7         36,407.4         30,319.3           Liabilities         Current liabilities           Short-term borrowings         9         (4,303.2)         (4,113.0)         (3,726.6)           Convertible bonds         9         (7,7)         (1,110.4)         (587.2)           Trade and other payables         (5,343.0)         (5,249.3)         (5,876.1)           Financial instruments (derivatives)         (33.9)         (28.5)         (67.7)           Retirement benefits         (117.4)         (155.0)         (132.1)           Current tax liabilities         (117.4)         (155.0)         (132.1)           Retirement benefits         (19,878.5)         (10,755.7)         (10,411.6)           Net current assets         1,357.7         1,374.5         1,288.8           Non-current liabilities         (10,755.7)         (10,711.6)         (11,949.5)           Long-term borrowings         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         -         (6.9)         -           Trade and other payables         (79.9)         (321.1)					
Total assets         29,965.7         36,407.4         30,319.3           Liabilities         Urrent liabilities           Short-term borrowings         9         (4,303.2)         (4,113.0)         (3,726.6)           Convertible bonds         9         (7.7)         (1,110.4)         (587.2)           Trade and other payables         (534.9)         (52.49.3)         (5,876.1)           Financial instruments (derivatives)         (53.9)         (28.5)         (67.7)           Retirement benefits         (7.1)         (6.7)         (4.9)           Provisions         (117.4)         (155.0)         (132.1)           Current tax liabilities         (46.2)         (92.8)         (17.0)           Verturent assets         1,357.7         1,374.5         1,288.8           Non-current liabilities         (9,878.5)         (10,755.7)         (10,411.6)           Non-current labilities         (9,878.5)         (10,755.7)         (10,411.6)           Conyertible bonds         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         (7.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (32.9)         (3.2)         (1.20.6)	*		•		
Total assets         29,965.7         36,407.4         30,319.3           Liabilities         Current liabilities           Short-term borrowings         9         (4,303.2)         (4,113.0)         (3,726.6)           Convertible bonds         9         (7.7)         (1,110.4)         (587.2)           Trade and other payables         (5,343.0)         (5,249.3)         (5,876.1)           Financial instruments (derivatives)         (53.9)         (28.5)         (67.7)           Retirement benefits         (7.1)         (6.7)         (4.9)           Provisions         (117.4)         (155.0)         (132.1)           Current tax liabilities         (46.2)         (92.8)         (17.0)           Current assets         1,357.7         1,374.5         1,288.8           Non-current liabilities         (46.2)         (92.8)         (17.0)           Long-term borrowings         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         (7.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Deferred tax liabilities         (637.4)         (2,703.6)         (602.2) <t< td=""><td>Cash and cash equivalents</td><td>9</td><td></td><td></td><td></td></t<>	Cash and cash equivalents	9			
Current liabilities				· · · · · · · · · · · · · · · · · · ·	
Current liabilities   Short-term borrowings   9   (4,303.2)   (4,113.0)   (3,726.6)   (2,000   (2,00			29,965.7	36,407.4	30,319.3
Short-term borrowings         9         (4,303.2)         (4,113.0)         (3,726.6)           Convertible bonds         9         (7.7)         (1,110.4)         (587.2)           Trade and other payables         (5,343.0)         (5,249.3)         (5,876.1)           Financial instruments (derivatives)         (53.9)         (28.5)         (67.7)           Retirement benefits         (7.1)         (6.7)         (4.9)           Provisions         (117.4)         (155.0)         (132.1)           Current tax liabilities         (46.2)         (92.8)         (17.0)           Net current assets         1,357.7         1,374.5         1,288.8           Non-current liabilities         (9,878.5)         (10,755.7)         (10,411.6)           Non-current borrowings         9         (12,022.4)         (11,220.6)         (11,949.5)           Conyertible bonds         9         -         (6.9)         -           Trade and other payables         (79.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (63.4)         (2,703.6)         (602.2)           Retirement benefits         (637.4)         (2,703.6)         (602.2)           Retirement benefits         (59.2)         (63.4)					
Convertible bonds         9         (7.7)         (1,110.4)         (587.2)           Trade and other payables         (5343.0)         (5,249.3)         (5,876.1)           Financial instruments (derivatives)         (53.9)         (28.5)         (67.7)           Retirement benefits         (7.1)         (6.7)         (4.9)           Provisions         (117.4)         (155.0)         (132.1)           Current tax liabilities         (46.2)         (92.8)         (17.0)           Net current assets         1,357.7         1,374.5         1,288.8           Non-current liabilities         (9,878.5)         (10,755.7)         (10,411.6)           Long-term borrowings         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         -         (6.9)         -           Trade and other payables         (79.9)         (32.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Deferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.		0	(4.000.0)	(4.440.0)	(2.70 ( ()
Trade and other payables         (5,343.0)         (5,249.3)         (5,876.1)           Financial instruments (derivatives)         (53.9)         (28.5)         (67.7)           Retirement benefits         (7.1)         (6.7)         (4.9)           Provisions         (117.4)         (155.0)         (132.1)           Current tax liabilities         (46.2)         (92.8)         (17.0)           Lord current assets         1,357.7         1,374.5         1,288.8           Non-current liabilities         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         -         (6.9)         -           Trade and other payables         (79.9)         (32.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Deferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)         (11.9)         (11.9)           Total liabilities         (23,012.8)         (25,264.2)         (23,466.9)	B		, ,	,	,
Financial instruments (derivatives)         (53.9)         (28.5)         (6.7)           Retirement benefits         (7.1)         (6.7)         (4.9)           Provisions         (117.4)         (155.0)         (132.1)           Current tax liabilities         (46.2)         (92.8)         (17.0)           Net current assets         1,357.7         1,374.5         1,288.8           Non-current liabilities         1,357.7         (11,220.6)         (11,949.5)           Convertible bonds         9         -         (6.9)         -           Trade and other payables         (79.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Deferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)         (11.9)         (11.9)         (11.9)         (11.9)         (11.9)         (11.9)         (11.9)         (11.9)         (11.9)         (11.9)         (11.9)         (11.9)         (11.9)         (11.9) <t< td=""><td></td><td>9</td><td></td><td>,</td><td>` /</td></t<>		9		,	` /
Retirement benefits         (7.1)         (6.7)         (4.9)           Provisions         (117.4)         (155.0)         (132.1)           Current tax liabilities         (46.2)         (92.8)         (17.0)           Net current assets         1,357.7         1,374.5         1,288.8           Non-current liabilities         Long-term borrowings         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         -         (6.9)         -           Trade and other payables         (79.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Deferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)         (11.9)         (11.9)           Total liabilities         (23,012.8)         (25,264.2)         (23,466.9)           Net assets         6,952.9         11,142.         6,852.4           Equity         30.1         30.1         30.1			, ,	,	, ,
Provisions         (117.4)         (155.0)         (132.1)           Current tax liabilities         (46.2)         (92.8)         (17.0)           Net current assets         1,357.7         1,374.5         1,288.8           Non-current liabilities         Ung-term borrowings         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         (79.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Eferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)         (11.9)         (11.9)           Total liabilities         (23,012.8)         (25,264.2)         (23,466.9)           Net assets         6,952.9         11,143.2         6,852.4           Equity         Stare permium         30.1         30.0         30.1           Share permium         20.5	* /				` '
Current tax liabilities         (46.2)         (92.8)         (17.0)           Net current assets         1,357.7         1,374.5         1,288.8           Non-current liabilities         1,357.7         1,374.5         1,288.8           Long-term borrowings         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         -         (6.9)         -           Trade and other payables         (79.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Deferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)				, ,	
1,357.7   1,374.5   1,288.8   1,357.7   1,374.5   1,288.8   Non-current liabilities			` /	, ,	` /
Net current assets         1,357.7         1,374.5         1,288.8           Non-current liabilities         Long-term borrowings         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         -         (6.9)         -           Trade and other payables         (79.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Deferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)         (12.9)         (25.64.2)         (	Current tax liabilities			\ /	
Non-current liabilities         Long-term borrowings         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         -         (6.9)         -           Trade and other payables         (79.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Deferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)         (11.9)         (11.9)           Total liabilities         (23,012.8)         (25,264.2)         (23,466.9)           Net assets         6,952.9         11,143.2         6,852.4           Equity         5         (23,012.8)         (25,264.2)         (23,466.9)           Net assets         6,952.9         11,143.2         6,852.4           Equity         5         (25,264.2)         (23,466.9)           Share capital         30.1         30.1         30.1           Share premium         201.5         198.5         201.5 <td>NT-1</td> <td></td> <td>·</td> <td></td> <td></td>	NT-1		·		
Long-term borrowings         9         (12,022.4)         (11,220.6)         (11,949.5)           Convertible bonds         9         -         (6.9)         -           Trade and other payables         (79.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Deferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)<			1,357.7	1,3/4.5	1,288.8
Convertible bonds         9         -         (6.9)         -           Trade and other payables         (79.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Deferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)         (23.46.9)         (23.46.9)	- 10 01 01	Q	(12 022 4)	(11 220 6)	(11 040 5)
Trade and other payables         (79.9)         (321.1)         (223.5)           Financial instruments (derivatives)         (3.2)         (0.2)         (1.2)           Deferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)         (11.9)         (11.9)           Total liabilities         (23,012.8)         (25,264.2)         (23,466.9)           Net assets         6,952.9         11,143.2         6,852.4           Equity         Share capital         30.1         30.0         30.1           Share premium         201.5         198.5         201.5           Treasury shares         (557.9)         (556.9)         (557.2)           Share-based payment reserve         26.0         27.3         29.9           Convertible bond reserve         0.4         24.1         6.0           Hedging reserve         (91.4)         (87.4)         (87.7)           Other reserves         7.0         64.8         (1.4)           Retained earnings         (490.0)	-		(12,022.4)	,	(11,949.3)
Financial instruments (derivatives)       (3.2)       (0.2)       (1.2)         Deferred tax liabilities       (637.4)       (2,703.6)       (620.2)         Retirement benefits       (59.2)       (63.4)       (61.6)         Provisions       10       (320.3)       (180.8)       (187.4)         Non-equity non-controlling interests       (11.9)       (11.9)       (11.9)         Total liabilities       (23,012.8)       (25,264.2)       (23,466.9)         Net assets       6,952.9       11,143.2       6,852.4         Equity         Share capital       30.1       30.0       30.1         Share premium       201.5       198.5       201.5         Treasury shares       (557.9)       (556.9)       (557.2)         Share-based payment reserve       26.0       27.3       29.9         Convertible bond reserve       0.4       24.1       6.0         Hedging reserve       (91.4)       (87.4)       (87.7)         Other reserves       7.0       64.8       (1.4)         Retained earnings       (490.0)       1,165.3       (334.0)		9	(70.0)	` '	(222.5)
Deferred tax liabilities         (637.4)         (2,703.6)         (620.2)           Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)         (					
Retirement benefits         (59.2)         (63.4)         (61.6)           Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)         (11.9)         (11.9)         (11.9)           Total liabilities         (23,012.8)         (25,264.2)         (23,466.9)           Net assets         6,952.9         11,143.2         6,852.4           Equity           Share capital         30.1         30.0         30.1           Share premium         201.5         198.5         201.5           Treasury shares         (557.9)         (556.9)         (557.2)           Share-based payment reserve         26.0         27.3         29.9           Convertible bond reserve         0.4         24.1         6.0           Hedging reserve         (91.4)         (87.4)         (87.7)           Other reserves         7.0         64.8         (1.4)           Retained earnings         (490.0)         1,165.3         (334.0)	· · · · · · · · · · · · · · · · · · ·				
Provisions         10         (320.3)         (180.8)         (187.4)           Non-equity non-controlling interests         (11.9)         (11.9)         (11.9)         (11.9)           Total liabilities         (23,012.8)         (25,264.2)         (23,466.9)           Net assets         6,952.9         11,143.2         6,852.4           Equity         Share capital         30.1         30.0         30.1           Share premium         201.5         198.5         201.5           Treasury shares         (557.9)         (556.9)         (557.2)           Share-based payment reserve         26.0         27.3         29.9           Convertible bond reserve         0.4         24.1         6.0           Hedging reserve         (91.4)         (87.4)         (87.7)           Other reserves         7.0         64.8         (1.4)           Retained earnings         (490.0)         1,165.3         (334.0)				, ,	, ,
Non-equity non-controlling interests         (11.9)         (11.9)         (11.9)           Total liabilities         (23,012.8)         (25,264.2)         (23,466.9)           Net assets         6,952.9         11,143.2         6,852.4           Equity         Share capital         30.1         30.0         30.1           Share premium         201.5         198.5         201.5           Treasury shares         (557.9)         (556.9)         (557.2)           Share-based payment reserve         26.0         27.3         29.9           Convertible bond reserve         0.4         24.1         6.0           Hedging reserve         (91.4)         (87.4)         (87.7)           Other reserves         7.0         64.8         (1.4)           Retained earnings         (490.0)         1,165.3         (334.0)		10	, ,		
Total liabilities         (23,012.8)         (25,264.2)         (23,466.9)           Net assets         6,952.9         11,143.2         6,852.4           Equity         Share capital         30.1         30.0         30.1           Share premium         201.5         198.5         201.5           Treasury shares         (557.9)         (556.9)         (557.2)           Share-based payment reserve         26.0         27.3         29.9           Convertible bond reserve         0.4         24.1         6.0           Hedging reserve         (91.4)         (87.4)         (87.7)           Other reserves         7.0         64.8         (1.4)           Retained earnings         (490.0)         1,165.3         (334.0)		10			
Total liabilities         (23,012.8)         (25,264.2)         (23,466.9)           Net assets         6,952.9         11,143.2         6,852.4           Equity         Share capital         30.1         30.0         30.1           Share premium         201.5         198.5         201.5           Treasury shares         (557.9)         (556.9)         (557.2)           Share-based payment reserve         26.0         27.3         29.9           Convertible bond reserve         0.4         24.1         6.0           Hedging reserve         (91.4)         (87.4)         (87.7)           Other reserves         7.0         64.8         (1.4)           Retained earnings         (490.0)         1,165.3         (334.0)	Tworrequity non-controlling interests				
Net assets         6,952.9         11,143.2         6,852.4           Equity         Share capital         30.1         30.0         30.1           Share premium         201.5         198.5         201.5           Treasury shares         (557.9)         (556.9)         (557.2)           Share-based payment reserve         26.0         27.3         29.9           Convertible bond reserve         0.4         24.1         6.0           Hedging reserve         (91.4)         (87.4)         (87.7)           Other reserves         7.0         64.8         (1.4)           Retained earnings         (490.0)         1,165.3         (334.0)	Total liabilities				
Equity           Share capital         30.1         30.0         30.1           Share premium         201.5         198.5         201.5           Treasury shares         (557.9)         (556.9)         (557.2)           Share-based payment reserve         26.0         27.3         29.9           Convertible bond reserve         0.4         24.1         6.0           Hedging reserve         (91.4)         (87.4)         (87.7)           Other reserves         7.0         64.8         (1.4)           Retained earnings         (490.0)         1,165.3         (334.0)			, , ,		
Share capital       30.1       30.0       30.1         Share premium       201.5       198.5       201.5         Treasury shares       (557.9)       (556.9)       (557.2)         Share-based payment reserve       26.0       27.3       29.9         Convertible bond reserve       0.4       24.1       6.0         Hedging reserve       (91.4)       (87.4)       (87.7)         Other reserves       7.0       64.8       (1.4)         Retained earnings       (490.0)       1,165.3       (334.0)					
Share premium       201.5       198.5       201.5         Treasury shares       (557.9)       (556.9)       (557.2)         Share-based payment reserve       26.0       27.3       29.9         Convertible bond reserve       0.4       24.1       6.0         Hedging reserve       (91.4)       (87.4)       (87.7)         Other reserves       7.0       64.8       (1.4)         Retained earnings       (490.0)       1,165.3       (334.0)			30.1	30.0	30.1
Treasury shares         (557.9)         (556.9)         (557.2)           Share-based payment reserve         26.0         27.3         29.9           Convertible bond reserve         0.4         24.1         6.0           Hedging reserve         (91.4)         (87.4)         (87.7)           Other reserves         7.0         64.8         (1.4)           Retained earnings         (490.0)         1,165.3         (334.0)	_				
Share-based payment reserve       26.0       27.3       29.9         Convertible bond reserve       0.4       24.1       6.0         Hedging reserve       (91.4)       (87.4)       (87.7)         Other reserves       7.0       64.8       (1.4)         Retained earnings       (490.0)       1,165.3       (334.0)	-				
Convertible bond reserve       0.4       24.1       6.0         Hedging reserve       (91.4)       (87.4)       (87.7)         Other reserves       7.0       64.8       (1.4)         Retained earnings       (490.0)       1,165.3       (334.0)			, ,	, ,	, ,
Hedging reserve       (91.4)       (87.7)         Other reserves       7.0       64.8       (1.4)         Retained earnings       (490.0)       1,165.3       (334.0)	Convertible bond reserve				
Other reserves       7.0       64.8       (1.4)         Retained earnings       (490.0)       1,165.3       (334.0)					
Retained earnings (490.0) 1,165.3 (334.0)	Other reserves				
	Retained earnings				

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Non-controlling interests	7,827.2	10,277.5	7,565.2
Total equity	6,952.9	11,143.2	6,852.4

Financial statements of Vedanta Resources plc were approved by the Board of Directors on 09 November 2016 and signed on behalf by

**Tom Albanese** 

**Chief Executive Officer** 

## CONDENSED CONSOLIDATED CASH FLOW STATEMENT

## For the six months ended 30 September 2016

•				(US\$ million)
		Six months ended	Six months ended	Year ended
		30 September 2016	30 September 2015	31 March 2016
	Note	(Unaudited)	(Unaudited)	(Audited)
Operating activities				
Profit / (loss) before taxation		426.5	243.7	(4,984.0)
Adjustments for:				
Depreciation and amortisation		513.3	707.9	1,455.2
Investment revenues		(385.6)	(372.8)	(697.8)
Finance costs		652.3	639.1	1,280.4
Other gains and (losses)	5	26.6	67.8	72.5
(Profit) /loss on disposal of property, plant and				
equipment		(0.7)	(0.3)	1.5
Write-off of unsuccessful exploration costs		0.5	2.3	4.5
Share-based payment charge		7.0	6.2	15.6
Impairment of mining reserves and Oil and gas assets		-	-	5,187.0
Other non-cash items		-	4.3	2.7
Operating cash flows before movements in working				
capital		1,239.9	1,298.2	2,337.6
(Increase) / decrease in inventories		(187.3)	(0.3)	163.7
(Increase) / decrease in receivables		(214.8)	125.4	343.3
Increase in payables		241.0	904.4	657.4
Cash generated from operations		1,078.8	2,327.7	3,502.0
Dividend received		0.6	0.8	0.3
Interest income received		248.5	242.3	633.1
Interest paid		(698.9)	(581.3)	(1,268.4)
Income taxes paid		(323.7)	(137.2)	(354.7)
Dividends paid		(82.8)	(111.3)	(110.6)
Net cash inflow from operating activities		222.5	1,741.0	2,401.7
Cash flows from investing activities				
Purchases of property, plant and equipment and				
intangibles		(504.4)	(553.1)	(872.4)
Proceeds on disposal of property, plant and equipment		7.0	2.6	10.0
Proceeds from redemption of liquid investments	9	8,155.5	4,610.9	15,839.7
Purchases of liquid investments	9	(7,322.2)	(5,522.4)	(16,839.6)
Net cash from / (used in) investing activities		335.9	(1,462.0)	(1,862.3)
Cash flows from financing activities				
Issue of ordinary shares		0.0	0.0	0.1
Purchase of shares under DSBP scheme		(0.8)	-	(0.9)
Dividends paid to non-controlling interests of subsidiaries		(677.6)	(166.1)	(325.5)
Proceeds from / (repayment of) working capital loan	9	456.5	(152.2)	32.5
Proceeds from other short-term borrowings	9	3,774.4	3,290.4	6,353.2
Repayment of other short-term borrowings	9	(3,307.2)	(3,706.7)	(7,407.8)
Repayment of convertible bond	9	(579.9)	-	-
Proceeds from long-term borrowings	9	395.7	1,294.5	2,383.2
Repayment of long-term borrowings	9	(652.3)	(802.4)	(958.0)
Buyback of convertible bond		-	-	(523.6)
Net cash from / (used in) financing activities		(591.2)	(242.5)	(446.8)
Net increase / (decrease) in cash and cash equivalents		(32.8)	36.5	92.6
Effect of foreign exchange rate changes		(23.1)	(7.9)	(18.0)
Cash and cash equivalents at beginning of period / year		428.3	353.7	353.7
Cash and cash equivalents at end of period/year		372.4	382.3	428.3

(US\$ million)

Vedanta Resources plc Interim Results For The Six Months Ended 30 September 2016

## CONDENSED CONSOLIDATED STATEMENT OF CHANGES IN EQUITY

For the six months ended 30 September 2016 (Unaudited)

			Att	Attributable to equity holders of the Company	uity holders of	the Company					
				Share-based						Non-	
	Share	Share	Treasury	payment	payment Convertible	Hedging	Other	Retained		controlling	
	capital	premium	Shares	reserves b	reserves bond reserve	reserve	$reserves^{(1)}$	earnings	Total	Interests Total equity	Total equity
At 1 April 2016	30.1	201.5	(557.2)	29.9	6.0	(87.7)	(1.4)	(334.0)	(712.8)	7,565.2	6,852.4
Profit / (loss) for the period	ı	ı	ı	1	ı	1	ı	(64.2)	(64.2)	321.5	257.3
Other comprehensive loss for the period	-	1	1	-	-	(3.7)	(15.5)	1	(19.2)	(20.4)	(39.6)
Total comprehensive income for the period	ı	1	ı	1	t	(3.7)	(15.5)	(64.2)	(83.4)	301.1	217.7
Acquisition of shares under DSBP scheme	ı	ı	(0.8)	1	1	1	ı	ı	(0.8)	ı	(0.8)
Change in non-controlling interest	1	1	1	1	1	1	1	(1.5)	(1.5)	1.5	1
Convertible bond transfers	ı	ı	1	1	(5.6)	1	1	5.6	1	ı	ı
Transfers	ı	ı	1	1	1	1	23.9	(23.9)	ı	ı	1
Dividends paid	ı	1	ı	1	ı	ı	ı	(82.8)	(82.8)	(40.6)	(123.4)
Exercise of LTIP awards	0.0	1	0.1	(10.9)	1	1	1	10.8	0.0	1	0.0
Recognition of share-based payment	-	1	1	7.0	-	-	1	1	7.0	1	7.0
At 30 September 2016 (Unaudited)	30.1	201.5	(557.9)	26.0	0.4	(91.4)	7.0	(490.0)	(874.3)	7,827.2	6,952.9

(US\$ million)

Vedanta Resources plc Interim Results For The Six Months Ended 30 September 2016

For the year ended 31 March 2016 (Audited)

			A	ttributable to	Attributable to equity holders of the Company	f the Company					
				Share-based						Non-	
	Share	Share	Treasury	payment	Convertible	Hedging	Other	Retained		controlling	Total
	capital	premium	Shares	reserves	bond reserve	reserve	reserves <sup>(1)</sup>	earnings	Total	Interests	equity
At 1 April 2015	30.0	198.5	(556.9)	27.4	38.4	(74.7)	339.9	1,600.5	1,603.1	10,654.3	12,257.4
Loss for the year	1	1	1	1	1	1	1	(1,837.4)	(1,837.4)	(1,664.7)	(3,502.1)
Other comprehensive loss for the year	-	-	-	-	-	(13.0)	(373.2)	-	(386.2)	(444.9)	(831.1)
Total comprehensive loss for the year	1	1	1	1	1	(13.0)	(373.2)	(1,837.4)	(2,223.6)	(2,109.6)	(4,333.2)
Acquisition of shares under DSBP scheme	1	1	(0.3)	1	ı	1	ı	(0.6)	(0.9)	1	(0.9)
Convertible bond transfer	ı	1	1	1	(24.6)	1	1	24.6	1	1	ı
Conversion of bond into equity	0.0	3.0	1	1	(0.1)	1	1	1	2.9	1	2.9
Convertible bond buy back	1	1	1	1	(7.7)	1	1	5.1	(2.6)	1	(2.6)
Transfers	ı	1	1	1	1	1	31.9	(31.9)	1	1	ı
Dividends paid / payable	1	1	ı	1	1	ı	1	(110.6)	(110.6)	(979.5)	(1,090.1)
Exercise of LTIP awards	0.1	1	1	(13.1)	ı	1	1	13.1	0.1	1	0.1
Recognition of share-based payment	1	1	1	15.6	1	1	1	1	15.6	1	15.6
Others	1	1	1	1		1	1	3.2	3.2	1	3.2
At 31 March 2016	30.1	201.5	(557.2)	29.9	0.9	(87.7)	(1.4)	(334.0)	(712.8)	7,565.2	6,852.4

(US\$ million)

Vedanta Resources plc Interim Results For The Six Months Ended 30 September 2016

# CONDENSED CONSOLIDATED STATEMENT OF CHANGES IN EQUITY (CONTINUED)

## For the six months ended 30 September 2015 (Unaudited)

			Att	Attributable to equity holders of the Company	uity holders of	the Company					
				Share-based						Non-	
	Share	Share	Treasury	payment Convertible	Convertible	Hedging	Other	Retained		controlling	
	capital	premium	Shares	reserves be	reserves bond reserve	reserve	$reserves^{(1)}$	earnings	Total	Interests	Interests Total equity
At 1 April 2015	30.0	198.5	(556.9)	27.4	38.4	(74.7)	339.9	1,600.5	1,603.1	10,654.3	12,257.4
Profit / (loss) for the period	1	1	1	1	ı	1	ı	(324.5)	(324.5)	170.9	(153.6)
Other comprehensive loss for the period	1	1	1	1	1	(12.7)	(295.1)	1	(307.8)	(381.6)	(689.4)
Total comprehensive loss for the period	1	1	1	1	1	(12.7)	(295.1)	(324.5)	(632.3)	(210.7)	(843.0)
Convertible bond transfers	1	1	1	1	(14.3)	1	1	14.3	ı	1	1
Transfers	1	1	1	1	ı	1	20.0	(20.0)	1	1	1
Dividends paid	1	1	1	1	ı	1	ı	(111.3)	(111.3)	(166.1)	(277.4)
Exercise of LTIP awards	0.0	1	1	(6.3)	1	1	1	6.3	ı	1	1
Recognition of share-based payment	-	-	-	6.2	1	1	1	1	6.2	1	6.2
At 30 September 2015 (Unaudited)	30.0	198.5	(556.9)	27.3	24.1	(87.4)	64.8	1,165.3	865.7	10,277.5	11,143.2

<sup>(1)</sup> Other reserves comprise the currency translation reserve, merger reserve, investment revaluation reserve, debenture redemption reserve, capital redemption reserve and the general reserves established in the statutory accounts of the Group's Indian subsidiaries

## Notes to the financial information

## 1. Basis of preparation

Vedanta Resources plc (the Company) is a company incorporated and domiciled in the United Kingdom and is a London listed diversified global natural resources major. The Condensed financial statements for the six months ended 30 September 2016 have been prepared in accordance with International Accounting Standard (IAS) 34 Interim Financial Reporting as adopted by the European Union ('EU') and the requirements of the Disclosure and Transparency Rules ('DTR') of the Financial Conduct Authority ('FCA') in the United Kingdom as applicable to interim financial reporting.

The Condensed financial statements represent a 'condensed set of financial statements' as referred to in the DTR issued by the FCA. Accordingly, they do not include all of the information required for a full annual financial report and are to be read in conjunction with the Group's financial statements for the year ended 31 March 2016, which were prepared in accordance with International Financial Reporting Standards (IFRS) as adopted by EU. The interim condensed consolidated financial statements do not constitute statutory accounts as defined in section 434 of the Companies Act 2006. The financial information for the full year is based on the statutory accounts for the financial year ended 31 March 2016. A copy of the statutory accounts for that year, have been delivered to the Registrar of Companies. The auditor's report on these accounts was unqualified, did not include a reference to any matters to which the auditor drew attention by way of an emphasis of matter and did not contain a statement under sections 498 (2) or (3) of the Companies Act 2006.

The financial information prepared in accordance with International Accounting Standard 34 – Interim Financial Reporting as adopted by the European Union ('EU') in respect of six months ended 30 September 2016 and 30 September 2015 are unaudited but have been reviewed by the auditor and their report is set out on page 69 and 70.

The Group published full financial statements that comply with IFRS as adopted by the European Union for the year ended 31 March 2016.

The set of financial statements included in the interim financial report has been prepared using the going concern basis of accounting for the reasons set out in the Going Concern section of the Financial Review.

## 2(a). Accounting policies

During the period interim consolidated financial statements are prepared using the same accounting policies as applied in the audited 31 March 2016 financial statements.

## 2(b). Application of new and revised standards

The Group has adopted, with effect from April 1, 2016, the following new and revised standards and interpretations. Their adoption has not had any significant impact on the amounts reported in the financial statements.

- Amendments to IFRS 11 Acquisition of an interest in a joint operation requires that when an entity acquires an interest in a joint operation in which the activity of the joint operation constitutes a business, as defined in IFRS 3, it shall apply, to the extent of its share in accordance with the guidance in this standard, all of the principles on business combinations accounting in IFRS 3, and all other IFRSs in relation to business combinations. The amendments apply prospectively
- Amendment to IAS 16 and IAS 38 This clarifies the use of methods based on revenue to calculate the depreciation is not appropriate. This is because such methods reflect a pattern of generation of economic benefits that arise from the operation of the business of which an asset is part, rather than the pattern of consumption of an asset's expected future economic

benefits, revenue is presumed to be inappropriate basis for measuring the consumption of the economic benefits embodied in an intangible asset. This presumption, however, can be rebutted in certain limited circumstances

- Amendments to IAS 1: Disclosure Initiative to improve and simplify disclosures within existing disclosure requirements
- Amendments to IAS 27: Equity method in separate financial statements The amendments reinstate the equity method as an accounting option for investments in subsidiaries, joint ventures and associates in an entity's separate financial statements. The amendments are to be applied retrospectively in accordance with IAS 8 Accounting Policies, Changes in Accounting Estimates and Errors
- Amendments to IAS 16 and IAS 41: Bearer plants Amendment is in relation to bearer biological assets (BBAs, e.g. fruit trees, grape vines), as to whether these assets would be better accounted for under IAS 16 Property, Plant and Equipment rather than using the fair value measurement approach prescribed by IAS 41
- Amendments to IFRS 10, IFRS 12 and IAS 28: Investment entities: Applying the Consolidation Exemption

## Annual Improvements to IFRSs 2012-2014 Cycle

2012-2014 Cycle and Annual Improvements to IFRSs: 2012-2014 Cycle, are part of annual process of revising and improving existing standards. These are applicable with mandatory effective date of January 1, 2016.

- IFRS 5 Non-current Assets Held for Sale and Discontinued Operations: Changes in methods of disposal. It adds specific guidance in IFRS 5 for cases in which an entity reclassifies an asset from held for sale to held for distribution or vice versa and cases in which held-for-distribution accounting is discontinued
- IFRS 7 Financial Instruments: Disclosures with consequential amendments to IFRS 1: Adds additional guidance to clarify whether a servicing contract is continuing involvement in a transferred asset for the purpose of determining the disclosures required. It further clarifies the applicability of the amendments to IFRS 7 on offsetting disclosures to condensed interim financial statements
- IAS 19 Employee Benefits: Discount rate: regional market issue. Clarifies that the high quality corporate bonds used in estimating the discount rate for post-employment benefits should be denominated in the same currency as the benefits to be paid (thus, the depth of the market for high quality corporate bonds should be assessed at currency level)
- IAS 34 Interim Financial Reporting: Disclosure of information 'elsewhere in the interim financial report'. Clarifies the meaning of 'elsewhere in the interim report' and requires a cross-reference

At the date of authorisation of these financial statements, the following Standards and Interpretations which have not been applied in these financial statements were in issue but not yet effective:

## IFRS 9 - Financial Instruments

In July 2014, the International Accounting Standards Board issued the final version of IFRS 9, Financial Instruments. The standard reduces the complexity of the current rules on financial instruments as mandated in IAS 39. IFRS 9 has fewer classification and measurement categories as compared to IAS 39 and has eliminated the categories of held to maturity, available for sale and loans and receivables. Further it eliminates the rule based requirement of segregating embedded derivatives and tainting rules pertaining to held to maturity investments. For an investment in an equity instrument which is not held for trading, IFRS 9 permits an irrevocable

election, on initial recognition, on an individual share-by- share basis, to present all fair value changes from the investment in other comprehensive income. No amount recognised in other comprehensive income would ever be reclassified to profit or loss. It requires the entity, which chooses to measure a liability at fair value, to present the portion of the fair value change attributable to the entity's own credit risk in the other comprehensive income. IFRS 9 replaces the 'incurred loss model' in IAS 39 with an 'expected credit loss' model. The measurement uses a dual measurement approach, under which the loss allowance is measured as either 12 month expected credit losses or lifetime expected credit losses. The standard also introduces new presentation and disclosure requirements. The effective date for adoption of IFRS 9 is annual periods beginning on or after 1 January 2018, though early adoption is permitted.

## IFRS 15 - Revenue from Contracts with Customers

IFRS 15 – Revenue from contracts with Customers outlines a single comprehensive model for entities to use in accounting for revenue arising from contracts with customers. The standard replaces most current revenue recognition guidance, including industry-specific guidance. The core principle of the new standard is for companies to recognise revenue to depict the transfer of goods or services to customers in amounts that reflect the consideration to which the company expects to be entitled in exchange for those goods or services. The new standard also will result in enhanced disclosures about revenue, provide guidance for transactions that were not previously addressed comprehensively including service revenues and contract modifications and improve guidance for multiple-element arrangements. The new Standard will come into effect for the annual reporting periods beginning on or after 1 January 2018 with early application permitted.

## IFRS 16 - Leases

IFRS 16- Leases, specifies recognition, measurement and disclosure criteria for leases. The standard provides a single lessee accounting model, requiring lessees to recognise assets and liabilities for all leases unless the lease term is 12 months or less or the underlying asset has a low value. Lessors continue to classify leases as operating or finance, with IFRS 16's approach to lessor accounting substantially unchanged from its predecessor, IAS 17. The new Standard will come into effect for the annual reporting periods beginning on or after 1 January 2019. Earlier application is permitted if IFRS 15 Revenue from Contracts with Customers has also been applied.

Following other standard, improvements and amendments to the standards have been issued upto the date of authorisation of these financial statements and will be applicable for the annual reporting periods beginning on or after 1 January 2017.

- Amendments to IAS 7, Statement of cash flows on disclosure initiative
- Amendments to IAS 12, 'Income taxes' on Recognition of deferred tax assets for unrealised losses

The Group is evaluating the requirements of these standards, improvements and amendments and has not yet determined the impact on the consolidated financial statements.

## Foreign Exchange Rate

The following exchange rate to US dollar (\$) have been applied:

	Average rate for six	Average rate for six				
		months ended	Average rate	As at 30	As at 30	As at
	30 September		for year ended	September	September	31 March
	2016	2015	31 March 2016	2016	2015	2016
Indian rupee	66.95	64.23	65.46	66.66	65.74	66.33

## 3. Segmental Reporting

The Group is a diversified natural resources group engaged in exploring, extracting and processing minerals and oil and gas. We produce Zinc, Lead, Silver, Copper, Aluminium, Iron ore, Oil and gas and commercial power and have presence across India, South Africa, Namibia, Ireland, Australia, U.A.E. and Liberia. The Group is also in the business of port operations in India.

Vedanta Resources plc is a company incorporated in the United Kingdom under the Companies Act. The Group's reportable segments defined in accordance with IFRS 8 are as follows:

- Zinc-India
- Zinc-International
- Oil and gas
- Iron Ore
- Copper-India / Australia
- Copper-Zambia
- Aluminium
- Power

The components not meeting the quantitative threshold for reporting are being reported as 'Others'.

Management monitors the operating results of reportable segments for the purpose of making decisions about resources to be allocated and for assessing performance. Segment performance is evaluated based on the EBITDA before Special Items of each segment. Intersegment sales are charged based on prevailing market prices.

The following table's present revenue and profit information and certain asset and liability information regarding the Group's reportable segments for the six months ended 30 September 2016 and 30 September 2015 and for the year ended 31 March 2016.

Vedanta Resources plc Interim Results For The Six Months Ended 30 September 2016

(a) Reportable segments

Six months ended 30 September 2016

												(US\$ million)
		Zinc-			Copper-				Total			
	Zinc-India	Inter national	Oil and gas	Iron Ore	India/ Australia	Copper- Zambia	Aluminium <sup>(1)</sup>	Power	reportable segment	Others	Others Elimination	Total operations
REVENUE												
Sales to external customers	871.2	170.0	585.9	217.1	1,393.3	382.4	863.3	375.4	4,858.6	9.2	ı	4,867.8
Inter-segment sales <sup>(2)</sup>	1.4	•	1	1.0	1.9	22.2	0.8	8.0	35.3	6.0	(36.2)	1
Segment revenue	872.6	170.0	585.9	218.1	1,395.2	404.6	864.1	383.4	4,893.9	10.1	(36.2)	4,867.8
Segment Result												
EBITDA(3)	456.1	88.4	273.9	71.7	126.3	17.2	102.1	107.9	1,243.6	(10.5)	ı	1,233.1
Depreciation and amortisation <sup>(4)</sup>	(52.8)	(14.9)	(234.2)	(27.9)	(14.9)	(59.6)	(70.7)	(35.9)	(510.9)	(2.4)	ı	(513.3)
Operating profit	403.3	73.5	39.7	43.8	111.4	(42.4)	31.4	72.0	732.7	(12.9)	ı	719.8
Investment revenue												385.6
Finance costs												(652.3)
Other gains and (losses) [net]												(26.6)
PROFIT BEFORE TAXATION												426.5
Segments assets	2,267.4	481.2	3,040.3	1,415.6	1,199.1	2,043.5	6,900.2	2,710.5	20,057.8	101.1	ı	20,158.9
Financial asset investments												7.1
Deferred tax assets												1,250.8
Liquid investments												7,794.9
Cash and cash equivalents												372.4
Tax assets												381.6
TOTAL ASSETS												29,965.7
Segment liabilities	(456.9)	(104.9)	(951.5)	(179.2)	(1,888.7)	(727.8)	(1,331.6)	(333.6)	(5,974.2)	(21.7)	ı	(5,995.9)
Short-term borrowings												(4,310.9)
Current tax liabilities												(46.2)
Long-term borrowings												(12,022.4)
Deferred tax liabilities												(637.4)
TOTAL LIABILITIES												(23,012.8)
Other segment information												
Additions to property, plant and												
equipment	178.8	14.0	149.0	1.1	9.6	13.1	173.7	64.8	604.1	1	1	604.1
Depreciation and amortisation	(52.8)	(14.9)	(234.2)	(27.9)	(14.9)	(59.6)	(70.7)	(35.9)	(510.9)	(2.4)	1	(513.3)
							-					

Vedanta Resources plc Interim Results For The Six Months Ended 30 September 2016

Six months ended 30 September 2015

												(US\$ million)
		Zinc-			Copper-				Total			
	Zinc-India	Inter national	Oil and	Iron Ore	India/ Australia	Copper-	Aluminium <sup>(1)</sup>	Power	reportable segment	Others Elimination	nination	Total operations
REVENUE									0			
Sales to external customers	1,150.5	244.5	755.3	131.6	1,696.2	520.0	849.4	338.1	5,685.6	13.7	1	5,699.3
Inter-segment sales <sup>(2)</sup>	1	1	1	6.2	0.4	5.0	2.1	4.2	17.9	ı	(17.9)	ı
Segment revenue	1,150.5	244.5	755.3	137.8	1,696.6	525.0	851.5	342.3	5,703.5	13.7	(17.9)	5,699.3
Segment Result												
EBITDA(3)	581.8	56.6	373.8	7.2	170.4	(24.3)	21.7	93.0	1,280.2	5.5	1	1285.7
Depreciation and amortisation <sup>(4)</sup>	(58.7)	(29.6)	(406.5)	(19.1)	(16.9)	(94.7)	(47.5)	(33.7)	(706.7)	(1.2)	1	(707.9)
Operating profit	523.1	27.0	(32.7)	(11.9)	153.5	(119.0)	(25.8)	59.3	573.5	4.3	•	577.8
Investment revenue												372.8
Finance costs												(639.1)
Other gains and (losses) [net]											•	(67.8)
PROFIT BEFORE TAXATION												243.7
Segments assets <sup>(5)</sup>	2,096.6	464.8	8,775.2	1,733.1	1,235.7	2,152.1	5,987.5	3,405.3	25,850.3	115.4	'	25,965.7
Financial asset investments												6.4
Deferred tax assets												1,132.3
Liquid investments												8,534.4
Cash and cash equivalents												382.3
Tax assets												386.3
TOTAL ASSETS											•	36,407.4
Segment liabilities <sup>(5)</sup>	(446.3)	(161.8)	(1,161.9)	(149.9)	(1,904.5)	(566.6)	(828.4)	(6.77.9)	(5,897.3)	(119.6)	1	(6,016.9)
Short-term borrowings												(5,223.4)
Current tax liabilities												(92.8)
Long-term borrowings												(11,227.5)
Deferred tax liabilities												(2,703.6)
TOTAL LIABILITIES												(25,264.2)
Other segment information												
Additions to property, plant and												
equipment	117.0	29.5	219.3	8.8	12.3	11.0	70.8	49.7	518.4	0.0	1	518.4
Depreciation and amortisation	(58.7)	(29.6)	(406.5)	(19.1)	(16.9)	(94.7)	(47.5)	(33.7)	(7.96.7)	(1.2)	1	(707.9)

Vedanta Resources plc Interim Results For The Six Months Ended 30 September 2016

Year ended 31 March 2016

												(US\$ million)
	Zinc-India	Zinc- Intern- ational	Oil and gas	Iron Ore	Copper- India/ Australia	Copper- Zambia	Aluminium <sup>(1)</sup>	Power	Total reportable segment	Others Elin	Elimination	Total operations
REVENUE												
Sales to external customers	2,111.0	391.5	1,322.3	341.8	3,196.8	2.996	1,692.3	691.7	10,714.1	23.8	1	10,737.9
Inter-segment sales <sup>(2)</sup>	1	1	1	8.2	0.4	5.8	2.0	15.8	32.2	ı	(32.2)	ı
Segment revenue	2,111.0	391.5	1,322.3	350.0	3,197.2	972.5	1,694.3	707.5	10,746.3	23.8	(32.2)	10,737.9
Segment Result												
EBITDA(3)	995.0	68.1	570.4	73.4	336.6	(17.9)	106.7	196.3	2,328.6	7.8	1	2336.4
Depreciation and amortisation <sup>(4)</sup>	(119.9)	(56.4)	(826.3)	(62.5)	(32.3)	(179.5)	(101.8)	(74.1)	(1,452.8)	(2.4)	1	(1,455.2)
Special items	(4.6)	(0.3)	(4,934.2)	(252.4)	(7.6)	(0.5)	(10.5)	. 1	(5,210.1)	. 1	1	(5,210.1)
Operating profit	870.5	11.4	(5,190.1)	(241.5)	296.7	(197.9)	(5.6)	122.2	(4,334.3)	5.4	1	(4,328.9)
Investment revenue												8.269
Finance costs												(1,280.4)
Other gains and (losses) [net]												(72.5)
PROFIT BEFORE TAXATION												(4,984.0)
Segments assets <sup>(5)</sup>	2,327.3	445.8	3,135.3	1,408.7	1,169.6	2,066.3	5,827.3	3,193.6	19,573.9	149.8	1	19,723.7
Financial asset investments												6.5
Deferred tax assets												1,255.4
Liquid investments												8,508.2
Cash and cash equivalents												428.3
Tax assets												397.2
TOTAL ASSETS												30,319.3
Segment liabilities $^{(5)}$	(1,290.4)	(125.8)	(847.4)	(191.1)	(2,006.7)	(697.2)	(777.6)	(591.4)	(6,527.6)	(38.8)	,	(6,566.4)
Short-term borrowings												(4,313.8)
Current tax liabilities												(17.0)
Long-term borrowings												(11,949.5)
Deferred tax liabilities												(620.2)
TOTAL LIABILITIES											l	(23,466.9)
Other segment information												
Additions to property, plant and												
equipment	239.9	58.5	214.3	14.8	18.4	27.6	119.6	50.3	743.4	7.3	1	750.7
Depreciation and amortisation	(119.9)	(56.4)	(826.3)	(62.5)	(32.3)	(179.5)	(101.8)	(74.1)	(1,452.8)	(2.4)	1	(1,455.2)
Impairment losses			(4,934.2)	(245.2)	(7.6)							(5,187)

(1) Three units of 600 MW each at Jharsuguda and 1 unit of 270 MW at BALCO, Korba have been converted from commercial power plant to captive power plant, pursuant to an order of Orissa Electricity Regulatory Authority and increased in-house demand respectively. Accordingly, the revenue, results, segment assets and segment liabilities of these plants have been disclosed as part of Aluminium segment beginning current half-year ended 30 September 2016

## Vedanta Resources plc Interim Results For The Six Months Ended 30 September 2016

- (2) Transfer prices for inter-segment sales are on an arm's length basis in a manner similar to transactions with third parties. However, inter-segment sales at BALCO from its Power segment to Aluminium segment amounting to US\$3.7 million for the six months ended 30 September 2016 (30 September 2015: US\$6.4 million, 31 March 2016: US\$6.6 million), is at cost
  - (3) EBITDA is a non-IFRS measure and represents operating profit / loss before special items, depreciation and amortisation, interest and tax
    - (4) Depreciation and amortisation is also provided to the chief operating decision maker on a regular basis
- (5) The allocation of segment assets and liabilities has been revised to more accurately reflect how these are managed. Previous period amounts have been reclassified to ensure consistency

Vedanta Resources plc Interim Results For The Six Months Ended 30 September 2016

## 4. Special items

								)	(US\$ million)
	Six months	Six months ended 30 September 2016	ıber 2016	Six months	Six months ended 30 September 2015	tember 2015	Year e	Year ended 31 March 2016	2016
		Tax effect of			Tax effect of			Tax effect of	
		Special items		S	Special items/		Ś	Special items/	
		/Special tax Special item	pecial item	Special	Special tax	Special tax Special items	Special	Special tax Special items	pecial items
	Special items	item	after tax	items	item	after tax	items	item	after tax
Impairment of oil and gas assets <sup>(1)</sup>	ı	1	ı	ı	1	1	(4,934.2)	1,903.3	(3,030.9)
Impairment of mining reserves and assets									
Iron ore <sup>(2a)</sup>	ı	1	ı	ı	ı	ı	(245.2)	ı	(245.2)
Copper(2b)	ı	1	ı	ı	ı	ı	(7.6)	ı	(7.6)
Total impairment charge	•	1	1	1	1	1	(5,187.0)	1,903.3	(3,283.7)
Voluntary retirement schemes (redundancy							(23.1)	7.9	(15.2)
$\cos$ ts $)^{(3)}$	1	1	1	ı	1	1			
Special tax item <sup>(4)</sup>		1	-	1	(173.8)	(173.8)	1	(173.8)	(173.8)
Special items	-	•	-	-	(173.8)	(173.8)	(5,210.1)	1,737.4	(3,472.7)

Special items for the year ended 31 March 2016:

- (1) Impairment charge on oil and gas assets of US\$4,934.2 million mainly relating to Rajasthan block, triggered by the significant fall in the crude oil prices, prevailing discount of Rajasthan crude and adverse long term impact of revised cess. Of this charge, US\$1,143.5 million has been recorded against oil and gas properties and US\$3,790.7 million against exploratory and evaluation assets. The valuation remains dependent on price and further deterioration in long term prices may result in additional impairment
- (2a) US\$227.5 million impairment charge in respect of the exploratory assets in West Africa (Western Cluster, Liberia) is on account of low iron ore prices, geo-political factors and no plans for any substantive expenditure resulting in continued uncertainty in the project and, US\$17.7 million impairment charge in the carrying amount of idle assets grouped under assets under construction at Bellary, Karnataka in India

(2b) US\$7.6 million impairment charge relating to operation in Copper Mines of Tasmania Pty Ltd, Australia on account of extended care and maintenance, lower copper prices and continued uncertainty in start-up of operations

- (3) US\$23.1 million incurred under a Group wide voluntary retirement initiative across various Group entities
- been restricted to a maximum of 50% of the income for the year. Accordingly, a total deferred tax charge of US\$173.8 million resulting from the amendments has been recognised under 'Special tax items' during the year ended 31 March 2016 and six months ended 30 September 2015, increase as compared to reversal in previous year is mainly on account of restriction placed on maximum loss which can be set off in a particular year (4) As a result of amendments to the Zambian Mining Tax regime, effective from 1 January 2015, the tax rate on integrated mining operations (excluding custom smelting mineral processing activities) was reduced from 30% to 0%. The deferred tax liability in relation to mining operations was therefore reversed during the year ended 31 March 2015, resulting in a net credit to the income statement of US\$52.8 million. Consequent amendments to the Zambian Mining Tax regime, effective from 1 July 2015 the tax rate on mining operations has been restored from 0% to 30%. Further, the set off of carried forward losses relating to mining operations has

Further disclosures regarding the special items are given in the annual report for the year ended 31 March 2016

## 5. Other gains and (losses) [net]

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		(ασφ πιπιοπ)
		Year ended 31 March 2016
(28.3)	(88.2)	(103.7)
1.5	13.7	10.1
(26.8)	(74.5)	(93.6)
(0.6)	(0.5)	(0.9)
0.8	7.2	22.0 (72.5)
	30 September 2016 (28.3) 1.5 (26.8) (0.6)	1.5 13.7 (26.8) (74.5) (0.6) (0.5) 0.8 7.2

## 6. Income tax expense

(7 T C +	
(USS)	million)

			(นรจุ พนนอก)
	Six months ended	Six months ended	Year ended
	30 September 2016	30 September 2015	31 March 2016
Current tax:			
UK Corporation tax	-	-	1.5
Foreign tax:			
India	146.5	208.6	538.5
Zambia	0.0	-	0.0
Australia	-	0.1	0.0
Africa and Europe	9.8	5.5	4.5
Others	0.0	(7.9)	(7.8)
	156.3	206.3	536.7
Deferred tax:			
Deferred tax impact on impairment of Oil and gas assets (Note 4)	-	-	(1,903.3)
Deferred tax charge due to change in tax regime in Zambia (Note 4)	-	173.8	173.8
Deferred tax others	12.9	17.2	(289.1)
	12.9	191.0	(2,018.6)
Net tax expense / (credit)	169.2	397.3	(1,481.9)
Effective tax rate	39.7%	163.0%	29.7%

## 7. Earnings per share

(a) Basic earnings per share amounts are calculated by dividing net profit / loss for the period / year attributable to ordinary equity holders of the parent by the weighted average number of Ordinary Shares outstanding during the period / year.

Diluted earnings per share amounts are calculated by dividing the net profit / loss attributable to ordinary shareholders by the weighted average number of Ordinary Shares outstanding during the period / year (adjusted for the effects of dilutive options and convertible loan notes).

The following reflects the income and share data used in the basic and diluted earnings per share computations:

		(US\$ million)
Six months ended	Six months ended	Year ended 31 March 2016
30 September 2016	30 September 2013	31 March 2010
(64.2)	(324.5)	(1,837.4)
	30 September 2016	30 September 2016 30 September 2015

## Basic/diluted loss per share on the loss for the period/year

		(US\$ millio	on except as stated)
	Six months ended 30 September 2016	Six months ended 30 September 2015	Year ended 31 March 2016
Net loss attributable to equity holders of the parent	(64.2)	(324.5)	(1,837.4)
Weighted average number of Ordinary Shares of the Company in issue (million)	276.5	275.8	276.0
Loss per share on loss for the period / year (US cents per share)	(23.2)	(117.7)	(665.8)

The effect of 9.7 million (30 September 2015: 6.4 million, 31 March 2016: 6.8 million) potential ordinary shares, which relate to share option awards under the LTIP scheme, on the attributable loss for the period / year are anti-dilutive and thus these shares are not considered in determining diluted EPS. The loss for the period / year would be decreased if holders of the convertible bonds in Vedanta exercised their right to convert their bond holdings into Vedanta equity. The impact on profit / loss for the period / year of this conversion would lower interest payable on the convertible bond. The adjustment in respect of the convertible bonds has an anti-dilutive impact on the number of shares and earnings / loss and thus diluted EPS is not disclosed.

## (b) Loss per share based on underlying profit / (loss) for the period / year (non-GAAP)

The Group's Underlying Profit / loss is the attributable profit for the period / year after adding back special items, other losses / (gains) [net]<sup>(1)</sup> and their resultant tax and Non-controlling interest effects:

			(US\$ million)
	Six months ended	Six months ended	Year ended
	30 September 2016	30 September 2015	31 March 2016
Loss for the year attributable to equity holders of the			
parent	(64.2)	(324.5)	(1,837.4)
Special items	-	-	5,210.1
Other losses / (gains) [net]	26.6	67.8	72.5
Tax and non-controlling interest effect of special items	3		
(including taxes classified as special items) and other			
losses / (gains)	(14.3)	97.8	(3,809.3)
Underlying Profit/ (loss) for the period/year	(51.9)	(158.9)	(364.1)

## Basic / diluted loss per share on underlying loss for the period / year (non-GAAP)

		(US\$ millio	on except as stated)
	Six months ended 30 September 2016	Six months ended 30 September 2015	Year ended 31 March 2016
Underlying (loss) / profit for the period / year	(51.9)	(158.9)	(364.1)
Weighted average number of Ordinary Shares of the Company in issue (million)	276.5	275.8	276.0
Loss per share on underlying loss for the period / year (US cents per share)	(18.8)	(57.6)	(131.9)

## 8. Dividends

			(US\$ million)
	Six months ended 30 September 2016	Six months ended 30 September 2015	Year ended 31 March 2016
Amounts paid as distributions to equity holders:			
Final dividend paid			
Final dividend 2014-15: 40 US cents per share	-	110.6	110.6
Final dividend 2015-16: 30 US cents per share	82.8	-	-
Total	82.8	110.6	110.6

The proposed interim dividend for the six months ended 30 September 2016 was 20 US cents per share (30 September 2015: Nil). This was approved by the Board of Directors on 9 November 2016 and has not been included as a liability as at 30 September 2016.

## 9. Movement in net debt(1)

(US\$ million)

			1			(	asy million)
				Debt due within			
				one year	Debt due af	ter one year	
			Total cash				
	Cash and		and				
	cash	Liquid	liquid	Debt carrying	Debt carrying	Debt-related	Total Net
	equivalents(2)	investments	investments	value	value	derivatives(3)	Debt
At 1 April 2016	428.3	8,508.2	8,936.5	(4,313.8)	(11,949.5)	(2.0)	(7,328.8)
Cash flow	(32.8)	(833.3)	(866.1)	(923.7)	836.5	-	(953.3)
Other non-cash							
changes (4)	-	136.6	136.6	905.0	(936.3)	2.0	107.3
Foreign exchange					, ,		
differences	(23.1)	(16.6)	(39.7)	21.6	26.9	-	8.8
At 30 September							
2016	372.4	7,794.9	8,167.3	(4,310.9)	(12,022.4)	-	(8,166.0)

(US\$ million)

				Debt due within			
				one year	Debt due after one year		
			Total cash				
	Cash and		and				
	cash	Liquid	liquid	Debt carrying	Debt carrying	Debt-related	Total Net
	equivalents(2)	investments	investments	value	value	derivatives(3)	Debt
At 1 April 2015	353.7	7,856.1	8,209.8	(3,179.2)	(13,488.6)	(2.3)	(8,460.3)
Cash flow	92.6	999.9	1,092.5	1,022.1	(901.6)	-	1,213.0
Other non-cash changes (4)	-	59.4	59.4	(2,280.6)	2,195.6	0.3	(25.3)
Foreign exchange differences	(18.0)	(407.2)	(425.2)	123.9	245.1	-	(56.2)
At 31 March 2016	428.3	8,508.2	8,936.5	(4,313.8)	(11,949.5)	(2.0)	(7,328.8)

(US\$ million)

				Debt due within			
				one year	Debt due after one year		
			Total cash				
			and				
	Cash and cash	Liquid	liquid	Debt carrying	Debt carrying	Debt-related	Total Net
	equivalents <sup>(2)</sup>	investments	investments	value	value	derivatives <sup>(3)</sup>	Debt
At 1 April 2015	353.7	7,856.1	8,209.8	(3,179.2)	(13,488.6)	(2.3)	(8,460.3)
Cash flow	36.5	911.5	948.0	568.5	(492.1)	-	1,024.4
Other non-cash							
changes(4)	-	121.5	121.5	(2,722.3)	2,551.7	0.3	(48.8)
Foreign exchange							
differences	(7.9)	(354.7)	(362.6)	109.6	201.5	-	(51.5)
At 30 September							_
2015	382.3	8,534.4	8,916.7	(5,223.4)	(11,227.5)	(2.0)	(7,536.2)

<sup>(1)</sup> Net debt is a Non-IFRS measure and represents total debt after fair value adjustments under IAS 32 and 39 as reduced by cash and cash equivalents and liquid investments

## Debt securities issued during the period

In September 2016, Vedanta Limited issued NCDs of US\$90.0 million (INR 6,000 million) to banks and financial institutions bearing an interest rate of 8.70% per annum. These debentures are secured by way of first pari-passu charge on the specific movable and / or immovable Fixed Assets with minimum asset coverage of the aggregate face value of Bonds outstanding at all times. The total principal is due for repayment in April 2020.

<sup>(2)</sup> Includes US\$55.5 million (31 March 2016: US\$44.8 million, 30 September 2015: US\$70.2 million) of cash held in short-term deposit accounts that is restricted in use as it relates to unclaimed dividends, closure costs and future redundancy payments

<sup>(3)</sup> Debt-related derivatives exclude commodity-related derivative financial assets and liabilities

<sup>(4)</sup> Other non-cash changes comprises of mark to market of embedded derivatives, interest accretion on convertible bonds, amortisation of borrowing costs and reclassification between medium and long-term borrowings and short-term borrowings for which there is no cash movement. It also includes US\$136.6 million (31 March 2016: US\$59.4 million, 30 September 2015: US\$121.5 million) of fair value movement in investments

In September 2016 Vedanta Limited issued NCDs of US\$22.5 million (INR 1,500 million) to banks and financial institutions bearing an interest rate of 8.65% per annum. These debentures are secured by way of first pari-passu charge on the specific movable and / or immovable Fixed Assets with minimum asset coverage of the aggregate face value of Bonds outstanding at all times. The total principal is due for repayment in September 2019.

## 10. Cairn- Decommissioning liability

Included within non-current provisions is a balance of US\$302.4 million at 30 September 2016 (31 March 2016: US\$174.2 million) in relation to the Group's decommissioning obligations. In the current period, the Group identified an adjustment to the discount rate applied to the decommissioning liability in relation to a prior year in the Group's Oil and Gas segment. The discount rate has been revised from 8% to 3.5% p.a. to reflect the risk free rate of return of the currency in which the majority of the expenses are likely to be incurred. The consequential increase in decommissioning provision and property, plant and equipment of US\$ 125.0 million, which the Group believes is not material when comparing to the overall net assets, has been recognised in the current period.

## 11. Other disclosures

## Capital commitments

Contractual commitments to acquire fixed assets were US\$1,151.3 million at 30 September 2016 (31 March 2016: US\$1,289.3 million, 30 September 2015: US\$1,758.5 million).

## Contingent liabilities and guarantees

## Guarantees

As at 30 September 2016, the Group has given Bank Guarantees of US\$386.5 million to suppliers, government authorities etc. in the normal course of business (31 March 2016: US\$384.6 million, 30 September 2015: US\$305.7 million). The Group has also entered into guarantees and bonds advanced to the customs authorities in India of US\$109.0 million (31 March 2016: US\$154.8 million, 30 September 2015: US\$178.0 million) related to export and payment of import duties on purchase of raw material and capital goods including export obligations.

## **Export Obligations**

The Indian entities of the Group have export obligations of US\$ 2,375.1 million (31 March 2016: US\$2,200.5 million, 30 September 2015: US\$2,398.0 million) on account of concessional rates of import duty paid on capital goods under the Export Promotion Capital Goods Scheme.

In the event of the Group's inability to meet its obligations, the Group's liability would be US\$324.3 million (31 March 2016: US\$349.1 million, 30 September 2015: US\$306.0 million) reduced in proportion to actual exports, plus applicable interest. Due to the remote likelihood of the Group being unable to meet its export obligations, the Group does not anticipate a loss with respect to these obligations and hence has not made any provision in its consolidated financial statements.

## Miscellaneous Disputes

The Group is subject to various claims and exposures which arise in the ordinary course of conducting and financing its business from the income tax, excise, indirect tax authorities and others. These claims and exposures mostly relate to the assessable values of sales and purchases or to incomplete documentation supporting the companies' returns or other claims.

The approximate value of claims (excluding the items as set out separately below) against the Group total US\$1,163.4 million (31 March 2016: US\$1,182.3 million, 30 September 2015: US\$1,523.4 million) of which US\$26.3 million (31 March 2016: US\$14.9 million, 30 September 2015: US\$47.6 million) is included as a provision in the Statement of financial position as at 30

September 2016. In the view of the Directors, there are no significant unprovided liabilities arising from these claims.

The contingent liabilities mentioned above and the items as set out below represent disputes with various Government authorities, suppliers and contractors in the respective jurisdictions where the operations are based.

Based on the Company's evaluation, it believes that it is not probable that the claim will materialise for such cases and therefore, no provision has been recognised.

## Richter and Westglobe: Income Tax

The Group through its subsidiaries Richter Holdings Limited (Richter) and Westglobe Limited (Westglobe) in 2007 acquired the entire stake in Finsider International Company Limited (FICL) based in the United Kingdom. FICL was holding 51 percent shares of Sesa Goa Ltd, an Indian Company. In October 2013, the Indian Tax Authorities (Tax Authorities) have served an order on Richter and Westglobe for alleged failure to deduct withholding tax on capital gain on the indirect acquisition of shares in April 2007. The Tax Authorities determined the liability for such non-deduction of tax as US\$131.4 million in the case of Richter and US\$87.5 million in the case of Westglobe, comprising tax and interest. Being aggrieved, Richter and Westglobe filed appeals before the first appellate authority. Writ petitions were filed in the High Court of Karnataka challenging the constitutional validity of retrospective amendments made by the Finance Act 2012 and in particular the imposition of obligations to deduct tax on payments made against an already concluded transaction.

The Karnataka High Court passed interim orders and directed that the adjudication of liability (TDS quantum and interest) shall no more remain in force since tax department passed the orders on merits travelling beyond the limited issue of jurisdiction. The high court will hear on jurisdiction issue.

The next hearing is scheduled for 7 December 2016.

## Cairn India: Income Tax

In March 2014, Cairn India received a show cause notice from the Indian Tax Authorities ("Tax Authorities") for not deducting withholding tax on the payments made to Cairn UK Holdings Limited ("CUHL") UK, for acquiring shares of Cairn India Holdings Limited ("CIHL"), as part of their internal reorganisation. Tax Authorities have stated in the said notice that a short-term capital gain has accrued to CUHL on transfer of the shares of CIHL to Cairn India, in financial year 2006-2007, on which tax should have been withheld by the Company. Pursuant to this various replies were filed with the tax authorities.

After hearings, the Income Tax Authority, during March 2015, have issued an order by holding Cairn India as 'assessee in default' and asked to pay such demand totalling US\$ 3,072.9 million (including interest of US\$1,536.4 million). Cairn India has filed its appeal before the Appellate Authority CIT (Appeals) and filed a fresh Writ petition before Delhi High Court wherein it raised several points for assailing the aforementioned order. The hearing of the said Writ is due on 23 January 2017.

The Company has issued a Notice of arbitration to Government of India by invoking Bilateral Investment Promotion Treaty between the UK and India. The matter is scheduled for hearing on 10 December 2016.

## Vedanta Limited: Contractor claim

Shenzhen Shandong Nuclear Power Construction Co. Limited ('SSNP') subsequent to terminating the EPC contract invoked arbitration as per the contract alleging non-payment of their dues towards construction of a 210 MW co-generation power plant for 6 MTPA expansion project, and filed a claim of US\$249.4 million. SSNP also filed a petition under Section 9 of the Arbitration and Conciliation Act, 1996 before the Bombay High Court praying for interim relief.

The Bombay High Court initially dismissed their petition, but on a further appeal by SSNP, the Division Bench of the Bombay High Court directed Jharsuguda Aluminium to deposit a bank guarantee for an amount of US\$29.4 million as a security, being a prima facie representation of the claim, until arbitration proceedings are completed. Jharsuguda Aluminium has deposited a bank guarantee of equivalent amount. Management is of the opinion that this claim is not valid under the terms of the contract with SSNP and it is unlikely that SSNP can legally sustain the claim and accordingly, no provision is considered necessary.

On 9 April 2013, the Company also filed a counterclaim for delays caused stating that SSNP was responsible. Subsequently SSNP had filed an application for interim award of US\$ 30.0 million before the arbitral tribunal which was not allowed. The proceedings are ongoing and the next hearing is scheduled for final arguments of SSNP in November 2016. Management is of the opinion that this claim is not valid under the terms of the contract with SSNP and it is remote that SSNP can legally sustain the claim and accordingly, no provision is considered necessary.

# Ravva Joint Venture arbitration proceedings: Base Development Cost

In case of Cairn, Ravva joint venture had received a claim from the Ministry of Petroleum and Natural Gas, Government of India (GOI) for the period from 2000-2005 for US\$ 129.0 million for an alleged underpayment of profit petroleum to the Indian Government, out of which, Group's share will be US\$ 29.0 million plus potential interest at applicable rate (LIBOR plus 2% as per PSC). This claim relates to the Indian Government's allegation that the Ravva JV had recovered costs in excess of the Base Development Costs ("BDC") cap imposed in the PSC and that the Ravva JV had also allowed these excess costs in the calculation of the Post Tax Rate of Return (PTRR). Joint venture partners initiated the arbitration proceedings and Arbitration Tribunal published the Award on 18 January 2011 at Kuala Lumpur, allowing Claimants (including the Group) to recover the development costs spent to the tune of US\$ 278.0 million and disallowed over run of US\$ 22.3 million spent in respect of BDC along with 50% legal costs reimbursable to the Joint venture partners. High Court of Kuala Lumpur dismissed Government of India's (GOI) application of setting aside the part of the Award on 30 August 2012 with costs. However, GOI appealed before the Court of Appeal against the High Court's order and the Court of Appeal dismissed the GOI's appeal on 27 June 2014. However, GOI still preferred to challenge the same before the Federal Court, Kuala Lumpur and their Leave to Appeal has been dismissed exhausting GOIs legal remedies to challenge the Award granted in our favor. GOI has also issued Show Cause Notice on this matter which Cairn has replied to and also filed an application for enforcement of Award before Delhi High Court as an abundant caution.

Furthermore, GOI is yet to agree on quantum of arbitration costs and expenses (legal fee & expenses) for reimbursing to Cairn as per the award. Therefore, Cairn has approached the Tribunal to quantify the costs. The GOI obtained an ex-parte stay order from Honourable High Court of Delhi, on 14 August 2015, against the Tribunal proceedings on quantum of arbitration costs on the grounds of Tribunal being functus officio. Cairn's appeal before the Honourable High Court of Delhi against the aforesaid 'stay order' granted by the Honourable High Court of Delhi against the Tribunal proceedings on determination of costs has been allowed and subsequently challenged by GOI by way of a Special Leave Petition before the Supreme Court. The matter is due for hearing on 11 January 2017.

# Ravva Joint Venture arbitration proceedings: ONCG Carry

Cairn is involved in a dispute against GOI relating to the recovery of contractual costs in terms of calculation of payments that contractor party were required to make in connection with the Ravva field.

The Ravva production sharing contract obliges the contractor party to pay proportionate share of ONGC's exploration, development, production and contract costs in consideration for ONGC's payment of costs related to construction and other activities it conducted in Ravva prior to the effective date of the Ravva production sharing contract (the "ONGC Carry"). The

question as to how the ONGC Carry is to be recovered and calculated, along with other issues, was submitted to an international arbitration Tribunal in August 2002 which rendered a decision on the ONGC Carry in favor of the contractor party whereas four other issues were decided in favor of GOI in October 2004 ("Partial Award").

The GOI then proceeded to challenge the ONGC Carry decision before the Malaysian courts, as Kuala Lumpur was the seat of the arbitration. The Federal Court of Malaysia which adjudicated the matter on 11 October 2011, upheld the partial award. Per the decision of the Arbitral Tribunal in the partial award, the contractor party and GOI were required to arrive at a quantification of the sums relatable to each of the issues under the Partial Award. Also, the arbitral Tribunal retained the jurisdiction for determination of any remaining issues in the matter.

Pursuant to the decision of the Federal Court, the contractor party approached the Ministry of Petroleum and Natural Gas ("MoPNG") to implement the partial award while reconciling the statement of accounts as outlined in partial award in 2004. GOI failed to implement the partial award by way of reconciling accounts as provided in the partial award ever since the Federal Court of Malaysia adjudicated in Cairn and other joint operator partners' favor.

However, the MoPNG on 10 July 2014 proceeded to issue a show cause notice alleging that since the partial award has not been enforced profit petroleum share of GOI has been short-paid. MoPNG threatened to recover that amount from the sale proceeds payable by the oil marketing companies to the contractor party. The contractor party replied to the show cause notice taking various legal contentions. On 9 March 2015 personal hearing took place between MoPNG and contractor party whereby, the contractor party expressed their concerns against such alleged unilateral recoveries and filed further written submissions on 12 March 2015.

As the partial award did not quantify the sums, therefore, contractor party approached the same Arbitral Tribunal to pass a final award in the subject matter since it had retained the jurisdiction to do so. The final award was passed by the tribunal on 26 October 2016, upholding that no further amounts are due from the claimants. With respect to arbitration costs, the award specifies that each party should bear costs equally.

GOI has the right to challenge the final award and may also challenge its enforcement. While Cairn does not believe so, however if GOI is finally successful in its challenge, Cairn could be liable for approximately US\$63.9 million and interest.

# Proceedings related to the Imposition of Entry Tax

BALCO and Vedanta Limited have challenged the constitutional validity of the local statute in Chattisgarh and Orissa respectively, levying entry tax on the entry of goods brought into the States from outside and other notifications, as being in violation of certain provisions of the Indian Constitution. The challenges were heard by a nine judge bench of the Supreme Court and the orders have been reserved. BALCO paid the entry tax of US\$ 30.6 million under protest to the state government of Chhattisgarh until 31 March 2015. Vedanta Limited was directed by Supreme Court on 3 February 2010 to deposit a sum of US\$ 0.6 million and a further amount on a monthly basis until the matter is actually disposed. These amounts have been paid under protest. In a related matter in respect of challenging the levy of entry tax on imported goods, the Supreme Court on 9 April 2013 directed 50% of the entry tax amount accrued until 30 September 2012 to be deposited. The amount of US\$21.0 million (as on 31 March 2015) has been deposited in accordance with the order of the Supreme Court. Total claims from Vedanta Limited are of US\$112.5 million (31 March 2016: US\$103.3 million).

Additionally, for entry tax in SEZ, GOO has finally come out with SEZ policy 2015 exempting entry tax levy on SEZ operations which were recently notified on December 2015. We have applied for the issuance of eligibility certificate to IPICOL for availing entry tax exemption; however operational guideline is pending to be issued by the industry department. The

declaration of SEZ policy being a recent development after the filing of petition before court, hence Vedanta is trying to bring out the same before the Court by filing an affidavit separately for appreciation of court in the coming hearing.

#### **TSPL**

TSPL has entered into a long term Power Purchase Agreement (PPA) with Punjab State Power Corporation Limited (PSPCL) for supply of power. Due to delay in fulfilment of certain obligations by PSPCL as per the PPA, other related reasons and force majeure events, there has been a delay in implementation / completion of the project as compared to the PPA timelines. TSPL has received notices of claims from PSPCL seeking payment of Liquidated Damages (LD) maximum of US\$47.6 million each for delay in commissioning of Unit I, II and III totalling to US\$142.9 million.

Subsequently, PSPCL invoked the Performance Bank Guarantee of US\$24.1 million to recover the LD on account of delay in COD of 1st Unit. TSPL filed a petition at Punjab State Electricity Regulatory Commission (PSERC) for adjudication of above dispute. TSPL had also filed a civil writ petition before the High Court of Punjab and Haryana against the bank guarantee invocation, which was disposed with a direction to refer the matter to PSERC for adjudication while granting stay. Further, PSERC vide order dated 22 October 2014 directed the matter to be settled through arbitration and allowed the stay on encashment of the bank guarantee until further orders. PSPCL has preferred an appeal in Appellate Tribunal for Electricity (APTEL) against the PSERC order and APTEL had on 12 May 2015, disposed the matter with a direction that the matter will be heard by way of arbitration. The arbitration proceedings are under way and the arguments will commence in January 2017. The Group has been legally advised by its advisors who have opined that such claims for LD from PSPCL are unsustainable. Recently, Appellate Tribunal for Electricity has, in a separate petition, before it by TSPL has adjudicated that coal is an absolute obligation of PSPCL and it needs to enter into a Fuel Supply Agreement and assign to TSPL. In light of the delay by PSPCL in entering into the Fuel Supply Agreement, the claims of PSPCL are further unsustainable.

# HZL: Department of Mines and Geology

The Department of Mines and Geology of the State of Rajasthan issued several show cause notices in August, September and October 2006 to HZL, totalling US\$50.1 million. These notices alleged unlawful occupation and unauthorised mining of associated minerals other than zinc and lead at HZL's Rampura Agucha, Rajpura Dariba and Zawar mines in Rajasthan during the period from July 1968 to March 2006. HZL believes that the likelihood of this claim becoming an obligation of the Group is not probable and thus no provision has been made in the financial statements. HZL had filed writ petitions in the High Court of Rajasthan in Jodhpur and had obtained a stay in respect of these demands. The High Court restrained the Department of Mines and Geology from undertaking any coercive measures to recover the penalty. In January 2007, the High Court issued another order granting the Department of Mines and Geology additional time to file their reply and also ordered the Department of Mines and Geology not to issue any orders cancelling the lease. The next date of hearing has not yet been fixed.

# Cairn- South Africa Block

As part of the farm-in agreement for Block 1, the Group is required to carry PetroSA up to a gross expenditure of US\$100.0 million for a work program including 3D and 2D seismic and at least one exploration well. At the balance sheet date, US\$37.0 million has been spent on exploration expenditure and a US\$63.0 million carry (including drilling one well) remains. The Mineral and Petroleum Resources Development Bill has proposed several changes to the fiscal terms of contracts for companies currently operating in South Africa and for new exploration contracts which are currently under revision. In light of the given uncertainty, the management believes, which is also supported by legal advice, that it is possible but not probable that the

liability of US\$63.0 million could be payable by the Group and accordingly no provision has been recognised in respect of the same in these financial statements.

# Cairn- Tax Holiday

In case of Cairn, Section 80-IB (9) of the Income Tax Act, 1961 allows the deduction of 100% of profits from the commercial production or refining of mineral oil. The term 'mineral oil' is not defined but has always been understood to refer to both oil and gas, either separately or collectively. The 2008 Indian Finance Bill appeared to remove this deduction by stating [without amending section 80-IB (9)] that "for the purpose of section 80-IB (9), the term 'mineral oil' does not include petroleum and natural gas, unlike in other sections of the Act". Subsequent announcements by the Finance Minister and the Ministry of Petroleum and Natural Gas have confirmed that tax holiday would be available on production of crude oil but have continued to exclude gas. Cairn filed a writ petition to the Gujarat High Court in December 2008 challenging the restriction of section 80-IB to the production of oil. Gujarat High Court did not admit the writ petition on the ground that the matter needs to be first decided by lower tax authorities. A Special Leave Petition has been filed before Supreme Court against the decision of Gujarat High court. However, in a similar case, the Gujarat High Court has held that tax holiday benefit would extend to production of gas. In the event this challenge is unsuccessful, the potential tax liability and related interest on tax holiday claimed on gas is approximately US\$48.3 million.

#### 12. Financial instruments

The accounting classification of each category of financial instruments, and their carrying amounts, are set out below

_			(US\$ million)
	As at	As at	As at
	30 September 2016	30 September 2015	31 March 2016
Financial assets <sup>(1)</sup>	-		
At fair value through profit or loss			
- Held for trading	7,055.5	7,450.1	7,977.9
At fair value through profit or loss /			
designated for hedging			
- Financial instruments (derivatives)	3.0	15.0	19.1
Cash and cash equivalents	372.4	382.3	428.3
Loan and receivables			
- Bank deposits	739.4	1,084.3	530.3
- Trade and other receivables	1,008.0	1,087.9	854.7
- Other non-current assets	102.7	72.7	69.2
Available-for-sale investments			
- Financial asset investments held at fair value	7.1	6.4	6.5
Total	9,288.1	10,098.7	9,886.0
Financial liabilities <sup>(1)</sup>			
At fair value through profit or loss /			
designated for hedging			
- Financial instruments (derivatives)	(57.1)	(28.7)	(68.9)
Financial liabilities at amortised cost			
- Trade and other payables	(4,352.1)	(4,914.3)	(4,921.6)
- Borrowings <sup>(2)</sup>	(16,333.3)	(16,450.9)	(16,263.3)
Total	(20,742.5)	(21,393.9)	(21,253.8)

<sup>(1)</sup> Non-financial assets and liabilities have been excluded from the above disclosures

IFRS 13 requires additional information regarding the methodologies employed to measure the fair value of financial instruments which are recognised or disclosed in the accounts. These methodologies are categorised per the standard as:

<sup>(2)</sup> Includes amortised cost liability portion of convertible bonds US\$7.7 million (31 March 2016: US\$587.2 million, 30 September 2015: US\$1,117.3 million)

(28.7)

Level 1 fair value measurements are those derived from quoted prices (unadjusted) in active markets for identical assets or liabilities.

Level 2 fair value measurements are those derived from inputs other than quoted prices that are observable for the asset or liability, either directly (i.e. as prices) or indirectly (i.e. derived from prices); and

Level 3 fair value measurements are those derived from valuation techniques that include inputs for the asset or liability that are not based on observable market data (unobservable inputs).

The below table summarises the categories of financial assets and liabilities measured at fair value:

		(US\$ million)
		As at
		30 September 2016
	Level 1	Level 2
Financial assets		
At fair value through profit or loss		
- Held for trading investments	2,571.1	4,484.4
- Financial instruments (derivatives)	-	3.0
Available-for-sale investments		
- Financial asset investments held at fair value	7.1	-
Total	2,578.2	4,487.4
Financial liabilities		
At fair value through profit or loss / designated for hedging		
- Financial instruments (derivatives)	-	(57.1)
Total	-	(57.1)
		(US\$ million)
		As at
		30 September 2015
	Level 1	Level 2
Financial assets		
At fair value through profit or loss		
- Held for trading investments	3,249.4	4,200.7
- Financial instruments (derivatives)	-	15.0
Available-for-sale investments		
- Financial asset investments held at fair value	6.4	-
Total	3,255.8	4,215.7
Financial liabilities		
At fair value through profit or loss / designated for hedging		
- Financial instruments (derivatives)	-	(28.7)

		(US\$ million)
		As at
		31 March 2016
	Level 1	Level 2
Financial assets		
At fair value through profit or loss		
- Held for trading investments	3,473.7	4,504.2
- Financial instruments (derivatives)	-	19.1
Available-for-sale investments		
- Financial asset investments held at fair value	6.5	-
Total	3,480.2	4,523.3

#### Financial liabilities

Total

At fair value through profit or loss / designated for hedging

- Financial instruments (derivatives)	-	(68.9)
Total	-	(68.9)

Short-term marketable securities traded in active markets are determined by reference to quotes from the financial institutions; for example: Net asset value (NAV) for investments in mutual funds declared by mutual fund house. For other listed securities traded in markets which are not active, the quoted price is used wherever the pricing mechanism is same as for other marketable securities traded in active markets. Other short term marketable securities are valued on the basis of market trades, poll and primary issuances for securities issued by the same or similar issuer and for similar maturities or based on the applicable spread movement for the security derived based on the aforementioned factor(s).

No financial assets or liabilities that are measured at fair value were Level 3 fair value measurements.

The fair value of borrowings as on 30 September 2016 was US\$16,336.7 million (31 March 2016: US\$15,118.2 million, 30 September 2015: US\$16,384.7 million), classified under Level 2 of fair value hierarchy. Fair value of long-term fixed-rate and variable-rate borrowings have been determined by the Group based on parameters such as interest rates, specific country risk factors, and the risk characteristics of the financed project. Listed bonds are fair valued based on the prevailing market price. For all other long-term fixed-rate and variable-rate borrowings, either the carrying amount approximates the fair value, or fair value have been estimated by discounting the expected future cash flows using a discount rate equivalent to the risk free rate of return adjusted for the appropriate credit spread. For all other financial instruments, the carrying amount is either the fair value, or approximates the fair value.

The fair value of financial asset investments represents the market value of the quoted investments and other traded instruments. For other financials assets the carrying value is considered to approximate fair value.

The fair value of financial liabilities is the market value of the traded instruments, where applicable. Otherwise fair value is calculated using a discounted cash flow model with market assumptions, unless the carrying value is considered to approximate fair value.

The Group has no financial instruments with fair values that are determined by reference to significant unobservable inputs.

# 13. Share Transactions

#### Call options

### a. HZL

Pursuant to the Government of India's policy of divestment, the Company in April 2002 acquired 26% equity interest in HZL from the Government of India. Under the terms of the Shareholder's Agreement ('SHA'), the Group had two call options to purchase all of the Government of India's shares in HZL at fair market value. The Group exercised the first call option on 29 August 2003 and acquired an additional 18.9% of HZL's issued share capital. The Company also acquired an additional 20% of the equity capital in HZL through an open offer, increasing its shareholding to 64.9%. The second call option provides the Group the right to acquire the Government of India's remaining 29.5% share in HZL. This call option is subject to the right of the Government of India to sell 3.5% of HZL shares to HZL employees. The Group exercised the second call option on 21 July 2009. The Government of India disputed the validity of the call option and has refused to act upon the second call option. Consequently the Company invoked arbitration which is in the early stages. The next date of hearing is scheduled for 25 February 2017. Meanwhile, the Government of India without prejudice to the position on

the Put / Call option issue has received approval from the Cabinet for divestment and the Government is looking to divest through the auction route.

# b. BALCO

Pursuant to the Government of India's policy of divestment, the Company in March 2001 acquired 51% equity interest in BALCO from the Government of India. Under the terms of the SHA, the Group has a call option to purchase the Government of India's remaining ownership interest in BALCO at any point from 2 March 2004. The Group exercised this option on 19 March 2004. However, the Government of India has contested the valuation and validity of the option and contended that the clauses of the SHA violate the (Indian) Companies Act, 1956 by restricting the rights of the Government of India to transfer its shares and that as a result such provisions of the SHA were null and void. In the arbitration filed by the Group, the arbitral tribunal by a majority award rejected the claims of the Group on the grounds that the clauses relating to the call option, the right of first refusal, the "tag-along" rights and the restriction on the transfer of shares violate the (Indian) Companies Act, 1956 and are not enforceable. The Group has challenged the validity of the majority award in the High Court of Delhi and sought for setting aside the arbitration award to the extent that it holds these clauses ineffective and inoperative. The Government of India also filed an application before the High Court of Delhi to partially set aside the arbitral award in respect of certain matters involving valuation. The matter is currently scheduled for hearing by the Delhi High Court on 10 July 2017. Meanwhile, the Government of India without prejudice to its position on the Put / Call option issue has received approval from the Cabinet for divestment and the Government is looking to divest through the auction route.

In view of the lack of resolution on the options, the non-response to the exercise and valuation request from the Government of India, the resultant uncertainty surrounding the potential transaction and the valuation of the consideration payable, the Group considers the strike price of the options to be at fair value, which is effectively nil, and hence the call options have not been recognised in the financial statements.

### 14. Related party transactions

The information below sets out transactions and balances between the Group and various related parties in the normal course of business for the period ended 30 September 2016.

# Sterlite Technologies Limited ('STL')

			(US\$ million)
	Six months ended 30 September 2016	Six months ended 30 September 2015	Year ended 31 March 2016
Sales to STL	41.1	79.9	140.4
Recovery of expenses	-	0.2	0.2
Purchases	1.5	0.4	1.1
Net interest received	0.2	0.1	0.2
Net amounts receivable at period / year end	0.0	-	0.2
Net amounts payable at period / year end	1.5	0.2	1.4
Dividend income	0.1	-	0.0
Investment in equity Share	5.5	6.4	6.5

Sterlite Technologies Limited is related by virtue of having the same controlling party as the Group, namely Volcan.

# Sterlite Power Transmission limited ('SPTL').

(US\$ million)

	Six months ended 30 September 16	Six months ended 30 September 15	Year ended 31 March 2016
Sales to STL	28.6	-	-
Purchases	0.4	-	-
Net Interest Received	0.0	-	-
Net amounts receivable at year end	0.9	-	-
Investment in equity Share	1.6	-	-

Sterlite Power Transmission limited ('SPTL') is related by virtue of having the same controlling party as the Group, namely Volcan.

# Volcan Investments Limited ("Volcan")

(US\$ million)

	Six months ended 30 September 2016	Six months ended 30 September 2015	Year ended 31 March 2016
Dividend paid	56.2	75.0	75.0
Net amount receivable at the period / year end	0.3	0.0	0.2
Recovery of expenses	0.1	0.1	0.3
Guarantees given	17.3	17.5	17.3

Volcan is a related party of the Group by virtue of being an ultimate controlling party of the Group.

# 15. Share capital

Share capital as at 30 September 2016 amounted to US\$30.1 million. During the Six months ended 30 September 2016, the Company issued 632,539 shares to the employees pursuant to the LTIP scheme and Employee Share Option Plan. As a result of the shares issued, the number of Ordinary shares in issue has increased from 300,522,798 shares as on 31 March 2016 to 301,155,337 shares as on 30 September 2016.

# 16. Cairn merger update

On 22 July 2016, Vedanta Limited and Cairn India Limited revised the terms of the proposed merger between Vedanta Limited and Cairn India Limited which was initially announced on 14 June 2015. As per the revised terms, upon the merger becoming effective, non-controlling i.e. public shareholders of Cairn India will receive for each equity share held, one equity share in Vedanta Limited of face value INR 1 each and four 7.5% Redeemable Preference Shares in Vedanta Limited with a face value of INR 10 each. No shares will be issued to Vedanta Limited or any of its subsidiaries for their shareholding in Cairn India Limited. NSE and BSE have provided their 'No Objection' to the proposed merger and shareholders of Vedanta Limited, Cairn India Limited, and Vedanta Resources Plc and the secured and unsecured creditors of Vedanta Limited have approved the Scheme with requisite majority. The Scheme is now subject to the approval of the jurisdictional High Courts and other regulatory approvals.

# 17. Subsequent events

Subsequent to the balance sheet date of 30 September 2016, there are no significant events to report.

#### INDEPENDENT REVIEW REPORT TO VEDANTA RESOURCES PLC

#### Introduction

We have been engaged by the Company to review the condensed set of financial statements in the interim results report for the six months ended 30 September 2016 which comprises the condensed consolidated income statement, the condensed consolidated statement of comprehensive income, the condensed consolidated statement of financial position, the condensed consolidated statement of cash flows, the condensed consolidated statement of changes in equity and the related notes 1 to 17. We have read the other information contained in the interim results report and considered whether it contains any apparent misstatements or material inconsistencies with the information in the condensed set of financial statements.

This report is made solely to the Company in accordance with guidance contained in International Standard on Review Engagements 2410 (UK and Ireland) "Review of Interim Financial Information Performed by the Independent Auditor of the Entity" issued by the Auditing Practices Board. To the fullest extent permitted by law, we do not accept or assume responsibility to anyone other than the Company, for our work, for this report, or for the conclusions we have formed.

# **Directors' Responsibilities**

The interim results report is the responsibility of, and has been approved by, the directors. The directors are responsible for preparing the interim results report in accordance with the Disclosure and Transparency Rules of the United Kingdom's Financial Conduct Authority.

As disclosed in note 1, the annual financial statements of the group are prepared in accordance with International Financial Reporting Standards (IFRSs) as adopted by the European Union. The condensed set of financial statements included in this interim results report has been prepared in accordance with International Accounting Standard 34, "Interim Financial Reporting", as adopted by the European Union.

# **Our Responsibility**

Our responsibility is to express to the Company a conclusion on the condensed set of financial statements in the interim results report based on our review.

# Scope of Review

We conducted our review in accordance with International Standard on Review Engagements (UK and Ireland) 2410, "Review of Interim Financial Information Performed by the Independent Auditor of the Entity" issued by the Auditing Practices Board for use in the United Kingdom. A review of interim financial information consists of making enquiries, primarily of persons responsible for financial and accounting matters, and applying analytical and other review procedures. A review is substantially less in scope than an audit conducted in accordance with International Standards on Auditing (UK and Ireland) and consequently does not enable us to obtain assurance that we would become aware of all significant matters that might be identified in an audit. Accordingly, we do not express an audit opinion.

#### Conclusion

Based on our review, nothing has come to our attention that causes us to believe that the condensed set of financial statements in the interim results report for the six months ended 30 September 2016 is not prepared, in all material respects, in accordance with International Accounting Standard 34 as adopted by the European Union and the Disclosure and Transparency Rules of the United Kingdom's Financial Conduct Authority.

Ernst & Young LLP London 9 November 2016

# Independent Auditor's Report To the Members of Vedanta Resources plc

#### Opinion on financial statements of Vedanta Resources plc

In our opinion:

- the financial statements give a true and fair view of the state of the group's and of the parent company's affairs as at 31 March 2016 and of the group's loss for the year then ended;
- the group financial statements have been properly prepared in accordance with International Financial Reporting Standards (IFRSs)
  as adopted by the European Union;
- the parent company financial statements have been properly prepared in accordance with United Kingdom Generally Accepted Accounting Practice including FRS 101 "Reduced Disclosure Framework"; and
- the financial statements have been prepared in accordance with the requirements of the Companies Act 2006 and, as regards the group financial statements, Article 4 of the IAS Regulation.

The financial statements comprise the Consolidated Income Statement, the Consolidated Statement of Comprehensive Income, the Consolidated and Parent Company Balance Sheets, the Consolidated Cash Flow Statement, the Consolidated Statement of Changes in Equity, and the related notes 1 to 59. The financial reporting framework that has been applied in the preparation of the group financial statements is applicable law and IFRSs as adopted by the European Union. The financial reporting framework that has been applied in the preparation of the parent company financial statements is applicable law and United Kingdom Accounting Standards (United Kingdom Generally Accepted Accounting Practice) including FRS 101 "Reduced Disclosure Framework".

Going concern and the directors' assessment of the principal risks that would threaten the solvency or liquidity of the group As required by the Listing Rules we have reviewed the directors' statement regarding the appropriateness of the going concern basis of accounting contained within note 1 to the financial statements and the directors' statement on the longer-term viability of the group contained within the strategic report on page 53.

We have nothing material to add or draw attention to in relation to:

- the directors confirmation on pages 133 to 134 that they have carried out a robust assessment of the principal risks facing the group, including those that would threaten its business model, future performance, solvency or liquidity:
- the disclosures on pages 28 to 35 that describe those risks and explain how they are being managed or mitigated;
- the directors' statement in note 1 to the financial statements about whether they considered it appropriate to adopt the going concern
  basis of accounting in preparing them and their identification of any material uncertainties to the group's ability to continue to do so
  over a period of at least twelve months from the date of approval of the financial statements;
- the directors' explanation on page 133 as to how they have assessed the prospects of the group, over what period they have done so and why they consider that period to be appropriate, and their statement as to whether they have a reasonable expectation that the group will be able to continue in operation and meet its liabilities as they fall due over the period of their assessment, including any related disclosures drawing attention to any necessary qualifications or assumptions.

We agreed with the directors' adoption of the going concern basis of accounting and we did not identify any such material uncertainties. However, because not all future events or conditions can be predicted, this statement is not a guarantee as to the group's ability to continue as a going concern.

#### Independence

We are required to comply with the Financial Reporting Council's Ethical Standards for Auditors and we confirm that we are independent of the group and we have fulfilled our other ethical responsibilities in accordance with those standards. We also confirm we have not provided any of the prohibited non-audit services referred to in those standards.

#### Our assessment of risks of material misstatement

The assessed risks of material misstatement described below are those that had the greatest effect on our audit strategy, the allocation of resources in the audit and directing the efforts of the engagement team.

The risks identified below are the same risks as in the prior year.

Risk

How the scope of our audit responded to the risk

Impairment of property, plant and equipment (PP&E) assets. The group has recognised PP&E assets with a net book value of US\$16,647.8 million at 31 March 2016 after recording impairments of US\$5,187.0 million in 2016, principally in relation to Cairn of which US\$4,018.3 million relates to E&E assets (discussed further below) and US\$1,168.7 million to other PP&E.

The assessment of the recoverable amount of PP&E requires management to exercise judgement around complex areas, as described in the group's critical accounting judgements in note 1 to the financial statements, specifically:

- the Rajasthan producing assets within the Oil & Gas business following a significant decrease in oil prices;
- the partially complete Lanjigarh expansionary programme within the Aluminium business unit received certain clearances in the year, however remained on hold during the year due to the challenges in obtaining locally-sourced bauxite:
- the operations in Goa and Karnataka within the Iron Ore business unit as a result of lower iron ore prices and statewide production caps in place; and
- the KCM operations in Zambia following lower copper prices and continuing operational challenges, including significantly higher electricity prices.

For more information see notes 2b, 5 and 17 in the financial statements that provide further details and disclosures to this matter.

#### We have:

- Obtained and assessed the inputs into management's assessment as to whether indicators of impairment exist specifically, in relation to the Rajasthan producing assets, the Lanjigarh expansionary project, the Iron Ore operations in Goa and Karnataka and the KCM copper operations in Zambia;
- obtained and assessed the valuation models used to determine the higher of value in use or fair value less cost of disposal of the relevant asset by challenging the key assumptions made by management in relation to these models, including:
  - the expected timings of approvals and renewal of licenses, holding discussions with management, reviewing regulatory approvals and reviewing any correspondence relating to potential changes in the economic terms;
  - source of reserve and production estimates;
  - · resources to reserves conversion ratios where applicable;
  - exchange rates; and
- operating and capital expenditure estimates by reference to independent third party evidence and consultation with operational management;
- benchmarking and analysis of commodity, oil & gas price assumptions against forward curves and analyst data;
- recalculated and benchmarked discount rates applied to third party evidence and involvement of Deloitte valuation specialists;
- testing the mechanical accuracy of the models used; and
- assessed whether assumptions had been determined and applied on a consistent basis across the Group.

#### Impairment of evaluation and exploration (E&E) assets

Following significant downward pressure on oil, gas and other commodity prices, which are a key assumption in the valuation of the recoverable value of E&E assets, impairment of E&E assets has been a specific area of focus for the FY16 audit.

The net book value of E&E assets at 31 March 2016 is US\$1,471.4 million after the group has written off E&E assets totalling US\$4,018.3 million in the year, following the low commodity pricing environment and reassessment of capital allocation priorities. US\$1,180.0 million of net book value relates to the Rajasthan oil field which is accounted for as one Cash Generating Unit.

The assessment of the carrying value of E&E assets requires management to exercise judgement around complex areas, as described in the group's critical accounting judgements in note 1 to the financial statements. Economic value can often be difficult to determine given the relatively early stages of development. The areas of judgement include the group's intention to proceed with a future work programme for a prospect or license, the likelihood of license renewal or extension and the success of drilling and geological analysis.

For more information see notes 2b, 5 and 17 in the financial statements that provide further details and disclosures to this matter.

We evaluated management's assessment of the impairment indicators on its E&E assets with reference to the criteria of IFRS 6 Exploration for and Evaluation of Mineral Resources and the group's successful efforts accounting policy (see page 158). In 2016, the group has reconsidered its exploration strategy and locations for future exploration focus in the context of a lower oil and commodity price environment and the availability of capital in these circumstances.

Our procedures included understanding the Group's ongoing E&E activity, by participating in meetings with operational and finance management at all key locations and obtaining evidence including reviewing minutes of board and executive committee meetings, confirmations of budget allocation, the results of on-going appraisal activity and the licensing status to assess E&E assets.

Where indicators of impairment were identified, we determined whether management provided in full for the projects that are not expected to proceed or valuations were performed where the projects are progressing but the carrying value may not be fully recoverable.

Where valuations were prepared, we challenged the key assumptions using the same approach as described under the impairment of PPE assets above.

#### Revenue recognition

IAS 18 Revenue and the Group's revenue recognition policy permits revenue to be recognised only when the significant risks and rewards of ownership have transferred from the seller to the buyer.

The risk is related to:

- the determination of the point of risk and reward transfer, particularly where this is different to the point of invoicing;
- incorrect valuation of provisionally priced sales (where the pricing is only finalised based on market prices subsequent to the balance sheet date);
- the value of regulated sales, and the resulting year-end

We have reviewed the application of the Group's revenue recognition policy and:

- on a sample basis, reviewed the terms of sales agreements to conclude on the point at which risk and reward transfer takes place;
- selected sales made pre and post year end, agreeing the date
  of revenue recognition to third party support, such as bills of
  lading, to confirm they have been recognised in the correct
  period:
- recalculated the value of provisional pricing adjustments and validating the assumptions used to third party data where possible:

- receivable of US\$98 million, made to the Grid Corporation of Odisha Limited ("Gridco") where a dispute regarding the interpretation of the tariff agreement is pending appellate tribunal resolution; and
- the calculation of Cairn's oil & gas sales on an entitlement basis.

For more information see notes 2a and 4 in the financial statements that provide further details and disclosures to this matter

- challenged management in respect of whether the Gridco trade receivables are recoverable through the review of state regulatory commission and the appellate tribunal rulings, and review of the underlying power purchase agreements, receipts in the year and the external legal opinions received; and
- reviewed the terms of Cairn's profit sharing agreements and tested
  the underlying cost recovery and profit petroleum calculations.
  This included reviewing the ageing of current unapproved costs
  and through sample testing ensuring that costs were in
  accordance with pre-approved Operational Committee work
  orders and prepared in accordance with requisite approval
  requirements.

#### Litigation, environmental and regulatory risk

As is the norm in extractive industries, there are a significant number of legal claims in the Group and a risk exists that the Group may not have adequately provided for liabilities or disclosed contingent liabilities. The Group has recognised provisions of US\$97 million and disclosed contingent liabilities of US\$889 million in respect of ongoing legal matters. There is also a risk of the Group's reputation being brought into disrepute resulting in financial and reputational damage.

The Group continues to be involved in a high number of legal claims. It is not unusual for claims to remain outstanding for a number of years, with the regulatory environment becoming increasingly complex and regulators focusing on the environmental and social impacts. These ongoing claims, environmental and regulatory enquiries require management to exercise judgement in determining the need for a provision or disclosure. These can give rise to a threat to the future operations as well as the Group's current financial performance and reputation.

For more information see notes 30, 38 and 42 in the financial statements that provide further details and disclosures to these matters.

#### We have:

- reviewed management's legal paper and challenged their assessment of the probability of success in these cases, the magnitude of any potential loss and their conclusions reached through discussions with the head of legal and operational management;
- inspected external legal opinions (where considered necessary) and other evidence that supports factual information in management's responses;
- focused our procedures on the terms and conditions of mining licenses and performed procedures to gain assurance over the compliance and validity of significant mining licenses and environmental clearances;
- we have assessed the appropriateness of provisions and considered the impact of the procedures performed above on the financial statements and whether the disclosures therein are in accordance with IAS 37 Provisions, contingent liabilities and contingent assets.

#### Taxation

There is a risk that the Group's aggregated taxation exposure in all jurisdictions, including the exposure to withholding taxes following past acquisitions, financing and transfer pricing arrangements, sales taxes and recognition of deferred taxation assets and liabilities, may not have been adequately valued and disclosed in the financial statements due to the complexities, timescales for resolution and the need to negotiate with various tax authorities.

In the prior year, Cairn India received an order from the Indian Tax Authority for an amount of US\$3,277.4 million relating to withholding taxes not paid on the acquisition of Cairn India by the previous owner, Cairn Energy plc.

At 31 March 2016, US\$620.2 million has been recognised as a deferred taxation liability, US\$1,255.4 million has been recognised as a deferred taxation asset and US\$18.5 million has been recognised as a net current tax receivable and a US\$361.7 million non-current tax receivable, with a total tax credit of US\$1,481.9 million recorded in the consolidated income statement.

For more information see notes 12, 31 and 38 in the financial statements that provide further details and disclosures to these matters.

We reviewed the potential taxation exposures within the Group and, through discussions with the Group's taxation department, the tax specialists within the audit team and review of relevant documentation, including external legal advice and correspondence with tax authorities, we evaluated the appropriateness of the provisions raised and contingent liability disclosures. We have obtained the forecast utilisation of deferred tax assets, which have been recognised as part of deferred tax, on a legal entity basis and independently assessed whether the forecasts support the recognition of these assets.

We considered, in the context of our tax specialists' prior experience of similar issues, the Group's exposure to withholding taxes following past acquisitions, the current tax exposure following the Group's internal restructuring, transfer pricing arrangements and deferred taxation assets and liabilities recognised to assess whether these matters were appropriately reflected and disclosed in the financial statements. We have reviewed the tax disclosures with reference to IAS 12 *Income Taxes* 

The description of risks above should be read in conjunction with the significant issues considered by the Audit Committee discussed on pages 108 to 109.

These matters were addressed in the context of our audit of the financial statements as a whole, and in forming our opinion thereon, and we do not provide a separate opinion on these matters.

#### Our application of materiality

We define materiality as the magnitude of misstatement in the financial statements that makes it probable that the economic decisions of a reasonably knowledgeable person would be changed or influenced. We use materiality both in planning the scope of our audit work and in evaluating the results of our work.

We determined materiality for the group to be US\$40 million (2015: US\$50 million), which is approximately 5% of normalised three year profit before tax (2015: 5% of normalised profit before tax), and below 1% (2015: 1%) of equity. The use of a normalised three year profit before tax is a change to our approach last year, when materiality was based on the normalised 2015 profit before tax only. This change of approach was determined to be appropriate given the current volatility in commodity prices and their impact on the current year performance and the cyclical nature of the mining industry. Profit before tax has been normalised by adjusting for specific one-off items: the impairment charges recognised on the PP&E and E&E assets during the year following a significant decrease in commodity and oil & gas prices. Normalised profit before tax is considered a more appropriate and less volatile measure reflecting the underlying scale of the Group.

We agreed with the Audit Committee that we would report to the Committee all audit differences in excess of US\$800,000 (2015: US\$1.0 million), as well as differences below that threshold that, in our view, warranted reporting on qualitative grounds. We also report to the Audit Committee on disclosure matters that we identified when assessing the overall presentation of the financial statements.

#### An overview of the scope of our audit

Our group audit was scoped by obtaining an understanding of the group and its environment, including group-wide controls, and assessing the risks of material misstatement at the group level. Based on that assessment, we focused our group audit scope primarily on the audit work at 17 locations (2015: 16 locations). 13 of these were subject to a full audit, whilst the remaining 4 were subject to an audit of specified account balances where the extent of our testing was based on our assessment of the risks of material misstatement and of the materiality of the group's operations at those locations (2015: 12 and 4 respectively). An additional location was scoped in in the current year as a result of the lower materiality.

These 17 locations represent the principal business units and account for 98% (2015: 94%) of the Group's net assets, 96% (2015: 100%) of the Group's revenue and 98% (2015: 91%) of the Group's normalised profit before tax. They were also selected to provide an appropriate basis for undertaking audit work to address the risks of material misstatement identified above. Our audit work at the 17 locations was executed at levels of materiality between US\$18 million and US\$22 million (2015: US\$22.5 million and US\$27.5 million), as applicable to each individual entity.

At the parent entity level we also tested the consolidation process and carried out analytical procedures to confirm our conclusion that there were no significant risks of material misstatement of the aggregated financial information of the remaining components not subject to audit or audit of specified account balances.

The group audit team continued to follow a programme of planned visits that has been designed so that the Senior Statutory Auditor or a senior member of the group audit team visits significant locations where the group audit scope was focused at least once every five years. At each six month reporting date we include the component audit partners and teams in our team briefing, discuss their risk assessment, and review documentation of the findings from their work.

# Opinion on other matters prescribed by the Companies Act 2006

In our opinion:

• the part of the Directors' Remuneration Report to be audited has been properly prepared in accordance with the Companies Act 2006; and the information given in the Strategic Report and the Directors' Report for the financial year for which the financial statements are prepared is consistent with the financial statements.

# Matters on which we are required to report by exception

# Adequacy of explanations received and accounting records

Under the Companies Act 2006 we are required to report to you if, in our opinion:

- we have not received all the information and explanations we require for our audit; or
- adequate accounting records have not been kept by the parent company, or returns adequate for our audit have not been received from branches not visited by us; or
- the parent company financial statements are not in agreement with the accounting records and returns.

We have nothing to report in respect of these matters.

#### Directors' remuneration

Under the Companies Act 2006 we are also required to report if in our opinion certain disclosures of directors' remuneration have not been made or the part of the Directors' Remuneration Report to be audited is not in agreement with the accounting records and returns. We have nothing to report arising from these matters.

#### **Corporate Governance Statement**

Under the Listing Rules we are also required to review the part of the Corporate Governance Statement relating to the company's compliance with certain provisions of the UK Corporate Governance Code. We have nothing to report arising from our review.

# Our duty to read other information in the Annual Report

Under International Standards on Auditing (UK and Ireland), we are required to report to you if, in our opinion, information in the annual report is:

- · materially inconsistent with the information in the audited financial statements; or
- apparently materially incorrect based on, or materially inconsistent with, our knowledge of the group acquired in the course of performing our audit; or
- · otherwise misleading.

In particular, we are required to consider whether we have identified any inconsistencies between our knowledge acquired during the audit and the directors' statement that they consider the annual report is fair, balanced and understandable and whether the annual report appropriately discloses those matters that we communicated to the audit committee which we consider should have been disclosed. We confirm that we have not identified any such inconsistencies or misleading statements.

#### Respective responsibilities of directors and auditor

As explained more fully in the Directors' Responsibilities Statement, the directors are responsible for the preparation of the financial statements and for being satisfied that they give a true and fair view. Our responsibility is to audit and express an opinion on the financial statements in accordance with applicable law and International Standards on Auditing (UK and Ireland). We also comply with International Standard on Quality Control 1 (UK and Ireland). Our audit methodology and tools aim to ensure that our quality control procedures are effective, understood and applied. Our quality controls and systems include our dedicated professional standards review team and independent partner reviews.

This report is made solely to the company's members, as a body, in accordance with Chapter 3 of Part 16 of the Companies Act 2006. Our audit work has been undertaken so that we might state to the company's members those matters we are required to state to them in an auditor's report and for no other purpose. To the fullest extent permitted by law, we do not accept or assume responsibility to anyone other than the company and the company's members as a body, for our audit work, for this report, or for the opinions we have formed.

#### Scope of the audit of the financial statements

An audit involves obtaining evidence about the amounts and disclosures in the financial statements sufficient to give reasonable assurance that the financial statements are free from material misstatement, whether caused by fraud or error. This includes an assessment of: whether the accounting policies are appropriate to the group's and the parent company's circumstances and have been consistently applied and adequately disclosed; the reasonableness of significant accounting estimates made by the directors; and the overall presentation of the financial statements. In addition, we read all the financial and non-financial information in the annual report to identify material inconsistencies with the audited financial statements and to identify any information that is apparently materially incorrect based on, or materially inconsistent with, the knowledge acquired by us in the course of performing the audit. If we become aware of any apparent material misstatements or inconsistencies we consider the implications for our report.

Christopher Thomas (Senior statutory auditor) for and on behalf of Deloitte LLP Chartered Accountants and Statutory Auditor London, United Kingdom 11 May 2016

# **Consolidated Income Statement**

		Year ended 31 March 2016			Year ended 31 March 2015		
(US\$ million except as stated)	Note	Before special items	Special items	Total	Before special items	Special items	Total
Revenue	4	10,737.9	_	10,737.9	12,878.7	_	12,878.7
Cost of sales		(9,241.1)	_	(9,241.1)	(10,463.9)	-	(10,463.9)
Gross profit		1,496.8	_	1,496.8	2,414.8	_	2,414.8
Other operating income		101.7	_	101.7	104.0	_	104.0
Distribution costs		(223.8)	_	(223.8)	(245.2)	_	(245.2)
Administrative expenses		(493.5)	_	(493.5)	(538.1)	_	(538.1)
Special items	5	_	(5,210.1)	(5,210.1)	_	(6,744.2)	(6,744.2)
Operating profit/(loss)		881.2	(5,210.1)	(4,328.9)	1,735.5	(6,744.2)	(5,008.7)
Investment revenue	6	697.8	_	697.8	832.6	_	832.6
Finance costs	7	(1,280.4)	_	(1,280.4)	(1,387.2)	_	(1,387.2)
Other gains and (losses) [net]	8	(72.5)	_	(72.5)	(76.9)	_	(76.9)
Profit/(loss) before taxation (a)		226.1	(5,210.1)	(4,984.0)	1,104.0	(6,744.2)	(5,640.2)
Tax credit – special items	12	_	1,737.4	1,737.4	_	2,205.1	2,205.1
Net tax expense – others	12	(255.5)	_	(255.5)	(352.6)	_	(352.6)
Net tax credit/(expense) (b)	12	(255.5)	1,737.4	1,481.9	(352.6)	2,205.1	1,852.5
(Loss)/profit for the year from continuing operations (a+b)	9	(29.4)	(3,472.7)	(3,502.1)	751.4	(4,539.1)	(3,787.7)
Attributable to:							
Equity holders of the parent		(392.9)	(1,444.5)	(1,837.4)	(74.7)	(1,723.9)	(1,798.6)
Non-controlling interests		363.5	(2,028.2)	(1,664.7)	826.1	(2,815.2)	(1,989.1)
Profit/(loss) for the year from continuing operations		(29.4)	(3,472.7)	(3,502.1)	751.4	(4,539.1)	(3,787.7)
Loss per share (US cents)							
Basic loss per ordinary share	13	(142.4)	(523.4)	(665.8)	(27.2)	(627.3)	(654.5)
Diluted loss per ordinary share	13	(142.4)	(523.4)	(665.8)	(27.2)	(627.3)	(654.5)

# **Consolidated Statement of Comprehensive Income**

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Loss for the year from continuing operations	(3,502.1)	(3,787.7)
Income and expenses recognised directly in equity:		
Items that will not be reclassified subsequently to income statement:		
Remeasurement of net defined benefit plans	8.0	(14.0)
Tax effects on items recognised directly in equity	(2.5)	4.6
Total (a)	5.5	(9.4)
Items that may be reclassified subsequently to income statement:		
Exchange differences arising on translation of foreign operations	(810.2)	(582.0)
Gain in fair value of available-for-sale financial assets (Note 18)	2.3	2.1
Loss in fair value of cash flow hedges deferred in reserves	(24.5)	(27.4)
Tax effects arising on cash flow hedges deferred in reserves	(2.8)	0.8
Gain in fair value of cash flow hedges transferred to income statement	(3.0)	(17.8)
Tax effects arising on cash flow hedges transferred to income statement	1.6	6.0
Total (b)	(836.6)	(618.3)
Other comprehensive loss for the year (a+b)	(831.1)	(627.7)
Total comprehensive loss for the year	(4,333.2)	(4,415.4)
Attributable to:		
Equity holders of the parent	(2,223.6)	(2,089.8)
Non-controlling interests	(2,109.6)	(2,325.6)
Total comprehensive loss for the year	(4,333.2)	(4,415.4)

# **Consolidated Balance Sheet**

(US\$ million)	Note	As at year ended 31 March 2016	As at year ended 31 March 2015
Assets			
Non-current assets			
Goodwill	15	16.6	16.6
Intangible assets	16	92.2	101.9
Property, plant and equipment	17	16,647.8	23,352.0
Financial asset investments	18	6.5	4.2
Non-current tax assets		361.7	394.0
Other non-current assets	19	237.9	156.0
Financial instruments (derivatives)	29	0.8	0.2
Deferred tax assets	31	1,255.4	1,252.6
		18,618.9	25,277.5
Current assets			
Inventories	20	1,365.8	1,605.7
Trade and other receivables	21	1,344.3	1,839.2
Financial instruments (derivatives)	29	18.3	16.6
Current tax assets		35.5	40.1
Liquid investments	22	8,508.2	7,856.1
Cash and cash equivalents	23	428.3	353.7
		11,700.4	11,711.4
Total assets		30,319.3	36,988.9
Liabilities			
Current liabilities			
Short-term borrowings	24	(3,726.6)	(3,179.2)
Convertible bonds	28	(587.2)	_
Trade and other payables	27a	(5,876.1)	(4,730.0)
Financial instruments (derivatives)	29	(67.7)	(45.7)
Retirement benefits	33	(4.9)	(12.7)
Provisions	30	(132.1)	(140.8)
Current tax liabilities		(17.0)	(74.2)
		(10,411.6)	(8,182.6)
Net current assets		1,288.8	3,528.8
Non-current liabilities			
Medium and long-term borrowings	24	(11,949.5)	(12,385.6)
Convertible bonds	28	_	(1,103.0)
Trade and other payables	27b	(223.5)	(194.3)
Financial instruments (derivatives)	29	(1.2)	(0.1)
Deferred tax liabilities	31	(620.2)	(2,588.7)
Retirement benefits	33	(61.6)	(61.9)
Provisions	30	(187.4)	(203.4)
Non-equity non-controlling interests	25	(11.9)	(11.9)
		(13,055.3)	(16,548.9)
		, ,	

(US\$ million)	Note	As at year ended 31 March 2016	As at year ended 31 March 2015
Net assets		6,852.4	12,257.4
Equity			
Share capital	35	30.1	30.0
Share premium		201.5	198.5
Treasury shares		(557.2)	(556.9)
Share-based payment reserve	32	29.9	27.4
Convertible bond reserve		6.0	38.4
Hedging reserve		(87.7)	(74.7)
Other reserves		(1.4)	339.9
Retained earnings		(334.0)	1,600.5
Equity attributable to equity holders of the parent		(712.8)	1,603.1
Non-controlling interests	36	7,565.2	10,654.3
Total equity		6,852.4	12,257.4

Financial statements of Vedanta Resources plc, registration number 4740415, were approved by the Board of Directors on 11 May 2016 and signed on their behalf by:

# Tom Albanese

Chief Executive Officer

# **Consolidated Cash Flow Statement**

(US\$ million)	Note	Year ended 31 March 2016	Year ended 31 March 2015
Operating activities			
Loss before taxation		(4,984.0)	(5,640.2)
Adjustments for:			
Depreciation and amortisation		1,455.2	2,005.7
Investment revenue		(697.8)	(832.6)
Finance costs		1,280.4	1,387.2
Other gains and (losses)		72.5	76.9
Loss on disposal of property, plant and equipment		1.5	4.6
Write-off of unsuccessful exploration costs		4.5	128.7
Share-based payment charge		15.6	28.6
Impairment of mining reserves and assets		5,187.0	6,694.4
Other non-cash items		2.7	40.8
Operating cash flows before movements in working capital		2,337.6	3,894.1
Decrease in inventories		163.7	40.0
(Increase)/decrease in receivables		343.3	(134.5)
Increase in payables		657.4	225.2
Cash generated from operations		3,502.0	4,024.8
Dividends received		0.3	0.3
Interest income received		633.1	587.7
Interest paid		(1,268.4)	(1,334.0)
Income taxes paid		(354.7)	(601.7)
Dividends paid		(110.6)	(171.3)
Net cash inflow from operating activities		2,401.7	2,505.8
Cash flows from investing activities			
Purchases of property, plant and equipment and intangibles		(872.4)	(2,289.1)
Proceeds on disposal of property, plant and equipment		10.0	25.7
Sale/(purchase) of liquid investments	26	(999.9)	671.7
Net cash used in investing activities		(1,862.3)	(1,591.7)
Cash flows from financing activities			
Issue of ordinary shares		0.1	0.2
Purchase of shares under DSBP scheme		(0.9)	
Dividends paid to non-controlling interests of subsidiaries		(325.5)	(340.4)
Acquisition of additional interests in subsidiaries/share buyback by subsidiary		_	(819.1)
Decrease in short-term borrowings	26	(1,022.1)	(818.8)
Proceeds from long-term borrowings	26	2,383.2	3,748.1
Repayment of long-term borrowings	26	(958.0)	(2,698.0)
Buyback of convertible bond		(523.6)	_
Net cash used in financing activities		(446.8)	(928.0)
Net increase/(decrease) in cash and cash equivalents	26	92.6	(13.9)
Effect of foreign exchange rate changes	26	(18.0)	(1.8)
Cash and cash equivalents at beginning of year		353.7	369.4
Cash and cash equivalents at end of year	23 & 26	428.3	353.7

# **Consolidated Statement of Changes in Equity**

	Attributable to equity holders of the Company									_	
(US\$ million)	Share capital (Note 35)	Share premium	Treasury shares	Share- based payment reserves	Convertible bond reserve	Hedging reserve	Other reserves <sup>1</sup>	Retained earnings	Total	Non-controlli ng interests	Total equity
At 1 April 2015	30.0	198.5	(556.9)	27.4	38.4	(74.7)	339.9	1,600.5	1,603.1	10,654.3	12,257.4
Loss for the year	_	_	_	_	_	_	_	(1,837.4)	(1,837.4)	(1,664.7)	(3,502.1)
Other comprehensive loss for the year	_	_	_	-	-	(13.0)	(373.2)	_	(386.2)	(444.9)	(831.1)
Total comprehensive loss for the year	_	_	_	_	_	(13.0)	(373.2)	(1,837.4)	(2,223.6)	(2,109.6)	(4,333.2)
Acquisition of shares under DSBP scheme	_	_	(0.3)	_	_	_	_	(0.6)	(0.9)	_	(0.9)
Convertible bond transfer (Note 28)	_	_	_	_	(24.6)	_	-	24.6	_	_	_
Conversion of bond into equity	0.0	3.0	_	_	(0.1)	_	_	_	2.9	-	2.9
Convertible bond buyback	_	_	_	_	(7.7)	_	_	5.1	(2.6)	-	(2.6)
Transfers <sup>1</sup>	_	_	_	_	_	_	31.9	(31.9)	_	_	_
Dividends paid/payable (Note 14)	_	_	_	_	_	_	_	(110.6)	(110.6)	(979.5)	(1,090.1)
Exercise of LTIP awards	0.1	_	_	(13.1)	_	_	-	13.1	0.1	_	0.1
Recognition of share-based payment (Note 32)	_	_	_	15.6	_	_	_	_	15.6	_	15.6
Others <sup>3</sup>	-	_	-	_	_	_	_	3.2	3.2	_	3.2
At 31 March 2016	30.1	201.5	(557.2)	29.9	6.0	(87.7)	(1.4)	(334.0)	(712.8)	7,565.2	6,852.4

Attributable to equity holders of the Company

(US\$ million)	Share capital (Note 35)	Share premium	Treasury shares	Share- based payment reserves	Convertible bond reserve	Hedging reserve	Other reserves <sup>1</sup>	Retained earnings	Total	Non-controlli ng interests	Total equity
At 1 April 2014	29.8	198.5	(556.9)	46.9	80.1	(50.4)	471.6	3,790.8	4,010.4	13,964.4	17,974.8
Loss for the year	_	_	_	_	_	_	_	(1,798.6)	(1,798.6)	(1,989.1)	(3,787.7)
Other comprehensive loss for the year	_	_	_	_	-	(24.3)	(266.9)	_	(291.2)	(336.5)	(627.7)
Total comprehensive loss for the year	_	_	_	_	_	(24.3)	(266.9)	(1,798.6)	(2,089.8)	(2,325.6)	(4,415.4)
Convertible bond transfer (Note 28)	_	_	_	_	(41.7)	_	_	41.7	_	_	_
Transfers <sup>1</sup>	_	_	_	_	_	_	135.2	(135.2)	_	_	_
Dividends paid (Note 14)	_	_	_	_	_	_	_	(171.3)	(171.3)	(340.4)	(511.7)
Additional investment in subsidiary/share buyback by subsidiary	_	_	_	_	_	_	_	(175.0)	(175.0)	(644.1)	(819.1)
Exercise of LTIP awards	0.2	_	_	(48.1)	_	_	_	48.1	0.2	_	0.2
Recognition of share-based payment (Note 32)	_	_	_	28.6	_	_	_	_	28.6	_	28.6
At 31 March 2015	30.0	198.5	(556.9)	27.4	38.4	(74.7)	339.9	1,600.5	1,603.1	10,654.3	12,257.4

# Other reserves comprise<sup>1</sup>

(US\$ million)	Currency translation reserve	Merger reserve <sup>2</sup>	Investment revaluation reserve	General reserves	Total
At 1 April 2014	(1,612.7)	4.4	1.2	2,078.7	471.6
Exchange differences on translation of foreign operations	(263.8)	_	_	_	(263.8)
Gain in fair value of available-for-sale financial assets	_	_	1.4	_	1.4
Remeasurements	_	_	_	(4.5)	(4.5)
Transfer from retained earnings <sup>1</sup>	_	-	_	135.2	135.2
At 1 April 2015	(1,876.5)	4.4	2.6	2,209.4	339.9
Exchange differences on translation of foreign operations	(378.7)	_	_	_	(378.7)
Gain in fair value of available-for-sale financial assets	_	_	1.5	_	1.5
Remeasurements	_	_	_	4.0	4.0
Transfer from retained earnings <sup>1</sup>	-	_	_	31.9	31.9
At 31 March 2016	(2,255.2)	4.4	4.1	2,245.3	(1.4)

Transfer to general reserve during the year ended 31 March 2016 and 31 March 2015 includes US\$31.9 million and US\$30.0 million of debenture redemption reserve

The merger reserve arose on incorporation of the Company during the year ended 31 March 2004. The investment in Twin Star had a carrying amount value of US\$20.0 million in the accounts of Volcan. As required by the Companies Act 1985, Section 132, upon issue of 156,000,000 ordinary shares to Volcan, Twin Star's issued share capital and share premium account have been eliminated and a merger reserve of US\$4.4 million arose, being the difference between the carrying value of the investment in Twin Star in Volcan's accounts and the nominal value of the shares issued to Volcan.

<sup>3</sup> Others: US\$3.2 million of tax refund received on appropriatoin of reserves in BALCO.

# **Notes to the Financial Statements**

#### 1. Presentation of financial statements

#### General information

Vedanta Resources plc (the Company) is a company incorporated and domiciled in the United Kingdom and is a London listed diversified global natural resources major. The Group produces aluminium, copper, zinc, lead, silver, iron ore, oil & gas and commercial energy. Vedanta has operations in India, Zambia, Namibia, South Africa, Ireland, Liberia and Australia. These financial statements are presented in US dollars being the functional currency of the Company and all values are rounded to one decimal of the nearest million except where other otherwise indicated.

#### Compliance with applicable law and IFRS

The financial statements have been prepared in accordance with those parts of the Companies Act 2006 applicable to companies reporting under International Financial Reporting Standards (IFRS), Article 4 of the IAS Regulation and IFRS as adopted by the European Union and related interpretations.

#### Basis of preparation

The financial statements have been prepared on a historical cost basis, except for derivative financial instruments, available-for-sale financial assets, liquid investments and defined benefit pension obligations that have been measured at fair value as per the principles of Fair value measurement under IFRS 13.

The following standards have been issued but not yet effective up to the date of authorisation of these financial statements (and in some cases had not yet been adopted by EU):

#### IFRS 9 - Financial Instruments

In July 2014, the International Accounting Standards Board issued the final version of IFRS 9 – Financial Instruments. The standard reduces the complexity of the current rules on financial instruments as mandated in IAS 39. IFRS 9 has fewer classification and measurement categories as compared to IAS 39 and has eliminated the categories of held to maturity, available for sale and loans and receivables. Further it eliminates the rule based requirement of segregating embedded derivatives and tainting rules pertaining to held to maturity investments. For an investment in an equity instrument which is not held for trading, IFRS 9 permits an irrevocable election, on initial recognition, on an individual share-by-share basis, to present all fair value changes from the investment in other comprehensive income. No amount recognised in other comprehensive income would ever be reclassified to profit or loss. It requires the entity, which chooses to measure a liability at fair value, to present the portion of the fair value change attributable to the entity's own credit risk in the other comprehensive income. IFRS 9 replaces the 'incurred loss model' in IAS 39 with an 'expected credit loss' model. The measurement uses a dual measurement approach, under which the loss allowance is measured as either 12 month expected credit losses or lifetime expected credit losses. The standard also introduces new presentation and disclosure requirements. The effective date for adoption of IFRS 9 is annual periods beginning on or after 1 January 2018, though early adoption is permitted.

#### IFRS 15 - Revenue from Contracts with Customers

IFRS 15 – Revenue from Contracts with Customers outlines a single comprehensive model for entities to use in accounting for revenue arising from contracts with customers. The standard replaces most current revenue recognition guidance, including industry-specific guidance. The core principle of the new standard is for companies to recognise revenue to depict the transfer of goods or services to customers in amounts that reflect the consideration to which the company expects to be entitled in exchange for those goods or services. The new standard also will result in enhanced disclosures about revenue, provide guidance for transactions that were not previously addressed comprehensively including service revenues and contract modifications and improve guidance for multiple-element arrangements. The new standard will come into effect for the annual reporting periods beginning on or after 1 January 2018 with early application permitted.

# IFRS 16 – Leases

IFRS 16 – Leases specifies recognition, measurement and disclosure criteria for leases. The standard provides a single lessee accounting model, requiring lessees to recognise assets and liabilities for all leases unless the lease term is 12 months or less or the underlying asset has a low value. Lessors continue to classify leases as operating or finance, with IFRS 16's approach to lessor accounting substantially unchanged from its predecessor, IAS 17. The new standard will come into effect for the annual reporting periods beginning on or after 1 January 2019. Earlier application is permitted if IFRS 15 – Revenue from Contracts with Customers has also been applied.

The following other standards, improvements and amendments to the standards have been issued up to the date of authorisation of these financial statements.

- IFRS 14 Regulatory Deferral Accounts
- Amendments to IAS 1: Disclosure Initiative
- Annual Improvements to IFRSs: 2012-2014 Cycle
- Amendments to IAS 27: Equity method in separate financial statements
- Amendments to IAS 16 and IAS 41: Bearer plants
- Amendments to IAS 16 and IAS 38: Clarification of Acceptable Methods of Depreciation and Amortisation
- Amendments to IFRS 11: Accounting for Acquisitions of Interests in Joint Operations
- Amendments to IAS 7: Statement of cash flows on disclosure initiative
- Amendments to IAS 12: 'Income taxes' on Recognition of deferred tax assets for unrealised losses
- Amendments to IFRS 10, IFRS 12 and IAS 28: Investment entities: Applying the Consolidation Exemption

The Group is evaluating the requirements of these standards, improvements and amendments and has not yet determined the impact on the consolidated financial statements.

#### Adoption of new and revised standards and pronouncements

The Group has adopted, with effect from 1 April 2015, the following new amendment and pronouncements. Their adoption has not had any significant impact on the amounts reported in the financial statements.

Amendments to IAS 19: Defined benefit plans: Employee Contributions

Annual improvements to IFRSs: 2010-2012 Cycle

Annual improvements to IFRSs: 2011-2013 Cycle

The Group has not early adopted any other amendments, standards or interpretations that have been issued but are not yet effective.

#### Goina concern

The financial statements have been prepared in accordance with the going concern basis of accounting. The use of this basis of accounting takes into consideration the Group's current and forecast financing position, additional details of which are provided in the Going Concern section of the Strategic Report.

#### Parent Company financial statements

The financial statements of the parent Company, Vedanta Resources plc, incorporated in United Kingdom, have been prepared in accordance with FRS 101 and UK company law. The Company Balance Sheet is presented in Note 46.

#### 2(a) Accounting policies

#### (i) Basis of consolidation

#### Subsidiaries

The consolidated financial information incorporates the results of the Company and all its subsidiaries (the Group), being the companies that it controls. Control is evidenced where the Company has power over the investee, is exposed, or has rights, to variable returns from its involvement with the investee and has the ability to affect those returns through its power over the investee. Power is demonstrated through existing rights that give the ability to direct relevant activities, which significantly affect the entity returns.

The financial statements of subsidiaries are prepared for the same reporting year as the parent Company. Where necessary, adjustments are made to the financial statements of subsidiaries to bring the accounting policies used into line with accounting policies used by the Group.

For non-wholly owned subsidiaries, a share of the profit for the financial year and net assets is attributed to the non-controlling interests as shown in the consolidated income statement, consolidated statement of comprehensive income and consolidated balance sheet.

For acquisitions of additional interests in subsidiaries, where there is no change in control, the Group recognises a reduction to the non-controlling interest of the respective subsidiary with the difference between this figure and the cash paid, inclusive of transaction fees, being recognised in equity. In addition, upon dilution of controlling interests the difference between the cash received from sale or listing of the subsidiary shares and the increase to non-controlling interest is also recognised in equity. The results of subsidiaries acquired or disposed of during the year are included in the consolidated income statement from the effective date of acquisition or up to the effective date of disposal, as appropriate.

All inter-company balances and transactions, including unrealised profits arising from intra-Group transactions, have been eliminated in full. Unrealised losses are eliminated unless costs cannot be recovered.

#### Joint arrangements

A joint arrangement is an arrangement of which two or more parties have joint control. Joint control is considered when there is contractually agreed sharing of control of an arrangement, which exists only when decisions about the relevant activities require the unanimous consent of the parties sharing control.

The Group has joint operations within its Oil & Gas segment, the Group participates in several unincorporated joint operations which involve the joint control of assets used in oil & gas exploration and producing activities. The Group accounts for its share of assets, liabilities, income and expenditure of joint ventures in which the Group holds an interest, classified in the appropriate balance sheet and income statement headings. In addition, where the Group acts as operator to the joint venture, the gross liabilities and receivables (including amounts due to or from non-operating partners) of the joint operations are included in the Group balance sheet.

#### (ii) Revenue recognition

Revenue is measured at the fair value of consideration received or receivable and represents the net invoice value of goods and services provided to third parties after deducting discounts, volume rebates, outgoing sales taxes and duties, and are recognised when all significant risks and rewards of ownership of the asset sold are transferred to the customer or services have been provided. This is usually when the title passes to the customer as per the contract.

Certain of the Group's sales contracts provide for provisional pricing based on the price on the London Metal Exchange Limited (LME), as specified in the contract, when shipped. Final settlement of the prices is based on the applicable price for a specified future period. The Company's provisionally priced sales are marked to market using the relevant forward prices for the future period specified in the contract with a corresponding adjustment to revenue.

Revenue from oil, gas and condensate sales represents the Group's share of oil, gas and condensate production, recognised on a direct entitlement basis, and tariff income received for third party use of operating facilities and pipelines in accordance with agreements.

Revenue from holding certificate contracts is recognised when goods have been delivered to a distribution warehouse or have been identified and kept separately, have been inspected by a nominee of the buyer and cash has been received. Under these arrangements, revenue is recognised once legal title has passed and all significant risks and rewards of ownership of the asset sold are transferred to the customer.

Revenue from the sale of power is recognised when the electricity is supplied and measured based on contractually agreed tariff rates as approved by the electricity regulatory authorities.

Revenues from sale of material by-products are recognised when the significant risks and rewards of ownership of the goods sold are transferred to the customer.

Dividend income is recognised when the shareholders' right to receive payment is established.

Interest income is recognised on an accrual basis in the income statement.

#### (iii) Special items

Special items are those items that management considers, by virtue of their size or incidence (including but not limited to impairment charges and acquisition and restructuring related costs), should be disclosed separately to ensure that the financial information allows an understanding of the underlying performance of the business in the year, so as to facilitate comparison with prior periods. Also tax charges related to Special items and certain one-time tax effects are considered Special. Such items are material by nature or amount to the year's result and require separate disclosure in accordance with IAS 1 paragraph 97. The determination as to which items should be disclosed separately requires a degree of judgement.

#### (iv) Business combinations

The results of subsidiaries acquired or sold during the year are consolidated for the periods from, or to, the date on which control passed. Acquisitions are accounted for under the acquisition method. The acquirer's identifiable assets, liabilities and contingent liabilities that meet the conditions for recognition are recognised at their fair value at the acquisition date, except certain assets and liabilities required to be measured as per the applicable standards.

The identifiable assets, liabilities and contingent liabilities of a subsidiary, a joint arrangement or an associate, which can be measured reliably, are recorded at their provisional fair values at the date of acquisition. The difference between the fair value of the consideration transferred (including contingent consideration and previously held non-controlling interests) and the Group's share of the fair value of the identifiable net assets on acquisition is recognised as goodwill. Goodwill arising on acquisitions is reviewed for impairment at least annually.

Where the fair values of the identifiable assets and liabilities exceed the cost of acquisition, the surplus is credited to the income statement in the period of acquisition.

Where it is not possible to complete the determination of fair values by the date on which the first post-acquisition financial statements are approved, a provisional assessment of fair values is made and any adjustments required to those provisional fair values, and the corresponding adjustments to purchased goodwill, are finalised within 12 months of the acquisition date.

Any non-controlling interest in an acquiree is measured at fair value or as the non-controlling interest's proportionate share of the acquiree's identifiable net assets, excluding goodwill. This accounting choice is made on a transaction-by-transaction basis.

Acquisition expenses are charged to the income statement.

If the Group acquires a group of assets or equity in a company that does not constitute a business combination in accordance with IFRS 3 Business Combinations (2008 revised), the cost of the acquired group of assets or equity is allocated to the individual identifiable assets acquired based on their relative fair value.

#### (v) Intangible assets

Intangible assets are measured at cost less accumulated amortisation and accumulated impairment losses, if any. The Group determines the amortisation period as the period over which the future economic benefits will flow to the Group after taking into account all relevant facts and circumstances. Amortisation method, residual values and estimated useful life of intangible assets are reviewed annually or more frequently if events or changes in circumstances indicate a potential impairment. The Group does not have any indefinite life intangible assets.

Intangible assets arising out of service concession arrangements are accounted for as intangible assets where the Company has a contractual right to charge users of services when the projects are completed and is measured at the cost of such construction services completed. Such assets are amortised on a straight line basis over the balance of license period, usually between 3 to 30 years.

### (vi) Property, plant and equipment

Relating to mineral assets – Mining properties and leases

The costs of mining properties and leases, which include the costs of acquiring and developing mining properties and mineral rights, are capitalised as property, plant and equipment under the heading 'Mining properties and leases' in the year in which they are incurred.

When a decision is taken that a mining property is viable for commercial production (i.e. when the Group determines that the mining property will provide sufficient and sustainable returns relative to the risk and decides to proceed with the development), all further pre-production primary development expenditure other than land, buildings, plant and equipment is capitalised as part of the cost of the mining property until the mining property is capable of commercial production. From that point, capitalised mining properties and lease costs are amortised on a unit-of-production basis over the total estimated remaining commercial reserves of each property or group of properties.

Exploration and evaluation assets acquired are recognised as assets at their cost of acquisition subject to meeting the commercial production criteria mentioned above and are subject to impairment review on an annual basis.

Exploration and evaluation expenditure incurred after obtaining the right to mine or the legal right to explore, is capitalised as property, plant and equipment and stated at cost less any impairment. Exploration and evaluation assets are transferred to the appropriate

category of property, plant and equipment when the technical feasibility and commercial viability has been determined. Exploration and evaluation assets are assessed for impairment and impairment loss, if any, is recognised prior to reclassification. Exploration and evaluation expenditure incurred prior to obtaining the mining right or the legal right to explore is expensed as incurred.

Exploration expenditure includes all direct and allocated indirect expenditure associated with finding specific mineral resources which includes depreciation and applicable operating costs of related support equipment and facilities and other costs of exploration activities:

- · Acquisition costs costs associated with acquisition of licenses and rights to explore, including related professional fees.
- General exploration costs costs of surveys and studies, rights of access to properties to conduct those studies (e.g. costs incurred
  for environment clearance, defence clearance, etc.), and salaries and other expenses of geologists, geophysical crews and other
  personnel conducting those studies.
- Costs of exploratory drilling and equipping exploratory and appraisal wells.

The stripping cost incurred during the production phase of a surface mine is deferred to the extent the current period stripping cost exceeds the average period stripping cost over the life of mine and recognised as an asset if such cost provides a benefit in terms of improved access to ore in future periods and certain criteria are met. Deferred stripping costs are included in mining properties within property, plant and equipment and disclosed as a part of mining properties. After initial recognition, the stripping activity asset is depreciated on a unit of production method over the expected useful life of the identified component of the ore body.

In circumstances where a mining property is abandoned, the cumulative capitalised costs relating to the property are written off in the period in which it occurs i.e. when the Group determines that the mining property will not provide sufficient and sustainable returns relative to the risks and the Group decides not to proceed with the mine development.

Commercial reserves are proved and probable reserves as defined by the 'JORC' Code and 'SAMREC' Code. Changes in the commercial reserves affecting unit of production calculations are dealt with prospectively over the revised remaining reserves.

Relating to oil & gas assets – Exploration and evaluation assets and developing/producing assets

For oil & gas assets a successful efforts based accounting policy is followed. Costs incurred prior to obtaining the legal rights to explore an area are expensed immediately to the income statement. Expenditure incurred on the acquisition of a license interest is initially capitalised on a license-by-license basis. Costs are held, are not amortised or depreciated, within exploration and evaluation assets until such time as the exploration phase on the license area is complete or commercial reserves have been discovered.

Exploration expenditure incurred in the process of determining oil & gas exploration targets is capitalised initially within property, plant and equipment – exploration and evaluation assets and subsequently allocated to drilling activities (under oil & gas properties and/or exploration and evaluation assets as appropriate). Exploration drilling costs are initially capitalised on a well-by-well basis until the success or otherwise of the well has been established. The success or failure of each exploration effort is judged on a well-by-well basis. Drilling costs are written off on completion of a well unless the results indicate that hydrocarbon reserves exist and there is a reasonable prospect that these reserves are commercial.

Following appraisal of successful exploration wells, if commercial reserves are established and technical feasibility for extraction demonstrated, then the related capitalised exploration costs are transferred into a single field cost centre within property, plant and equipment – development/producing assets (oil & gas properties) after testing for impairment. Where results of exploration drilling indicate the presence of hydrocarbons which are ultimately not considered commercially viable, all related costs are written off to the income statement.

All costs incurred after the technical feasibility and commercial viability of producing hydrocarbons has been demonstrated are capitalised within property, plant and equipment – development/producing assets (oil & gas properties) on a field-by-field basis. Subsequent expenditure is capitalised only where it either enhances the economic benefits of the development/producing asset or replaces part of the existing development/producing asset. Any remaining costs associated with the part replaced are expensed.

Net proceeds from any disposal of an exploration asset are initially credited against the previously capitalised costs. Any surplus proceeds are credited to the income statement. Net proceeds from any disposal of development/producing assets are credited against the previously capitalised cost. A gain or loss on disposal of a development/producing asset is recognised in the income statement to the extent that the net proceeds exceed or are less than the appropriate portion of the net capitalised costs of the asset.

#### Other property, plant and equipment

The initial cost of property, plant and equipment comprises its purchase price, including import duties and non-refundable purchase taxes, and any directly attributable costs of bringing an asset to working condition and location for its intended use, including relevant borrowing costs and any expected costs of decommissioning. Expenditure incurred after the property, plant and equipment have been put into operation, such as repairs and maintenance, are charged to the income statement in the period in which the costs are incurred. Major shut-down and overhaul expenditure is capitalised as the activities undertaken improve the economic benefits expected to arise from the asset

# (vii) Assets in the course of construction

Assets in the course of construction are capitalised in the assets under construction account. At the point when an asset is operating at management's intended use, the cost of construction is transferred to the appropriate category of property, plant and equipment and depreciation commences (see below). Costs associated with the commissioning of an asset and any obligatory decommissioning costs are capitalised where the asset is available for use but incapable of operating at normal levels until a period of commissioning has been completed. Revenue generated from production during the trial period is capitalised. Borrowing costs and certain foreign exchange gains or losses are in certain circumstances capitalised in the cost of the asset under construction. This policy is set out under 'Borrowing Costs'.

## (viii) Depreciation and amortisation

Relating to mining properties

Mining properties and other assets in the course of development or construction, freehold land and goodwill are not depreciated or

amortised. Capitalised mining properties and lease costs are amortised once commercial production commences, as described in 'Property, plant and equipment – mining properties and leases'. Leasehold land and buildings are depreciated on a straight-line basis over the period of the lease or, if shorter, their useful economic life.

#### Relating to oil & gas assets

All expenditure carried within each field is amortised from the commencement of production on a unit of production basis, which is the ratio of oil & gas production in the period to the estimated quantities of commercial reserves at the end of the period plus the production in the period, generally on a field-by-field basis or group of fields which are reliant on common infrastructure.

Commercial reserves are proven and probable oil & gas reserves, which are defined as the estimated quantities of crude oil, natural gas and natural gas liquids which geological, geophysical and engineering data demonstrate with a specified degree of certainty to be recoverable in future years from known reservoirs and which are considered commercially producible. There should be a 50% statistical probability that the actual quantity of recoverable reserves will be more than the amount estimated as proven and probable reserves and a 50% statistical probability that it will be less.

Costs used in the unit of production calculation comprise the net book value of capitalised costs plus the estimated future field development costs required to access commercial reserves. Changes in the estimates of commercial reserves or future field development costs are dealt with prospectively.

#### Others

Other buildings, plant and equipment, office equipment and fixtures, and motor vehicles are stated at cost less accumulated depreciation and any provision for impairment. Depreciation commences when the assets are ready for their intended use. Depreciation is provided at rates calculated to write off the cost, less estimated residual value, of each asset on a straight-line basis over its expected useful life, as follows:

Buildings operations and administration
Plant and machinery
Office equipment and fixtures
Motor vehicles
30–60 years
15–40 years
5–10 years
8–10 years

The Group reviews the residual value and useful life of an asset annually and, if expectations differ from previous estimates, the change is accounted for as a change in accounting estimate.

Major overhaul costs are depreciated over the estimated life of the economic benefit to be derived from the overhaul. The carrying amount of the remaining previous overhaul cost is charged to the income statement if the next overhaul is undertaken earlier than the previously estimated life of the economic benefit.

Property, plant and equipment held for sale or which is part of a disposal group held for sale is not depreciated. Property, plant and equipment held for sale is carried at the lower of its carrying value and fair value less disposal cost and is presented separately on the face of the balance sheet.

#### (ix) Impairment

#### Financial assets

A financial asset is assessed at each reporting date to determine whether there is any objective evidence that it is impaired. A financial asset is considered to be impaired if objective evidence indicates that one or more events have had a negative effect on the estimated future cash flows of that asset.

An impairment loss in respect of a financial asset measured at amortised cost is calculated as the difference between its carrying amount, and the present value of the estimated future cash flows discounted at the original effective interest rate. An impairment loss in respect of an available-for-sale financial asset is calculated by reference to its fair value.

Significant financial assets are tested for impairment on an individual basis. The remaining financial assets are assessed collectively in groups that share similar credit risk characteristics. All impairment losses are recognised in the consolidated statements of income. Any cumulative loss in respect of an available-for-sale financial asset recognised previously in the consolidated statements of comprehensive income is transferred to the consolidated statements of income on recognition of impairment. An impairment loss is reversed if the reversal can be related objectively to an event occurring after the impairment loss was recognised. For financial assets measured at amortised cost and available-for-sale financial assets that are debt securities, the reversal is recognised in the consolidated statements of income. For available-for-sale financial assets that are equity securities, the change in fair value is recognised directly in the consolidated statements of comprehensive income.

The allowance accounts in respect of trade and other receivables are used to record impairment losses unless the Company is satisfied that no recovery of the amount owing is possible; at that point the amounts are considered irrecoverable and are written off against the financial asset directly.

#### Non-financial assets

Impairment charges and reversals are assessed at the level of cash-generating units. A cash-generating unit (CGU) is the smallest identifiable group of assets that generate cash inflows that are largely independent of the cash inflows from other assets or group of assets.

Formal impairment tests are carried out annually for goodwill. In addition, formal impairment tests for all assets are performed when there is an indication of impairment. The Group conducts an internal review of asset values annually, which is used as a source of information to assess for any indications of impairment or reversal of previously recognised impairment losses. External factors, such as changes in expected future prices, costs and other market factors are also monitored to assess for indications of impairment or reversal of previously recognised impairment losses.

If any such indication exists then an impairment review is undertaken, the recoverable amount is calculated, as the higher of fair value

less costs of disposal and the asset's value in use.

Fair value less costs of disposal is the price that would be received to sell the asset in an orderly transaction between market participants and does not reflect the effects of factors that may be specific to the entity and not applicable to entities in general. Fair value for mineral and oil & gas assets is generally determined as the present value of the estimated future cash flows expected to arise from the continued use of the asset, including any expansion prospects, and its eventual disposal, using assumptions that an independent market participant may take into account. These cash flows are discounted at an appropriate post tax discount rate to arrive at the net present value.

Value in use is determined as the present value of the estimated future cash flows expected to arise from the continued use of the asset in its present form and its eventual disposal. The cash flows are discounted using a pre-tax discount rate that reflects current market assessments of the time value of money and the risks specific to the asset for which estimates of future cash flows have not been adjusted. Value in use is determined by applying assumptions specific to the Group's continued use and cannot take into account future development. These assumptions are different to those used in calculating fair value and consequently the value in use calculation is likely to give a different result to a fair value calculation.

The carrying amount of the CGU is determined on a basis consistent with the way the recoverable amount of the CGU is determined. The carrying amount includes the deferred tax liability recognised in the fair value of the assets acquired in a business combination.

If the recoverable amount of an asset or CGU is estimated to be less than its carrying amount, the carrying amount of the asset or CGU is reduced to its recoverable amount. An impairment loss is recognised in the income statement.

Any reversal of the previously recognised impairment loss is limited to the extent that the asset's carrying amount does not exceed the carrying amount that would have been determined if no impairment loss had previously been recognised.

#### Exploration and evaluation assets

In assessing whether there is any indication that an exploration and evaluation asset may be impaired, the Company considers, as a minimum, the following indications

- the period for which the entity has the right to explore in the specific area has expired during the period or will expire in the near future, and is not expected to be renewed;
- substantive expenditure on further exploration for and evaluation of mineral resources in the specific area is neither budgeted nor planned;
- exploration for and evaluation of mineral resources in the specific area have not led to the discovery of commercially viable quantities
  of mineral resources and the entity has decided to discontinue such activities in the specific area;
- sufficient data exist to indicate that, although a development in the specific area is likely to proceed, the carrying amount of the
  exploration and evaluation asset is unlikely to be recovered in full from successful development or by sale; and
- · reserve information prepared annually by external experts.

When a potential impairment is identified, an assessment is performed for each area of interest in conjunction with the group of operating assets (representing a cash-generating unit) to which the exploration and evaluation assets is attributed. Exploration areas in which reserves have been discovered but require major capital expenditure before production can begin, are continually evaluated to ensure that commercial quantities of reserves exist or to ensure that additional exploration work is under way or planned. To the extent that capitalised expenditure is no longer expected to be recovered, it is charged to the income statement.

# (x) Non-current assets held for sale and discontinued operations

Non-current assets are classified as held for sale if their carrying amount will be recovered principally through a sale transaction rather than through continuing use. This condition is regarded as met only when a sale is highly probable from the date of classification, management are committed to the sale and the asset is available for immediate sale in its present condition. Non-current assets are classified as held for sale from the date these conditions are met and are measured at the lower of carrying amount and fair value (less costs to sell). Any resulting impairment loss is recognised in the income statement as a special item. On classification as held for sale the assets are no longer depreciated.

#### (xi) Government grants

Government grants relating to property, plant and equipment are treated as deferred income and released to the income statement over the expected useful lives of the assets concerned. Other grants are credited to the income statement as and when the related expenditure is incurred.

#### (xii) Inventories

Inventories and work-in-progress are stated at the lower of cost and net realisable value.

Cost is determined on the following basis:

- Purchased copper concentrate is recorded at cost on a first-in, first-out (FIFO) basis; all other materials including stores and spares are valued on weighted average basis; except at Cairn where stores and spares are valued on a FIFO basis.
- Finished products are valued at raw material cost plus costs of conversion, comprising labour costs and an attributable proportion of manufacturing overheads based on normal levels of activity; and by-products and scrap are valued at net realisable value.
- Net realisable value is determined based on estimated selling price, less further costs expected to be incurred to completion and disposal.

#### (xiii) Taxation

Tax expense represents the sum of tax currently payable and deferred tax.

Current tax is provided at amounts expected to be paid (or recovered) using the tax rates and laws that have been enacted or substantively enacted by the balance sheet date.

Deferred tax is provided, using the balance sheet method, on all temporary differences at the balance sheet date between the tax bases of assets and liabilities and their carrying amounts for financial reporting purposes. Exceptions to this principle are:

- tax payable on the future remittance of the past earnings of subsidiaries where the timing of the reversal of the temporary differences can be controlled and it is probable that the temporary differences will not reverse in the foreseeable future;
- deferred income tax is not recognised on the impairment of goodwill which is not deductible for tax purposes or on the initial recognition of an asset or liability in a transaction that is not a business combination which, at the time of the transaction, affects neither the accounting profit nor taxable profit or loss; and
- · deferred tax assets are recognised only to the extent that it is more likely than not that they will be recovered.

Deferred tax assets and liabilities are measured at the tax rates that are expected to apply to the year when the asset is realised or the liability is settled, based on tax rates (and tax laws) that have been enacted or substantively enacted at the balance sheet date. Tax relating to items recognised directly in equity is recognised in equity and not in the income statement.

The carrying amount of deferred tax assets is reviewed at each balance sheet date and is adjusted to the extent that it is no longer probable that sufficient taxable profit will be available to allow all or part of the asset to be recovered.

Deferred tax assets and deferred tax liabilities are offset, if a legally enforceable right exists to set off current income tax assets against current income tax liabilities and the deferred taxes relate to the same taxable entity and the same taxation authority.

Deferred tax is provided on temporary differences arising on acquisitions that are categorised as Business Combinations. Deferred tax is recognised at acquisition as part of the assessment of the fair value of assets and liabilities acquired. Any deferred tax is charged or credited in the income statement as the underlying temporary difference is reversed.

#### (xiv) Retirement benefit schemes

The Group operates or participates in a number of defined benefits and contribution schemes, the assets of which are (where funded) held in separately administered funds.

For defined benefit schemes the cost of providing benefits under the plans is determined each year separately for each plan using the projected unit credit method by independent qualified actuaries.

Actuarial gains and losses arising in the year are recognised in other comprehensive income and are not recycled to the income statement.

Net interest is calculated by applying a discount rate to the net defined benefit liability or asset. Defined benefit costs are split into current service cost, past service cost, net interest expense or income and remeasurement.

Current service cost and past service costs is recognised within cost of sales and administrative expenses. Net interest expense or income is recognised within finance costs.

For defined contribution schemes, the amount charged to the income statement in respect of pension costs and other post-retirement benefits is the contributions payable in the year.

# (xv) Share-based payments

Certain employees (including Executive Directors) of the Group receive part of their remuneration in the form of share-based payment transactions, whereby employees render services in exchange for shares or rights over shares ('equity-settled transactions').

The cost of equity-settled transactions with employees is measured at fair value at the date at which they are granted. The fair value of share awards with market-related vesting conditions are determined with the assistance of an external valuer and the fair value at the grant date is expensed on a straight-line basis over the vesting period based on the Group's estimate of shares that will eventually vest. The estimate of the number of awards likely to vest is reviewed at each balance sheet date up to the vesting date at which point the estimate is adjusted to reflect the current expectations.

#### (xvi) Provisions for liabilities and charges

Provisions are recognised when the Group has a present obligation (legal or constructive), as a result of past events, and it is probable that an outflow of resources, that can be reliably estimated, will be required to settle such an obligation. If the effect of the time value of money is material, provisions are determined by discounting the expected future cash flows to net present value using an appropriate pre-tax discount rate that reflects current market assessments of the time value of money and, where appropriate, the risks specific to the liability. Unwinding of the discount is recognised in the income statement as a finance cost. Provisions are reviewed at each balance sheet date and are adjusted to reflect the current best estimate.

#### (xvii) Restoration, rehabilitation and environmental costs

An obligation to incur restoration, rehabilitation and environmental costs arises when environmental disturbance is caused by the development or ongoing production of a mine or oil fields. Costs arising from the decommissioning of plant and other site preparation work are provided for based on their discounted net present value, with a corresponding amount being capitalised at the start of each project. The amount provided for is recognised, as soon as the obligation to incur such costs arises. These costs are charged to the income statement over the life of the operation through the depreciation of the asset and the unwinding of the discount on the provision. The cost estimates are reviewed periodically and are adjusted to reflect known developments which may have an impact on the cost estimates or life of operations. The cost of the related asset is adjusted for changes in the provision due to factors such as updated cost estimates, new disturbance and revisions to discount rates. The adjusted cost of the asset is depreciated prospectively over the lives of the assets to which they relate. The unwinding of the discount is shown as a finance cost in the income statement.

Costs for restoration of subsequent site damage which is caused on an ongoing basis during production are provided for at their net present values and charged to the income statement as extraction progresses. Where the costs of site restoration are not anticipated to be significant, they are expensed as incurred.

#### (xviii) Operating leases

Rentals under operating leases are charged on a straight-line basis over the lease term, even if the payments are not made on such a basis

#### (xix) Finance leases

Assets held under finance leases are recognised as assets of the Group at their fair value at the inception of the lease or, if lower, at the present value of the minimum lease payments. The corresponding liability to the lessor is included in the balance sheet as a finance lease obligation. Lease payments are apportioned between finance charges and reduction of the lease obligation so as to achieve a constant rate of interest on the remaining balance of the liability. Finance charges are charged to the income statement, unless they are directly attributable to qualifying assets, in which case they are capitalised in accordance with the Group's policy on borrowing costs.

The Group has reviewed the terms and conditions of the lease arrangements and determined that all risks and rewards of ownership lie with the Group and has therefore accounted for the leases as finance leases.

#### (xx) Foreign currency translation

The functional currency for each entity in the Group is determined as the currency of the primary economic environment in which it operates. For all principal operating subsidiaries, the functional currency is the local currency of the country in which it operates with the exception of KCM and Cairn which has a US dollar functional currency as that is the currency of primary economic environment in which it operates. In the financial statements of individual Group companies, transactions in currencies other than the functional currency are translated into the functional currency at the exchange rates ruling at the date of transaction. Monetary assets and liabilities denominated in other currencies are translated into the functional currency at exchange rates prevailing on the balance sheet date.

All exchange differences are included in the income statement, except, where the monetary item is designated as an effective hedging instrument of the currency risk of designated forecast sales, where exchange differences are recognised in equity and exchange differences on foreign currency borrowings relating to asset under construction, and for future productive use, which are included in the cost of those assets when they are regarded as an adjustment to interest costs on those foreign currency borrowings.

For the purposes of consolidation, the income statement items of those entities for which the US dollar is not the functional currency are translated into US dollars at the average rates of exchange during the period. The related balance sheets are translated at the rates ruling at the balance sheet date. Exchange differences arising on translation of the opening net assets and results of such operations, and on foreign currency borrowings to the extent that they hedge the Group's investment in such operations, are reported in other comprehensive income and accumulated in equity.

On disposal of entities with a different functional currency to the Company's functional currency, the deferred cumulative exchange differences recognised in equity relating to that particular operation are reclassified to the income statement.

#### (xxi) Financial asset investments

Financial asset investments are classified as available for sale under IAS 39 and are initially recorded at cost and then remeasured at subsequent reporting dates to fair value. Unrealised gains and losses on financial asset investments are recognised directly in equity. On disposal or impairment of the investments, the gains and losses in equity are recycled to the income statement.

Investments in unquoted equity instruments that do not have a market price and whose fair value cannot be reliably measured are measured at cost.

Investments in equity instruments are recorded in non-current assets unless they are expected to be sold within one year.

#### (xxii) Liquid investments

Liquid investments represent short-term investments that do not meet the definition of cash and cash equivalents for one or more of the following reasons:

- they have a maturity profile greater than 90 days;
- they may be subject to a greater risk of changes in value than cash;
- they are held for investment purposes.

The value of trading investments incorporates any dividend and interest earned on the held for trading investments.

#### (xxiii) Cash and cash equivalents

Cash and cash equivalents in the balance sheet comprise cash at bank and in hand, short-term deposits with banks and short-term highly liquid investments that are readily convertible into cash which are subject to insignificant risk of changes in value and are held for the purpose of meeting short-term cash commitments.

#### (xxiiii) Trade receivables

Trade receivables are stated at their nominal value as reduced by appropriate allowances for estimated irrecoverable amounts. An allowance for impairment of trade receivables is made where there is an event, which based on previous experience, is an indication of a reduction in the recoverability of the carrying value of the trade receivables.

#### (xxv) Trade payables

Trade payables are stated at their nominal value.

### (xxvi) Bills of exchange payable

The Group enters into arrangements whereby financial institutions make direct payments to suppliers for raw materials and project materials. The financial institutions are subsequently repaid by the Company at a later date providing working capital timing benefits. These are normally settled up to 12 months (for raw materials) and up to 36 months (for project materials). Where these arrangements are for raw materials with a maturity of up to 12 months, the economic substance of the transaction is determined to be operating in

nature and these are recognised as Bills of exchange (under trade and other payables). Where these arrangements are for project materials with a maturity up to 36 months, the economic substance of the transaction is determined to be financing in nature, and these are classified as projects buyers' credit within borrowings in the statement of financial position.

#### (xxvii) Equity instruments

Equity instruments issued by the Company are recorded at the proceeds received, net of direct issue costs.

#### (xxviii) Borrowings

Interest bearing loans and overdrafts are recorded at the proceeds received. Finance charges, including premiums payable on settlement or redemption and direct issue costs, are accounted for on an accruals basis and charged to the income statement using the effective interest method. They are netted against the carrying amount of the instrument to the extent that they are not settled in the period in which they arise.

# (xxix) Convertible bonds

Convertible bonds denominated in the functional currency of the issuing entity are accounted for as compound instruments. The equity components and the liability components are separated out on the date of the issue. The equity component is recognised in a separate reserve and is not subsequently remeasured. The liability component is held at amortised cost. The interest expense on the liability component is calculated by applying the effective interest rate, being the prevailing market interest rate at the date of issuance for similar non-convertible debt. The difference between this amount and interest paid is added to the carrying amount of the liability component.

Convertible bonds not denominated in the functional currency of the issuing entity or where a cash conversion option exists, are split into two components: a debt component and a component representing the embedded derivative in the convertible bond. The debt component represents a liability for future coupon payments and the redemption of the principal amount. The embedded derivative, a financial liability, represents the value of the option that bondholders have to convert into ordinary shares. At inception the embedded derivative is recorded at fair value and the remaining balance, after deducting a share of issue costs, is recorded as the debt component. Subsequently, the debt component is measured at amortised cost and the embedded derivative is measured at fair value at each balance sheet date with the change in the fair value recognised in the income statement. The embedded derivative and the debt component are disclosed together and the current/non-current classification follows the classification of the debt component which is the host contract.

#### (xxx) Borrowing costs

Borrowing costs directly relating to the acquisition, construction or production of a qualifying capital project under construction are capitalised and added to the project cost during construction until such time that the assets are substantially ready for their intended use in accordance with the Group policy which is when they are capable of commercial production. Where funds are borrowed specifically to finance a project, the amount capitalised represents the actual borrowing costs incurred. Where surplus funds are available out of money borrowed specifically to finance a project, the income generated from such short-term investments is also capitalised to reduce the total capitalised borrowing cost.

All other borrowing costs are recognised in the income statement in the period in which they are incurred.

Capitalisation of interest on borrowings related to construction or development projects is ceased when substantially all the activities that are necessary to make the assets ready for their intended use are complete or when delays occur outside of the normal course of business.

#### (xxxi) Available for sale financial assets

Listed equity shares and debt instruments held by the Group that are traded in an active market are classified as being available for sale (AFS) financial assets and are stated at fair value. Unrealised gains and losses on financial asset investments are recognised directly in equity. On disposal or impairment of the investments, the gains and losses in equity are recycled to the income statement. Dividends received from investees accounted for as equity instruments are recognised in the income statement when the right to receive the payment is established.

#### (xxxii) Financial instruments fair valued through profit and loss

#### Held for trading financial assets

Financial assets are classified as held for trading if they have been acquired principally for the purpose of selling in the near term. The change in fair value of trading investments incorporates any dividend and interest earned on the held for trading investments and is accounted for in the income statement.

#### Derivative financial instruments

In order to hedge its exposure to foreign exchange, interest rate and commodity price risks, the Group enters into forward contracts, option contracts, swap contracts and other derivative financial instruments. The Group does not hold derivative financial instruments for speculative purposes.

Derivative financial instruments are initially recorded at their fair value on the date of the derivative transaction and are re-measured at their fair value at subsequent balance sheet dates. The resultant gains or losses are recognised in the income statement unless these are designated as effective hedging instruments.

### (xxxiii) Hedge accounting

The Group designates certain hedging instruments, which include derivatives and non-derivatives in respect of foreign currency risk, as either fair value hedges or cash flow hedges. Changes in the fair value of derivatives that are designated and qualify as fair value hedges are recorded in the income statement. The hedged item is recorded at fair value and any gain or loss is recorded in the income statement and is offset by the gain or loss from the change in the fair value of the derivative.

Changes in the fair value of derivatives that are designated and qualify as cash flow hedges are recorded in equity. This includes certain non-derivative liabilities that are designated as hedge of the foreign currency risk on future, highly probable, forecast sales. Amounts deferred in equity are recycled to the income statement in the periods when the hedged item is recognised in the income statement.

The gain or loss on hedging instruments relating to the effective portion of a net investment hedge is recognised in equity. The ineffective portion is recognised immediately in the income statement. Gains or losses accumulated in equity are reclassified to the income statement on disposal of the foreign operations to which they relate.

Hedge accounting is discontinued when the hedging instrument expires or is sold, terminated or exercised, or no longer qualifies for hedge accounting. Any cumulative gain or loss on the hedging instrument recognised in equity is kept in equity until the forecast transaction occurs. If a hedged transaction is no longer expected to occur, the net cumulative gain or loss recognised in equity is transferred to the income statement.

Derivatives embedded in other financial instruments or other host contracts are treated as separate derivatives when their risks and characteristics are not closely related to those of the host contracts and the host contracts are not carried at fair value with unrealised gains or losses recognised in the income statement.

#### (xxxiv) Held-to-maturity financial assets

Financial instruments with fixed or determinable payments and fixed maturity dates that the Group has the positive intent and ability to hold to maturity are classified as held-to-maturity investments. Held-to-maturity investments are measured at amortised cost using the effective interest method.

#### 2(b) Critical accounting judgement and estimation uncertainty

The preparation of financial statements in conformity with IFRS requires management to make judgements, estimates and assumptions, that affect the application of accounting policies and the reported amounts of assets, liabilities, income, expenses and disclosures of contingent assets and liabilities at the date of these consolidated financial statements and the reported amounts of revenues and expenses for the years presented. Actual results may differ from these estimates under different assumptions and conditions.

Estimates and underlying assumptions are reviewed on an ongoing basis. Revisions to accounting estimates are recognised in the period in which the estimate is revised and future periods affected. The Group considers the following areas as the key sources of estimation uncertainty:

#### (i) Oil & gas reserves

Oil & gas reserves are estimated on a proved and probable entitlement interest basis. Proven and probable reserves are estimated using standard recognised evaluation techniques. The estimate is reviewed regularly. Future development costs are estimated taking into account the level of development required to produce the reserves by reference to operators, where applicable, and internal engineers.

Net entitlement reserves estimates are subsequently calculated using the Group's current oil price and cost recovery assumptions, in line with the relevant agreements.

Changes in reserves as a result of factors such as production cost, recovery rates, grade of reserves or commodity prices could impact the depreciation rates, carrying value of assets and environmental and restoration provisions.

# (ii) Carrying value of exploration and evaluation fixed assets

Where a project is sufficiently advanced the recoverability of IFRS 6 Exploration assets are assessed by comparing the carrying value to higher of fair value less cost of disposal or value in use. Change to the valuation of exploration assets is an area of judgement. Further details on the Group's accounting policies on this are set out in the accounting policy above. The amounts for exploration and evaluation assets represent active exploration projects. These amounts will be written off to the income statement as exploration costs unless commercial reserves are established or the determination process is not completed and there are no indications of impairment. The outcome of ongoing exploration, and therefore whether the carrying value of exploration and evaluation assets will ultimately be recovered, is inherently uncertain.

Details of impairment charge and the assumptions used are disclosed in Note 5.

#### (iii) Carrying value of developing/producing oil & gas assets

Management perform impairment tests on the Group's developing/producing oil & gas assets where indicators of impairment are identified in accordance with IAS 36.

The impairment assessments are based on a range of estimates and assumptions, including:

Estimates/assumptions	Basis
Future production	proved and probable reserves, resource estimates and, in certain cases, expansion projects
Commodity prices	management's best estimate benchmarked with external sources of information, to ensure they are within the range of available analyst forecast
Discount to price	management's best estimate based on historical prevailing discount
Extension of PSC	assumed that PSC for Rajasthan block would be extended until 2030 on the same commercial terms
Discount rates	cost of capital risk-adjusted for the risk specific to the asset/CGU

Other key assumptions in the impairment models based on management expectations are that government approval will be received for new projects and projects will be successfully implemented as planned.

Any subsequent changes to cash flows due to changes in the above mentioned factors could impact the carrying value of the assets.

Details of impairment charge and the assumptions used are disclosed in Note 5.

#### (iv) Mining properties and leases

The carrying value of mining property and leases is arrived at by depreciating the assets over the life of the mine using the unit of production method based on proved and probable reserves. The estimate of reserves is subject to assumptions relating to life of the mine and may change when new information becomes available. Changes in reserves as a result of factors such as production cost, recovery rates, grade of reserves or commodity prices could thus impact the carrying values of mining properties and leases and environmental and restoration provisions.

Management performs impairment tests when there is an indication of impairment. The impairment assessments are based on a range of estimates and assumptions, including:

Estimates/assumptions	Basis						
Future production	proved and probable reserves, resource estimates (with an appropriate conversion factor) considering the expected permitted mining volumes and, in certain cases, expansion projects						
Commodity prices	management's best estimate benchmarked with external sources of information, to ensure they are within the range of available analyst forecast						
Exchange rates	management's best estimate benchmarked with external sources of information						
Discount rates	cost of capital risk-adjusted for the risk specific to the asset/CGU						

Details of impairment charge are disclosed in Note 5.

#### (v) Useful economic lives and impairment of other assets

Property, plant and equipment other than mining properties, oil & gas properties, and leases are depreciated over their useful economic lives. Management reviews the useful economic lives at least once a year and any changes could affect the depreciation rates prospectively and hence the asset carrying values. The Group also reviews its property, plant and equipment, including mining properties and leases, for possible impairment if there are events or changes in circumstances that indicate that carrying values of the assets may not be recoverable. In assessing the property, plant and equipment for impairment, factors leading to significant reduction in profits such as changes in commodity prices, the Group's business plans and changes in regulatory environment are taken into consideration. The carrying value of the assets of a cash-generating unit (CGU) is compared with the recoverable amount of those assets, that is, the higher of fair value less costs of disposal and value in use. Recoverable value is based on the management estimates of commodity prices, market demand and supply, economic and regulatory climates, long-term plan, discount rates and other factors. Any subsequent changes to cash flow due to changes in the above mentioned factors could impact the carrying value of the assets.

# (vi) Assessment of impairment at Lanjigarh Refinery

During the year, the Group has received the necessary approvals for expansion of the Lanjigarh refinery to 4 million tonnes per annum (mtpa). Approval for expansion from 4mtpa to 6mtpa is dependent upon certain conditions.

Accordingly, second stream operation has commenced in Alumina refinery from April 2016 thus, taking it to the debottlenecked capacity of 1.7–2.0mtpa (contingent on bauxite quality). Further ramp up to 4mtpa will be considered after tying up the local bauxite sources. The Group has considered the delay in tying up local bauxite sources as an indication of impairment. Hence, the Group has reviewed the carrying value of its property, plant and equipment at Lanjigarh as at balance sheet date, estimated the recoverable amounts of these assets and concluded that there was no impairment because the recoverable amount (estimated based on fair value less cost of disposal) exceeded the carrying amounts.

The key assumptions and estimates used in determining the fair value less cost of disposal of these assets were:

- The State of Odisha has abundant bauxite resources and under the terms of the Memorandum of Understanding (MOU) with the Government of Odisha, management is confident that bauxite will be made available in the short to medium term. The Company has entered into agreements with various suppliers internationally and domestically to ensure the availability of bauxite to run its refinery. In the initial years, the Company has assumed that bauxite will be purchased from third party suppliers in India and other countries, until the bauxite is sourced from own mines.
- The State of Odisha has taken certain measures including reservation of areas for mining operations or undertaking prospecting and
  constitution of Ministerial Committee for formulation of policy for supply of ores to Odisha based industries on long-term basis. GOI
  has amended the existing MMDR Act. The major change is in the process of grant of concessions i.e. from first come, first served
  basis to more transparent process of auction and to expedite the grant process.
- Management expects that the conditions for construction of the Alumina refinery beyond 4mtpa will be fulfilled and it is assumed that the final unconditional approval for the expansion of the refinery would be received for commencement of production by fiscal 2020.
- The Government of Odisha has cancelled all the old reservations for mine allotment and has formed a more transparent process of auction of mines under the MMDR Act, which will improve the chances of local bauxite availability.

Management expects that the mining approvals for various local bauxite mines will be received. The Group carries out impairment assessment for carrying value of these assets, every half year and challenges these assumptions.

The Group has carried out a sensitivity analysis on the key variables including delay in obtaining bauxite mining approval, appreciation of rupee against US dollar, discount rate and London Metal Exchange aluminium prices. The most significant variable is the estimated timeframe for obtaining regulatory approval for the mining and/or gaining access to local bauxite. The sensitivity analysis indicates that even if regulatory approvals for mines/access to local bauxite are delayed by a year, the recoverable amount is still expected to exceed the carrying value and costs. As at 31 March 2016 the carrying amount of property, plant and equipment related to Alumina refinery operations at Lanjigarh and related mining assets is US\$1,079.0 million (31 March 2015: US\$1,165 million).

# (vii) Assessment of impairment of Karnataka and Goa iron ore mines Karnataka mining

The mining ban in Karnataka was lifted on 17 April 2013 and the mining operations resumed in December 2013. The mining operations were suspended since August 2014 pending environment clearances. On execution of Mining Lease Deed and final forest clearance, the operations were resumed towards the end of February 2015. Currently the permissible extraction capacity is fixed at 2.29mtpa which is based on lowest of Reserves and Resources (R&R) capacity, dumping capacity and road capacity as assessed by Indian Council of Forestry Research and Education. Subsequently, based on reassessment of R&R and other factors, the modified mining plan has been submitted to Indian Bureau of Mines in March 2016 for enhancement of production to 6mtpa. Management has estimated the recoverable amounts of these assets considering the increase in the extraction capacity in FY2017.

A delay of one year in increase in the allocated capacity would result in reduction in the recoverable amount by approximately 1% and the recoverable amount would continue to be sufficiently in excess of the carrying value.

The carrying value of assets as at 31 March 2016 is US\$145.6 million (31 March 2015: US\$168.1 million).

#### Goa mining

The Ministry of Environment and Forest revoked its earlier order which had kept the environment clearances for iron ore mines in Goa in abeyance. The State Government has issued a mining policy and has lifted the ban on iron ore mining in Goa. The Group has been allocated with an interim annual mining quantity of 6.9 million tonnes per annum (mtpa) (out of the total interim mining cap of 20mtpa for FY2016) of saleable ore.

The Expert Committee, constituted by the Supreme Court of India for conducting the Macro-Environmental Impact Assessment study on the ceiling of annual extraction of iron ore mining in Goa has recommended the enhancement of the mining cap to 30mtpa. This has been recommended to be further enhanced to 37mtpa after the review of the Macro-Environmental Impact Assessment and augmenting the carrying capacity. The report is pending for consideration of the Supreme Court. Post the Supreme Court clearance, the State Government will allocate the limits. It has been assumed that the allocation will be made based on the proportionate share of the current EC limits.

The mining operations resumed in October 2015. Management has estimated the recoverable amounts of these assets considering the mining cap of 30mtpa in FY2017 and 37mtpa from FY2018 and onwards.

A delay of one year in increase in the mining cap to 30mtpa and 37mtpa would result in a reduction in the recoverable amount by approximately 4% and the recoverable amount would continue to be sufficiently in excess of the carrying value.

The carrying value of assets as at 31 March 2016 is US\$643.9 million (31 March 2015: US\$736.3 million).

Management has reviewed the carrying value of Karnataka and Goa mining assets as at the balance sheet date, estimated the recoverable amounts of these assets and concluded that there was no impairment as the recoverable amount (estimated based on fair value less costs of disposal) exceeded the carrying amounts.

The Group has also carried out a sensitivity analysis on key variables including delay in increase in the mining cap, movement in iron ore prices, discount rate and appreciation of rupee against US dollar. Based on the sensitivity analysis, the recoverable amount is still expected to exceed the carrying value.

# (viii) Assessment of impairment at Western Cluster Limited (WCL)

The project in Liberia is at exploratory stage and considering the low iron ore prices and volatility, geo-political factors and no immediate plans for any substantive expenditure, the Group has impaired these assets fully.

Details of impairment charge are disclosed in Note 5.

#### (ix) Assessment of impairment at Konkola Copper Mines (KCM)

The KCM operations in Zambia have experienced the challenging price environment, rising electricity cost and other operational challenges. Due to these factors, the Group has reviewed the carrying value of its property, plant and equipment at KCM as at balance sheet date, estimated the recoverable amounts of the assets and concluded that there was no impairment because the recoverable amount (estimated based on fair value less costs of disposal) exceeded the carrying amounts.

The Group has also carried out a sensitivity analysis on key variables like movement in copper prices, discount rate and increase in production. Based on the sensitivity analysis, the recoverable amount is still expected to exceed the carrying value.

The carrying value of assets as at 31 March 2016 is US\$1,744.9 million (31 March 2015: US\$2,010.3 million).

#### (x) Restoration, rehabilitation and environmental costs

Provision is made for costs associated with restoration and rehabilitation of mining sites as soon as the obligation to incur such costs arises. Such restoration and closure costs are typical of extractive industries and they are normally incurred at the end of the life of the mine. The costs are estimated on an annual basis on the basis of closure plans and the estimated discounted costs of dismantling and removing these facilities and the costs of restoration are capitalised as soon as the obligation to incur such costs arises. A corresponding provision is created on the liability side. The capitalised asset is charged to the income statement over the life of the operation through the depreciation of the asset and the provision is increased each period via unwinding the discount on the provision. Management estimates are based on local legislation and/or other agreements. The actual costs and cash outflows may differ from estimates because of changes in laws and regulations, changes in prices, analysis of site conditions and changes in restoration technology.

#### (xi) Provisions and liabilities

Provisions and liabilities are recognised in the period when it becomes probable that there will be a future outflow of funds resulting from past operations or events that can be reasonably estimated. The timing of recognition requires the application of judgement to existing facts and circumstances which may be subject to change especially when taken in the context of the legal environment in India. The actual cash outflows may take place over many years in the future and hence the carrying amounts of provisions and liabilities are regularly reviewed and adjusted to take into account the changing circumstances and other factors that influence the provisions and liabilities. This is set out in Note 30.

#### (xii) Contingencies and commitments

In the normal course of business, contingent liabilities may arise from litigation, taxation and other claims against the Group. Where it is management's assessment that the outcome cannot be reliably quantified or is uncertain, the claims are disclosed as contingent liabilities unless the likelihood of an adverse outcome is remote. Such liabilities are disclosed in the notes but are not provided for in the financial statements.

While considering the possible, probable and remote analysis of taxation, legal and other claims, there is always a certain degree of judgement involved pertaining to the application of the legislation which in certain cases is supported by views of tax experts and/or earlier precedents in similar matters. Although there can be no assurance regarding the final outcome of the legal proceedings, the Group does not expect them to have a materially adverse impact on the Group's financial position or profitability. These are set out in Note 38 and Note 42.

#### (xiii) The HZL and BALCO call options

The Group had exercised its call option to acquire the remaining 49% interest in BALCO and 29.5% interest in HZL. The Government of India has, however, contested the validity of the options and disputed their valuation performed in terms of the relevant agreements, the details of which are set out in Note 39. In view of the lack of resolution on the options, the non-response to the exercise and valuation request from the Government of India, the resultant uncertainty surrounding the potential transaction and the valuation of the consideration payable, the Group considers the strike price of the options to be at fair value, accordingly, the value of the option would be nil, and hence, the call options have not been recognised in the financial statements.

#### 3. Segment information

The Group is a diversified natural resources group engaged in exploring, extracting and processing minerals and oil & gas. We produce zinc, lead, silver, copper, aluminium, iron ore, oil & gas and commercial power and have presence across India, South Africa, Namibia, Ireland, Australia and Liberia. The Group is also in the business of port operations in India.

The Group's reportable segments defined in accordance with IFRS 8 are as follows:

- Zinc-India
- Zinc-International
- Oil & Gas
- Iron Ore
- Copper-India/Australia
- Copper-Zambia
- Aluminium
- Power

The components not meeting the quantitative threshold for reporting are being reported as 'Others'.

Management monitors the operating results of reportable segments for the purpose of making decisions about resources to be allocated and for assessing performance. Segment performance is evaluated based on the EBITDA of each segment. Business segment financial data includes certain corporate costs, which have been allocated on an appropriate basis. Inter-segment sales are charged based on prevailing market prices.

The following tables present revenue and profit information and certain asset and liability information regarding the Group's reportable segments for the years ended 31 March 2016 and 31 March 2015. Items after operating profit are not allocated by segment.

# (a) Reportable segments Year ended 31 March 2016

(US\$ million)	Zinc- India	Zinc-Internati onal	Oil & Gas	Iron Ore	Copper-In dia/ Australia	Copper-Za mbia	Aluminium	Power	Total reportable segment	Elimination/ Others	Total operations
REVENUE											
Sales to external customers	2,111.0	391.5	1,322.3	341.8	3,196.8	966.7	1,692.3	691.7	10,714.1	23.8	10,737.9
Inter-segment sales <sup>3</sup>	-	-	-	8.2	0.4	5.8	2.0	15.8	32.2	(32.2)	_
Segment revenue	2,111.0	391.5	1,322.3	350.0	3,197.2	972.5	1,694.3	707.5	10,746.3	(8.4)	10,737.9
Segment result											
EBITDA <sup>1</sup>	995.0	68.1	570.4	73.4	336.6	(17.9)	106.7	196.3	2,328.6	7.8	2,336.4
Depreciation and amortisation <sup>2</sup>											(1,455.2)
Special items (Note 5)											(5,210.1)
Operating loss											(4,328.9)
Investment revenue											697.8
Finance costs											(1,280.4)
Other gains and (losses) (net)											(72.5)
LOSS BEFORE TAXATION											(4,984.0)
Segments assets	8,034.7	544.3	7,391.5	1,432.2	1,351.8	2,208.7	5,915.1	3,205.9	30,084.2	88.1	30,172.3
Unallocated assets											147.1
TOTAL ASSETS											30,319.4
Segment liabilities	(1,290.4)	(191.7)	(1,018.2)	(1,213.7)	(766.5)	(1,461.0)	(6,912.8)	(3,324.2)	(16,178.5)	(56.0)	(16,234.5)
Unallocated liabilities											(7,232.4)
TOTAL LIABILITIES											(23,466.9)
Other segment information											
Additions to property, plant and equipment and intangible assets	239.9	58.5	214.3	14.8	18.4	27.6	119.6	50.3	743.4	7.3	750.7
Depreciation and amortisation	(119.9)	(56.4)	(826.3)	(62.5)	(32.3)	(179.5)	(101.8)	(74.1)	(1,452.8)	(2.4)	(1,455.2)
Impairment losses (Note 5)		·	(4,934.2)	(245.2)	(7.6)	•		·	·		(5,187.0)

EBITDA is a non-IFRS measure and represents operating profit/(loss) before special items, depreciation, amortisation, interest and tax.
 Depreciation and amortisation is also provided to the chief operating decision maker on a regular basis.
 Transfer prices for inter-segment sales are on an arm's length basis in a manner similar to transactions with third parties. However, inter-segment sales at BALCO amounting to US\$6.6 million for the year ended 31 March 2016 (31 March 2015; NiI), is at cost.

(US\$ million)	Zinc- India	Zinc-Internati onal	Oil & Gas	Iron Ore	Copper-In dia/ Australia	Copper-Za mbia	Aluminium	Power	Total reportable segment	Elimination/ Others	Total operations
REVENUE											
Sales to external customers	2,357.0	586.9	2,397.5	311.4	3,682.7	883.5	2,078.1	552.8	12,849.9	28.8	12,878.7
Inter-segment sales <sup>3,4</sup>	_	-	_	15.1	18.0	193.6	3.8	35.3	265.8	(265.8)	-
Segment revenue	2,357.0	586.9	2,397.5	326.5	3,700.7	1,077.1	2,081.9	588.1	13,115.7	(237.0)	12,878.7
Segment result											
EBITDA <sup>1</sup>	1,192.5	180.8	1,476.8	31.4	281.0	(3.8)	415.5	153.8	3,728.0	13.2	3,741.2
Depreciation and amortisation <sup>2</sup>											(2,005.7)
Special items (Note 5)											(6,744.2)
Operating loss											(5,008.7)
Investment revenue											832.6
Finance costs											(1,387.2)
Other gains and (losses) (net)											(76.9)
LOSS BEFORE TAXATION											(5,640.2)
Segments assets <sup>5</sup>	7,356.8	694.1	12,948.8	1,924.3	1,357.8	2,387.1	6,304.6	3,584.7	36,558.2	58.4	36,616.6
Unallocated assets											372.3
TOTAL ASSETS											36,988.9
Segment liabilities <sup>5</sup>	(277.9)	(253.0)	(3,105.7)	(1,329.8)	(1,286.6)	(1,474.2)	(5,171.6)	(2,388.5)	(15,287.3)	(113.9)	(15,401.2)
Unallocated liabilities											(9,330.3)
TOTAL LIABILITIES											(24,731.5)
Other segment information											
Additions to property, plant and equipment and intangible assets	217.7	34.4	1,079.6	42.1	29.7	58.2	148.9	140.3	1,750.9	1.1	1,752.0
Depreciation and amortisation	(133.2)	(111.1)	(1,270.3)	(42.3)	(51.6)	(187.2)	(140.2)	(65.8)	(2,001.7)	(4.0)	(2,005.7)
Impairment losses (Note 5)	_	_	(6,642.1)	_	_	(52.3)	_	_	(6,694.4)	_	(6,694.4)

EBITDA is a non-IFRS measure and represents operating profit/(loss) before special items, depreciation, amortisation, interest and tax.

Depreciation and amortisation is also provided to the chief operating decision maker on a regular basis.

Transfer prices for inter-segment sales are on an arm's length basis in a manner similar to transactions with third parties. However, inter-segment sales at BALCO amounting to US\$6.6 million for the year ended 31 March 2016 (31 March 2015: Nil), is at cost.

Trevious year amounts have been reclassified to ensure consistency.

During the year ended 31 March 2016, consequent to certain power facilities at a subsidiary being commissioned for the generation and sale of commercial power, assets (US\$349.2 million) and liabilities (US\$48.6 million) in respect of capital work-in-progress for the previous year relating to the generation and sale of commercial power has been reclassified from the 'Aluminium' segment to the 'Power' segment as this more accurately reflects the segment breakdown.

## (b) Geographical segmental analysis

The Group's operations are located in India, Zambia, Namibia, South Africa, Liberia, Ireland, Australia and UAE. The following table provides an analysis of the Group's sales by region in which the customer is located, irrespective of the origin of the goods.

(100 million)	Year ended 31 March	D	Year ended 31 March	Danasatana
(US\$ million)	2016	Percentage	2015	Percentage
India	6,773.9	63.1%	7,872.0	61.1%
China	527.9	4.9%	1,314.2	10.2%
Far East Asia	902.5	8.4%	1,168.4	9.1%
Middle East	1,075.1	10.0%	1,143.7	8.9%
Europe	345.3	3.2%	643.3	5.0%
Africa	91.1	0.8%	192.3	1.5%
Asia Others	725.3	6.8%	118.9	0.9%
UK	103.9	1.0%	2.2	0.0%
Others	192.9	1.8%	423.7	3.3%
Total	10,737.9	100.0%	12,878.7	100.0%

The following is an analysis of the carrying amount of non-current assets, and additions to property, plant and equipment, analysed by the country in which the assets are located. No material non-current assets are located in the United Kingdom and no significant additions to property, plant and equipment have been made there.

	Carrying a non-curre	Additions to property, plant and equipment		
(US\$ million)	As at 31 March 2016	As at 31 March 2015	Year ended 31 March 2016	Year ended 31 March 2015
Australia	4.4	13.4	2.6	3.8
India	14,752.9	20,996.2	651.7	1,635.7
Zambia	1,863.3	1,905.4	27.6	58.2
Namibia	119.7	128.5	35.4	21.5
Ireland	6.7	37.7	_	12.7
South Africa	254.0	335.9	23.1	5.9
Sri Lanka	_	_	7.3	2.7
Other	-	213.6	3.0	11.5
Total	17,001.0	23,630.7	750.7	1,752.0

<sup>1</sup> Non-current assets do not include deferred tax assets, non-current tax assets and derivative assets.

## Information about major customer

Included in revenue from the Oil & Gas segment are revenues of US\$663.1 million (year ended 31 March 2015: US\$1,393.2 million), which arose from sales to the Group's largest customer; sales to this customer were more than 10% in the previous year. No customer contributed 10% or more to the Group's revenue during the year ended 31 March 2016.

# 4. Total revenue

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Revenue from sales of goods	10,737.9	12,878.7
Other operating income	101.7	104.0
Investment revenue	697.8	832.6
Total	11,537.4	13,815.3

#### 5. Special items

	Year ended 31 March 2016		Year	Year ended 31 March 2015		
(US\$ million)	Special items	Tax effect of special items/ special tax items	Special items after tax	Special items	Tax effect of special items/ special tax items	Special items after tax
Impairment of oil & gas assets <sup>1a</sup>	(4,934.2)	1,903.3	(3,030.9)	(6,642.1)	2,138.0	(4,504.1)
Impairment of mining reserves and assets					_	
Iron ore <sup>1b</sup>	(245.2)	_	(245.2)	_	_	_
Copper <sup>1c,d</sup>	(7.6)	_	(7.6)	(52.3)	_	(52.3)
Total impairment charge	(5,187.0)	1,903.3	(3,283.7)	(6,694.4)	2,138.0	(4,556.4)
Voluntary retirement schemes (redundancy costs) <sup>2</sup>	(23.1)	7.9	(15.2)	_	_	_
Provision for receivables <sup>7</sup>	_	_	_	(36.6)	12.5	(24.1)
Provision for investment in coal blocks <sup>3</sup>	_	_	_	(5.4)	1.8	(3.6)
Acquisition and restructuring related costs <sup>4</sup>	_	_	_	0.4	_	0.4
Provision for contractor dispute <sup>5</sup>	_	_	_	(8.2)	_	(8.2)
Special tax item <sup>6</sup>	_	(173.8)	(173.8)	_	52.8	52.8
Special items	(5,210.1)	1,737.4	(3,472.7)	(6,744.2)	2,205.1	(4,539.1)

1a During the year ended 31 March 2016, the Group has recognised impairment charge on its oil & gas assets of US\$4,934.2 million mainly relating to Rajasthan block, triggered by the significant fall in the crude oil prices, prevailing discount of Rajasthan crude and adverse long-term impact of revised cess. Of this charge, US\$1,143.5 million has been recorded against oil & gas properties and US\$3,790.7 million against exploratory and evaluation assets. The valuation remains dependent on price and further deterioration in long-term prices may result in additional impairment.

For oil & gas properties, CGUs identified are on the basis of a production sharing contract (PSC) level as it is the smallest group of assets that generates cash inflows that are largely independent of the cash inflows from other assets or group of assets.

The recoverable amount of the CGU, US\$2,204.0 million (March 2015: US\$5,825.5 million), was determined based on the fair value less costs of disposal approach, a level-3 valuation technique in the fair value hierarchy, as it more accurately reflects the recoverable amount based on our view of the assumptions that would be used by a market participant. This is based on the cash flows expected to be generated by the projected oil or natural gas production profiles up to the expected dates of cessation of production sharing contract (PSC)/cessation of production from each producing field based on current estimates of reserves and risked resources. Reserves assumptions for fair value less costs of disposal discounted cash flow tests consider all reserves that a market participant would consider when valuing the asset, which are usually broader in scope than the reserves used in a value-in-use test. Discounted cash flow analysis used to calculate fair value less costs of disposal uses assumption for oil price of US\$41 per barrel for FY2017 (March 2015: US\$70 per barrel) and the long-term nominal price of US\$70 per barrel) derived from a consensus of various analyst recommendations. Thereafter, these have been escalated at a rate of 2.5% per annum. The cash flows are discounted using the post-tax nominal discount rate of 11.00% (March 2015: 10.32%) derived from the post-tax weighted average cost of capital.

The impairment loss relates to the Oil & Gas business reportable segments, however this has been shown as special items and does not form part of the segment result for the purpose of segment reporting.

During the year ended 31 March 2015, the Group has recognised impairment charge on oil & gas assets of US\$6,642.1 million mainly relating to Rajasthan block and Sri Lanka block, triggered by the significant fall in the crude oil prices. Of this charge, US\$2,162.1 million has been recorded against oil & gas properties and US\$4,480.0 million against exploratory and evaluation assets. The impairment charge of US\$4,480.0 million also includes US\$778.1 million impairment charge relating to exploratory wells in Sri Lanka, as the development of hydrocarbons in the said block is not commercially viable at the current prices.

- 1b During the year ended 31 March 2016, the Group has recognised US\$227.5 million impairment charge in respect of the exploratory assets in West Africa (Western Cluster, Liberia) on account of low iron ore prices, geo-political factors and no plans for any substantive expenditure resulting in continued uncertainty in the project and relates to US\$17.7 million impairment charge in the carrying amount of idle assets grouped under assets under construction at Bellary, Karnataka in India.
- 1c During the year ended 31 March 2016, the Group has recognised US\$7.6 million impairment charge relating to its operation in the Copper Mines of Tasmania Pty Ltd, Australia on account of extended care and maintenance, lower copper prices and continued uncertainty in start-up of operations.
- 1d During the year ended 31 March 2015, the Group has recognised US\$52.3 million impairment charge relating to underground assets in Nchanga in Konkola Copper Mines Plc on account of suspension of operations and the fall in the copper prices. Of this charge, US\$47.2 million has been recorded against mining property and leases and US\$5.1 million against plant and equipment.
- 2 US\$23.1 million incurred under a Group-wide voluntary retirement initiative across various Group entities.
- 3 Relates to provision recognised in respect of expenditure incurred on cancelled coal blocks allotted to Company's subsidiaries, pursuant to the order of the Supreme Court of India.
- 4 Acquisition related costs include reversal of excess provision for costs of Group simplification and restructuring and other acquisition related costs classified as special items in previous year.
- Relates to a provision recognised following a dispute with a mining contractor at KCM Zambia.
- As a result of amendments to the Zambian Mining Tax regime, effective from 1 January 2015, the tax rate on integrated mining operations (excluding custom smelting mineral processing activities) was reduced from 30% to 0%. The deferred tax liability in relation to mining operations was therefore reversed during the year ended 31 March 2015, resulting in a net credit to the income statement of US\$52.8 million. Consequent to the subsequent amendments to the Zambian Mining Tax regime, effective from 1 July 2015 the tax rate on mining operations has been restored from 0% to 30%. Further, the set off of carried forward losses relating to mining operations has been restricted to a maximum of 50% of the income for the year. Accordingly, a total deferred tax charge of US\$173.8 million resulting from the amendments has been recognised under 'Special tax items' during the year ended 31 March 2016, increase as compared to reversal in previous year is mainly on account of restriction placed on maximum loss which can be set off in a particular year.
- 7 In respect of iron ore mining at Goa, the Supreme Court has ruled that, out of the sale proceeds of inventory of excavated ore lying unsold, the leaseholder would be paid only the average cost of excavation. However, the carrying value includes the amortisation based on the fair value of mining reserves determined at the time of acquisition.

  Consequently, the excess of the carrying value of receivables over the net realisable value has been written off.

# 6. Investment revenue

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Interest income on loans and receivables	26.4	29.3
Interest income on cash and bank balances	124.6	139.9
Change in fair value of financial assets held for trading realised and unrealised	541.3	656.9
Dividend income on financial assets held for trading	0.3	0.3
Dividend income on available for sale investment	0.1	_
Foreign exchange gain on cash and liquid investments	5.1	6.2
	697.8	832.6

# 7. Finance costs

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Interest on loans, overdrafts and bonds (a)	1,101.3	1,116.8
Coupon interest on convertible bonds (Note 28)	62.4	86.8
Accretive interest on convertible bonds (Note 28)	28.7	76.6
Total interest charge on convertible bonds (b)	91.1	163.4
Other borrowing and finance costs (c)	160.3	194.1
Total interest cost (a+b+c)	1,352.7	1,474.3
Unwinding of discount on provisions (Note 30)	13.5	36.8
Net interest on defined benefit arrangements (Note 33)	10.4	9.2
Capitalisation of borrowing costs (Note 17) <sup>1</sup>	(75.6)	(133.1)
Gain on buy back of convertible bond	(20.6)	_
	1,280.4	1,387.2

<sup>1</sup> All borrowing costs are capitalised using rates based on specific borrowings with the interests ranging between 1.9% to 12.2% per annum.

# 8. Other gains and (losses) (net)

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Gross foreign exchange losses	(103.7)	(80.8)
Qualifying exchange losses capitalised (Note 17)	10.1	14.4
Net foreign exchange gains and losses	(93.6)	(66.4)
Change in fair value of financial liabilities measured at fair value	(0.9)	(1.1)
Net (loss)/gain arising on qualifying hedges and non-qualifying hedges	22.0	(9.4)
	(72.5)	(76.9)

## 9. Loss for the year has been stated after charging/(crediting):

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Depreciation and amortisation	1,455.2	2,005.7
Costs of inventories recognised as an expense	3,708.0	3,905.0
Auditor's remuneration for audit services	2.4	2.5
Research and development	0.8	0.8
Net loss/(profit) on disposal of property, plant and equipment	1.5	4.6
Provision for receivables	_	80.4
Impairment of mining reserves and assets	252.8	52.3
Impairment of oil & gas assets	4,934.2	6,642.1
Staff costs	639.7	812.8
Foreign exchange gains and losses <sup>1</sup>	106.1	82.8

<sup>1</sup> Includes foreign exchange losses on non-operational monetary items of US\$93.6 million (31 March 2015: US\$66.4 million), and on operational monetary items of US\$17.6 million (31 March 2015: US\$22.6 million). It also includes foreign exchange gain on cash and liquid investments of US\$5.1 million (31 March 2015: US\$6.2 million).

## 10. Auditor's remuneration

The table below shows the fees payable globally to the Company's auditor, Deloitte LLP, for statutory external audit and audit related services, as well as fees paid to other accountancy firms for statutory external audit and audit related services in each of the two years ended 31 March:

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Fees payable to the Company's auditor for the audit of Vedanta Resources plc annual accounts	0.6	0.6
The audit of the Company's subsidiaries pursuant to legislation	1.8	1.9
Total audit fees	2.4	2.5
Fees payable to the Company's auditor and their associates for other services to the Group		
Other services pursuant to legislation <sup>1</sup>	1.4	1.4
Tax services <sup>2</sup>	0.4	0.4
Corporate finance services <sup>3</sup>	0.7	0.5
Other services <sup>4</sup>	0.2	0.2
Total non-audit fees	2.7	2.5
Total fees paid to the Company's auditor	5.1	5.0
Audit fees payable to other auditors of the Group's subsidiaries	0.3	0.4
Non-audit fees payable to other auditors of the Group's subsidiaries	0.2	0.1
Total fees paid to other auditors	0.5	0.5

<sup>1</sup> Other services pursuant to legislation principally comprise assurance services, being quarterly reviews of the Group's subsidiaries' results and the half year review of the Group's results.

<sup>2</sup> Tax services principally comprise certification and assurance services as required by Indian and overseas tax regulations.

<sup>3</sup> Corporate finance services principally comprise Group simplification and other acquisition related certifications. These assurance-related services are ordinarily provided by the auditor.

<sup>4</sup> Includes certification related services.

## 11. Employee numbers and costs

Average number of persons employed by the Group in the year

India	Class of business	Year ended 31 March 2016	Year ended 31 March 2015
International   1,845   1,986   1,98	Zinc	6,780	7,428
— International   1,845   1,981     Iron Ore   3,034   3,46     Copper   3,034   3,46     Copper   3,105   1,105     — IndialAustralia   1,058   1,105     — IndialAustralia   7,215   7,52     Aluminium   5,266   5,33     Power   3,34   3,56     Other   3,105   3,21	– India	4,935	5,439
Copper         8.273         8,711           - India/Australia         1,058         1,188           - Zambia         7,215         7,525           Aluminium         5,666         5,93           Power         334         15,27         1,68           Other         321         14           Costs incurred during the year in respect of employees and Executive Directors         Vear ended 31 Masch	- International	1,845	1,989
India Australia	Iron Ore	3,034	3,465
Tambia   T	Copper	8,273	8,710
Power   Space   Spac	- India/Australia	1,058	1,185
Power   334   355   35	– Zambia	7,215	7,525
1,627   1,628   1,629   1,62	Aluminium	5,266	5,932
	Power	334	358
Costs Incurred during the year in respect of employees and Executive Directors	Oil & Gas	1,527	1,684
Costs incurred during the year in respect of employees and Executive Directors         Year ended 31 March 201         Year ended 31 March 201           Salaries and wages         575.8         733.           Defined contribution pension scheme costs (Note 33)         18.2         19.2           Share-based payments charge         15.6         28.1           12. Tax         Year ended 31 March 201         28.1           UKS million)         Year ended 31 March 201         28.1           UKS corporation tax         1.5         (19.3           Foreign tax         1.5         (19.3           Foreign tax         9.0         1.1           Australia         9.0         1.1           Australia         9.0         1.2           - Other         (7.8)         4.2           - Other         (7.8)         4.5           Deferred tax: (Note 31)         (1,903.3)         (2,138.0)           Deferred tax impact on impairment of oil & gas assets (Note 5)         (1,903.3)         (2,138.0)           Deferred tax impact on impairment of oil & gas assets (Note 5)         (1,903.3)         (2,138.0)           Deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5)         173.8         (52.8)           Deferred tax charge/(reversal) due to change in tax	Other	321	140
Vear ended   Vea		25,535	27,717
Marie   Mari	Costs incurred during the year in respect of employees and Executive Directors		
Salaries and wages         575.8         733.1           Defined contribution pension scheme costs (Note 33)         30.1         30.1           Defined benefit pension scheme costs (Note 33)         18.2         19.2           Share-based payments charge         15.6         28.1           12. Tax           Year ended 31 March 2016         Year ended 31 March 2016         31 March 2016           Current tax:           UK Corporation tax         1.5         (19.3           Foreign tax         1.5         692.           Lambia         536.5         562.           Zambia         0.0         1.1           Australia         0.0         (0.1           Africa and Europe         4.5         22.           Cother         (7.8)         4.           Deferred tax: (Note 31)           Deferred tax impact on impairment of oil & gas assets (Note 5)         (1,903.8)         (2,138.0)           Deferred tax others         (289.1)         (282.5)           Net tax credit <sup>1</sup> (1,481.9)         (1,842.3)	(US\$ million)	31 March	Year ended 31 March 2015
Defined contribution pension scheme costs (Note 33)         30.1         30.0           Defined benefit pension scheme costs (Note 33)         18.2         19.2           Share-based payments charge         15.6         28.0           12. Tax         Teach and Europe         Year ended 31 March 2016         Year en			
18.2   19.2   19.2   19.3			
Share-based payments charge         15.6         28.1           12. Tax         Year ended sharp and			
12. Tax			
Vear ended   Standard   Vear ended   Standard   Stand			812.8
CUSS million)         31 Marc 2016         31 Marc 2016         31 Marc 2016         31 Marc 2016         201           CUrrent tax:         UK Corporation tax         1.5         (19.3           Foreign tax         - India         538.5         562.7           - Zambia         0.0         1.1           - Australia         0.0         (0.1           - Africa and Europe         4.5         22.           - Other         (7.8)         4.4           Deferred tax: (Note 31)         Deferred tax: (Note 31)         173.8         (52.8           Deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5)         173.8         (52.8           Deferred tax others         (289.1)         (232.5           Net tax credit <sup>1</sup> (1,481.9)         (1,852.5	12. Tax		
UK Corporation tax 1.5 (19.3 Foreign tax Foreign tax - India 538.5 562.1   - Zambia 0.0 1.0   - Australia 0.0 (0.1   - Africa and Europe 4.5 22.1   - Other (7.8) 4.0    Deferred tax: (Note 31) Deferred tax impact on impairment of oil & gas assets (Note 5) (1,903.3) (2,138.0   Deferred tax others (289.1) (232.5   Deferred tax others (289.1) (2,423.3   Net tax credit (1,481.9) (1,852.5   Deferred (1,48	(US\$ million)	31 March	Year ended 31 March 2015
Foreign tax - India 538.5 562.7 - Zambia 0.0 1.0 - Australia 0.0 (0.1 - Africa and Europe 4.5 22.7 - Other (7.8) 4.0 - Other (7.8) 4.0 - Deferred tax: (Note 31) Deferred tax impact on impairment of oil & gas assets (Note 5) (1,903.3) (2,138.0) Deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5) 173.8 (52.8) Deferred tax others (289.1) (232.5)  Net tax credit (1,481.9) (1,852.5)	Current tax:		
Foreign tax - India 538.5 562.7 - Zambia 0.0 1.0 - Australia 0.0 (0.1 - Africa and Europe 4.5 22.7 - Other (7.8) 4.0 - Other (7.8) 4.0 - Deferred tax: (Note 31) Deferred tax: impact on impairment of oil & gas assets (Note 5) (1,903.3) (2,138.0) Deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5) 173.8 (52.8) Deferred tax others (2,918.6) (2,423.3) Net tax credit (1,481.9) (1,852.5)	UK Corporation tax	1.5	(19.3)
- Zambia 0.0 1.0 - Australia 0.0 (0.1 - Africa and Europe 4.5 22.0 - Other (7.8) 4.0 - Other (7.8) 536.7 570.0 - Deferred tax: (Note 31) - Deferred tax impact on impairment of oil & gas assets (Note 5) (1,903.3) (2,138.0 - Deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5) 173.8 (52.8 - Deferred tax others (289.1) (232.5 - Deferred tax credit (1,481.9) (1,852.5	Foreign tax		
Australia 0.0 (0.1 - Africa and Europe 4.5 22.6 - Other (7.8) 4.6	– India	538.5	562.7
Africa and Europe Other  (7.8) 4.0  536.7 570.8  Deferred tax: (Note 31)  Deferred tax impact on impairment of oil & gas assets (Note 5)  Deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5)  Deferred tax others  (289.1) (232.5  Net tax credit <sup>1</sup> (1,481.9) (1,852.5	– Zambia	0.0	1.0
- Other (7.8) 4.4  536.7 570.8  Deferred tax: (Note 31)  Deferred tax impact on impairment of oil & gas assets (Note 5) (1,903.3) (2,138.0) Deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5) 173.8 (52.8) Deferred tax others (289.1) (232.5)  Net tax credit <sup>1</sup> (1,481.9) (1,852.5)	– Australia	0.0	(0.1)
The state of the	– Africa and Europe	4.5	22.1
Deferred tax: (Note 31)         Deferred tax impact on impairment of oil & gas assets (Note 5)       (1,903.3)       (2,138.0)         Deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5)       173.8       (52.8)         Deferred tax others       (289.1)       (232.5)         Net tax credit <sup>1</sup> (1,481.9)       (1,852.5)	- Other	(7.8)	4.4
Deferred tax impact on impairment of oil & gas assets (Note 5) (1,903.3) (2,138.0) Deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5) 173.8 (52.8) Deferred tax others (289.1) (232.5)  (2,018.6) (2,423.3) Net tax credit <sup>1</sup> (1,481.9) (1,852.5)		536.7	570.8
Deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5)  173.8 (52.8  (289.1) (232.5  (2,018.6) (2,423.3  Net tax credit <sup>1</sup> (1,481.9) (1,852.5	Deferred tax: (Note 31)		
Deferred tax others (289.1) (232.5 (2,018.6) (2,423.3 Net tax credit <sup>1</sup> (1,481.9) (1,852.5 (2,423.3 (4	Deferred tax impact on impairment of oil & gas assets (Note 5)	(1,903.3)	(2,138.0)
(2,018.6) (2,423.3 Net tax credit <sup>1</sup> (1,481.9) (1,852.5	Deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5)	173.8	(52.8)
Net tax credit <sup>1</sup> (1,481.9) (1,852.5	Deferred tax others	(289.1)	(232.5)
		(2,018.6)	(2,423.3)
Effective tax rate <sup>2</sup> 29.7% 32.8%	Net tax credit <sup>1</sup>	(1,481.9)	(1,852.5)
	Effective tax rate <sup>2</sup>	29.7%	32.8%

<sup>1</sup> Includes tax credit on special items and tax credit – special items of US\$1,737.4 million during the year ended 31 March 2016 (31 March 2015: US\$2,205.1 million).
2 Effective tax rate excluding special items, tax credit on special items, and dividend distribution tax of 3.1% during the year ended 31 March 2016 (31 March 2015: 25.7%).

The deferred tax expense recycled from equity to the income statement is US\$1.6 million (2015: US\$6.0 million).

#### Tax expense

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Tax effect of special items (Note 5)	(1,911.2)	(2,152.3)
Special tax item – deferred tax charge/(reversal) due to change in tax regime in Zambia (Note 5)	173.8	(52.8)
Net tax credit – special items	(1,737.4)	(2,205.1)
Tax expense – others	255.5	352.6
Net tax (credit)/expense	(1,481.9)	(1,852.5)
Deferred tax recognised in the income statement:  (US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Accelerated capital allowances (including fair value adjustments)	(1,281.6)	(2,634.1)
Unutilised tax losses <sup>1</sup>	(479.7)	440.2
Other temporary differences <sup>2</sup>	(257.3)	(229.4)
	(2,018.6)	(2,423.3)

- 1 US\$236.8 million has been reclassified from unutilised tax losses to other temporary differences for the year ended 31 March 2015.
- 2 Includes MAT credit (net) US\$175.7 million for the period ended 31 March 2016 (31 March 2015: US\$321.2 million).

No deferred tax has been recognised in respect of temporary differences associated with investments in subsidiaries where the Group is in a position to control the timing of the reversal of the temporary differences and it is probable that such differences will not reverse in the foreseeable future. The aggregate amount of temporary differences associated with such investments in subsidiaries is represented by the contribution of those investments to the Group's retained earnings and amounted to US\$7,098.1 million (2015: US\$5,768.3 million).

A reconciliation of income tax expense applicable to accounting profit/(loss) before tax at the Indian statutory income tax rate to income tax expense/(credit) at the Group's effective income tax rate for the year ended 31 March 2016 is as follows:

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Accounting loss before tax	(4,984.0)	(5,640.2)
At Indian statutory income tax rate of 34.61% (2015: 33.99%)	(1,724.9)	(1,917.1)
Unrecognised tax losses	224.2	107.6
Disallowable expenses/other permanent differences	(72.0)	86.5
Dividend distribution tax	248.5	68.1
Non-taxable income	(111.4)	(73.0)
Impact of tax rate difference	67.5	118.8
Impact of change in tax regime <sup>1</sup>	201.9	(52.8)
Tax holiday and similar exemptions	(311.0)	(238.8)
Adjustments in respect of previous years	(4.7)	48.2
At effective income tax rate of 29.7% (2015: 32.8%)	(1,481.9)	(1,852.5)

<sup>1</sup> Includes US\$173.8 million (31 March 2015: US\$(52.8) million) due to change in tax regime in Zambia (Note 5) and US\$28.1 million due to change in Indian statutory rate from 33.99% to 34.61%.

Certain businesses of the Group within India are eligible for specified tax incentives in the form of tax exemptions. Most of such tax exemptions are relevant for the companies operating in India. These are briefly described as under:

#### The location-based exemption

In order to boost industrial and economic development in undeveloped regions, provided certain conditions are met, profits of newly established undertakings located in certain areas in India may benefit from a tax holiday. Such a tax holiday works to exempt 100% of the profits for the first five years from the commencement of the tax holiday, and 30% of profits for the subsequent five years. This deduction is available only for units established up to 31 March 2012. However, such undertaking would continue to be subject to the Minimum Alternative tax (MAT).

The Group has such types of undertakings at Haridwar and Pantnagar, which are part of Hindustan Zinc Limited (Zinc India). In the

current year, Haridwar and Pantnagar units are eligible for deduction at 30% and 100% of taxable profits respectively. For the next financial year, both would be eligible for deduction at 30% of taxable profits.

#### Sectoral benefit – power plants

To encourage the establishment of certain power plants, provided certain conditions are met, tax incentives exist to exempt 100% of profits and gains for any 10 consecutive years within the 15-year period following commencement of the power plant's operation. The Group currently has total operational capacity of 8.4GW of thermal based power generation facilities and wind power capacity of 274MW. However, such undertakings generating power would continue to be subject to the MAT provisions.

The Group has power plants which benefit from such deductions, at various locations of Hindustan Zinc Limited (where such benefits have been drawn), Talwandi Sabo Power Limited, Vedanta Limited and Bharat Aluminium Company Limited (where no benefit has been drawn).

#### Sectoral benefit - oil & gas

Provided certain conditions are met, profits of newly constructed industrial undertakings engaged in the oil & gas sector may benefit from a deduction of 100% of the profits of the undertaking for a period of seven consecutive years. This deduction is only available to blocks licensed prior to 31 March 2011. However, such businesses would continue to be subject to the MAT provisions.

In the Group, Cairn India Limited benefits from such deductions. Current year is the last year for claiming such benefit.

In addition, the subsidiaries incorporated in Mauritius are eligible for tax credit to the extent of 80% of the applicable tax rate on foreign source income.

The total effect of such tax holidays and exemptions was US\$311.0 million for the year ended 31 March 2016 (31 March 2015: US\$238.8 million).

#### 13. Earnings per share

Basic earnings per share (EPS) amounts are calculated by dividing net profit for the year attributable to ordinary equity holders of the parent by the weighted average number of ordinary shares outstanding during the year.

Weighted average number of treasury shares, 24,231,160 (2015: 24,206,816), outstanding during the year are excluded from the total outstanding shares for the calculation of EPS.

Diluted earnings per share amounts are calculated by dividing the net profit attributable to ordinary equity holders by the weighted average number of ordinary shares outstanding during the year (adjusted for the effects of dilutive options and the Group's convertible bonds). The following reflects the income and share data used in the basic and diluted earnings per share computations:

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Net loss attributable to equity holders of the parent	(1,837.4)	(1,798.6)
Loss per share based on loss for the year Basic/diluted loss per share on loss for the year		
(US\$ million except as stated)	Year ended 31 March 2016	Year ended 31 March 2015
Loss for the year attributable to equity holders of the parent (US\$ million)	(1,837.4)	(1,798.6)
Weighted average number of shares of the Company in issue (million)	276.0	274.8
Loss per share on loss for the year (US cents per share)	(665.8)	(654.5)

The effect of 6.8 million (2015: 4.0 million) potential ordinary shares, which relate to share option awards under the LTIP scheme, on the attributable loss for the year is anti-dilutive and thus these shares are not considered in determining diluted loss per share.

The loss for the year would be decreased if holders of the convertible bonds in Vedanta exercised their right to convert their bond holdings into Vedanta equity. The impact on loss for the year of this conversion would be the reduction in interest payable on the convertible bond.

The adjustment in respect of convertible bonds has an anti-dilutive impact on earnings and is thus not considered in determining diluted EPS.

#### Loss per share based on underlying loss for the year (non-GAAP)

Weighted average number of shares of the Company in issue (million)

Loss per share on underlying loss for the year (US cents per share)

Underlying earnings is an alternative earnings measure, which the management considers to be a useful additional measure of the Group's performance. The Group's underlying loss is the loss for the year after adding back special items, other losses/(gains) [net] (Note 8) and their resultant tax (including taxes classified as special items) and non-controlling interest effects. This is a non-GAAP measure.

(US\$ million)	Note	Year ended 31 March 2016	Year ended 31 March 2015
Loss for the year attributable to equity holders of the parent		(1,837.4)	(1,798.6)
Special items	5	5,210.1	6,744.2
Other (gains)/losses [net]		72.5	76.9
Tax and non-controlling interest effect of special items (including taxes classified as special items) and other losses/(gains)		(3,809.3)	(5,061.4)
Underlying attributable loss for the year		(364.1)	(38.9)
Basic/diluted loss per share on underlying loss for the year (non-GAAP)			
(LIS\$ million excent as stated)		Year ended 31 March 2016	Year ended 31 March

The effect of 6.8 million (2015: 4.0 million) potential ordinary shares, which relate to share option awards under the LTIP scheme, on the underlying attributable loss for the year is anti-dilutive and thus these shares are not considered in determining diluted underlying loss per share.

(364.1)

276.0

(131.9)

(38.9)

274.8

(14.2)

#### 14. Dividends

Underlying loss for the year (US\$ million)

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Amounts recognised as distributions to equity holders:		
Equity dividends on ordinary shares:		
Final dividend for 2014-15: 40.0 US cents per share (2013-14: 39.0 US cents per share)	110.6	107.5
Interim dividend paid during the year: Nil (2014-15: 23.0 US cents per share)	_	63.8
	110.6	171.3
Proposed for approval at AGM		
Equity dividends on ordinary shares:		
Final dividend for 2015-16: 30.0 US cents per share (2014-15: 40 US cents per share)	82.8	110.8
15. Goodwill		
(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Cost (gross carrying amount)	16.6	16.6
Accumulated impairment losses	_	-
Net carrying amount at 31 March	16.6	16.6

Goodwill is allocated for impairment testing purposes to the following cash-generating units (CGUs). The allocation of goodwill to CGUs is as follows:

- US\$12.2 million Copper India.
- US\$4.4 million arising on acquisition of Goa Energy Limited.

The Group tests goodwill annually for impairment or more frequently if there are indications that goodwill might be impaired.

The Company has undertaken an impairment review of goodwill of US\$16.6 million as at 31 March 2016. The carrying amount of goodwill allocated to the relevant cash-generating unit is considered to be insignificant in comparison with the total carrying value of the cash-generating unit. The carrying amount of goodwill was evaluated using the higher of fair value less cost of disposal (FVLCD) or value in use based on discounted future cash flows of the entities to which the goodwill pertains and comparing this to the total carrying

value of the relevant cash-generating units. It was determined that the carrying amount of goodwill is not impaired and nor was impairment indicated following a reasonably possible change in a key assumption.

#### 16. Intangible assets

Intangible assets include Port concession rights to operate a general cargo berth for handling coal at the outer harbour of the Visakhapatnam port on the east coast of India, rights to use treated water from a sewage treatment plant at Zinc India operations and software licenses

(US\$ million)	Port concession rights <sup>1</sup>	Others <sup>2</sup>	Total
Cost	.ig.i.e		
As at 1 April 2014	99.9	14.8	114.7
Addition	0.8	4.7	5.5
Foreign exchange differences	(4.0)	(0.9)	(4.9)
As at 1 April 2015	96.7	18.6	115.3
Addition	0.0	2.8	2.8
Foreign exchange differences	(5.2)	(1.6)	(6.8)
As at 31 March 2016	91.5	19.8	111.3
Accumulated amortisation			
As at 1 April 2014	3.5	2.6	6.1
Charge for the year	3.6	3.9	7.5
Foreign exchange differences	0.2	(0.4)	(0.2)
As at 1 April 2015	7.3	6.1	13.4
Charge for the year	3.5	3.2	6.7
Foreign exchange differences	(0.4)	(0.6)	(1.0)
As at 31 March 2016	10.4	8.7	19.1
Net book value			
As at 1 April 2014	96.4	12.2	108.6
As at 1 April 2015	89.4	12.5	101.9
As at 31 March 2016	81.1	11.1	92.2

<sup>1</sup> Vizag General Cargo Berth Private Limited (VGCB), a special purpose vehicle, was incorporated for the coal berth mechanisation and upgrades at Visakhapatnam port. VGCB is owned by Vedanta Limited and Leighton Welspun Contractors Private Limited (Leighton) in the ratio of 99.99:0.01 as on 31 March 2016 (99.99:0.01 as on 31 March 2015). Leighton has agreed to sell its shares in VGCB to Vedanta Limited. The project is to be carried out on a design, build, finance, operate, transfer basis and the concession agreement between Visakhapatnam port and VGCB was signed in June 2010. In October 2010, VGCB was awarded with the concession after fulfilling conditions stipulated as a precedent to the concession agreement. Visakhapatnam port has provided, in lieu of license fee an exclusive license to VGCB for designing, engineering, financing, constructing, equipping, operating, maintaining, and replacing the project/project facilities and services. The concession period is 30 years from the date of the award of the concession. The capacity of the upgraded berth would be 10.18mmtpa and that the Vishakhapatnam port would be entitled to receive 38.10% share of the gross revenue as royalty. VGCB is entitled to receive a tariff from the user(s) of the project facilities and services as per its tariff notification. The tariff rates are linked to the Wholesale Price Index (WPI) and would accordingly be adjusted as specified in the concession agreement every year. The ownership of all infrastructure assets, buildings, structures, berths, wharfs, equipment and other immovable and movable assets constructed, installed, located, created or provided by VGCB at the project site and/or in the port's assets pursuant to concession agreement would be with VGCB until expiry of this concession agreement. The cost of any repair, replacement or restoration of the project facilities and services shall be borne by VGCB during the concession period. VGCB has to transfer all its rights, titles and interest in the project facilities and services fr

Visakhapatnam port at the end of the concession period.

2 Others include right to use of sewage treatment plant at Zinc India which is amortised over 25 years. The carrying value was US\$7.7 million as on 31 March 2016 (31 March 2015: US\$7.7 million). It also includes software licenses which are amortised over a period of three years.

## 17. Property, plant and equipment

(US\$ million)	Mining property and leases	Leasehold land and buildings	Freehold land and buildings	Plant and equipment <sup>1</sup>	Assets under construction	Oil & Gas	Exploratory and evaluation assets	Others	Total
Cost									
At 1 April 2014	3,174.4	160.5	1,174.3	9,934.5	6,257.5	8,237.0	10,273.8	154.6	39,366.6
Additions	25.8	11.1	44.2	212.3	372.8	865.0	204.2	16.6	1,752.0
Transfers	66.0	_	134.7	996.5	(1,291.4)	533.7	(439.7)	0.2	_
Unsuccessful exploration costs	_	_	_	_	_	_	(128.7)	_	(128.7)
Disposals	(7.2)	(0.7)	(0.3)	(37.4)	(0.6)	_	_	(0.3)	(46.5)
Foreign exchange differences	(133.3)	(2.4)	(62.5)	(390.8)	(226.3)	_	(1.9)	(24.0)	(841.2)
At 1 April 2015	3,125.7	168.5	1,290.4	10,715.1	5,112.0	9,635.7	9,907.7	147.1	40,102.2
Additions	121.1	0.1	20.8	129.0	249.7	134.5	79.9	15.6	750.7
Transfers	11.7	(4.2)	333.7	1,313.0	(1,673.8)	_	_	19.6	_
Unsuccessful exploration costs	_	_	_	_	_	_	(4.5)	_	(4.5)
Disposal <sup>4</sup>	(490.4)	(7.5)	(0.1)	(184.1)	_	_	_	_	(682.1)
Foreign exchange differences	(152.6)	(3.4)	(93.3)	(551.8)	(278.7)	_	_	(32.8)	(1,112.6)
At 31 March 2016	2,615.5	153.5	1,551.5	11,421.2	3,409.2	9,770.2	9,983.1	149.5	39,053.7
Accumulated depreciation.									
depreciation, amortisation and impairment									
depreciation, amortisation and	1,629.6	58.2	198.9	3,203.9	28.8	3,157.4	14.3	32.0	8,323.1
depreciation, amortisation and impairment	<b>1,629.6</b> 103.6	<b>58.2</b> 1.8	<b>198.9</b> 45.9	<b>3,203.9</b> 544.4	28.8	<b>3,157.4</b> 1,258.1	14.3 _	<b>32.0</b> 44.4	<b>8,323.1</b> 1,998.2
depreciation, amortisation and impairment At 1 April 2014	•					•	<b>14.3</b> - 4,480.0		•
depreciation, amortisation and impairment At 1 April 2014 Charge for the year Impairment of assets	103.6	1.8	45.9	544.4		1,258.1	_	44.4	1,998.2
depreciation, amortisation and impairment  At 1 April 2014  Charge for the year  Impairment of assets (Note 5)	103.6 47.2	1.8	45.9	544.4 5.1		1,258.1	_	44.4	1,998.2 6,694.4
depreciation, amortisation and impairment  At 1 April 2014  Charge for the year  Impairment of assets (Note 5)  Disposal <sup>4</sup> Foreign exchange	103.6 47.2 (2.0)	1.8	45.9	544.4 5.1 (23.2)		1,258.1 2,162.1	4,480.0	44.4	1,998.2 6,694.4 (25.5)
depreciation, amortisation and impairment  At 1 April 2014  Charge for the year Impairment of assets (Note 5) Disposal <sup>4</sup> Foreign exchange differences	103.6 47.2 (2.0) (82.9)	1.8	45.9 - (0.2) (15.5)	544.4 5.1 (23.2) (123.2)	- - -	1,258.1 2,162.1 -	4,480.0 - (0.7)	44.4 - (0.1) (17.4)	1,998.2 6,694.4 (25.5) (240.0)
depreciation, amortisation and impairment  At 1 April 2014  Charge for the year Impairment of assets (Note 5)  Disposal <sup>4</sup> Foreign exchange differences  At 1 April 2015	103.6 47.2 (2.0) (82.9) 1,695.5	1.8 - - (0.3) <b>59.7</b>	45.9 - (0.2) (15.5) <b>229.1</b>	544.4 5.1 (23.2) (123.2) 3,607.0	- - -	1,258.1 2,162.1 - - 6,577.6	4,480.0 - (0.7)	44.4 - (0.1) (17.4) 58.9	1,998.2 6,694.4 (25.5) (240.0) <b>16,750.2</b>
depreciation, amortisation and impairment  At 1 April 2014  Charge for the year Impairment of assets (Note 5)  Disposal <sup>4</sup> Foreign exchange differences  At 1 April 2015  Charge for the year Impairment of assets	103.6 47.2 (2.0) (82.9) 1,695.5	1.8 - (0.3) <b>59.7</b> 1.7	45.9 - (0.2) (15.5) 229.1 35.4	544.4 5.1 (23.2) (123.2) <b>3,607.0</b> 433.6	28.8	1,258.1 2,162.1 - - <b>6,577.6</b> 817.9	4,480.0 - (0.7) 4,493.6	44.4 - (0.1) (17.4) 58.9 4.0	1,998.2 6,694.4 (25.5) (240.0) <b>16,750.2</b> 1,448.5
depreciation, amortisation and impairment  At 1 April 2014  Charge for the year Impairment of assets (Note 5) Disposal <sup>4</sup> Foreign exchange differences  At 1 April 2015  Charge for the year Impairment of assets (Note 5)	103.6 47.2 (2.0) (82.9) 1,695.5 155.9	1.8 - (0.3) 59.7 1.7	45.9  (0.2) (15.5)  229.1  35.4	544.4 5.1 (23.2) (123.2) 3,607.0 433.6 7.6	28.8	1,258.1 2,162.1 - - <b>6,577.6</b> 817.9	4,480.0 - (0.7) 4,493.6	44.4 - (0.1) (17.4) 58.9 4.0	1,998.2 6,694.4 (25.5) (240.0) <b>16,750.2</b> 1,448.5 5,187.0
depreciation, amortisation and impairment  At 1 April 2014  Charge for the year  Impairment of assets (Note 5)  Disposal <sup>4</sup> Foreign exchange differences  At 1 April 2015  Charge for the year  Impairment of assets (Note 5)  Disposal <sup>4</sup> Foreign exchange	103.6 47.2 (2.0) (82.9) 1,695.5 155.9	1.8 - (0.3) 59.7 1.7 - (6.6)	45.9  (0.2) (15.5)  229.1  35.4	544.4 5.1 (23.2) (123.2) 3,607.0 433.6 7.6 (173.6)	28.8	1,258.1 2,162.1 - - <b>6,577.6</b> 817.9	4,480.0 - (0.7) 4,493.6	44.4 - (0.1) (17.4) 58.9 4.0	1,998.2 6,694.4 (25.5) (240.0) <b>16,750.2</b> 1,448.5 5,187.0 (670.6)
depreciation, amortisation and impairment  At 1 April 2014  Charge for the year  Impairment of assets (Note 5)  Disposal <sup>4</sup> Foreign exchange differences  At 1 April 2015  Charge for the year  Impairment of assets (Note 5)  Disposal <sup>4</sup> Foreign exchange differences	103.6 47.2 (2.0) (82.9) 1,695.5 155.9 - (490.4) (60.1)	1.8 - (0.3) 59.7 1.7 - (6.6) (0.5)	45.9  (0.2) (15.5)  229.1  35.4  - (26.2)	544.4 5.1 (23.2) (123.2) 3,607.0 433.6 7.6 (173.6) (198.5)	28.8 - 17.6	1,258.1 2,162.1 6,577.6 817.9 1,143.5	4,480.0 - (0.7) 4,493.6 - 4,018.3 -	44.4 - (0.1) (17.4) 58.9 4.0 - (23.9)	1,998.2 6,694.4 (25.5) (240.0) <b>16,750.2</b> 1,448.5 5,187.0 (670.6) (309.2)
depreciation, amortisation and impairment  At 1 April 2014  Charge for the year Impairment of assets (Note 5)  Disposal <sup>4</sup> Foreign exchange differences  At 1 April 2015  Charge for the year Impairment of assets (Note 5)  Disposal <sup>4</sup> Foreign exchange differences  At 31 March 2016	103.6 47.2 (2.0) (82.9) 1,695.5 155.9 - (490.4) (60.1)	1.8 - (0.3) 59.7 1.7 - (6.6) (0.5)	45.9  (0.2) (15.5)  229.1  35.4  - (26.2)	544.4 5.1 (23.2) (123.2) 3,607.0 433.6 7.6 (173.6) (198.5)	28.8 - 17.6	1,258.1 2,162.1 6,577.6 817.9 1,143.5	4,480.0 - (0.7) 4,493.6 - 4,018.3 -	44.4 - (0.1) (17.4) 58.9 4.0 - (23.9)	1,998.2 6,694.4 (25.5) (240.0) <b>16,750.2</b> 1,448.5 5,187.0 (670.6) (309.2)
depreciation, amortisation and impairment  At 1 April 2014  Charge for the year  Impairment of assets (Note 5)  Disposal <sup>4</sup> Foreign exchange differences  At 1 April 2015  Charge for the year  Impairment of assets (Note 5)  Disposal <sup>4</sup> Foreign exchange differences  At 31 March 2016  Net book value	103.6 47.2 (2.0) (82.9) 1,695.5 155.9 - (490.4) (60.1) 1,300.9	1.8 - (0.3) 59.7 1.7 - (6.6) (0.5)	45.9  (0.2) (15.5)  229.1  35.4  - (26.2)  238.3	544.4 5.1 (23.2) (123.2) 3,607.0 433.6 7.6 (173.6) (198.5) 3,676.1	28.8 - 17.6 - 46.4	1,258.1 2,162.1 - 6,577.6 817.9 1,143.5 - 8,539.0	4,480.0 - (0.7) 4,493.6 - 4,018.3 - - 8,511.9	44.4 - (0.1) (17.4) 58.9 4.0 - (23.9) 39.0	1,998.2 6,694.4 (25.5) (240.0) <b>16,750.2</b> 1,448.5 5,187.0 (670.6) (309.2) <b>22,405.9</b>

# 18. Financial asset investments

Financial asset investments are required to be classified and accounted for as either available-for-sale or fair value through profit or loss. The Group only has financial asset investments classified as available-for-sale.

Plant and equipment include refineries, smelters, power plants and related facilities. Other tangible fixed assets include office equipment and fixtures, and light vehicles. At 31 March 2016, land with a carrying value of US\$132.5 million (31 March 2015: US\$125.9 million) was not depreciated. During the year ended 31 March 2016, interest and foreign exchange losses capitalised was US\$85.7 million (31 March 2015: US\$147.5 million). Certain property, plant and equipment are pledged as collateral against borrowings, the details related to which have been described in Note 24 on Borrowings.

Subsequent to end of life of mines in Lisheen, US\$585.0 million has been removed from gross block and US\$580.7 million from accumulated depreciation.

#### Available-for-sale investments

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
At 1 April	4.2	1.7
Movements in fair value	2.3	2.1
Exchange difference	-	0.4
At 31 March	6.5	4.2

Financial assets investment represents quoted investments in equity shares that present the Group with an opportunity for returns through dividend income and gains in value. These securities are held at fair value based on market prices. These are classified as non-current as on 31 March 2016.

## 19. Other non-current assets

(US\$ million)	As at 31 March 2016	As at 31 March 2015
Deposits, advances and other receivables due after one year	237.9	156.0
20. Inventories		
(US\$ million)	As at 31 March 2016	As at 31 March 2015
Raw materials and consumables	852.4	975.8
Work-in-progress	385.3	486.0
Finished goods	128.1	143.9
	1,365.8	1,605.7

Inventories with a carrying amount of US\$758.1 million (2015: US\$801.8 million) have been pledged as security against certain bank borrowings of the Group.

Inventory held at net realisable value amounted to US\$142.8 million (2015: US\$154.3 million). The write down of inventories amounted to US\$53.7 million (2015: US\$50.6 million).

#### 21. Trade and other receivables

(US\$ million)	As at 31 March 2016	As at 31 March 2015
Trade receivables	406.6	555.0
Amounts due from related parties (Note 39)	2.7	4.9
Prepayments	34.4	31.0
Deposits with Governments	277.8	281.3
Other receivables	622.8	967.0
	1,344.3	1,839.2

The credit period given to customers ranges from zero to 90 days. Other receivables primarily include excise balances, customs balances, advances to suppliers and claims receivables.

# 22. Liquid investments

(US\$ million)	As at 31 March 2016	As at 31 March 2015
Bank deposits <sup>1</sup>	530.3	1,850.1
Other investments	7,977.9	6,006.0
	8,508.2	7,856.1

<sup>1</sup> Includes US\$28.2 million (2015: US\$29.8 million) of bank deposits at Jharsuguda Aluminium that is restricted in use as it relates to security deposits as directed by courts in relation to a relief claim filed by a vendor (Note 38).

Bank deposits are made for periods of between three months and one year depending on the cash requirements of the companies within the Group and earn interest at the respective deposit rates.

Other investments include mutual fund investments which are recorded at fair value with changes in fair value reported through the income statement. Liquid investments do not qualify for recognition as cash and cash equivalents due to their maturity period and risk of change in value of the investments.

#### 23. Cash and cash equivalents

(US\$ million)	As at 31 March 2016	As at 31 March 2015
Cash at bank and in hand	217.2	211.6
Short-term deposits <sup>1</sup>	211.1	142.1
	428.3	353.7

<sup>1</sup> Includes US\$44.8 million (2015: US\$66.5 million) of cash held in short-term deposit accounts that is restricted in use as it relates to unclaimed dividends, closure costs and future redundancy payments.

Short-term deposits are made for periods of between one day and three months, depending on the immediate cash requirements of the Group, and earn interest at the respective short-term deposit rates.

#### 24. Borrowings

(US\$ million)	As at 31 March 2016	As at 31 March 2015
Bank loans	11,587.9	11,474.9
Bonds	4,074.6	4,075.4
Other loans	13.6	14.5
Total	15,676.1	15,564.8
Borrowings are repayable as:		
Within one year (shown as current liabilities)	3,726.6	3,179.2
More than one year	11,949.5	12,385.6
Total	15,676.1	15,564.8

At 31 March 2016, the Group had available US\$1,087.3 million (2015: US\$1,208.2 million) of undrawn committed borrowing facilities in respect of which all conditions precedent had been met. The Group facilities are subject to certain financial and non-financial covenants. During the current year ended 31 March 2016, the Group has agreed with the lenders for a moratorium period for testing of certain financial covenants and relaxed level for others. Certain of these financial covenants will be reset to their original levels beginning March 2019. The primary covenants which must be complied with include fixed charge cover ratio, net borrowing to EBITDA ratio, total net assets to borrowings ratio and net interest expense to EBITDA ratio. The principal loans held by Group companies at 31 March 2016 were as follows:

#### Vedanta Resources plc

Long-term bonds

In July 2008, the Company issued US\$500.0 million bonds bearing a coupon rate of 8.75% and US\$750.0 million bonds bearing a coupon rate of 9.50%. US\$500.0 million bonds due in January 2014 were duly paid. US\$750.0 million bonds are due for repayment in July 2018. As at 31 March 2016, the amount outstanding is US\$750.0 million (2015: US\$750.0 million).

In July 2011, the Company issued US\$750.0 million bonds bearing a coupon rate of 6.75% and US\$900.0 million bonds bearing a coupon rate of 8.25%. The same is due for repayment in June 2016 and June 2021 respectively. Out of US\$750.0 million bond due in June 2016, US\$7 million has been bought back in December 2015. As at 31 March 2016, the amount outstanding is US\$1,643.0 million (2015: US\$1,650.0 million).

In June 2013, the Company issued US\$1,200 million bonds bearing a coupon rate of 6% and US\$500.0 million at a coupon rate of 7.125%. The same is due for repayment in January 2019 and May 2023. As at 31 March 2016, the amount outstanding is US\$1,700.0 million (2015: US\$1,700.0 million).

All the above bonds are issued in the United States of America (USA) pursuant to Rule 144A of US Securities Act of 1933 (Securities Act) and outside of the USA in compliance with Regulations pursuant to the Securities Act. The bonds are unsecured and are currently rated BB (-) by Standard & Poor's and Ba3 by Moody's.

#### Term loar

In December 2010, the Company availed a facility from the ICICI Bank for US\$180.0 million bearing an interest rate of three month GBP LIBOR plus 385 basis points. The first instalment of US\$90.0 million due in December 2014 was duly repaid and the balance US\$90.0 million was duly repaid in December 2015.

In January 2011, the Company availed a facility from ICICI Bank for US\$150.0 million bearing an interest rate of three month US\$LIBOR plus 389 basis points. The same is repayable as US\$75.0 million in January 2016 and the balance US\$75.0 million in January 2017. US\$75.0 million facility has been duly repaid in January 2016. As at 31 March 2016, the amount outstanding is US\$75.0 million (2015: US\$150.0 million).

In July 2011, the Company availed a facility from ICICI Bank for US\$500.0 million bearing an interest rate of three month US\$LIBOR plus 390 basis points. The same is repayable as US\$250.0 million in January 2018 and the balance US\$250.0 million in July 2018. As at 31 March 2016, the amount outstanding is US\$500.0 million (2015: US\$500.0 million).

In March 2013, the Company entered into a three-year facility agreement with Deutsche Bank as an agent for an amount of US\$185.0 million bearing an interest rate of US\$LIBOR plus 315 basis points. The same has been duly repaid in March 2016.

In March 2013, the Company entered into two facility agreements with ICICI Bank for an amount of US\$170.0 million and US\$180.0 million. The loans bear interest rates of US\$LIBOR plus 430 basis points and US\$LIBOR plus 427 basis points respectively. Of the said loan US\$170.0 million is repayable in three annual instalments beginning April 2018 (the first instalment being 20% and the balance two instalments being 40% each) and US\$180.0 million facility is repayable in three equal annual instalments beginning February 2017. As at 31 March 2016, the amount outstanding is US\$350.0 million (2015: US\$350.0 million).

In April 2013, the Company entered into a Standby Letter of Credit agreement arranged by Axis Bank for an amount of US\$150 million bearing an interest rate at three month US\$LIBOR plus 290 basis points. The facility is repayable in two equal annual instalments in April 2017 and April 2018. As at 31 March 2016, the amount outstanding is US\$148.5 million (2015: US\$148.5 million).

In October 2013, the Company entered into a syndicated facility agreement with Standard Chartered Bank as facility agent for borrowing up to US\$500 million bearing an interest rate of US\$LIBOR plus 357 basis points. The same is repayable as two equal instalments of US\$250.0 million each in October 2017 and January 2018. As at 31 March 2016, the amount outstanding is US\$500.0 million (2015: US\$500.0 million).

In November 2013, the Company entered into a two-year Revolving Credit Facility arranged by The Royal Bank of Scotland and Standard Chartered Bank for borrowing up to US\$100 million at an interest rate of US\$LIBOR plus 250 basis points. The same was duly repaid in August 2015.

In December 2013, the Company entered into a facility agreement with Bank of India for borrowing up to US\$100 million at an interest rate of US\$LIBOR plus 357 basis points. The same is repayable in two equal instalments of US\$50.0 million each in October 2017 and January 2018. As at 31 March 2016, the amount outstanding is US\$100.0 million (2015: US\$100.0 million).

In March 2014, the Company has entered into a US\$500 million syndicated facility agreement with Axis Bank as the lead arranger. The facility bears an interest rate of US\$LIBOR plus 352 basis points. The facility was fully drawn in September 2014. The same is repayable as US\$100.0 million in December 2018, US\$150.0 million in March 2019 and US\$250.0 million in September 2019. As at 31 March 2016, the amount outstanding is US\$500.0 million (2015: US\$500.0 million).

In March 2015, the Company entered into a facility agreement with State Bank of India for US\$350 million. Out of said facility US\$100 million bears an interest rate of US\$LIBOR plus 370 basis points and is repayable in March 2020. US\$250.0 million bears an interest rate of US\$LIBOR plus 403 basis points repayable in two instalments of US\$100 million and US\$150 million in June 2021 and June 2022 respectively. As at 31 March 2016, the amount outstanding is US\$350.0 million (2015: US\$25.0 million).

In January 2016, the Company entered into a facility agreement with State Bank of India for US\$300.0 million. Out of which US\$120.0 million bears an interest rate of US\$LIBOR plus 450 basis points and is repayable in February 2022. Balance US\$180.0 million bears an interest rate of 454 basis points. As at 31 March 2016, the amount outstanding is US\$300.0 million.

## Twin Star Mauritius Holdings Limited (TMHL)

Term loan

In May 2013, the Group tied up a term loan facility of US\$1,200 million borrowed by TMHL through a syndicate of banks with Standard Chartered Bank (SCB) as facility agent to partly refinance US\$2,664 million drawn to meet the funding requirements for the acquisition of 28.5% stake in Cairn India Limited in December 2011. The facility bears an interest rate of LIBOR plus 275 basis points and is due for repayment in four equal annual instalments starting June 2015. The facility of US\$2,664 million due for repayment as US\$1,350.0 million in June 2013 and US\$1,314.4 million in December 2014 was fully prepaid in June 2013. The first instalment due in June 2015 has been duly repaid. As at 31 March 2016, the amount outstanding is US\$900.0 million (2015: US\$1,200.0 million).

In August 2014, the Group tied up a US\$500 million facility with Standard Chartered Bank and First Gulf Bank PJSC of which \$250 million is under a commodity murabaha structure (Islamic financing) and balance US\$250 million is under a conventional loan structure. Out of the said facility US\$287.5 million bears an interest rate of LIBOR plus 275 basis points with an average maturity of about five years from the date of first drawdown in August 2014 and balance amount of US\$212.5 million bears an interest rate of LIBOR plus 340 basis points with an average maturity of about six years from the date of first drawdown in August 2014. US\$25.0 million has been duly repaid during the current year. As at 31 March 2016, the amount outstanding is US\$475.0 million (2015: US\$500.0 million).

#### Vedanta Limited

Term Ioan

In March 2014, Jharsuguda Aluminium had availed a facility of US\$287.5 million from Axis Bank at an average interest rate of bank base rate plus 25 basis points per annum. In May 2014, the said facility was further enhanced by US\$32.0 million. The same was down sold to the following banks:

- a) Axis Bank US\$39.9 million at an average interest rate of bank base rate plus 25 basis points per annum. The facility is secured by first charge by way of mortgage/pledge of movable/immovable all present and future fixed assets of the Aluminium division for the project. The same was repayable as US\$32.0 million in February 2017 and US\$7.9 million in February 2018. As at 31 March 2015, the amount outstanding was US\$39.9 million and the same has been duly prepaid.
- b) Bank of India US\$79.9 million at an average interest rate of bank base rate plus 25 basis points per annum. The facility is secured

- by first charge by way of mortgage/pledge of movable/immovable all present and future fixed assets of the Aluminium division for the project. The same was repayable as US\$32.0 million in February 2017, US\$32.0 million in February 2018 and US\$15.9 million in February 2019. As at 31 March 2015, the amount outstanding was US\$79.9 million and the same has been duly prepaid.
- c) Corporation Bank US\$79.9 million at an average interest rate of bank base rate plus 25 basis points per annum. The facility is secured by first charge by way of mortgage/pledge of movable/immovable all present and future fixed assets of the Aluminium division for the project. The same was repayable as US\$12.0 million in February 2017, US\$27.9 million in February 2018 and US\$40.0 million in February 2019. As at 31 March 2015, the amount outstanding was US\$79.9 million and the same has been duly prepaid.
- d) Syndicate Bank US\$79.9 million at an average interest rate of bank base rate plus 25 basis points per annum. The facility is secured by first charge by way of mortgage/pledge of movable/immovable all present and future fixed assets of the Aluminium division for the project. The same was repayable as US\$12.0 million in February 2017, US\$27.9 million in February 2018 and US\$40.0 million in February 2019. As at 31 March 2015, the amount outstanding was US\$79.9 million and the same has been duly prepaid.
- e) Vijaya Bank US\$39.9 million at an average interest rate of bank base rate plus 25 basis points per annum. The facility is secured by first charge by way of mortgage/pledge of movable/immovable all present and future fixed assets of the Aluminium division for the project. The same was repayable as US\$7.9 million in February 2017, US\$16.0 million in February 2018 and US\$16.0 million in February 2019. As at 31 March 2015, the amount outstanding was US\$39.9 million and the same has been duly prepaid.

During the year, Jharsuguda Aluminium has acquired a facility for US\$301.5 million from Axis Bank at an average rate of bank base rate plus 30 basis points per annum. The same is down sell to the following banks:

- a) Axis Bank US\$150.8 million at an average interest rate of bank base rate plus 30 basis points per annum. The facility is secured by first pari passu charge by way of i) a first pari passu charge by way of hypothecation on the entire moveable fixed assets (including WIP) of the project, both present and future ii) mortgage by deposit of documents of title of the land pertaining to the fixed assets. The aforesaid mortgages/charges shall in all respects rank pari passu inter se amongst the rupee lenders and amongst all existing lenders and future lenders having first charge on the security without any preference or priority to one over the other or others. The same is repayable in quarterly instalments till December 2030. As at 31 March 2016, the amount outstanding is US\$150.0 million.
- b) State Bank of Hyderabad US\$30.2 million at an average interest rate of bank base rate plus 5 basis points per annum. The facility is secured by a first pari passu charge by way of hypothecation on the entire moveable fixed assets (including WIP) of the project, both present and future; and mortgage by deposit of documents of title of the land pertaining to the fixed assets. The same is repayable in quarterly instalments till December 2030. As at 31 March 2016, the amount outstanding is US\$30.0 million.
- c) Vijaya Bank US\$75.4 million at an average interest rate of bank base rate plus 15 basis points per annum. The facility is secured by a first pari passu charge by way of hypothecation on the entire moveable fixed assets (including WIP) of the project, both present and future; and mortgage by deposit of documents of title of the land pertaining to the fixed assets. The same is repayable in quarterly instalments till December 2030. As at 31 March 2016, the amount outstanding is US\$75.0 million.
- d) State Bank of Patiala US\$45.2 million at an average interest rate of bank base rate plus 15 basis points per annum. The facility is secured by a first pari passu charge by way of hypothecation on the entire moveable fixed assets (including WIP) of the project, both present and future; and mortgage by deposit of documents of title of the land pertaining to the fixed assets. The same is repayable in quarterly instalments till December 2030. As at 31 March 2016, the amount outstanding is US\$45.0 million.

In July 2014, Jharsuguda Aluminium has availed a facility of US\$753.8 million from State Bank of India (SBI) at a floating interest rate of SBI base rate plus 30 basis points. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2022. As at 31 March 2016, the amount outstanding is US\$716.1 million (2015: US\$692.2 million).

In April 2014, Jharsuguda Aluminium has availed a facility of US\$301.5 million from Bank of Baroda at a floating interest rate of bank base rate plus 10 basis points. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2020. As at 31 March 2016, the amount outstanding is US\$268.3 million (2015: US\$316.3 million).

In April 2014, Jharsuguda Aluminium has availed a facility of US\$301.5 million from Bank of India at a floating interest rate of bank base rate plus 15 basis points. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to September 2020. As at 31 March 2016, the amount outstanding is US\$257.0 million (2015: US\$304.4 million).

In April 2014, Jharsuguda Aluminium has availed a facility of US\$75.4 million from State Bank of Bikaner & Jaipur at a floating interest rate of bank base rate plus 5 basis points. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2020. As at 31 March 2016, the amount outstanding is US\$67.1 million (2015: US\$79.1 million).

In April 2014, Jharsuguda Aluminium has availed a facility of US\$154.6 million from Syndicate Bank at a floating interest rate of bank base rate. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2020. As at 31 March 2016, the amount outstanding is US\$137.5 million (2015: US\$162.1 million).

In April 2014, Jharsuguda Aluminium has availed a facility of US\$150.8 million from Union Bank of India at a floating interest rate of bank base rate plus 25 basis points. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2020. As at 31 March 2016, the amount outstanding is US\$133.4 million (2015: US\$157.4 million).

In December 2013, Jharsuguda 2,400MW power plant has availed a facility of US\$59.4 million from Canara Bank at an interest rate of 9.75% per annum. In August 2014, this facility has further been enhanced by US\$90.5 million. The facility is secured by way of mortgage and charge on all the immovable properties, both present and future, of Jharsuguda 2,400MW power plant except IPP Agricultural Land and a second charge by way of pledge on all the movable fixed assets of the Power division. The loan is repayable in 16 quarterly instalments from end of quarter starting after the moratorium period up to December 2018. As at 31 March 2016, the amount outstanding is US\$103.6 million (2015: US\$149.8 million).

In March 2016, Jharsuguda Aluminium has availed a facility of US\$188.4 million from State Bank of India at a floating interest rate of bank base rate plus 20 basis points. The facility is secured by aggregate of the net fixed assets of the Aluminium division and the Lanjigarh Expansion project reduced by the outstanding borrowings having first pari passu charge on the fixed assets of the Aluminium division and the Lanjigarh Expansion Project. The same is repayable in quarterly instalments up to March 2025. As at 31 March 2016, the amount outstanding is US\$188.4 million.

In November 2015, Iron Ore Sesa has availed a facility of US\$72.4 million from Corporation Bank at a floating interest rate of 9.65%. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2020. As at 31 March 2016, the amount outstanding is US\$67.1 million (2015: US\$36.0 million).

## Short-term loans

In January 2015, Jharsuguda Aluminium availed a short-term borrowing facility in the form of export packing credit from Bank of America at an average rate 9.30% per annum. These loans were obtained to meet the working capital requirements. The same is repayable in June 2016. As at 31 March 2016, the amount outstanding is US\$95.0 million (2015: US\$32.0 million).

In October 2014, Jharsuguda Aluminium availed a short-term borrowing facility in foreign currency in the form of pre shipment/export packing credit from Bank of America at an average rate of LIBOR plus 65-70 basis points. These loans were obtained to meet the working capital requirements. This was repayable as US\$32.6 million in April 2015 and US\$14.6 million in May 2015. The same has been duly repaid.

Iron Ore Sesa obtained a short-term borrowing facility in foreign currency in the form of pre shipment/export packing credit from various banks at an average rate of 9.39%. These loans were obtained to meet the working capital requirements of the Iron Ore. As at 31 March 2016, the amount outstanding is US\$57.4 million (2015: US\$36.0 million).

#### Non-convertible debentures (NCDs)

In October 2008, Jharsuguda Aluminium has issued NCDs of US\$66.6 million to the Life Insurance Corporation of India at a rate of 11.5% per annum. These NCDs are secured and have the first pari passu charge over the identified assets (including land and buildings) of the issuer to the extent of 1.33 times of the issued amount. These NCDs are repayable in three equal annual instalments starting October 2013. The first two instalments due for repayment of US\$22.2 million each were paid in October 2013 and October 2014 respectively. The balance instalment of US\$22.2 million was due for repayment in October 2015 and the same has been duly repaid.

In December 2012, April 2013, July 2013 and August 2016 Vedanta Limited had issued NCDs in three tranches for US\$75.4 million, US\$376.9 million, US\$180.9 million and US\$301.5 million with an interest rate of 9.24%, 9.10%, 9.17% and 9.70% per annum respectively. Out of the total NCDs US\$180.9 million are secured by way of mortgage on the immovable property of Vedanta Limited situated at Sanaswadi in the state of Maharashtra and also by way of pledge on the movable fixed assets of Jharsuguda Aluminium division with a security cover of 1.25 times on the face value of outstanding NCDs at all time during the tenure of the NCDs. The balance NCDs of US\$753.8 million are secured by way of mortgage on the immovable property of Vedanta Limited situated at Sanaswadi in the state of Maharashtra and also by way of pledge on the movable fixed assets of Jharsuguda 2,400MW power plant with a security cover of 1.25 times on the face value of outstanding NCDs at all time during the tenure of the NCDs. Of the total outstanding NCDs, US\$75.4 million is repayable in December 2022, US\$376.9 million in April 2023, US\$180.9 million in July 2023 and US\$301.5 million in August 2020. All NCDs, except for US\$301.5 million issued in August 2016, have put and call option respectively at the end of five years from the respective date of allotment. As at 31 March 2016, the amount outstanding is US\$934.7 million (2015: US\$671.0 million).

In October, November and December 2012, Vedanta Limited had also issued NCDs in three tranches for US\$75.4 million each per tranche with an interest rate of 9.24%, 9.40% and 9.40% per annum respectively. These NCDs are secured by way of mortgage on the immovable property of Vedanta Limited situated at Sanaswadi in the state of Maharashtra and also by way of pledge on the movable fixed assets of Jharsuguda 2,400MW power plant with a security cover of 1.25 times on the face value of outstanding NCDs at all time during the tenure of the NCDs. Of the total outstanding NCDs, US\$75.4 million is repayable in October 2022, US\$75.4 million in November 2022 and US\$75.4 million in December 2022. The NCDs have put and call option respectively at the end of five years from the respective date of allotment of the NCDs. As at 31 March 2016, the amount outstanding is US\$226.1 million (2015: US\$239.6 million).

In October 2014, Iron Ore Sesa has also issued NCDs of US\$226.1 million with an interest rate of 9.36% per annum. These NCDs are secured by way of mortgage on the immovable property of Vedanta Limited situated at Tuticorin in the state of Tamil Nadu and also by way of first ranking pari passu charge over 'movable fixed assets' in relation to Vedanta Limited's Iron Ore Sesa business (pig iron and met coke assets) and power plant assets located in Goa and the Copper plant assets located at Tuticorin with a security cover of 1.25 times on the face value of outstanding NCDs at all times during the tenure of the NCDs. These NCDs are redeemable in two instalments as US\$147.0 million in October 2017 and US\$79.1 million in December 2017. As at 31 March 2016, the amount outstanding is US\$226.1 million (2015: US\$239.7 million).

## External commercial borrowing

During the year ended 31 March 2015, Jharsuguda Aluminium External Commercial Borrowing from Axis Bank of US\$500.0 million was refinanced by ICICI Bank and SCB at an interest rate of US\$LIBOR plus 170 basis points (prior to refinancing at an interest rate of US\$LIBOR plus 400 basis points) having a subservient charge on all present and future movable assets of the Aluminium division. The repayment is to be made in three equal instalments starting from April 2015. The first instalment of US\$200.0 million has been duly repaid. As at 31 March 2016, the amount outstanding is US\$300.0 million (2015: US\$500.0 million).

During the year ended 31 March 2013, a part of intercompany borrowing from Welter Trading Limited was refinanced through Axis Bank. This has been further refinanced from Standard Chartered Bank for US\$44.5 million at an interest rate of US\$LIBOR plus 129 basis points (prior to refinancing at an interest rate of US\$LIBOR plus 360 basis points) having a subservient charge on all present and future movable assets of Jharsuguda Aluminium. The entire loan was repayable in July 2015 and the same has been duly repaid.

#### Project buyers' credit

Jharsuguda Aluminium had extended credit terms relating to purchases of property, plant and equipment bearing an average interest rate of LIBOR plus 24-55 basis points. These are secured by all of the fixed assets of Jharsuguda Aluminium, immovable or movable, present and future, on a pari passu basis with other term lenders and with priority over other creditors. Project buyers' credit have an average maturity of May 2015. As at 31 March 2015, the amount outstanding was US\$2.0 million and the same has been duly repaid.

#### Commercial papers

During the year, Jharsuguda 2,400MW power plant has issued commercial paper to various asset management companies bearing an average coupon rate of 9.6% for funding project payables. As at 31 March 2016, the amount outstanding is US\$395.7 million (2015: US\$180.5 million).

During the year, Iron Ore Sesa has issued commercial papers for periods ranging up to one year bearing an average interest rate of 9.5%. These commercial papers are used to meet working capital requirements of the Iron Ore division and are repayable in the next financial year. As at 31 March 2016, the outstanding balance was US\$112.3 million (2015: US\$380.2 million).

During the year, Vedanta Limited has issued commercial paper to various asset management companies bearing an average coupon rate of 9.19% and are repayable in the next financial year. As at 31 March 2016, the amount outstanding is US\$392.0 million.

#### **KCM**

A term loan facility of US\$820 million (2015: US\$820 million) has been obtained by KCM from Standard Bank. The term loan facility is made up of three tranches: US\$300 million ('Facility A'), US\$120 million ('Facility A1') and US\$400 million ('Facility B') drawn down on various dates with the last amount drawn in June 2014. The facility was restructured in 2014. The facility was repayable in 16 quarterly instalments starting in June 2015. But during this year we restructured the loan again with Standard Bank and got a moratorium period for testing of financial covenants. First testing will be done on 30 September 2017. The loan is secured against the fixed assets of KCM and a corporate guarantee from Vedanta Resources plc for the amount equivalent to the total outstanding loan. Interest is payable quarterly at LIBOR plus 350 basis points for Facility A and A1 and US\$LIBOR plus 300 basis points for Facility B. The facility is repayable in tranches with Facility A and A1 in 11 quarterly instalments commencing from 30 September 2016 and Facility B is repayable in 14 quarterly instalments commencing from 31 March 2017. As at 31 March 2016, the amount outstanding is US\$569.1 million (2015: US\$710.9 million).

A general short-term banking facility incorporating multiple sub-facilities amounting to US\$30 million (31 March 2015: US\$50 million) was provided by Stanbic Bank. The facility was revolved on 1 June 2011. Interest is payable monthly at three month US\$LIBOR plus 350 basis points. The facility is repayable strictly on demand. The tenure for the facility is 12 months. The amount drawn as at 31 March 2016 under this facility is US\$14 million (2015: US\$27.8 million).

A general short-term banking facility incorporating multiple sub-facilities amounting to US\$50 million (2015: US\$50 million) was provided by Standard Chartered Bank. The facility was revolved on 26 May 2011. The facility bears an interest rate of US\$LIBOR plus 300 basis points. The facilities are repayable strictly on demand. The tenure for the facility is 12 months. As at 31 March 2016, the amount outstanding is US\$50.0 million (2015: US\$50.0 million).

A general short-term banking facility incorporating multiple sub-facilities amounting to US\$40 million (2015: US\$40 million) was provided by Barclays Bank Zambia Plc. The facility bears an interest rate of three month US\$LIBOR plus 250 basis points payable monthly. The facilities are repayable strictly on demand. The tenure for the facility is 12 months. As at 31 March 2016, the amount outstanding is US\$32.81 million (2015: US\$13.8 million).

#### BALCO

NCDs

In November 2008, BALCO issued NCDs of US\$75.4 million to the Life Insurance Corporation of India at a rate of 12.25% per annum. These NCDs are secured and have the first pari passu charge on the fixed assets of BALCO including land and buildings. These NCDs were repayable in three equal instalments in November 2013, November 2014 and November 2015. All three instalments have been duly repaid.

In May 2013, BALCO issued NCDs of US\$75.4 million to Kotak Mahindra Bank, Axis Bank Limited and Wipro Limited at an interest rate of 8.58% per annum (Series–I) and 8.60% per annum (Series–II). These NCDs are secured and have the first pari passu charge on the fixed assets of BALCO. These NCDs are repayable in two equal instalments in November 2015 and May 2016. The first instalment has been duly repaid. As at 31 March 2016, the amount outstanding is US\$37.7 million (2015: US\$79.9 million).

In August 2014, BALCO issued NCDs of US\$75.4 million to banks and financial institutions arranged by Deutsche Bank at an interest rate of 10.25% per annum. These NCDs are secured and have the first pari passu charge on the fixed assets of BALCO. These NCDs are repayable in August 2017. As at 31 March 2016, the amount outstanding is US\$75.4 million (2015: US\$79.9 million).

#### Project buyers' credit

BALCO has extended credit terms relating to the purchase of property, plant and equipment at an average interest rate of US\$LIBOR plus 107 basis points. Project buyers' credits have an average maturity of November 2016. As at 31 March 2016, the amount outstanding is US\$58.1 million (2015: US\$59.6 million).

## External commercial borrowings

In August 2011, BALCO has obtained an External Commercial Borrowing loan from State Bank of India, London of US\$200 million at an interest rate of six month US\$LIBOR plus 290 basis points secured by first pari passu charges on all the fixed assets (excluding land) of BALCO projects both present and future along with secured lenders. The above loan is repayable in three equal annual instalments starting August 2016. As at 31 March 2016, the amount outstanding is US\$200.0 million (2015: US\$200.0 million).

In September 2015, BALCO has also obtained an External Commercial Borrowing loan from ICICI Bank Dubai of US\$50.0 million at an interest rate of three month US\$LIBOR plus 240 basis points secured by first pari passu charge on all movable fixed assets including plant and machinery related to 1,200MW Power project and 3.25 LTPA Smelter projects both present and future along with secured

lenders. The facility is repayable as US\$13.0 million in August 2019, US\$14.0 million in August 2020 and US\$23.0 million in August 2021. As at 31 March 2016, the amount outstanding is US\$50.0 million.

#### Rupee term loan

During the year, BALCO has availed rupee term loan of US\$75.4 million from Dena Bank at pricing of bank base rate plus 50 basis points. The facility is secured against movable fixed assets (excluding coal block assets) of BALCO. The facility has a maturity of eight years and is repayable in 28 quarterly instalments post moratorium period of one year. As at 31 March 2016, the amount outstanding is US\$75.4 million.

During the year, BALCO has availed rupee term loan of US\$45.2 million from State Bank of India at pricing of bank base rate plus 50 basis points. The facility is secured against movable fixed assets (excluding coal block assets) of BALCO. The facility has a maturity of eight years and is repayable in 28 quarterly instalments post moratorium period of one year. As at 31 March 2016, the amount outstanding is US\$45.2 million.

During the year, BALCO has availed rupee term loan of US\$22.6 million from State Bank of Mysore at pricing of bank base rate plus 50 basis points. The facility is secured against movable fixed assets (excluding coal block assets) of BALCO. The facility has a maturity of eight years and is repayable in 28 quarterly instalments post moratorium period of one year. As at 31 March 2016, the amount outstanding is US\$22.6 million.

During the year, BALCO has availed rupee term loan of US\$30.2 million from State Bank of Patiala at pricing of bank base rate plus 50 basis points. The facility is secured against movable fixed assets (excluding coal block assets) of BALCO. The facility has a maturity of eight years and is repayable in 28 quarterly instalments post moratorium period of one year. As at 31 March 2016, the amount outstanding is US\$30.2 million.

During the year, BALCO has availed rupee term loan of US\$22.6 million from South Indian Bank at pricing of bank base rate plus 25 basis points. The facility is secured against movable fixed assets (excluding coal block assets) of BALCO. The facility has a maturity of eight years and is repayable in 28 quarterly instalments post moratorium period of one year. As at 31 March 2016, the amount outstanding is US\$22.6 million.

During the year, BALCO has availed rupee term loan of US\$45.0 million from UCO Bank at pricing of bank base rate plus 50 basis points. The facility is secured against movable fixed assets (excluding coal block assets) of BALCO. The facility has a maturity of eight years and is repayable in 28 quarterly instalments post moratorium period of one year. As at 31 March 2016, the amount outstanding is US\$45.0 million.

#### Commercial paper

In March 2016, BALCO has issued commercial paper bearing an average coupon rate of 9.89% per annum to various asset management companies for the funding of project loan repayment and other payables. As at 31 March 2016, the amount outstanding is US\$79.1 million (2015: US\$317.1 million).

## Talwandi Sabo

#### NCDs

In December 2010 and January 2011, Talwandi Sabo has issued NCDs of US\$226.13 million to ICICI Bank at a rate of 9.8% per annum. These NCDs are secured by first pari passu charge on the assets of Talwandi Sabo both present and future, with an unconditional and irrevocable corporate guarantee by Vedanta Limited. These NCDs have tenure of 13 years and are repayable in 12 equal instalments after 10 years after allotment. These NCDs have a call option, five years after allotment. The call option has been exercised and the NCDs have been duly repaid.

In September 2014 (four tranches), November 2014, March 2015 and April 2015, Talwandi Sabo has also issued NCDs of US\$226.1 million in five tranches of US\$18.1 million, US\$27.1 million, US\$30.2 million, US\$49.0 million and US\$101.8 million respectively at an interest rate of 9.60% per annum, 9.70% per annum, 9.27% per annum, 8.91% and 8.91% per annum respectively, to various asset management companies for fresh project funding and repayment of loan. These NCDs are secured by first pari passu charge on the assets of Talwandi Sabo both present and future, with an unconditional and irrevocable corporate guarantee by Vedanta Limited. These NCDs are repayable in tranches as US\$18.1 million, US\$27.1 million, US\$30.2 million in November 2017 and balance US\$150.8 million in April 2018. As at 31 March 2016, the amount outstanding is US\$226.1 million (2015: US\$131.8 million).

#### Term loan

In September 2014, Talwandi Sabo has availed a rupee term loan facility of US\$75.4 million from Kotak Mahindra Bank Limited at an interest rate of 10.10% per annum. The facility is secured by first pari passu charge on the assets of Talwandi Sabo both present and future, with an unconditional and irrevocable corporate guarantee by Vedanta Limited. The facility is repayable as first 50% of the loan amount in 24 equal quarterly instalments starting from December 2015 and balance 50% of the loan amount in March 2021. As at 31 March 2016, the amount outstanding is US\$68.7 million (2015: US\$79.9 million).

In December 2015, Talwandi Saboo has availed a rupee term loan facility of U\$\$301.5 million from the State Bank of India at an interest rate of SBI base rate plus 50 basis points (which is at present effective 9.80% per annum). The facility is secured by pari passu charge on the assets of Talwandi Sabo both present and future, with an unconditional and irrevocable corporate guarantee by Vedanta Limited. The facility is repayable in 48 quarterly instalments starting in June 2018. As at 31 March 2016, the amount outstanding is U\$\$283.4 million.

## Project buyers' credit

Talwandi Sabo has accessed buyers' credit in respect of purchase of capital goods at an average rate of six month US\$LIBOR plus 136 basis points. The average maturity of the project buyers' credit is May 2017. As at 31 March 2016, the amount outstanding is US\$165.6 million (2015: US\$177.1 million).

#### Commercial paper

During the year, Talwandi Sabo has issued commercial paper to various asset management companies for the funding of project loan

repayment bearing an average coupon rate of 9.5% per annum. As at 31 March 2016, Talwandi Sabo had an outstanding balance of US\$361.1 million (2015: US\$417.0 million).

#### **VGCB**

NCDs

In May 2013, VGCB has issued NCDs of US\$47.9 million to IDFC Limited at a rate of 9% per annum to refinance the existing term loan from Axis Bank. These NCDs are secured by 1.1 times on the face value of outstanding debentures, by way of charge on the fixed assets of VGCB at all time during the currency of the debentures. Debentures have tenure of three years with put and call option at the end of the second year. During this year, the call and put option has been exercised on US\$33.9 million bonds and has been duly repaid. As at 31 March 2016, the amount outstanding is US\$11.3 million (2015: US\$47.9 million).

#### Project buyers' credit

VGCB has accessed buyers' credit in respect of purchase of capital goods at an average rate of six month US\$LIBOR plus 145 basis points. The average maturity of the project buyers' credit is May 2017. As at 31 March 2016, the amount outstanding is US\$18.3 million (2015: US\$18.3 million).

# 25. Non-equity non-controlling interests

As at 31 March 2016, non-equity non-controlling interests amounts to US\$11.9 million, being deferred shares in KCM held by ZCCM. The deferred shares have no voting rights or rights to KCM's dividends, but are entitled on a winding up to a return of up to US\$0.99 per share once all of KCM's ordinary shares have received a distribution equal to their par value and any share premium created on their issue and which remains distributable to them.

The deferred shares are held at historic cost, being the fair value attributed to them at the time of initial acquisition of KCM in the year ended 31 March 2005. They are classified as non-current liabilities as they are repayable only on the winding up of KCM, for an amount different than the pro rata share of net assets upon liquidation. The shares have been valued at US\$0.99 per share, which is the maximum amount payable to the deferred shareholders. These deferred shares have not been discounted as the effect would not be material.

#### 26. Movement in net debt1

				Debt due withi one year		ter one year	
(US\$ million)	Cash and cash equivalents	Liquid investments	Total cash and liquid investments	Debt carrying value	Debt carrying value	Debt- related derivatives <sup>2</sup>	Total net debt
At 1 April 2014	369.4	8,568.5	8,937.9	(4,358.5)	(12,512.7)	13.8	(7,919.5)
Cash flow	(13.9)	(671.7)	(685.6)	818.8	(1,050.1)	_	(916.9)
Other non-cash changes <sup>3</sup>	_	250.8	250.8	294.8	(46.7)	(16.1)	482.8
Foreign exchange differences	(1.8)	(291.5)	(293.3)	65.7	120.9	_	(106.7)
At 1 April 2015	353.7	7,856.1	8,209.8	(3,179.2)	(13,488.6)	(2.3)	(8,460.3)
Cash flow	92.6	999.9	1,092.5	1,022.1	(901.6)	_	1,213.0
Other non-cash changes <sup>3</sup>	_	59.4	59.4	(2,280.6)	2,195.6	0.3	(25.3)
Foreign exchange differences	(18.0)	(407.2)	(425.2)	123.9	245.1	_	(56.2)
At 31 March 2016	428.3	8,508.2	8,936.5	(4,313.8)	(11,949.5)	(2.0)	(7,328.8)

<sup>1</sup> Net debt being total debt reduced by cash and cash equivalents and liquid investments, as carried at fair value under IAS 32 and 39.

<sup>2</sup> Debt-related derivatives exclude derivative financial assets and liabilities relating to commodity contracts and forward foreign currency contracts.

<sup>3</sup> Other non-cash changes comprises of mark to market of embedded derivatives, interest accretion on convertible bonds and amortisation of borrowing costs for which there is no cash movement and reclassification between debt due within one year and debt due after one year. It also includes US\$59.5 million (2015: US\$250.8 million) of fair value movement in investments.

#### 27. Trade and other payables

#### (a) Current trade and other payables

(US\$ million)	As at 31 March 2016	As at 31 March 2015 <sup>3</sup>
Trade payables	2,155.8	2,258.9
Bills of exchange	1,500.0	1,512.4
Accruals and deferred income	38.3	22.8
Advance from customers <sup>1</sup>	396.8	_
Dividend payable to NCI	536.3	_
Dividend tax payable	311.2	_
Other trade payables <sup>2</sup>	937.7	935.9
	5,876.1	4,730.0

Non-interest bearing trade payables are normally settled on 60 to 90-day terms.

Interest bearing trade and other payables amount to US\$1,500.0 million (2015: US\$1,567.5 million).

Bills of exchange are interest-bearing liabilities and are normally settled within a period of 12 months. These represent arrangements whereby operational suppliers of raw materials are paid by financial institutions, with the Company recognising the liability for settlement with the institutions at a later date.

The fair values of the trade and other payables are not materially different from the carrying values presented.

## (b) Non-current trade and other payables

(US\$ million)	As at 31 March 2016	As at 31 March 2015
Advance from customers <sup>1</sup>	150.5	_
Other trade payables <sup>2</sup>	73.0	194.3
	223.5	194.3

Advances from customers include amounts received under long-term supply agreements. The advance payment plus a fixed rate of return will be settled by supplying copper over a period up to 24 months under an agreed delivery schedule as per the terms of the respective agreements. As these are contracts that the Group expects, and has the ability, to fulfil through delivery of a non-financial item, these are recognised as advances from customers and will be released to the income statement as copper is delivered under the agreements. The portion of the advance that is expected to be settled within the next 12 months has been classified as a current liability.

## 28. Convertible bonds

(US\$ million)	As at 31 March 2016	As at 31 March 2015
A. VRJL	579.9	1,096.4
B. VRJL II	7.3	6.6
	587.2	1,103.0

A. Vedanta Resource Jersey Limited (VRJL) issued 5.5% US\$1,250 million guaranteed convertible bonds on 13 July 2009. The bonds are first convertible into exchangeable redeemable preference shares to be issued by VRJL, which will then be automatically exchanged for ordinary shares of Vedanta Resources plc. The bondholders have the option to convert at any time from 24 August 2009 to 6 July 2016. Conversion options exercised before 15 August 2012 were convertible at US\$36.48 per share. Conversion options exercised on or after 15 August 2012 were convertible at US\$35.58 per share.

If the notes have not been converted, they will be redeemed at the option of the Company at any time on or after 28 July 2012 subject to certain conditions, or be redeemed at the option of the bondholders on or after 13 July 2014.

If the notes have not been converted, they will be redeemed at the option of the issuer on or at any time after 28 July 2013, subject to the conditions as part of the issue. Bondholders had exercised put option on 14 July 2014, accordingly bonds with a face value US\$113.8 million (9.1% of total face value) were redeemed during the year ending 31 March 2015.

During the year, in October 2015, the Company received notice from bondholders with a face value of US\$3 million to exercise the option to convert the bonds into equity shares of Vedanta Resources plc in accordance with the provisions of the Offer circular dated 9

<sup>2</sup> Other trade payables primarily comprise amounts withheld as retentions, payable to suppliers of capital projects after satisfactory completion of contractual commissioning period, which are payable after the completion of commissioning. The fair value of the non-current trade payables are not materially different from the carrying values presented.

<sup>3</sup> Prior year trade and other payables of US\$331.6 million have been reclassified from accruals to trade and other payables to better reflect the nature of these costs.

July 2009. During the year ended 31 March 2016 US\$3 million of bonds were converted into 93,341 equity shares of Vedanta Resources plc. The carrying value of bond on the date of conversion was US\$2.9 million.

During the year, in January 2016 and February 2016, the Company bought back the convertible bonds of a face value of US\$549.3 million and carrying value of US\$541.6 million from market for a consideration of US\$522.4 million. The buyback consideration including buyback cost of US\$1.2 million has been split between the liability and equity. Accordingly, US\$2.6 million has been debited to convertible bond reserve and net gain of US\$20.7 million has been recognised in the income statement

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Opening liability	1,096.4	1,177.1
Effective interest cost	90.1	97.3
Conversion of convertible bonds	(2.9)	_
Repayment of convertible bonds	_	(113.8)
Buy back of convertible bonds	(541.6)	_
Coupon interest paid/accrued	(62.1)	(64.2)
Closing liability	579.9	1,096.4

The interest charged for the year is calculated by applying an effective interest rate of 8.2% (March 2015: 8.7%).

The fair value of the convertible bond as at 31 March 2016 is US\$573.1 million (March 2015: US\$1,056.9 million).

B. Vedanta Resource Jersey II Limited (VRJL-II) issued 4.0% US\$883 million guaranteed convertible bonds on 30 March 2010. The bonds are first convertible into exchangeable redeemable preference shares to be issued by VRJL-II, which will then be automatically exchanged for ordinary shares of Vedanta Resources plc. The bondholders have the option to convert at any time from 10 May 2010 to 23 March 2017. Conversion options exercised before 15 August 2012 were convertible at US\$51.9251 per share. Conversion options exercised on or after 15 August 2012 are convertible at US\$50.646 per share, as per the terms of offering circular.

If the notes have not been converted, they will be redeemed at the option of the Company at any time on or after 14 April 2013 subject to certain conditions, or be redeemed at the option of the bondholders on or after 29 April 2013 to 30 March 2015.

Bondholders exercised the put option in March 2015, resulting in redemption of US\$65.1 million bonds during the year ending 31 March 2015. The maturity of the remaining bonds is March 2017.

At the inception the net proceeds of the convertible issue was split between the liability element and a derivative component, representing the fair value of the embedded option to convert the liability into equity of the Company. The latter was not recorded within equity due to the existence of partial cash settlement terms within the bond which prevent the adoption of compound financial instrument accounting.

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Opening liability	6.6	65.7
Effective interest cost	1.0	8.9
Repayment of convertible bonds	-	(65.1)
Coupon interest paid/accrued	(0.3)	(2.9)
Closing liability	7.3	6.6

The interest charged for the year is calculated by applying an effective interest rate of 15.1% (2015: 15.0%).

The fair value of the convertible bond as at 31 March 2016 was US\$7.3 million (March 2015: US\$7.8 million).

C. Vedanta Limited issued 4% US\$500 million convertible bonds (denominated in US dollars) on 29 October 2009 which were due on 30 October 2014. The bonds are convertible into American Depository Share (ADS) to be issued by Vedanta Limited. The bondholders have the option to convert at any time before 29 October 2014 at a conversion ratio of 42.8688 for every US\$1,000 of principal which is equal to a conversion price of US\$23.33 per ADS. Pursuant to the effectiveness of Group simplification scheme in August 2014 conversion rate has changed to 25.7213 ADSs for every US\$1,000 principal amount of notes which is equal to a conversion price of approximately US\$38.88 per ADS. Vedanta has the option (subject to the terms of the bond) to redeem the convertible bond at any time after 4 November 2012.

Vedanta Limited had also issued 5% US\$500 million convertible bonds (denominated in US dollars) on 30 October 2009 and due on 31 October 2014. The bonds are convertible into ordinary shares of Vedanta Limited. The bondholders have the option to convert at any time after 10 December 2009 and before 24 October 2014 at a conversion ratio of 13837.6384 for every US\$100,000 principal. Vedanta Limited has the option (subject to certain conditions) to redeem the convertible bond at any time after 30 October 2012. As the functional currency of Vedanta Limited is INR, the conversion of the convertible bonds (which are denominated in US dollars) would not result in the settlement and exchange of a fixed amount of cash in INR terms, for a fixed number of its shares respectively. Accordingly, the convertible bond must be

separated into two component elements: a derivative component consisting of the conversion option (carried at fair value) and a liability component consisting of the debt element of the bonds. Further details of the accounting for such instruments are provided in the Group accounting policies (note 2a).

These convertible bonds were repaid during the year ended 31 March 2015.

The following table shows the movements in the Vedanta Limited bonds during the year on an aggregated basis:

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Opening liability	-	678.7
Effective interest cost	-	57.2
Coupon interest paid	-	(19.8)
Repayment of FCCBs	-	(716.1)
Closing liability	-	_

The interest charged for the year is calculated by applying an effective interest rate of nil (March 2015: 12.7%) for 4% US\$500 million convertible notes and nil (March 2015: 19.1%) for 5% US\$500 million convertible notes.

## Summary of convertible bond movements:

	Year ended 31 March 2016	Year ended 31 March 2015
Opening liability	1,103.0	1,921.5
Effective interest cost	91.1	163.4
Coupon interest paid/accrued	(62.4)	(86.8)
Repayment of bonds	-	(895.1)
Conversion of convertible bonds	(2.9)	_
Buy back of convertible bonds	(541.6)	_
Closing liability	587.2	1,103.0

#### 29. Financial instruments

The accounting classification of each category of financial instruments, and their carrying amounts, are set out below:

(US\$ million)	As at 31 March 2016	As at 31 March 2015
Financial assets		
At fair value through profit or loss		
- Held for trading (Note 22)	7,977.9	6,006.0
At fair value through profit or loss/designated for hedging		
Financial instruments (derivatives)	19.1	16.8
Loan and receivables		
Bank deposits (Note 22)	530.3	1,850.1
Cash and cash equivalents	428.3	353.7
- Trade and other receivables	854.7	1,132.6
- Other non-current assets	69.2	129.8
Available-for-sale investments		
- Financial asset investments held at fair value	6.5	4.2
Total	9,886.0	9,493.2
Financial liabilities		
At fair value through profit or loss/designated for hedging		
- Financial instruments (derivatives)	(68.9)	(45.8)
Financial liabilities at amortised cost		
- Trade and other payables	(4,921.6)	(4,808.2)
- Borrowings <sup>1</sup>	(16,263.3)	(16,667.8)
Total	(21,253.8)	(21,521.8)

<sup>1</sup> Includes amortised cost liability portion of convertible bonds US\$587.2 million (2015: US\$1,103.3 million).

IFRS 13 requires additional information regarding the methodologies employed to measure the fair value of financial instruments which are recognised or disclosed in the financial statements. These methodologies are categorised per the standard as:

Level 1 fair value measurements are those derived from quoted prices (unadjusted) in active markets for identical assets or liabilities.

Level 2 fair value measurements are those derived from inputs other than quoted prices that are observable for the asset or liability, either directly (i.e. as prices) or indirectly (i.e. derived from prices).

Level 3 fair value measurements are those derived from valuation techniques that include inputs for the asset or liability that are not based on observable market data (unobservable inputs).

The below table summarises the categories of financial assets and liabilities measured at fair value:

	As at 31 M	arch 2016	
(US\$ million)	Level 1	Level 2	
Financial assets			
At fair value through profit or loss			
- Held for trading	6,840.7	1,137.2	
- Financial instruments (derivatives)	3.2	15.9	
Available-for-sale investments			
- Financial asset investments held at fair value	6.5	-	
Total	6,850.4	1,153.1	
Financial liabilities			
At fair value through profit or loss/designated for hedging			
- Financial instruments (derivatives)	(2.1)	(66.8)	
Total	(2.1)	(66.8)	

	As at 31 March 2015	
	Level 1	Level 2
Financial assets		
At fair value through profit or loss		
- Held for trading	6,725.3	1,130.8
- Financial instruments (derivatives)	_	16.8
Available-for-sale investments		
- Financial asset investments held at fair value	4.2	_
Total	6,729.5	1,147.6
Financial liabilities		
At fair value through profit or loss/designated for hedging		
- Financial instruments (derivatives)	-	(45.8)
Total	-	(45.8)

<sup>1</sup> Held for trading disclosure at 31 March 2015 has been restated to appropriately disclose the bonds valued using inputs other than quoted price as Level 2 rather than Level 1.

There were no transfers between Level 1 and Level 2 during the year. No financial assets or liabilities that are measured at fair value were Level 3 fair value measurements.

The fair value of borrowings is US\$15,118.2 million (2015: US\$16,457.7 million), classified under Level 2 of fair value hierarchy. For all other financial instruments, the carrying amount is either the fair value, or approximates to the fair value.

The fair value of financial asset investments represents the market value of the quoted investments and other traded instruments. For other financial assets the carrying value is considered to approximate to fair value.

The fair value of financial liabilities is the market value of the traded instruments, where applicable. Otherwise fair value is calculated using a discounted cash flow model with market assumptions, unless the carrying value is considered to approximate to fair value.

The fair value of the embedded derivative liability of the convertible bond has been calculated using the Black-Scholes model with market assumptions.

#### Derivative instruments and risk management

The Group's businesses are subject to several risks and uncertainties including financial risks.

The Group's documented risk management policies act as an effective tool in mitigating the various financial risks to which the businesses are exposed in the course of their daily operations. The risk management policies cover areas such as liquidity risk, commodity price risk, foreign exchange risk, interest rate risk, credit risk and capital management (the latter covered in Note 34).

Risks are identified through a formal risk management programme with active involvement of senior management personnel and business managers at both the corporate and individual subsidiary level. Each operating subsidiary in the Group has in place risk management processes which are in line with the Group's policy. Each significant risk has a designated 'owner' within the Group at an appropriate senior level. The potential financial impact of the risk and its likelihood of a negative outcome are regularly updated. The risk management process is coordinated by the Management Assurance function and is regularly reviewed by the Group's Audit Committee. The Audit Committee is aided by the CFO Committee and the Risk Management Committee, which meets regularly to review risks as well as the progress against the planned actions. Key business decisions are discussed at the monthly meetings of the CFO Committee and Executive Committee. The overall internal control environment and risk management programme including financial risk management is reviewed by the Audit Committee on behalf of the Board.

## Treasury management

Treasury management focuses on capital protection, liquidity maintenance and yield maximisation. The treasury policies are approved by the Board and adherence to these policies is strictly monitored at the Executive Committee meetings. Day-to-day treasury operations of the subsidiary companies are managed by their respective finance teams within the framework of the overall Group treasury policies. Long-term fund raising including strategic treasury initiatives are handled by a central team while short-term funding for routine working capital requirements is delegated to subsidiary companies. A monthly reporting system exists to inform senior management of investments, debt, currency, commodity and interest rate derivatives. The Group has a strong system of internal control which enables effective monitoring of adherence to Group policies. The internal control measures are supplemented by regular internal audits.

The investment portfolio is independently reviewed by CRISIL Limited and our portfolio has been rated as 'Very Good', meaning highest safety.

The Group uses derivative instruments as part of its management of exposure to fluctuations in foreign currency exchange rates, interest rates and commodity prices. The Group does not acquire or issue derivative financial instruments for trading or speculative purposes. The Group does not enter into complex derivative transactions to manage the treasury and commodity risks. Both treasury and commodities derivative transactions are normally in the form of forward contracts and interest rate and currency swaps and these are subject to the Group guidelines and policies.

#### Commodity risk

The Group is exposed to the movement of base metal commodity prices on the London Metal Exchange. Any decline in the prices of the base metals that the Group produces and sells will have an immediate and direct impact on the profitability of the businesses. As a general policy, the Group aims to sell the products at prevailing market prices. The commodity price risk in the import of copper concentrate and alumina is hedged on back-to-back basis ensuring no price risk for the business. Entities with integrated operations aim to achieve the monthly average of the commodity prices for sales realisation. Hedging is used primarily as a risk management tool to secure future cash flows in cases of high volatility by entering into forward contracts or similar instruments. The hedging activities are subject to strict limits set out by the Board and to a strictly defined internal control and monitoring mechanism. Decisions relating to hedging of commodities are taken at the Executive Committee level and with clearly laid down guidelines for their implementation by the subsidiaries.

Whilst the Group aims to achieve average LME prices for a month or a year, average realised prices may not necessarily reflect the LME price movements because of a variety of reasons such as uneven sales during the year and timing of shipments.

The Group is also exposed to the movement of international crude oil price and the discount in the price of Rajasthan crude oil to Brent price.

#### Copper

The Group's custom smelting copper operations at Tuticorin is benefited by a natural hedge except to the extent of a possible mismatch in quotational periods between the purchase of concentrate and the sale of finished copper. The Group's policy on custom smelting is to generate margins from TC/RCs, improving operational efficiencies, minimising conversion cost, generating a premium over LME on sale of finished copper, sale of by-products and from achieving import parity on domestic sales. Hence, mismatches in quotational periods are managed to ensure that the gains or losses are minimised. The Group hedges this variability of LME prices through forward contracts and tries to make the LME price a pass-through cost between purchases of copper concentrate and sales of finished products, both of which are linked to the LME price.

TC/RCs are a major source of income for the Indian copper smelting operations. Fluctuations in TC/RCs are influenced by factors including demand and supply conditions prevailing in the market for mine output. The Group's Copper business has a strategy of securing a majority of its concentrate feed requirement under long-term contracts with mines.

KCM is largely an integrated copper producer and whenever hedging is done it is with an intention to protect the Group from price fluctuations in copper. KCM also does hedging for its custom smelting operations in line with the Group's policy on custom smelting at Tuticorin, as explained above.

#### **Aluminium**

The requirement of the primary raw material, alumina, is partly met from own sources and the rest is purchased primarily on negotiated price terms. Sales prices are linked to the LME prices. At present the Group on selective basis hedges the aluminium content in imported alumina to protect its margins.

The Group also enters into hedging arrangements for its aluminium sales to realise month of sale LME prices.

#### Zinc and lead

The sales prices are linked to the LME prices. The Group also enters into hedging arrangements for its zinc and lead sales to realise month of sale LME prices.

#### Iron ore

The Group sells its iron ore production from Goa on the prevailing market prices and from Karnataka through e-auction route as mandated by State Government of Karnataka in India.

## Provisionally priced financial instruments

On 31 March 2016, the value of net financial liabilities linked to commodities (excluding derivatives) accounted for on provisional prices was a liability of US\$416.3 million (2015: liability of US\$689.9 million). These instruments are subject to price movements at the time of final settlement and the final price of these instruments will be determined in the financial year beginning 1 April 2016.

Set out below is the impact of a 10% increase in LME prices on profit/(loss) for the year and total equity as a result of changes in value of the Group's commodity financial instruments as at 31 March 2016:

(US\$ million except as stated) Commodity price sensitivity	Closing LME as at 31 March 2016 US\$	Effect on profit/(loss) of a 10% increase in the LME 31 March 2016 (US\$ million)	Effect on total equity of a 10% increase in the LME 31 March 2016 (US\$ million)
Copper	4,855.5	(44.5)	(44.5)
Zinc	1,785.0	0.2	0.2
Lead	1,704.5	0.6	0.6

(US\$ million except as stated) Commodity price sensitivity	Closing LME as at 31 March 2015 US\$	Effect on profit/(loss) of a 10% increase in the LME 31 March 2015 (US\$ million)	Effect on total equity of a 10% increase in the LME 31 March 2015 (US\$ million)
Copper	6,050	(62.2)	(62.2)
Zinc	2,075	0.2	0.2
Lead	1,808	_	_

The above sensitivities are based on volumes, costs, exchange rates and other variables and provide the estimated impact of a change in LME prices on profit and equity assuming that all other variables remain constant. A 10% decrease in LME prices would have an equal and opposite effect on the Group's financial instruments.

Further, the impact of a 10% increase in closing copper LME for provisionally priced copper concentrate purchased at Vedanta Limited Copper division custom smelting operations is US\$50.0 million (2015: US\$69.2 million), which is pass through in nature and as such will not have any impact on the profitability.

#### Financial risk and sensitivities

The Group's Board approved financial risk policies comprise liquidity, currency, interest rate and counterparty risk. The Group does not engage in speculative treasury activity but seeks to manage risk and optimise interest and commodity pricing through proven financial instruments.

#### (a) Liquidity

The Group requires funds both for short-term operational needs as well as for long-term investment programmes mainly in growth projects. The Group generates sufficient cash flows from the current operations which together with the available cash and cash equivalents and liquid financial asset investments provide liquidity both in the short term as well as in the long term. Anticipated future cash flows, together with undrawn fund based committed facilities of US\$1,087.3 million, and cash and liquid investments of US\$8,936.5 million as at 31 March 2016, are expected to be sufficient to meet the liquidity requirement of the Group in the near future.

The Group's current corporate family ratings from Standard & Poor's and Moody's are B and B2 respectively, with Stable outlook from Standard & Poor's and Negative outlook from Moody's. These ratings reflect the rating agencies' actions during the year on the companies in the resource sector taking into consideration current market conditions. The Group strives to maintain a healthy liquidity, gearing ratio and retains flexibility in the financing structure to alter the ratio when the need arises (see Note 34 for further details).

The maturity profile of the Group's financial liabilities based on the remaining period from the balance sheet date to the contractual maturity date is given in the table below. The figures reflect the contractual undiscounted cash obligation of the Group:

## At 31 March 2016

(US\$ million) Payment due by period	< 1 year	1–2 years	2-5 years	> 5 years	Total
Trade and other payables	4,885.5	_	29.9	6.2	4,921.6
Bank and other borrowings <sup>1</sup>	4,711.2	3,434.4	7,645.5	3,388.3	19,179.4
Convertible bonds <sup>1</sup>	595.5	_	_	_	595.5
Derivative liabilities	67.8	1.1	_	_	68.9
Total	10,260.0	3,435.5	7,675.4	3,394.5	24,765.4

<sup>1</sup> Includes contractual interest payment based on interest rate prevailing at the end of the reporting period.

#### At 31 March 2015

(US\$ million) Payment due by period	< 1 year	1–2 years	2–5 years	> 5 years	Total
Trade and other payables	4,509.0	229.3	63.0	6.9	4,808.2
Bank and other borrowings <sup>1</sup>	4,171.8	2,981.0	8,730.4	3,476.1	19,359.3
Convertible bonds <sup>1</sup>	65.8	1,161.5	_	_	1,227.3
Derivative liabilities	45.8	-	-	-	45.8
Total	8,792.4	4,371.8	8,793.4	3,483.0	25,440.6

<sup>1</sup> Includes contractual interest payment based on interest rate prevailing at the end of the reporting period.

At 31 March 2016, the Group had access to funding facilities (both fund based and non-fund based) of US\$18,140.7 million, of which US\$1,087.3 million is fund based and US\$716.2 million is non-fund based, was not yet drawn, as set out below.

(US\$ million) Funding facilities	Total facility	Drawn	Undrawn
Less than 1 year	6,104.2	4,310.0	1,794.2
1–2 years	2,642.7	2,642.7	_
2–5 years and above	9,393.8	9,384.5	9.3
Total	18,140.7	16,337.2	1,803.5

At 31 March 2015, the Group had access to funding facilities (both fund based and non-fund based) of US\$18,981.5 million of which US\$1,208.2 million was fund based and US\$969.7 million was non-fund based, was not yet drawn, as set out below.

(US\$ million) Funding facilities	Total facility	Drawn	Undrawn
Less than 1 year	5,270.9	3,189.5	2,081.4
1–2 years	3,265.4	3,265.4	-
2–5 years and above	10,445.2	10,348.7	96.5
Total	18,981.5	16,803.6	2,177.9

'Fund based' facilities represent contractual agreements for financial institutions to provide cash, such as cash credit limits and term loans, whereas 'non-fund based' facilities only give rise to an obligation to provide cash in certain circumstances, such as bank guarantees and letters of credit.

#### (b) Foreign currency

The Group's presentation currency is the US dollar. The majority of the assets are located in India and the Indian rupee is the functional currency for the Indian operating subsidiaries. Exposures on foreign currency loans are managed through the foreign exchange hedging policy, which is reviewed periodically to ensure that the risk from fluctuating currency exchange rates is appropriately managed. Natural hedges available in the business are identified at each entity level and hedges are placed only for the net exposure. Short-term net exposures are hedged progressively based on their maturity. Longer exposures beyond one year for trade and other current account transactions are reviewed and hedges taken accordingly. However, all new exposures on account of long-term borrowing are being hedged.

The carrying amount of the Group's financial assets and liabilities in different currencies are as follows:

	At 31 Ma	rch 2016	At 31 March 2015	
(US\$ million)	Financial assets	Financial liabilities	Financial assets	Financial liabilities
US\$	1,260.9	12,519.9	1,362.1	14,216.3
INR	8,524.6	8,502.5	8,019.4	7,151.8
Kwacha	0.8	120.9	1.3	38.9
AUD	0.4	9.3	0.7	9.7
CAD	_	0.1	_	0.3
EURO	46.6	47.4	75.6	59.0
ZAR	18.3	18.6	14.8	21.8
NAD	5.0	5.0	9.8	23.2
Others	29.4	30.1	9.5	0.8
Total	9,886.0	21,253.8	9,493.2	21,521.8

The Group's exposure to foreign currency arises where a Group company holds monetary assets and liabilities denominated in a currency different to the functional currency of that entity with USD (US dollar) being the major foreign currency exposure of the Group's main operating subsidiaries. Set out below is the impact of a 10% change in the US dollar on profit/(loss) and equity arising as a result of the revaluation of the Group's foreign currency financial instruments:

		31 March 2016		
(US\$ million)	Closing exchange rate	Effect of 10% strengthening of US dollar on net earnings	Effect of 10% strengthening of US dollar on total equity	
INR	66.3329	(191.1)	(230.2)	
Kwacha	7.5811	(10.1)	(10.1)	

	31 March 2015				
(US\$ million)	Closing exchange rate	Effect of 10% strengthening of US dollar on net earnings	Effect of 10% strengthening of US dollar on total equity		
INR	62.5908	(192.3)	(236.1)		
Euro	0.9271	0.7	0.7		

The sensitivities are based on financial assets and liabilities held at 31 March 2016 where balances are not denominated in the functional currency of the respective subsidiaries. The sensitivities do not take into account the Group's sales and costs and the results of the sensitivities could change due to other factors such as changes in the value of financial assets and liabilities as a result of non-foreign exchange influenced factors. A 10% depreciation of the US dollar would have an equal and opposite effect on the Group's financial instruments.

## (c) Interest rate risk

At 31 March 2016, the Group's net debt of US\$7,328.8 million (2015: US\$8,460.3 million net debt) comprises cash, cash equivalents and liquid investments of US\$8,936.5 million (2015: US\$8,209.8 million) offset by debt of US\$16,263.3 million (2015: US\$16,667.8 million) and debt derivative liability of US\$2.0 million (2015: liability of US\$2.3 million).

The Group is exposed to interest rate risk on short-term and long-term floating rate instruments and on the refinancing of fixed rate debt. The Group's policy is to maintain a balance of fixed and floating interest rate borrowings and the proportion of fixed and floating rate debt is determined by current market interest rates. As at 31 March 2016, 48.0% (2015: 50.2%) of the total debt was at a fixed rate and the balance was at a floating rate. The USD floating rate debt is linked to US dollar LIBOR and INR floating rate debt to Bank's base rate. The Group also aims to opt for a higher proportion of long-term debt to fund growth projects to extend its maturity profile. The Group invests cash and liquid investments in short-term deposits and debt mutual funds, some of which generate a tax-free return, to achieve the Group's goal of maintaining liquidity, carrying manageable risk and achieving satisfactory returns.

Floating rate financial assets are largely mutual fund investments which have debt securities as underlying assets. The returns from these financial assets are linked to market interest rate movements; however the counterparty invests in the agreed securities with known maturity tenure and return and hence has manageable risk. Additionally, the investments portfolio is independently reviewed by CRISIL Limited, and our investment portfolio has been rated as 'Very Good', meaning highest safety.

The exposure of the Group's financial assets to interest rate risk is as follows:

		At 31 March 2016			At 31 March 2015			
(US\$ million)	Floating rate financial assets	Fixed rate financial assets	Equity investments	Non-interest bearing financial assets	Floating rate financial assets	Fixed rate financial assets	Equity investments	Non- interest bearing financial assets
Financial assets	6,334.0	2,601.8	6.5	924.6	5,419.6	2,820.1	4.2	1,232.5
Derivative assets	-	-	-	19.1	-	-	_	16.8
Total financial assets	6.334.0	2,601.8	6.5	943.7	5,419.6	2,820.1	4.2	1,249.3

The exposure of the Group's financial liabilities to interest rate risk is as follows:

	A	t 31 March 2016	<b>;</b>	At 31 March 2015			
(US\$ million)	Floating rate financial liabilities	Fixed rate financial liabilities	Non- interest bearing financial liabilities	Floating rate financial liabilities	Fixed rate financial liabilities	Non- interest bearing financial liabilities	
Financial liabilities	8,454.3	9,294.2	3,436.4	8,711.9	9,506.7	3,257.4	
Derivative liabilities	-	_	68.9	2.3	_	43.5	
Total financial liabilities	8,454.3	9,294.2	3,505.3	8,714.2	9,506.7	3,300.9	

The weighted average interest rate on the fixed rate financial liabilities is 8.15% (2015: 8.3%) and the weighted average period for which the rate is fixed is 2.4 years (2015: 3.0 years).

Considering the net debt position as at 31 March 2016 and the investment in bank deposits, corporate bonds and debt mutual funds, any increase in interest rates would result in a net loss and any decrease in interest rates would result in a net gain. The sensitivity analysis below has been determined based on the exposure to interest rates for both derivative and non-derivative instruments at the balance sheet date.

The below table illustrates the impact of a 0.5% to 2.0% change in interest rate of borrowings on profit/(loss) and equity and represents management's assessment of the possible change in interest rates.

#### At 31 March 2016

(US\$ million) Change in interest rates	Effect on loss for the year	Effect on total equity
0.5%	42.3	42.3
1.0%	84.5	84.5
2.0%	169.1	169.1

#### At 31 March 2015

(US\$ million) Change in interest rates	Effect on loss for the year	Effect on total equity
0.5%	41.5	41.5
1.0%	82.9	82.9
2.0%	165.9	165.9

#### (d) Credit risk

The Group is exposed to credit risk from trade receivables, cash and cash equivalents, liquid investments and other financial instruments.

The Group has clearly defined policies to mitigate counterparty risks. Cash and liquid investments are held primarily in debt schemes of mutual funds, bonds and bank deposits with good credit ratings. Defined limits are in place for exposure to individual counterparties in case of mutual fund houses and banks.

The large majority of receivables due from third parties are secured. Moreover, given the diverse nature of the Group's businesses, trade receivables are spread over a number of customers with no significant concentration of credit risk. During the year ended 31 March 2016 no single customer accounted for 10% or more of the Group's net sales or for any of the Group's primary businesses. During the year ended 31 March 2015, other than the exception of a single customer in our Oil & Gas business, no single customer accounted for 10% or more of the Group's net sales or for any of the Group's primary businesses. The history of trade receivables shows a negligible provision for bad and doubtful debts. Therefore, the Group does not expect any material risk on account of non-performance by any of our counterparties.

The Group's maximum gross exposure to credit risk at 31 March 2016 is US\$9,886.0 million (2015: US\$9,493.2 million).

Of the year end trade and other receivable balance the following, though overdue, are expected to be realised in the normal course of business and, hence, are not considered impaired as at 31 March 2016:

(US\$ million)	2016	2015
Less than 1 month	49.8	39.1
Between 1–3 months	74.3	49.1
Between 3–12 months	98.1	40.3
Greater than 12 months	86.3	62.5
Total	308.5	191.0

Receivables amounting to Nil (31 March 2015: US\$43.8 million), of the Power division of the Group have been impaired primarily as a result of an ongoing dispute in relation to a tariff agreement with a power supply company.

## Derivative financial instruments

The fair value of all derivatives is separately recorded on the balance sheet within other financial assets (derivatives) and other financial liabilities (derivatives), current and non-current. In addition, the derivative component of certain convertible bonds is shown as part of the overall convertible bond liability (Note 28). Derivatives that are designated as hedges are classified as current or non-current depending on the maturity of the derivative.

#### Embedded derivatives

Derivatives embedded in other financial instruments or other contracts are treated as separate derivative contracts, when their risks and characteristics are not closely related to those of their host contracts.

#### Cash flow hedges

The Group also enters into forward exchange and commodity price contracts for hedging highly probable forecast transactions and accounts for them as cash flow hedges and states them at fair value. Subsequent changes in fair value are recognised in equity until the hedged transactions occur, at which time the respective gains or losses are transferred to the income statement.

The fair value of the Group's open derivative positions at 31 March 2016, recorded within financial instruments (derivative), is as follows:

	As at 31 Mar	ch 2016	As at 31 March 2015	
(US\$ million)	Liability	Asset	Liability	Asset
Current				
Cash flow hedges				
- Commodity contracts	(0.9)	0.2	_	2.5
- Forward foreign currency contracts	(8.3)	5.5	(0.6)	_
Hedge of net investment in foreign operations	-	_	_	7.9
Fair value hedges				
- Commodity contracts	_	0.1	(1.7)	3.8
- Forward foreign currency contracts	(37.4)	1.3	(20.1)	1.6
- Other (foreign currency swap)	_	_	(2.2)	_
Non-qualifying hedges				
- Commodity contracts	(1.2)	2.9	(1.5)	0.8
- Forward foreign currency contracts	(19.7)	8.3	(11.2)	0.0
- Interest rate swap	_	_	(8.2)	_
- Other (foreign currency swap)	(0.2)	0.0	(0.2)	_
Total	(67.7)	18.3	(45.7)	16.6
Non-current				
Fair value hedges				
- Forward foreign currency contracts	(1.2)	0.8	(0.1)	0.2
Total	(1.2)	0.8	(0.1)	0.2
Grand total	(68.9)	19.1	(45.8)	16.8

The majority of cash flow hedges taken out by the Group during the year comprises commodity contracts and foreign currency forward contracts for firm future commitments.

The cash flows related to the majority of cash flow hedges above are expected to occur during the year ended 31 March 2017 and consequently may impact the income statements for that year depending upon the change in the commodity prices and foreign exchange rate movements.

## Non-qualifying hedges

The majority of these derivatives comprise interest rate swaps and foreign currency forward contracts which are economic hedges but which do not fulfil the requirements for hedge accounting of IAS 39 Financial Instruments: Recognition and Measurement.

#### Fair value hedges

The fair value hedges relate to foreign currency forward contracts taken to hedge currency exposure on purchase of raw materials and capital imports.

## Hedging reserve reconciliation

(US\$ million)	Hedging reserves	Non-controlli ng interests	Total
At 1 April 2014	(50.4)	(37.2)	(87.6)
Amount recognised directly in equity	(17.1)	(9.5)	(26.6)
Amount transferred to income statement	(7.4)	(4.4)	(11.8)
Changes in non-controlling interests	(3.9)	3.9	_
Exchange difference	4.1	2.5	6.6
At 1 April 2015	(74.7)	(44.7)	(119.4)
Amount recognised directly in equity	(17.2)	(10.1)	(27.3)
Amount transferred to income statement	(0.8)	(0.7)	(1.5)
Exchange difference	5.0	2.9	7.9
At 31 March 2016	(87.7)	(52.6)	(140.3)

#### 30. Provisions

	Restoration, rehabilitation and	KCM copper price		
(US\$ million)	environmental	participation	Other	Total
At 1 April 2014	306.5	89.3	28.9	424.7
(Released)/charged to income statement	(26.9)	(1.4)	0.9	(27.4)
Unwinding of discount	31.8	5.0	-	36.8
Cash paid	(7.5)	(1.0)	(1.4)	(9.9)
Change in estimates	(66.1)	_	_	(66.1)
Exchange differences	(12.9)	-	(1.0)	(13.9)
At 1 April 2015	224.9	91.9	27.4	344.2
Charged to income statement	3.4	_	1.7	5.1
Unwinding of discount (note 7)	10.3	2.5	0.7	13.5
Cash paid	(43.9)	_	(0.7)	(44.6)
Exchange differences	(3.0)	7.6	(3.3)	1.3
At 1 April 2016	191.7	102.0	25.8	319.5
Current 2016	17.5	102.0	12.6	132.1
Non-current 2016	174.2	-	13.2	187.4
	191.7	102.0	25.8	319.5
Current 2015	37.3	91.6	11.9	140.8
Non-current 2015	187.6	0.3	15.5	203.4
	224.9	91.9	27.4	344.2

#### Restoration, rehabilitation and environmental

The provisions for restoration, rehabilitation and environmental liabilities represent the management's best estimate of the costs which will be incurred in the future to meet the Group's obligations under existing Indian, Australian, Zambian, Namibian, South African and Irish law and the terms of the Group's mining and other licenses and contractual arrangements. These amounts, calculated by considering discount rates within the range of 2% to 9%, become payable on closure of mines and are expected to be incurred over a period of one to 15 years. Within India, the principal restoration and rehabilitation provisions are recorded within Cairn India where a legal obligation exists relating to the oil & gas fields,

where costs are expected to be incurred in restoring the site of production facilities at the end of the producing life of an oil field. The Group recognises the full cost of site restoration as a liability when the obligation to rectify environmental damage arises.

An obligation to incur restoration, rehabilitation and environmental costs arises when environmental disturbance is caused by the development or ongoing production from a producing field.

#### KCM copper price participation

During the year ended 31 March 2013, the Group and ZCCM-IH agreed a final settlement for the copper price participation liability. The total amount to be paid is US\$119.7 million to be settled in 16 instalments with the first instalment starting on 31 December 2012 and last instalment on 30 September 2016. The total liability that remains outstanding is US\$102.0 million as at 31 March 2016. The liability recognised has been discounted at 11.00% to take into account the expected timings of the various payments and recognised as a liability of US\$94.4 million (2015: US\$91.9 million).

#### Other

Other includes provision on post retirement medical benefits. The expected period of utilisation is 18 years.

#### 31. Deferred tax

The Group has accrued significant amounts of deferred tax. The majority of the deferred tax liability represents accelerated tax relief for the depreciation of capital expenditure and the depreciation on fair value uplifts created on acquisitions, net of losses carried forward by Vedanta Limited (post the reorganisation) and MAT credits carried forward in Cairn India and Hindustan Zinc.

The amounts of deferred taxation on temporary differences, provided and not provided, in the accounts are as follows:

#### Provided - deferred tax liabilities/(assets)

(US\$ million)	As at 31 March 2016	As at 31 March 2015
Accelerated capital allowances	2,164.2	3,478.3
Unutilised tax losses	(749.8)	(445.1)
Other temporary differences	(2049.6)	(1,697.1)
	(635.2)	1,336.1
Disclosed as:		
Deferred tax liability	620.2	2,588.7
Deferred tax asset	(1,255.4)	(1,252.6)
	(635.2)	1,336.1

#### Unrecognised deferred tax assets

(US\$ million)	As at 31 March 2016	As at 31 March 2015
Unutilised business losses	(585.2)	(342.2)
Unabsorbed depreciation	(203.2)	(116.6)
Capital losses	(42.4)	(12.8)
Total	(830.8)	(471.6)

The above relates to the tax effect on US\$1,239.0 million (2015: US\$1,088.3 million) of unutilised tax losses of the Company, VRP, VRHL and VRJ2 which have no expiry period; US\$986.4 million (2015: US\$827.2 million) unutilised tax losses of Twin Star Mauritius Holdings Limited; US\$110.6 million unutilised tax losses of Westglobe Ltd (WL); which are subject to the Mauritius tax regime and can be carried forward for a period of five years; US\$54.9 million of unutilised tax losses and non-refundable R&D tax credits of Copper Mines of Tasmania, which can be carried forward indefinitely under the Australian tax regime; US\$515.4 million of unutilised tax losses of Konkola Copper Mines which can be carried forward for 10 years under the Zambian tax regime and US\$297.7 million (2015: US\$344.3 million) of unabsorbed depreciation for Malco Energy Limited (MEL); US\$250.8 million of unutilised tax losses and unabsorbed depreciation for Talwandi Sabo Power Ltd (TSPL); US\$143.0 million of unutilised capital losses of Hindustan Zinc Ltd (HZL); US\$40.7 million of unutilised capital losses of Vedanta Ltd (VEDL); US\$41.1 million of unutilised tax losses and unabsorbed depreciation for Vizag General Cargo Berth Pvt Ltd (VGCB) which are subject to the Indian tax regime. Pursuant to the Indian tax regime, unutilised business tax losses expire eight years from the period in which the losses arise and unabsorbed depreciation can be carried forward indefinitely. No deferred tax asset has been recognised on these unutilised tax losses and tax credits as there is no evidence that sufficient taxable profit will be available in the future against which they can be utilised by the respective entities.

#### Deferred tax asset

(US\$ million)	As at 31 March 2016	As at 31 March 2015
At 1 April	1,252.6	1,223.7
Reclassification	(10.1)	_
Credited to income statement	96.8	45.8
Credited/(charged) directly to equity	1.3	(0.3)
Foreign exchange differences	(85.2)	(16.6)
At 31 March	1,255.4	1,252.6

The Group has US\$2,274.6 million of unutilised tax losses in Vedanta Limited, BALCO, KCM and MAT credits of US\$1,966.8 million carried forward in Hindustan Zinc, Vedanta Limited and Cairn India which are subject to the Indian tax regime. Under the Indian tax regime, unutilised tax losses expire eight years from the period in which the losses arise and unabsorbed depreciation can be carried forward indefinitely. MAT credits expire 10 years from the period in which the credits arise.

Deferred tax assets in the Group have been recognised to the extent there are sufficient taxable temporary differences relating to the same taxation authority and the same taxable entity which are expected to reverse.

#### Deferred tax liability

(US\$ million)	As at 31 March 2016	As at 31 March 2015
At 1 April	2,588.7	4,960.1
Reclassification	(10.1)	_
Credited to income statement <sup>1</sup>	(1,921.8)	(2,377.5)
Charged/(credited) directly to equity	2.5	(6.5)
Foreign exchange differences	(39.1)	12.6
At 31 March	620.2	2,588.7

<sup>1</sup> Including deferred tax credit of US\$1,903.3 million (2015: US\$2138.0 million) related to impairment of Oil & Gas assets at Cairn (Note 5).

# 32. Share-based payments

#### Employee share schemes

The Group aims to provide superior rewards for outstanding performance and a high proportion of 'at risk' remuneration for Executive Directors. Three employee share schemes were approved by shareholders on Listing. In 2014, the Board introduced a Performance Share Plan (PSP) which is the primary arrangement under which share-based incentives are provided to the Executive Directors and the wider management group. In 2015, the Board also introduced a Deferred Share Bonus Plan (DSBP).

# The Vedanta Resources Long-Term Incentive Plan (the LTIP) and Employee Share Ownership Plan (the ESOP) and Performance Share Plan (the PSP)

The maximum value of shares that can be conditionally awarded to an Executive Director in a year is 150% of annual salary. In respect of Mr Navin Agarwal and Mr Tom Albanese, salary means the aggregate of their salary payable by Vedanta and their CTC payable by Vedanta Limited. The maximum value of shares that can be awarded to members of the wider management group is calculated by reference to the grade average CTC and individual grade of the employee. The performance conditions attaching to outstanding awards are as follows:

• PSP – measured in terms of Total Shareholder Return (TSR) (being the movement in a company's share price plus reinvested dividends) – is compared over the performance period with the performance of the companies as defined in the scheme from the grant date. The extent to which an award vests will depend on the Company's TSR rank against a group or groups of peer companies at the end of the performance period and as moderated by the Remuneration Committee.

The vesting schedule is shown in the table below, with adjusted straight-line vesting in between the points shown and rounding down to the nearest whole share.

# Vedanta's TSR performance against comparator group

	(% of award vesting)
Below median	-
At median	30
At or above upper quartile	100

- The performance condition is measured by taking the Company's TSR over the three months immediately preceding the date of grant and over the three months immediately preceding the end of the performance period, and comparing its performance with that of the comparator group or groups. The information to enable this calculation to be carried out on behalf of the Remuneration Committee (the Committee) is provided by the Company's advisers. The Committee considers that this performance condition, which requires that the Company's total return has outperformed a group of industry peers, provides a reasonable alignment of the interests of the Executive Directors and the wider management group with those of the shareholders.
- Initial awards under the PSP were granted on 17 November 2014, 1 January 2015 and subsequently on 30 December 2015. The exercise price of the awards is 10 US cents per share and the performance period is three years, with no re-testing being allowed.
- ESOP measured in terms of business performance set against business plan for the financial year comprising operational deliverables, enabler parameters and sustainability performance specific to each company. The vesting schedule is graded over three years and varies from company to company with a minimum vesting of 30% triggering at either 80% or 85% business score. In another tranche, the vesting schedule is staggered over a period of three years from the date of grant, with 70% vesting based on the achievement of business performance and the remaining 30% based on continued employment with the Group until the end of the third year.
- Initial awards under ESOP were granted on 24 September 2012 with further awards being made on 16 May 2013. The exercise price of the awards is 10 US cents per share and the performance period is one year.
- The exercise period is six months from the date of vesting.
- LTIP measured in terms of Total Shareholder Return (TSR) (being the movement in a company's share price plus reinvested dividends) is compared over the performance period with the performance of the companies as defined in the scheme from the grant date. The extent to which an award vests will depend on the Company's TSR rank against a group of peer companies (Adapted Comparator Group) at the end of the performance period and as moderated by the Remuneration Committee. The vesting schedule is shown in the table below, with adjusted straight-line vesting in between the points shown and rounded down to the nearest whole share.

#### Vedanta's TSR performance against adapted comparator group

	(% of award vesting)
Below median	-
At median	40
At or above upper quartile	100

The performance condition is measured by taking the Company's TSR over the four weeks immediately preceding the date of grant and over the four weeks immediately preceding the end of the performance period, and comparing its performance with that of the comparator group described above. The information to enable this calculation to be carried out on behalf of the Remuneration Committee (the Committee) is provided by the Company's advisers. The Committee considers that this performance condition, which requires that the Company's total return has outperformed a group of companies chosen to represent the mining sector, provides a reasonable alignment of the interests of the Executive Directors and the wider management group with those of the shareholders.

Initial awards under the LTIP were granted on 26 February 2004. As on 31 March 2015 the awards outstanding are the awards issued on 1 August 2011, 1 October 2011, 1 January 2012 and 1 April 2012. The exercise price of the awards is 10 US cents per share and the performance period is three years, with no re-testing being allowed.

• The Vedanta Resources Deferred Share Bonus Plan (the DSBP) – In 2015, Vedanta introduced the DSBP, with initial awards being made in May 2015 and August 2015. Under the plan, a portion of the annual bonus is deferred into shares and the awards granted under this scheme are not subject to any performance conditions only on service conditions being met. The vesting schedule is staggered over a period of two or three years. In case of DSBP, the shares are purchased from open market and allotted to employees, officers and Directors. As on 31 March, the options outstanding under the DSBP scheme are 231,437.

In general, the awards will be settled in equity. The awards are accounted for in accordance with the requirements applying to equity-settled share-based payment transactions. The fair value of each award on the day of grant is equal to the average of the middle market quotations of its share price for five dealing days before the grant date.

Further details on these schemes are available in the Remuneration Report of the Annual Report.

The details of share options for the year ended 31 March 2016 and 31 March 2015 are presented below:

Year of grant	Exercise date	Exercise price US cents per share 1 April 2015	Options outstanding	Options granted during the year	Options lapsed during the year	Options lapsed during the year owing to performance conditions	Options exercised during the year	Options outstanding at 31 March 2016
2011	1 July 2014–1 January 2015	10	600	_	-	_	(600)	_
2011	1 August 2014–1 February 2015	10	118,527	_	(15,120)	_	(103,407)	_
2011	1 October 2014–1 April 2015 <sup>1</sup>	10	5,000	_	-	(1,800)	_	3,200
2012	1 January 2015–1 July 2015 <sup>1</sup>	10	7,000	_	-	(4,200)	_	2,800
2012	1 April 2015–1 September 2015 <sup>1</sup>	10	97,800	_	(37,850)	(58,190)	_	1,760
2012	24 September 2013–24 March 2016 <sup>1</sup>	10	368,952	_	(19,515)	_	(274,687)	74,750
2013	16 May 2014–16 November 2016	10	1,302,785	_	(159,288)	-	(361,500)	781,997
2014	17 November 2017–17 May 2018	10	5,335,500	_	(677,171)	_	_	4,658,329
2015	1 January 2018–1 July 2018	10	_	21,500	_	_	_	21,500
2015	30 December 2018–30 June 2019	10	-	5,484,575	(65,733)	_	-	5,418,842
			7,236,164	5,506,075	(974,677)	(64,190)	(740,194)	10,963,178

<sup>1</sup> The exercise period of the schemes expiring before 31 March 2016 has been extended up to June 2016.

## 32. Share-based payments continued

Year of grant	Exercise date	Exercise price US cents per share 1 April 2014	Options outstanding	Options granted during the year	Options lapsed during the year	Options lapsed during the year owing to performance conditions	Options exercised during the year	Options outstanding at 31 March 2015
2011	1 January 2014–1 July 2014	10	2,700	-	_	(1,620)	(1,080)	-
2011	1 April 2014–1 October 2014	10	67,500	_	_	(41,380)	(26,120)	-
2011	1 July 2014–1 January 2015	10	16,500	_	(5,000)	(6,900)	(4,000)	600
2011	1 August 2014–1 February 2015	10	2,185,550	-	(77,550)	(1,365,934)	(623,539)	118,527
2011	1 October 2014–1 April 2015	10	5,000	_	_	_	_	5,000
2012	1 January 2015–1 July 2015	10	7,000	_	_	_	_	7,000
2012	1 April 2015–1 September 2015	10	97,800	_	_	_	_	97,800
2012	24 September 2013–24 March 2016	10	2,380,748	_	(41,238)	(1,586,513)	(384,045)	368,952
2013	16 May 2014–16 October 2016	10	3,754,550	-	(188,047)	(1,899,849)	(363,869)	1,302,785
2014	17 November 2017–17 May 2018	10	-	5,485,000	(149,500)	-	-	5,335,500
			8,517,348	5,485,000	(461,335)	(4,902,196)	(1,402,653)	7,236,164

In the year ended 31 March 2016, 974,677 options lapsed in total and 740,194 options exercised. As at 31 March 2016, 10,963,178 options remained outstanding and 82,510 options were exercisable at the year end. The weighted average share price for the share options exercised during the year ended 31 March 2016 was GBP4.1 (year ended 31 March 2015: GBP8.9). The weighted average maturity period for the options outstanding as on 31 March 2016 is 31 months (31 March 2015: 33 months).

All share-based awards of the Group are equity-settled as defined by IFRS 2 'Share-based Payment'. The fair value of these awards has been determined at the date of grant of the award allowing for the effect of any market-based performance conditions. This fair value, adjusted by the Group's estimate of the number of awards that will eventually vest as a result of non-market conditions, is expensed on a straight-line basis over the vesting period.

The fair values were calculated using the Stochastic valuation model with suitable modifications to allow for the specific performance conditions of the respective schemes. The inputs to the model include the share price at date of grant, exercise price, expected volatility, expected dividends, expected term and the risk free rate of interest. A progressive dividend growth policy is assumed in all fair value calculations. Expected volatility has been calculated using historical return indices over the period to date of grant that is commensurate with the performance period of the award. The volatilities of the industry peers have been modelled based on historical movements in the return indices over the period to date of grant which is also commensurate with the performance period for the option. The history of return indices is used to determine the volatility and correlation of share prices for the comparator companies and is needed for the Stochastic valuation model to estimate their future TSR performance relative to the Company's TSR performance. All options are assumed to be exercised immediately after vesting.

The assumptions used in the calculations of the charge in respect of the PSP/ESOP awards granted during the year ended 31 March 2016 and 31 March 2015 are set out below:

	Year ended 31 March 2016 PSP December 2015	Year ended 31 March 2015 PSP November 2014
Number of instruments	5,484,575	5,485,000
Exercise price	US\$0.10	US\$0.10
Share price at the date of grant	GBP2.72	GBP8.09
Contractual life	3 years	3 years
Expected volatility	55.9%	35.5%
Expected option life	3 years	3 years
Expected dividends	9.93%	4.62%
Risk free interest rate	0.91%	0.90%
Expected annual forfeitures	10% p.a.	10% p.a.
Fair value per option granted	GBP1.95/GBP0.79	GBP6.98/GBP3.00

The Group recognised total expenses of US\$15.6 million and US\$28.6 million related to equity-settled share-based payment transactions in the year ended 31 March 2016 and 31 March 2015 respectively.

#### 33. Retirement benefits

The Group operates pension schemes for the majority of its employees in India, Australia, Africa and Ireland.

#### (a) Defined contribution schemes

Indian pension schemes

## Central Recognised Provident Fund

The Central Recognised Provident Fund relates to all full-time Indian employees of the Group. The amount contributed by the Group is a designated percentage of 12% of basic salary less contributions made as part of the Pension Fund (see below), together with an additional contribution of 12% (limited to a maximum contribution of 30% in case of the Iron Ore segment) of the salary of the employee.

The benefit is paid to the employee on their retirement or resignation from the Group.

#### Superannuation

Superannuation, another pension scheme applicable in India, is applicable only to executives in grade M4 and above. However, in case of the Cairn India Group and Iron Ore segment, the benefit is applicable to all executives. In Cairn India, it is applicable from the second year of employment. Certain companies hold policies with the Life Insurance Corporation of India (LIC), to which they contribute a fixed amount relating to superannuation, and the pension annuity is met by the LIC as required, taking into consideration the contributions made. Accordingly, this scheme has been accounted for on a defined contribution basis and contributions are charged directly to the income statement.

## Pension Fund

The Pension Fund was established in 1995 and is managed by the Government of India. The employee makes no contribution to this fund but the employer makes a contribution of 8.33% of salary each month subject to a specified ceiling per employee. This must be provided for every permanent employee on the payroll.

At the age of superannuation, contributions cease and the individual receives a monthly payment based on the level of contributions through the years, and on their salary scale at the time they retire, subject to a maximum ceiling of salary level. The Government funds these payments, thus the Group has no additional liability beyond the contributions that it makes, regardless of whether the central fund is in surplus or deficit.

# Australian Pension Scheme

The Group also operates defined contribution pension schemes in Australia. The contribution of a proportion of an employee's salary into a superannuation fund is a compulsory legal requirement in Australia. The employer contributes 9.5% of the employee's gross remuneration where the employee is covered by the industrial agreement and 12.5% of the basic remuneration for all other employees, into the employee's fund of choice. All employees have the option to make additional voluntary contributions.

## Zambian Pension Scheme

The KCM Pension Scheme is applicable to full-time permanent employees of KCM (subject to the fulfilment of certain eligibility criteria). The management of the scheme is vested in the trustees consisting of representatives of the employer and the members. The employer makes a monthly contribution of 5% to the KCM Pension Scheme and the member makes monthly contribution of 5%.

All contributions to the KCM Pension Scheme in respect of a member cease to be payable when the member attains normal retirement age of 55 years, or upon leaving the service of the employer, or when the member is permanently medically incapable of performing duties in the service of the employer. Upon such cessation of contribution on the grounds of normal retirement, or being rendered medically incapable of performing duties, or early voluntary retirement, the member is entitled to receive his accrued pension. The member is allowed to commute his/her accrued pension subject to certain rules and regulations.

The Group has no additional liability beyond the contributions that it makes. Accordingly, this scheme has been accounted for on a defined contribution basis and contributions are charged directly to the income statement.

#### Skorpion Zinc Provident Fund, Namibia

The Skorpion Zinc Provident Fund is a defined contribution fund and is compulsory to all full-time employees under the age of 60. Company contribution to the fund is a fixed percentage of 9% per month of pensionable salary, whilst the employee contributes 7% with the option of making additional contributions, over and above the normal contribution, up to a maximum of 12%.

Normal retirement age is 60 years and benefit payable is the member's fund credit which is equal to all employer and employee contributions plus interest. The same applies when an employee resigns from Skorpion Zinc. The Fund provides disability cover which is equal to the member's fund credit and a death cover of two times annual salary in the event of death before retirement. Current membership total is 908.

The Group has no additional liability beyond the contributions that it makes. Accordingly, this scheme has been accounted for on a defined contribution basis and contributions are charged directly to the income statement.

Black Mountain Mining (Pty) Limited, South Africa pension and provident funds

Black Mountain Mining (Pty) Ltd has two retirement funds, both administered by Alexander Forbes, a registered financial service provider. Both funds form part of the Alexander Forbes umbrella fund and are defined contribution funds.

Membership of both funds is compulsory for all permanent employees under the age of 60.

#### Lisheen Mine, Ireland Pension Funds

Lisheen Pension Plan is for all employees. Lisheen pays 5% and employees pay 5% with the option to make Additional Voluntary Contributions (AVCs) if desired. Executive contributions are 15% by Lisheen and a minimum of 5% by the employee with the option to make AVCs if desired. Death benefit is three times salary for employees and four times salary for executives. Pension and life cover ceases at 65. On wind up of the pension schemes, the benefits will be paid out to the remaining members in accordance with the scheme rules and Irish Revenue tax regulations.

The Group has no additional liability beyond the contributions that it makes. Accordingly, this scheme has been accounted for on a defined contribution basis and contributions are charged directly to the income statement.

#### (b) Defined benefit schemes

#### India

The Gratuity schemes are defined benefit schemes which are open to all Group employees in India who have a minimum of five years of service with their employing company. These schemes are funded in some subsidiaries. Based on actuarial valuation, a provision is recognised in full for the projected obligation over and above the funds held in scheme. In case where there is no funding held by the scheme, full provision is recognised in the balance sheet. Under these schemes, benefits are provided based on final pensionable pay.

The assets of the schemes are held in separate funds and a full actuarial valuation of the schemes is carried out on an annual basis.

#### Vedanta Limited

The Iron Ore, Aluminium and Copper divisions of Vedanta Limited contributed to the LIC Fund based on an actuarial valuation every year. Vedanta Limited's Gratuity scheme is accounted for on a defined benefit basis. The latest actuarial valuation was performed as at 31 March 2016 using the projected unit credit actuarial method.

### BALCO

All employees who are scheduled to retire on or before 31 March 2016 are being paid by BALCO. The Gratuity scheme is accounted for as a defined benefit scheme for all employees scheduled to retire after 31 March 2016. A provision is recognised based on the latest actuarial valuation which was performed as at 31 March 2016 using the projected unit actuarial method. At that date the fund was in deficit.

#### HZL

HZL contributes to the LIC fund based on an actuarial valuation every year. HZL's Gratuity scheme is accounted for on a defined benefit basis. The latest actuarial valuation was performed as at 31 March 2016 using the projected unit actuarial method. At that date the fund was in deficit.

#### MEL

MEL contributed to the LIC fund based on an actuarial valuation every year. The MEL Gratuity scheme is accounted for on a defined benefit basis. The latest actuarial valuation was performed as at 31 March 2016 using the projected unit credit actuarial method.

#### TSPL

TSPL contributes to the LIC based on an actuarial valuation. Liabilities with regard to the Gratuity scheme are fully provided in the balance sheet and are determined by actuarial valuation as at the balance sheet date and as per gratuity regulations for TSPL. The latest actuarial valuation was performed as at 31 March 2016 using the projected unit actuarial method.

#### Cairr

Cairn contributes to the LIC fund based on an actuarial valuation every year. Cairn India Group's Gratuity scheme is accounted for on a defined benefit basis. The latest actuarial valuation was performed as at 31 March 2016 using the projected unit actuarial method. At that date the fund was in deficit.

## Zambia

Specified permanent employees of KCM are entitled to receive medical and retirement severance benefits. This comprises two months' basic pay for every completed year of service with an earliest service start date of 1 July 2004. Under this scheme, benefits are provided based on final pensionable pay and a full actuarial valuation of the scheme is carried out on an annual basis. The accruals are not contributed to any fund and are in the form of provisions in KCM's accounts.

On the death of an employee during service, a lump sum amount is paid to his or her dependants. This amount is equal to 60 months' basic pay for employees who joined before 1 April 2000 and 30 months' basic pay for employees who joined on or after 1 April 2000. For fixed term contract employees, the benefit payable on death is 30 months' basic pay.

As at 31 March 2016, membership of pension schemes across Vedanta Limited, BALCO, HZL, TSPL, KCM and Cairn stood at 22,534

employees (31 March 2015: 24,456). The deficits, principal actuarial assumptions and other aspects of these schemes are disclosed in further detail in notes (d) and (e) below.

## (c) Pension scheme costs

Contributions of US\$66.5 million and US\$nil in respect of defined benefit schemes were outstanding and prepaid respectively as at 31 March 2016 (2015: US\$74.6 million and US\$nil respectively).

Contributions to all pension schemes in the year ending 31 March 2017 are expected to be around US\$5.0 million (actual contribution during the year ended 31 March 2016: US\$9.7 million).

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Defined contribution pension schemes	30.1	30.7
Defined benefit pension schemes	18.2	19.7
Total expense	48.3	50.4

#### (d) Principal actuarial assumptions

Principal actuarial assumptions used to calculate the defined benefit schemes' liabilities are:

	MA	_CO	BA	LCO	Sterlite	Copper	Н	IZL	K	CM	Jharsugud	a Aluminium	Iron O	re Sesa	C	airn	TS	PL
Particulars	Mar 16	Mar 15	Mar 16	Mar 15	Mar 16	Mar 15	Mar 16	Mar 15	Mar 16	Mar 15	Mar 16	Mar 15	Mar 16	Mar 15	Mar 16	Mar 15	Mar 16	Mar 15
Discount rate	8.0%	7.8%	8.0%	9.0%	8.0%	7.8%	8.0%	7.8%	24.0%	22.5%	8.0%	7.8%	8.0%	7.8%	8.0%	7.8%	8.0%	7.8%
Salary increases	5.5%	5.0%	5.0%	5.0%	5.5%	5.3%	5.5%	5.5%	5.0%	5.0%	6.0%	6.0%	7.0%	7.0%	10.0%	10.0%	5.5%	5.5%
Actual number of employees	71	76	2,498	3,059	1,067	1,078	4,646	5,286	7,230	7,281	2,393	2,738	2,860	3,821	1,482	1,569	238	211

In India, the mortality tables used assume that a person aged 60 at the end of the balance sheet date has a future life expectancy of 19 years.

Assumptions regarding mortality for Indian entities are based on mortality table of 'Indian Assured Lives Mortality (2006-2008)' published by the Institute of Actuaries of India.

Assumptions regarding mortality for KCM are based on World Health Organisation Life Tables for 1999 applicable to Zambia which has been taken as a reference point. Based on this a mortality table which is appropriate for the workers of Konkola Copper Mines plc has been derived.

## (e) Balance sheet recognition

_		31 March 2016									31 March 2015							
(US\$ million)	MALCO & TSPL	BALCO	Sterlite Copper	HZL	КСМ	Jhar- suguda Alumin- ium	Iron Ore Sesa	Cairn	Total	MALCO & TSPL	BALCO	Sterlite Copper	HZL	KCM	Jhar- suguda Alumin- ium	Iron Ore Sesa	Cairn	Total
Fair value of pension scheme assets	0.1	_	2.9	27.6	_	1.6	5.6	5.7	43.5	0.3	_	2.5	26.8	_	1.5	9.0	4.9	45.0
Present value of pension scheme liabilities	(0.2)	(15.3)	(3.6)	(29.5)	(45.6)	(1.8)	(5.2)	(8.8)	(110.0)	(0.3)	(20.8)	(3.5)	(35.8)	(39.8)	(2.4)	(9.3)	(7.7)	(119.6)
Deficit in pension scheme recognised in balance sheet	(0.1)	(15.3)	(0.7)	(1.9)	(45.6)	(0.2)	0.4	(3.1)	(66.5)	_	(20.8)	(1.0)	(9.0)	(39.8)	(0.9)	(0.3)	(2.8)	(74.6)
Deferred tax	0.0	5.3	0.2	0.6	15.8	0.1	(0.2)	1.0	22.8	-	7.1	0.3	3.1	13.5	0.3	0.1	1.0	25.4
Net pension liability	(0.1)	(10.0)	(0.5)	(1.3)	(29.8)	(0.1)	0.2	(2.1)	(43.7)	-	(13.7)	(0.7)	(5.9)	(26.3)	(0.6)	(0.2)	(1.8)	(49.2)

## (f) Amounts recognised in income statement in respect of defined benefit pension schemes:

			31 March 2016 Jhar-							31 March 2015								
(US\$ million)	MALCO & TSPL	BALCO	Sterlite Copper	HZL	КСМ	Jhar- suguda Alumin- ium	Iron Ore Sesa	Cairn	Total	MALCO & TSPL	BALCO	Sterlite Copper	HZL	KCM	Jhar- suguda Alumin- ium	Iron Ore Sesa	Cairn	Total
Current service cost	0.0	0.4	0.2	1.4	4.0	0.3	0.5	1.0	7.8	0.1	0.5	0.2	2.0	6.2	0.3	0.6	0.6	10.5
Net interest cost	0.0	1.3	0.1	0.3	8.4	0.1	0.1	0.1	10.4	0.0	1.6	0.2	0.5	6.4	0.0	0.2	0.3	9.2
Total charge to income statement	0.0	1.7	0.3	1.7	12.4	0.4	0.6	1.1	18.2	0.1	2.1	0.4	2.5	12.6	0.3	0.8	0.9	19.7

## (g) Amounts recognised in the Statement of Comprehensive Income:

		31 March 2016								31 March 2015								
(US\$ million)	MALCO & TSPL	BALCO	Sterlite Copper	HZL	ксм	Jhar- suguda Alumin- ium (	Iron Ore Sesa	Cairn	Total	MALCO & TSPL	BALCO	Sterlite Copper	HZL	KCM	Jhar- suguda Alumin- ium	Iron Ore Sesa	Cairn	Total
Actuarial gains/(losses) on defined benefit obligation	(0.1)	0.5	0.0	(2.0)	(6.7)	0.5	(0.2)	(0.1)	(8.1)	0.1	3.7	0.5	6.2	2.8	0.6	0.4	(0.1)	14.2
Actuarial (gains)/losses on plan asset	_	_	-	0.1	_	0.0	(0.2)	-	(0.1)	(0.1)	-	-	-	-	-	(0.1)	_	(0.2)
Remeasure- ment of the net defined benefit liability (asset)	(0.1)	0.5	0.0	(1.9)	(6.7)	0.5	(0.4)	(0.1)	(8.0)	_	3.7	0.5	6.2	2.8	0.6	0.3	(0.1)	14.0

(h) Movements in the present value of defined benefit obligations

The movement during the year ended 31 March 2016 of the present value of the defined benefit obligation was as follows:

		31 March 2016								31 March 2015								
(US\$ million)	MALCO & TSPL	BALCO	Sterlite Copper	HZL	КСМ	Jhar- suguda Alumin- ium	Iron Ore Sesa	Cairn	Total	MALCO & TSPL	BALCO	Sterlite Copper	HZL	KCM	Jhar- suguda Alumin- ium	Iron Ore Sesa	Cairn	Total
At 1 April	(0.2)	(20.8)	(3.4)	(35.8)	(39.8)	(2.4)	(9.5)	(7.7)	(119.6)	(0.1)	(21.2)	(3.5)	(29.4)	(35.5)	(1.7)	(9.8)	(7.5)	(108.7)
Current service cost	(0.0)	(0.4)	(0.2)	(1.4)	(4.0)	(0.3)	(0.5)	(1.0)	(7.8)	(0.1)	(0.5)	(0.2)	(2.0)	(6.2)	(0.3)	(0.6)	(0.6)	(10.5)
Gratuity benefits paid	0.0	7.1	0.2	7.2	3.2	0.5	3.8	0.4	22.4	_	5.7	0.9	4.4	4.3	0.2	1.0	0.6	17.1
Interest cost of scheme liabilities	(0.0)	(1.3)	(0.3)	(2.6)	(8.4)	(0.2)	(0.6)	(0.4)	(13.8)	(0.1)	(1.6)	(0.3)	(2.6)	(6.6)	(0.1)	(0.9)	(0.3)	(12.5)
Remeasure- ment gains/(losses)	(0.1)	0.5	0.0	(2.0)	(6.7)	0.5	(0.2)	(0.1)	(8.1)	0.1	(3.7)	(0.5)	(6.2)	(2.8)	(0.6)	(0.5)	(0.0)	(14.2)
Exchange difference	0.1	(0.4)	0.1	5.2	10.0	0.1	1.9	(0.1)	16.9		0.5	0.2	_	7.0	0.1	1.3	0.1	9.2
At 31 March	(0.2)	(15.3)	(3.6)	(29.4)	(45.7)	(1.8)	(5.1)	(8.9)	(110.0)	(0.2)	(20.8)	(3.4)	(35.8)	(39.8)	(2.4)	(9.5)	(7.7)	(119.6)

#### (i) Movements in the fair value of plan assets

(US\$ million)	As at 31 March 2016	As at 31 March 2015
At 1 April	45.0	45.8
Contributions received	9.7	4.0
Benefits paid	(12.2)	(6.6)
Remeasurements	0.1	0.2
Interest income	3.4	3.3
Foreign exchange differences	(2.5)	(1.7)
At 31 March	43.5	45.0

#### (j) Five year history

Defined benefit pension plan

(US\$ million)	As at 31 March 2016	As at 31 March 2015	As at 31 March 2014	As at 31 March 2013	As at 31 March 2012
Experience losses arising on scheme liabilities	(8.1)	(14.2)	(5.0)	(6.9)	(7.0)
Difference between expected and actual return on plan assets	0.1	0.2	0.8	0.6	_
Fair value of pension scheme assets	43.5	45.0	45.8	46.2	47.8
Present value of pension scheme liabilities	(110.0)	(119.6)	(108.7)	(112.9)	(106.9)
Deficits in the schemes	(66.5)	(74.6)	(62.9)	(66.7)	(59.1)

#### (k) Sensitivity analysis

Below is the sensitivity analysis determined for significant actuarial assumptions for the determination of defined benefit obligations and based on reasonably possible changes of the respective assumptions occurring at the end of the reporting period while holding all other assumptions constant.

Increase/(dec
rease) in defined
defined benefit
obligation
(2.0)
2.4
2.0
(1.9)

The above sensitivity analysis may not be representative of the actual benefit obligation as it is unlikely that the change in assumptions would occur in isolation of one another as some of the assumptions may be correlated.

#### (I) Risk analysis

The Group is exposed to a number of risks in the defined benefit plans. The most significant risks pertaining to defined benefits plans and management estimation of the impact of these risks are as follows:

#### Investment risk

Most of the Indian defined benefit plans are funded with Life Insurance Corporation of India. The Group does not have any liberty to manage the fund provided to Life Insurance Corporation of India.

The present value of the defined benefit plan liability is calculated using a discount rate determined by reference to Government of India bonds for the Group's Indian operations. If the return on plan asset is below this rate, it will create a plan deficit.

#### Interest risk

A decrease in the interest rate on plan assets will increase the plan liability.

#### Longevity risk/life expectancy

The present value of the defined benefit plan liability is calculated by reference to the best estimate of the mortality of plan participants both during and at the end of the employment. An increase in the life expectancy of the plan participants will increase the plan liability.

## Salary growth risk

The present value of the defined benefit plan liability is calculated by reference to the future salaries of plan participants. An increase in the salary of the plan participants will increase the plan liability.

#### 34. Capital management

The Group's objectives when managing capital are to safeguard continuity, maintain a strong credit rating and healthy capital ratios in order to support its business and provide adequate return to shareholders through continuing growth.

The Group sets the amount of capital required on the basis of annual business and long-term operating plans which include capital and other strategic investments. The funding requirement is met through a mixture of equity, internal accruals, convertible bonds and other long-term and short-term borrowings.

The Group monitors capital using a gearing ratio, being the ratio of net debt as a percentage of total capital.

(US\$ million)	As at 31 March 2016	As at 31 March 2015
Total equity	6,852.4	12,257.4
Net debt	7,328.8	8,460.3
Total capital	14,181.2	20,717.7
Gearing	51.7%	40.8%

The increase in the gearing ratio compared to the 2015 ratio is primarily due to a decrease in total equity pursuant to the impairment charge on oil & gas assets of US\$3,030.9 million (net of deferred tax of US\$1,903.3 million) (Note 5).

#### 35. Share capital

	At 31 March	2016	At 31 March	2015	
dinary shares of £1 each	Number	Number	US\$ million		
Ordinary shares of 10 US cents each	400,000,000	40.0	400,000,000	40.0	
Deferred shares of £1 each	50,000	-	50,000	_	
	400,050,000	40.0	400,050,000	40.0	
	At 31 March	2016	At 31 March	2015	
Ordinary shares issued and fully paid	Number	US\$ million	Number	US\$ million	
Ordinary shares of 10 US cents each	300,522,798	30.1	299,868,180	30.0	
Deferred shares of £1 each	50,000	_	50,000	_	
	300,572,798	30.1	299,918,180	30.0	

During the year ended 31 March 2016, the Company issued 561,277 shares at face value of 10 US cents per share to the employees pursuant to the Vedanta LTIP and ESOP schemes (2015: 1,686,045 shares) and 93,341 shares were issued on the conversion of a convertible bond issued by one of the Group's subsidiaries.

The holders of deferred shares do not have the right to receive notice of any general meeting of the Company nor the right to attend, speak or vote at any such general meeting. The deferred shares have no rights to dividends and, on a winding-up or other return of capital, entitle the holder only to the payment of the amounts paid on such shares after repayment to the holders of ordinary shares of the nominal amount paid up on the ordinary shares plus the payment of £100,000 per ordinary share. Of the 50,000 deferred shares, one deferred share was issued at par and has been fully paid, and 49,999 deferred shares were each paid up as to one-quarter of their nominal value.

As on 31 March 2016, 6,904,995 ordinary shares which were issued on the conversion of certain convertible bonds issued by one of the Group's subsidiaries are held through a Global Depositary Receipts and carry no voting rights.

At 31 March 2016, the total number of treasury shares held was 24,309,230 (2015: 24,206,816).

#### 36. Non-controlling interests (NCI)

The Group consists of a parent Company, Vedanta Resources plc, incorporated in UK and a number of subsidiaries held directly and indirectly by the Group which operate and are incorporated around the world. Note 44 to the financial statements lists details of the interests in the subsidiaries.

Non-controlling interests that are material to the Group relate to Hindustan Zinc Limited (HZL), Cairn India Limited (Cairn) and Vedanta Limited.

As at 31 March 2016, NCIs hold an economic interest of 59.20%, 62.36% and 37.15% respectively in HZL, Cairn and Vedanta Limited. The respective NCI holdings in 2015 were 59.20%, 62.36% and 37.15% respectively.

Principal place of business of HZL, Cairn and Vedanta Limited is in India (refer to Note 44).

The table below shows details of non-wholly owned subsidiaries of the Group that have material non-controlling interests:

		Year e	nded 31 Marc	h 2016		Year ended 31 March 2015						
(US\$ million) Particulars	HZL	Cairn	Vedanta Limited	Others <sup>1</sup>	Total	HZL	Cairn	Vedanta Limited²	Others <sup>1</sup>	Total		
Profit/(loss) attributable to NCI	706.8	(1,982.9)	342.6	(731.2)	(1,664.7)	813.8	(2,608.9)	74.7	(268.7)	(1,989.1)		
Equity attributable to NCI	3,344.9	4,756.3	2,257.0	(2,793.0)	7,565.2	4,310.9	6,903.6	2,199.9	(2,760.1)	10,654.3		
Dividends paid/payable to NCI	(825.7)	(55.3)	(98.5)	_	(979.5)	(107.8)	(165.4)	(67.2)	_	(340.4)		

Others consist of investment subsidiaries of Vedanta Limited and other individual non-material subsidiaries.

Summarised financial information in respect of the Group's subsidiaries that have material non-controlling interests is set out below. The summarised financial information below is on a 100% basis and before inter-company eliminations:

	As	As at 31 March 2016			As at 31 March 2015		
(US\$ million) Particulars	HZL	Cairn	Vedanta Limited	HZL	Cairn	Vedanta Limited	
Non-current assets	2,346.8	3,516.9	11,541.6	2,193.2	10,407.1	11,502.0	
Current assets	5,591.8	5,128.4	3,586.3	5,305.9	3,794.8	1,614.8	
Current liabilities	(2,266.8)	(746.2)	(5,238.0)	(267.9)	(957.4)	(3,576.3)	
Non-current liabilities	(21.6)	(272.0)	(3,814.6)	(22.1)	(2,148.3)	(3,732.2)	
Net assets	5,650.2	7,627.1	6,075.3	7,209.1	11,096.2	5,808.3	

	Year ended 31 March 2016 Year ended 31 Mar		ended 31 March	larch 2015		
Particulars	HZL	Cairn	Vedanta Limited	HZL	Cairn	Vedanta Limited
Revenue	2,132.4	1,322.3	4,541.0	2,385.8	2,397.5	5,290.4
Profit/(loss) for the year	1,193.9	(3,179.8)	922.1	1,360.8	(4,193.4)	199.1
Other comprehensive income/(loss)	1.9	0.1	(27.5)	(5.7)	_	(37.2)

The effect of changes in ownership interests in subsidiaries that did not result in a loss of control is as follows:

	Year ended 31 March 2016				
(US\$ million)	HZL	Cairn	Vedanta Limited	Others	Total
Changes in NCI due to buyback and investment	_	_	-	-	_
		Year ended 31 March 2015			
	HZL	Cairn	Vedanta Limited	Others	Total
Changes in NCI due to buyback and investment	(197.2)	(531.5)	(83.3)	167.9	(644.1)

<sup>2</sup> For principal activities, country of incorporation and the immediate holding company of the above subsidiaries refer to Note 44.

#### 37. Joint arrangements

#### Joint operations

The Group's principal license interests in the Oil & Gas business are joint operations. The principal license interests are as follows:

Oil & Gas blocks/fields	Area	Participating interest
Operated blocks		
Ravva block	Krishna Godavari	22.50%
CB-OS/2 – Exploration	Cambay Offshore	60.00%
CB-OS/2 – Development and production	Cambay Offshore	40.00%
RJ-ON-90/1 – Exploration	Rajasthan Onshore	100.00%
RJ-ON-90/1 – Development and production	Rajasthan Onshore	70.00%
PR-OSN-2004/1	Palar Basin Offshore	35.00%
KG-OSN-2009/3	Krishna Godavari Offshore	100.00%
MB-DWN-2009/1 <sup>1</sup>	Mumbai Deep Water	100.00%
South Africa Block <sup>1</sup>	Orange Basin South Africa Offshore	60.00%
Relinquished block		
SL 2007-01-001 <sup>2</sup>	North West Sri Lanka Offshore	100.00%
Non-operated block		
KG-ONN-2003/1 <sup>3</sup>	Krishna Godavari Onshore	49.00%

<sup>1</sup> Intended to be relinquished in the next year.

## 38. Commitments, guarantees and contingencies

## Commitments

The Group has a number of continuing operational and financial commitments in the normal course of business including:

- · exploratory mining commitments;
- oil & gas commitments;
- mining commitments arising under production sharing agreements; and
- completion of the construction of certain assets.

(US\$ million)	As at 31 March 2016	As at 31 March 2015
Capital commitments contracted but not provided	1,289.3	1,973.7
Commitments primarily related to the expansion projects:		
	As at 31 March 2016	As at 31 March 2015
HZL	296.7	274.4
Jharsuguda Aluminium	470.2	508.6
Jharsuguda 2,400MW power plant	32.3	33.7
BALCO	47.8	69.5

71.8

207.1

41.5

58.1

5.5

1,231.0

96.1

220.8

602.0

1,805.1

#### Guarantees

Talwandi Sabo

Sterlite Copper

Cairn

BMM

Others

**Total** 

Companies within the Group provide guarantees within the normal course of business. Guarantees have also been provided in respect of certain short-term and long-term borrowings.

A summary of the most significant guarantees is set out below:

As at 31 March 2016, US\$384.6 million of guarantees were advanced to banks, suppliers etc. in the normal course of business (2015:

<sup>2</sup> Relinquished on 15 October 2015.

Operatorship has been transferred to Oil and Natural Gas Corporation (ONGC) with effect from 7 July 2014.

US\$365.4 million). The Group has also entered into guarantees and bonds advanced to the customs authorities in India of US\$154.8 million relating to the export and payment of import duties on purchases of raw material and capital goods including export obligations (2015: US\$228.9 million).

#### Cairn PSC guarantee to Government

The Group has provided a parent Company guarantee for the Cairn India Group's obligation under the Production Sharing Contract (PSC).

Cairn India have provided various other guarantees under the Cairn India Group's bank facilities for the Cairn India Group's share of minimum work programme commitments of US\$13.1 million outstanding as of 31 March 2016 (2015: US\$15.6 million).

#### Export obligations

The Indian entities of the Group have export obligations of US\$2,200.5 million (2015: US\$2,688.0 million) on account of concessional rates of import duty paid on capital goods under the Export Promotion Capital Goods Scheme and under the Advance License Scheme for import of raw material laid down by the Government of India.

In the event of the Group's inability to meet its obligations, the Group's liability would be US\$349.1 million (2015: US\$429.1 million), reduced in proportion to actual exports, plus applicable interest.

#### Contingencies

## MEL claims with Tamil Nadu Electricity Board (TNEB)

TNEB is claiming US\$16.3 million from MEL for an electricity self-generation levy for the period from May 1999 to June 2003. This claim has arisen since the commissioning of MEL's captive power plant in 1999. The Company has sought an exemption from the application of this levy from the Government of Tamil Nadu. The application is under consideration. Meanwhile, the Madras High Court has in its recent order, remitted back the case to the State of Tamil Nadu, to take a decision afresh on the representation for grant of tax exemption on consumption of electricity and directed to pass a detailed speaking order. MEL has accordingly represented before the Government of Tamil Nadu Energy Secretary, Government of Tamil Nadu vide his letter dated 20 March 2013 denied the exemption citing various reasons and asked MEL to remit US\$15.7 million. MEL moved to the High Court of Madras and a stay was granted on the same.

#### HZL: Department of Mines and Geology

The Department of Mines and Geology of the State of Rajasthan issued several show cause notices in August, September and October 2006 to HZL, totalling US\$53.3 million. These notices alleged unlawful occupation and unauthorised mining of associated minerals other than zinc and lead at HZL's Rampura Agucha, Rajpura Dariba and Zawar mines in Rajasthan during the period from July 1968 to March 2006. HZL believes that the claim becoming an obligation of the Company is unlikely and thus no provision has been made in the financial statements. HZL has filed writ petitions in the High Court of Rajasthan in Jodhpur and has obtained a stay in respect of these demands.

#### Richter and Westglobe: income tax

The Group through its subsidiaries Richter Holdings Limited (Richter) and Westglobe Limited (Westglobe) in 2007 acquired the entire stake in Finsider International Company Limited based in the United Kingdom. In October 2013, the Indian Tax Authorities (Tax Authorities) have served an order on Richter and Westglobe for alleged failure to deduct withholding tax on capital gain on the indirect acquisition of shares in April 2007. The Tax Authorities determined the liability for such non-deduction of tax as US\$132.1 million in the case of Richter and US\$88.0 million in the case of Westglobe, comprising tax and interest. Being aggrieved, Richter and Westglobe filed appeals before the first appellate authority. Writ petitions were filed in the High Court of Karnataka challenging the constitutional validity of retrospective amendments made by the Finance Act 2012 and in particular the imposition of obligations to deduct tax on payments made against an already concluded transaction. These Writs are pending for disposal before Division Bench. The hearing of the said Writ is due on 10 June 2016. Richter and Westglobe believe that they are not liable for such withholding tax and intend to defend the proceedings.

#### Cairn India: income tax

In March 2014, Cairn India received a show cause notice from the Indian Tax Authorities (Tax Authorities) for not deducting withholding tax on the payments made to Cairn UK Holdings Limited (CUHL) UK, for acquiring shares of Cairn India Holdings Limited (CIHL), as part of their internal reorganisation. The Tax Authorities have stated in the said notice that a short-term capital gain has accrued to CUHL on transfer of the shares of CIHL to Cairn India, in financial year 2006-2007, on which tax should have been withheld by the Company. Pursuant to this various replies were filed with the Tax Authorities.

After hearings, the Income Tax Authority, during March 2015, have issued an order by holding Cairn India as 'assessee in default' and asked to pay such demand totalling US\$3,089.7 million (including interest of US\$1,544.8 million). Cairn India has filed its appeal before the Appellate Authority CIT (Appeals) and filed a fresh Writ petition before Delhi High Court wherein it raised several points for assailing the aforementioned order. The hearing of the said Writ is due on 4 August 2016.

The Company has issued a Notice of arbitration to the Government of India by invoking Bilateral Investment Promotion Treaty between the UK and India.

## Vedanta Limited: contractor claim

Shenzhen Shandong Nuclear Power Construction Co. Limited (SSNP) subsequent to terminating the EPC contract invoked arbitration as per the contract alleging non-payment of their dues towards construction of a 210MW co-generation power plant for 6mtpa expansion project, and filed a claim of US\$248.1 million. SSNP also filed a petition under Section 9 of the Arbitration and Conciliation Act, 1996 before the Bombay High Court praying for interim relief. The Bombay High Court initially dismissed their petition, but on a further appeal by SSNP, the Division Bench of the Bombay High Court directed Jharsuguda Aluminium to deposit a bank guarantee for an amount of US\$27.8 million as a security, being a prima facie representation of the claim, until arbitration proceedings are completed. Jharsuguda Aluminium has deposited a bank guarantee of equivalent amount. Management is of the opinion that this claim is not valid under the terms of the contract with SSNP and it is unlikely that SSNP can legally sustain the claim and, accordingly, no provision is considered necessary.

Ravva joint venture arbitration proceedings: Base Development Cost

In case of Cairn, Ravva joint venture had received a claim from the Ministry of Petroleum and Natural Gas, Government of India (GOI) for the period from 2000 to 2005 for US\$129.0 million for an alleged underpayment of profit petroleum to the Indian Government, out of which, the Group's share will be US\$29.0 million plus potential interest at applicable rate (LIBOR plus 2% as per PSC). This claim relates to the Indian Government's allegation that the Ravva JV had recovered costs in excess of the Base Development Costs (BDC) cap imposed in the PSC and that the Ravva JV had also allowed these excess costs in the calculation of the Post Tax Rate of Return (PTRR). Joint venture partners initiated the arbitration proceedings and Arbitration Tribunal published the Award on 18 January 2011 at Kuala Lumpur, allowing claimants (including the Group) to recover the development costs spent to the tune of US\$278.0 million and disallowed over run of US\$22.3 million spent in respect of BDC along with 50% legal costs reimbursable to the joint venture partners. The High Court of Kuala Lumpur dismissed Government of India's application of setting aside the part of the Award on 30 August 2012 with costs. However, GOI appealed before the Court of Appeal against the High Court's order and the Court of Appeal dismissed the GOI's appeal on 27 June 2014. However, GOI still preferred to challenge the same before the Federal Court, Kuala Lumpur and their Leave to Appeal is pending. GOI has also issued Show Cause Notice on this matter which Cairn has replied to and also filed an application for enforcement of Award before Delhi High Court as an abundant caution.

Ravva joint venture arbitration proceedings: ONGC Carry

Cairn is involved in a dispute against GOI relating to the recovery of contractual costs in terms of calculation of payments that contractor party was required to make in connection with the Ravva field.

The Ravva production sharing contract obliges the contractor party to pay proportionate share of ONGC's exploration, development, production and contract costs in consideration for ONGC's payment of costs related to construction and other activities it conducted in Ravva prior to the effective date of the Ravva production sharing contract (the ONGC Carry). The question as to how the ONGC Carry is to be recovered and calculated, along with other issues, was submitted to an international arbitration Tribunal in August 2002 which rendered a decision on the ONGC Carry in favour of the contractor party whereas four other issues were decided in favour of GOI in October 2004 (Partial Award).

The GOI then proceeded to challenge the ONGC Carry decision before the Malaysian courts, as Kuala Lumpur was the seat of the arbitration. The Federal Court of Malaysia, which adjudicated the matter on 11 October 2011, upheld the Partial Award. Per the decision of the Arbitral Tribunal in the Partial Award, the contractor party and GOI were required to arrive at a quantification of the sums relatable to each of the issues under the Partial Award. Also, the arbitral Tribunal retained the jurisdiction for determination of any remaining issues in the matter.

Pursuant to the decision of the Federal Court, the contractor party approached the Ministry of Petroleum and Natural Gas (MoPNG) to implement the Partial Award while reconciling the statement of accounts as outlined in the Partial Award in 2004. GOI failed to implement the Partial Award by way of reconciling accounts as provided in the Partial Award ever since the Federal Court of Malaysia adjudicated in Cairn and other joint operator partners' favour.

However, the MoPNG on 10 July 2014 proceeded to issue a show cause notice alleging that since the Partial Award has not been enforced, profit petroleum share of GOI has been short-paid. MoPNG threatened to recover that amount from the sale proceeds payable by the oil marketing companies to the contractor party. The contractor party replied to the show cause notice taking various legal contentions. On 9 March 2015 a personal hearing took place between MoPNG and the contractor party, whereby the contractor party expressed their concerns against such alleged unilateral recoveries and filed further written submissions on 12 March 2015.

As the Partial Award did not quantify the sums, therefore, the contractor party approached the same arbitral Tribunal to pass a final award in the subject matter since it had retained the jurisdiction to do so. The Arbitral Tribunal has been reconstituted and the determination of final award is sub-judice before it. While Cairn does not believe the GOI will be successful in its challenge, if the arbitral award is reversed and such reversal is binding, Cairn could be liable for approximately US\$63.9 million.

#### Proceedings related to the imposition of entry tax

BALCO and Vedanta Limited have challenged the constitutional validity of the local statute in Chattisgarh and Orissa respectively, levying entry tax on the entry of goods brought into the States from outside and other notifications, as being in violation of certain provisions of the Indian Constitution. The challenges are pending in the Supreme Court to be heard by a Constitution Bench taking into account diverse opinion of various High Courts and the same is listed on 11 May 2016. BALCO paid the entry tax of US\$30.6 million under protest to the state government of Chhattisgarh until 31 March 2015. Vedanta Limited was directed by the Supreme Court on 3 February 2010 to deposit a sum of US\$0.6 million and a further amount on a monthly basis until the matter is actually disposed. These amounts have been paid under protest. In a related matter in respect of challenging the levy of entry tax on imported goods, the Supreme Court on 9 April 2013 directed 50% of the entry tax amount accrued until 30 September 2012. The amount of US\$21.0 million (as on 31 March 2015) has been deposited in accordance with the order of the Supreme Court. Total claims from Vedanta Limited are of US\$112.5 million (2015: US\$103.3 million).

Additionally, for entry tax in SEZ, GOO has finally come out with SEZ policy 2015 exempting entry tax levy on SEZ operations which were recently notified in December 2015. We have applied for the issuance of an eligibility certificate to IPICOL for availing entry tax exemption; however, an operational guideline is pending to be issued by the industry department. The declaration of SEZ policy being a recent development after the filing of a petition before court, hence Vedanta is trying to bring out the same before the Court by filing an affidavit separately for appreciation of the court in the coming hearing.

#### TSPI

TSPL has entered into a long-term Power Purchase Agreement (PPA) with Punjab State Power Corporation Limited (PSPCL) for supply of power. Due to delay in fulfilment of certain obligations by PSPCL as per the PPA, other related reasons and force majeure events, there has been a delay in implementation/completion of the project as compared to the PPA timelines. TSPL has received notices of claims from PSPCL seeking payment of Liquidated Damages (LD) maximum of US\$50.9 million each for delay in commissioning of Unit I, II and III, totalling US\$152.9 million.

During the year, PSPCL invoked the Performance Bank Guarantee of US\$24.1 million to recover the LD on account of delay in COD of Unit I. TSPL filed a petition at Punjab State Electricity Regulatory Commission (PSERC) for adjudication of above dispute. TSPL had

also filed a civil writ petition before the High Court of Punjab and Haryana against the bank guarantee invocation, which was disposed with a direction to refer the matter to PSERC for adjudication while granting stay. Further, PSERC vide order dated 22 October 2014 directed the matter to be settled through arbitration and allowed the stay on encashment of the bank guarantee until further orders. PSPCL has preferred an appeal in Appellate Tribunal for Electricity (APTEL) against the PSERC order and APTEL had, on 12 May 2015, disposed the matter with a direction that the matter will be heard by way of arbitration. The arbitration proceedings are in the early stages. The Group has been legally advised by its advisers who have opined that such claims for LD from PSPCL are unsustainable. Recently, Appellate Tribunal for Electricity has, in a separate petition, before it by TSPL has adjudicated that coal is an absolute obligation of PSPCL and it needs to enter into a Fuel Supply Agreement and assign to TSPL. In light of the delay by PSPCL in entering into the Fuel Supply Agreement, the claims of PSPCL are further unsustainable.

Miscellaneous disputes - Vedanta Limited, HZL, MEL, BALCO, Cairn, Lisheen, VRJL and VRJII

The Group is subject to various claims and exposures which arise in the ordinary course of conducting and financing its business from the income tax, excise, indirect tax authorities and others. These claims and exposures mostly relate to the assessable values of sales and purchases or to incomplete documentation supporting the companies' returns or other claims.

The approximate value of claims against the Group companies excluding claims shown above total US\$1,182.3 million (2015: US\$1,005.0 million), of which US\$14.9 million (2015: US\$29.3 million) is included as a provision in the balance sheet as at 31 March 2016 (including claims of US\$646.3 million in respect of income tax assessments out of which US\$2.1 million is included as a provision in the balance sheet as at 31 March 2016).

The Group considers that it can take steps such that the risks can be mitigated and that there are no significant unprovided liabilities arising.

#### Operating lease commitments: as lessee

Operating leases are in relation to the office premises, office equipment and other assets, some of which are cancellable and some are non-cancellable. There is an escalation clause in the lease agreements during the primary lease period. There are no restrictions imposed by lease arrangements and there are no sub leases. There are no contingent rents. The total of the future minimum lease payments under non-cancellable leases are as follows:

(US\$ million) Particulars	As at 31 March 2016	As at 31 March 2015
Within one year of the balance sheet date	3.9	4.9
Within two to five years from the balance sheet date	0.4	5.6
Total	4.3	10.5

Lease payments recognised as expenses during the year ended 31 March 2016, on non-cancellable leases, is US\$8.1 million (31 March 2015: US\$3.9 million).

### 39. Related party transactions

The information below sets out transactions and balances between the Group and various related parties in the normal course of business for the year ended 31 March 2016.

## Sterlite Technologies Limited (STL)

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Sales to STL	140.4	126.0
Recovery of expenses	0.2	0.0
Purchases	1.1	2.9
Net interest received	0.2	0.6
Net amounts receivable at year end	0.2	3.7
Net amounts payable at year end	1.4	
Dividend income	0.0	_

Sterlite Technologies Limited is related by virtue of having the same controlling party as the Group, namely Volcan. Pursuant to the terms of the Shared Services Agreement dated 5 December 2003 entered into by the Company and STL, the Company provides various commercial services in relation to STL's businesses on an arm's length basis and at normal commercial terms. For the year ended 31 March 2016, the commercial services provided to STL were performed by certain senior employees of the Group on terms set out in the Shared Services Agreement. The services provided to STL in this year amounted to US\$0.02 million (2015: US\$0.02 million).

#### Vedanta Foundation

During the year US\$0.5 million was paid to the Vedanta Foundation (2015: US\$0.7 million).

The Vedanta Foundation is a registered not-for-profit entity engaged in computer education and other related social and charitable activities. The major activity of the Vedanta Foundation is providing computer education for disadvantaged students. The Vedanta Foundation is a related party as it is controlled by members of the Agarwal family who control Volcan. Volcan is also the majority shareholder of Vedanta Resources plc.

#### Sesa Goa Community Foundation Limited

Following the acquisition of erstwhile Sesa Goa Limited, the Sesa Goa Community Foundation Limited, a charitable institution, became a related party of the Group on the basis that key management personnel of the Group have significant influence on the Sesa Goa Community Foundation Limited. During the year ended 31 March 2016, US\$0.4 million (2015: US\$0.4 million) was paid to the Sesa Goa Community Foundation Limited.

#### Sterlite Iron and Steel Limited

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Loan balance receivable	0.7	1.1
Net amount receivable at year end (including interest)	1.8	1.8
Net interest received	0.1	0.2

Sterlite Iron and Steel Limited is a related party by virtue of having the same controlling party as the Group, namely Volcan.

#### Vedanta Medical Research Foundation

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Donation	2.7	0.7

Vedanta Medical Research Foundation is a related party of the Group on the basis that key management personnel of the Group exercise significant influence.

#### Volcan Investments Limited

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Net amount receivable at the year end	0.2	0.4
Recovery of expenses	0.3	0.3
Dividend paid	75.0	115.6

Volcan Investments Limited is a related party of the Group by virtue of being an ultimate controlling party of the Group.

A bank guarantee has been provided by the Group on behalf of Volcan in favour of Income tax department, India as collateral in respect of certain tax disputes of Volcan. The guarantee amount is US\$17.3 million (2015: US\$18.4 million).

## Ashurst LLP

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Services received during the year	0.1	0.4

Ashurst LLP is a related party of the Group on the basis that an independent Director of the Group was a partner in the legal firm Ashurst LLP during the year ended 31 March 2016. It ceased to be a related party from 1 May 2015 onwards.

## **Employees Provident Fund Trust**

Details of transactions during the year with post-retirement trusts:

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
BALCO Employees Provident Fund Trust	1.7	2.2
Hindustan Zinc Ltd. Employee Contributory Provident Fund Trust	5.0	5.2
Sesa Group Employees Provident Fund	2.4	2.6
Sesa Resources Limited Employees Provident Fund	0.3	0.3
Sesa Mining Corporation Limited Employees Provident Fund	0.3	0.4

#### Remuneration of key management personnel

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Short-term employee benefits	20.0	15.9
Post-employment benefits	0.9	0.8
Share-based payments	2.3	2.5
	23.2	19.2

Key management personnel are those persons having authority and responsibility for planning, directing and controlling the activities of the Group, directly or indirectly, including any Director (whether executive or otherwise).

#### Other related party1

(US\$ million)	Year ended 31 March 2016	Year ended 31 March 2015
Salary paid	1.1	1.0
Interest bearing salary advance <sup>2</sup>	-	1.5

- Close relative of the Executive Chairman.
- 2 Since repaid.

In addition to the above, sitting fees and commission of US\$34,371 (2015: US\$39,250) was also paid.

## 40. Share transactions – call options

## (a) HZL

Pursuant to the Government of India's policy of divestment, in April 2002 the Company acquired 26% equity interest in HZL from the Government of India. Under the terms of the Shareholder's Agreement (SHA), the Group had two call options to purchase all of the Government of India's shares in HZL at fair market value. The Group exercised the first call option on 29 August 2003 and acquired an additional 18.9% of HZL's issued share capital. The Company also acquired an additional 20% of the equity capital in HZL through an open offer, increasing its shareholding to 64.9%. The second call option provides the Group the right to acquire the Government of India's remaining 29.5% share in HZL. This call option is subject to the right of the Government of India to sell 3.5% of HZL shares to HZL employees. The Group exercised the second call option on 21 July 2009. The Government of India disputed the validity of the call option and has refused to act upon the second call option. Consequently, the Company invoked arbitration which is in the early stages. The next date of the hearing is scheduled for 20 August 2016. Meanwhile, the Government of India, without prejudice to the position on the put/call option issue, has received approval from the Cabinet for divestment and the Government is looking to divest through the auction route.

#### (b) BALCO

Pursuant to the Government of India's policy of divestment, in March 2001 the Company acquired 51% equity interest in BALCO from the Government of India. Under the terms of the SHA, the Group has a call option to purchase the Government of India's remaining ownership interest in BALCO at any point from 2 March 2004. The Group exercised this option on 19 March 2004. However, the Government of India has contested the valuation and validity of the option and contended that the clauses of the SHA violate the (Indian) Companies Act, 1956 by restricting the rights of the Government of India to transfer its shares and that as a result such provisions of the SHA were null and void. In the arbitration filed by the Group, the arbitral tribunal by a majority award rejected the claims of the Group on the grounds that the clauses relating to the call option, the right of first refusal, the 'tag-along' rights and the restriction on the transfer of shares violate the (Indian) Companies Act, 1956 and are not enforceable. The Group has challenged the validity of the majority award in the High Court of Delhi and sought for setting aside the arbitration award to the extent that it holds these clauses ineffective and inoperative. The Government of India also filed an application before the High Court of Delhi to partially set aside the arbitral award in respect of certain matters involving valuation. The matter is currently scheduled for hearing by the Delhi High Court on 28 July 2016. Meanwhile, the Government of India, without prejudice to its position on the put/call option issue, has received approval from the Cabinet for divestment and the Government is looking to divest through the auction route.

On 9 January 2012, the Group offered to acquire the Government of India's interests in HZL and BALCO for the INR equivalent of US\$2,356.5 million and US\$271.1 million, respectively. This offer was separate from the contested exercise of the call options, and the Group proposed to withdraw the ongoing litigations in relation to the contested exercise of the options should the offer be accepted. To date, the offer has not been accepted by the Government of India and, therefore, there is no certainty that the acquisition will proceed.

The Group continues to include the shareholding in the two companies HZL and BALCO, in respect of which the Group has a call option as non-controlling interest.

#### 41. Konkola Copper Mines: value added tax

In earlier years, Zambia Revenue Authority (ZRA) had raised an assessment demand related to output tax amounting to K4.71 billion (US\$600 million at the time). The assessment covered the years 2011, 2012 and the first quarter of 2013 and claimed non-submission of documentary evidence as required under Rule 18 of the Value Added Tax Rules to prove an export and claim it as zero rated sales. As a consequence, all sales of products that were zero rated in the returns became standard rated by this assessment. After a series of deliberations, submission of the requisite documents by KCM, followed by an independent audit by ZRA, the assessment demand has now been set aside.

Additionally, KCM has US\$129 million receivable on account of value added tax on inputs that are receivable from the Zambian Government. KCM has submitted all the requisite documents and is in full compliance as per the previous Rule 18. There are precedents where other companies have received refunds of such amounts from the Government on submission of documents. Further, effective February 2015, Rule 18 has been amended by allowing exporters to submit transit documents issued by the customs authority in the country of transit of the goods instead of import certificates from the country of destination, as proof of export for purposes of VAT zero rating.

The discharge of assessment demand and amendment to Rule 18 will make it easier to collect the refunds. The Group believes that it will receive a refund of the entire amount and there is no objective evidence of uncertainty around collectability.

#### 42. Cairn merger update

The Board of Directors of the Company and Cairn India Limited at their respective meetings held on 14 June 2015 had approved the Scheme of Arrangements (the Scheme) between the Company and Cairn India Limited and their respective shareholders and creditors, subject to regulatory and other approvals. On 10 September 2015, BSE Limited and the National Stock Exchange of India Limited has issued the 'No adverse observation' letter to the Scheme.

#### 43. Subsequent events

In March 2016, the Company has announced a third bond buyback programme through market purchase route. Post the balance sheet date and up to the date of approval of the financial statements it has bought back bonds worth US\$129.7 million.

#### 44. List of subsidiaries

The financial statements comprise the financial statements of the following subsidiaries:

		The Compan	y's economic ge holding		lanca di da	Immediate perc	entage holding
Subsidiaries	Principal activities	31 March 2016	31 March 2015	Country of incorporation	Immediate holding company	31 March 2016	31 March 2015
Direct subsidiaries of the parent Company							
Vedanta Resources Holding Limited (VRHL)	Holding company	100.00%	100.00%	United Kingdom	VR plc	100.00%	100.00%
Vedanta Resources Jersey Limited (VRJL)	Investment company	100.00%	100.00%	Jersey (CI)	VR plc	100.00%	100.00%
Vedanta Resources Jersey II Limited (VRJL-II)	Investment company	100.00%	100.00%	Jersey (CI)	VR plc	100.00%	100.00%
Vedanta Finance (Jersey) Limited (VFJL)	Investment company	100.00%	100.00%	Jersey (CI)	VR plc	100.00%	100.00%
Vedanta Jersey Investments Limited (VJIL)	Investment company	100.00%	100.00%	Jersey (CI)	VR plc	100.00%	100.00%
Indirect subsidiaries of the parent Company							
Vedanta Limited	Copper smelting, iron ore mining, aluminium mining, refining and smelting, power generation	62.85%	62.85%	India	Twin Star	46.53%	46.53%
Bharat Aluminium Company Limited (BALCO)	Aluminium mining and smelting	32.05%	32.05%	India	Vedanta Limited	51.00%	51.00%
Copper Mines of Tasmania Pty Limited (CMT)	Copper mining	62.85%	62.85%	Australia	MCBV	100.00%	100.00%
Fujairah Gold FZC <sup>1</sup>	Gold and silver processing	62.85%	62.85%	UAE	MEL	97.96%	-
Hindustan Zinc Limited (HZL)	Zinc and mining and smelting	40.80%	40.80%	India	Vedanta Limited	64.92%	64.92%
Monte Cello BV (MCBV)	Holding company	62.85%	62.85%	Netherlands	Vedanta Limited	100.00%	100.00%
Monte Cello Corporation NV (MCNV)	Holding company	100.00%	100.00%	Curacao	Twin Star	100.00%	100.00%
Konkola Copper Mines PLC	CCopper mining and	79.42%	79.42%	Zambia	VRHL	79.42%	79.42%

The Company's economic percentage holding

	perceritag	e holding		1 2 4	Immediate perc	entage holding
incipal activities	31 March 2016	31 March 2015	Country of incorporation	Immediate holding company	31 March 2016	31 March 2015
smelting			· ·			
on ore	62.85%	62.85%	India	Vedanta Limited	100.00%	100.00%
on ore	62.85%	62.85%	India	SRL	100.00%	100.00%
opper mining	62.85%	62.85%	Australia	MCBV	100.00%	100.00%
olding company	100.00%	100.00%	Mauritius	VRHL	100.00%	100.00%
ower generation	62.85%	62.85%	India	Vedanta Limited	100.00%	100.00%
ovestment company	100.00%	100.00%	Cyprus	VRCL	100.00%	100.00%
vestment company	100.00%	100.00%	Mauritius	Richter	100.00%	100.00%
ovestment company	100.00%	100.00%	United Kingdom	Richter	60.00%	60.00%
vestment company	100.00%	100.00%	United Kingdom	VRHL	100.00%	100.00%
vestment company	100.00%	100.00%	Cyprus	VRFL	100.00%	100.00%
vestment company	100.00%	100.00%	Cyprus	VRCL	100.00%	100.00%
vestment company	62.85%	62.85%	Netherlands	THL Zinc Holding B.V.	100.00%	100.00%
vestment company	62.85%	62.85%	Mauritius	Vedanta Limited	100.00%	100.00%
olding company	62.85%	62.85%	Mauritius	BFM	100.00%	100.00%
vestment company	62.85%	62.85%	Mauritius	THL Zinc Ventures Ltd	100.00%	100.00%
nvestment company	62.85%	62.85%	USA	Vedanta Limited	100.00%	100.00%
ower generation	62.85%	62.85%	India	Vedanta Limited	100.00%	100.00%
olding company	_	100.00%	United Kingdom	VRHL	-	100.00%
olding company	62.85%	62.85%	Mauritius	TEHL	100.00%	100.00%
lining and exploration	62.85%	62.85%	Namibia	THL Zinc Ltd	100.00%	100.00%
cquisition of immovable and movable properties	62.85%	62.85%	Namibia	VNHL	100.00%	100.00%
lining	62.85%	62.85%	Namibia	SZPL	100.00%	100.00%
lining	62.85%	62.85%	Namibia	SZPL	100.00%	100.00%
ccommodation and catering services	62.85%	62.85%	Namibia	SZPL	100.00%	100.00%
easing out of medical equipment and building	43.37%	43.37%	Namibia	SZPL	69.00%	69.00%
S C C C C C C C C C C C C C C C C C C C	emelting on ore on ore on ore on ore opper mining olding company ower generation vestment company ovestment company	smelting on ore 62.85% on ore 62.85% on ore 62.85% opper mining 62.85% obtaining company 100.00% ovestment company 62.85% over generation 62.85% over generation 62.85% origing and exploration 62.85% origing and exploration 62.85% origing 62.85% over generation 62.85% over generation 62.85% origing 62.85% over generation 62.85% origing 62.85% over generation 62.85%	melting on ore 62.85% 62.85% o		incept activities         2016         2015         incorporation         company           on ore         62.85%         62.85%         India         Vedanta Limited           on ore         62.85%         62.85%         India         Vedanta Limited           opper mining         62.85%         62.85%         Australia         MCBV           oblding company         100.00%         100.00%         Mauritius         VRHL           ovestment company         100.00%         100.00%         Mauritius         Richter           vestment company         100.00%         100.00%         United Kingdom         Richter           vestment company         100.00%         100.00%         United Kingdom         VRFL           vestment company         100.00%         100.00%         Cyprus         VRFL           vestment company         100.00%         100.00%         Cyprus         VRFL           vestment company         62.85%         62.85%         Mauritius         Vedanta Limited           vestment company         62.85%         62.85%         Mauritius         FM           vestment company         62.85%         62.85%         Mauritius         THL Zinc           vestment company         62.85% <td>  Maintaine   Main</td>	Maintaine   Main

The Company's economic percentage holding

		The Compan percentag	y's economic ge holding			Immediate perce	entage holding
Subsidiaries	Principal activities	31 March 2016	31 March 2015	Country of incorporation	Immediate holding company	31 March 2016	31 March 2015
	and conducting services related thereto						
Black Mountain Mining (Pty) Ltd	Mining	43.13%	43.13%	South Africa	THL Zinc Ltd	74.00%	74.00%
THL Zinc Holding BV	Investment company	62.85%	62.85%	Netherlands	Vedanta Limited	100.00%	100.00%
Lisheen Mine Partnership	Mining partnership firm	62.85%	62.85%	Ireland	VLML	50.00%	50.00%
Pecvest 17 Proprietary Ltd.	Investment company	62.85%	62.85%	South Africa	THL Zinc Ltd	100.00%	100.00%
Vedanta Lisheen Holdings Limited (VLHL)	Investment company	62.85%	62.85%	Ireland	THL Zinc Holding BV	100.00%	100.00%
Vedanta Exploration Ireland Limited	dExploration company	62.85%	62.85%	Ireland	VLHL	100.00%	100.00%
Vedanta Lisheen Mining Limited (VLML)	Mining	62.85%	62.85%	Ireland	VLHL	100.00%	100.00%
Killoran Lisheen Mining Limited	Mining	62.85%	62.85%	Ireland	VLHL	100.00%	100.00%
Killoran Lisheen Finance Limited	Investment company	62.85%	62.85%	Ireland	VLHL	100.00%	100.00%
Lisheen Milling Limited	Manufacturing	62.85%	62.85%	Ireland	VLHL	100.00%	100.00%
Vizag General Cargo Berth Private Limited	Infrastructure	62.85%	62.85%	India	Vedanta Limited	99.99%	99.99%
Paradip Multi Cargo Berth Private Limited	Infrastructure	46.51%	46.51%	India	Vedanta Limited	74.00%	74.00%
Sterlite Ports Limited (SPL)	Investment company	62.85%	62.85%	India	Vedanta Limited	100.00%	100.00%
Maritime Ventures Private Limited	Infrastructure	62.85%	62.85%	India	SPL	100.00%	100.00%
Sterlite Infraventures Limited	Investment company	62.85%	62.85%	India	Vedanta Limited	100.00%	100.00%
Bloom Fountain Limited (BFM)	Investment company	62.85%	62.85%	Mauritius	Vedanta Limited	100.00%	100.00%
Western Cluster Limited	Mining company	62.85%	62.85%	Liberia	BFM	100.00%	100.00%
Sesa Sterlite Mauritius Holdings Limited	Investment company	100.00%	100.00%	Mauritius	VRHL	100.00%	100.00%
Vedanta Finance UK Limited	Investment company	100.00%	100.00%	United Kingdom	Welter	100.00%	100.00%
Valliant (Jersey) Limited	Investment company	100.00%	100.00%	Jersey (CI)	VRJL-II	100.00%	100.00%
Cairn India Limited	Oil & gas exploration, and production	37.64%	37.64%	India	TMHL	34.43% <sup>3</sup>	39.41%
Cairn India Holdings Limited	Investment company	37.64%	37.64%	Jersey	Cairn India Limited	100.00%	100.00%
Cairn Energy Holdings Limited	Investment company	37.64%	37.64%	Scotland	Cairn India Holdings Limited	100.00%	100.00%
Cairn Energy Hydrocarbons Ltd	sExploration and production	37.64%	37.64%	Scotland	Cairn India Holdings Limited	100.00%	100.00%
Cairn Exploration (No.7) Limited <sup>4</sup>	Exploration and production	37.64%	37.64%	Scotland	Cairn India Holdings Limited	100.00%	100.00%
Cairn Exploration (No.6)	Exploration and	37.64%	37.64%	Scotland	Cairn India	100.00%	100.00%

		The Company percentage			Immediate	Immediate perd	entage holding
Subsidiaries	Principal activities	31 March 2016	31 March 2015	Country of incorporation	holding company	31 March 2016	31 March 2015
Limited <sup>2</sup>	production				Holdings Limited		
Cairn Exploration (No.2) Limited	Exploration and production	37.64%	37.64%	Scotland	Cairn India Holdings Limited	100.00%	100.00%
Cairn Energy Gujarat Block 1 Limited	Exploration and production	37.64%	37.64%	Scotland	Cairn India Holdings Limited	100.00%	100.00%
Cairn Energy Discovery Limited	Exploration and production	37.64%	37.64%	Scotland	Cairn India Holdings Limited	100.00%	100.00%
Cairn Energy Australia Pty Limited	Investment company	37.64%	37.64%	Australia	Cairn India Holdings Limited	100.00%	100.00%
Cairn Energy India Pty Limited	Exploration and production	37.64%	37.64%	Australia	Cairn Energy Australia Pty Limited	100.00%	100.00%
CIG Mauritius Holdings Private Limited	Investment company	37.64%	37.64%	Mauritius	Cairn India Limited	100.00%	100.00%
CIG Mauritius Private Limited	Investment company	37.64%	37.64%	Mauritius	CIG Mauritius Holding Private Limited	100.00%	100.00%
Cairn Lanka Private Limiter	dExploration and production	37.64%	37.64%	Sri Lanka	CIG Mauritius Pvt Ltd	100.00%	100.00%
Cairn South Africa Pty Limited	Exploration and production	37.64%	37.64%	South Africa	Cairn Energy Hydrocarbons	100.00%	100.00%

Pursuant to additional capital infusion in FG by MEL during the year ended 31 March 2016. Immediate percentage holding as of 31 March 2015 was 98% held by CMT. Dissolved during the year ended 31 March 2016.

Pursuant to transfer of 4.98% of TMHL holdings in Cairn India to Vedanta Limited.

Limited

The Group owns directly, or indirectly through subsidiaries, more than half of the voting power of all of its subsidiaries as mentioned in the list above, and has power over the subsidiaries, is exposed or has rights, to variable returns from its involvement with the subsidiaries and has the ability to affect those returns through its power over the subsidiaries.

## 45. Ultimate controlling party

At 31 March 2016, the ultimate controlling party of the Group was Volcan, which is controlled by persons related to the Executive Chairman, Mr Anil Agarwal. Volcan is incorporated in the Bahamas, and does not produce Group accounts.

Dissolved subsequently on 19 April 2016.

#### 46. Company balance sheet

(US\$ million)	Note	31 March 2016	31 March 2015
Fixed assets			
Tangible assets	48	0.2	0.3
Investments in subsidiaries	49	1,226.3	1,226.3
Investment in preference shares of subsidiaries	50	4.7	1.7
Financial asset investment	51	0.1	0.1
		1,231.3	1,228.4
Current assets			
Debtors due within one year	52	505.5	422.7
Debtors due after one year	52	4,683.9	5,066.8
Investments	53	28.1	33.2
Cash at bank and in hand		0.6	0.1
		5,218.1	5,522.8
Creditors: amounts falling due within one year			
Trade and other creditors	54	(104.3)	(97.2)
External borrowings	54	(742.7)	(270.4)
Loan from subsidiary	54	(600.3)	_
Derivative liability	54	-	(2.0)
		(1,447.3)	(369.6)
Net current assets		3,770.8	5,153.2
Total assets less current liabilities		5,002.1	6,381.6
Creditors: amounts falling due after one year			
Loan from subsidiary	55	(278.0)	(1,430.2)
External borrowings	55	(4,220.0)	(4,345.7)
		(4,498.0)	(5,775.9)
Net assets		504.1	605.7
Capital and reserves			
Called up share capital	56	30.1	30.0
Share premium account	56	201.5	198.5
Share-based payment reserve	56	29.9	27.4
Convertible bond reserve	56	10.8	38.4
Other reserves	56	(2.2)	(2.2)
Treasury shares	56	(490.6)	(490.6)
Profit and loss account	56	724.6	804.2
Equity shareholders' funds	56	504.1	605.7

The financial statements of Vedanta Resources plc, registration number 4740415, were approved by the Board of Directors on 11 May 2016 and signed on its behalf by:

## Tom Albanese

Chief Executive Officer

## 47. Company accounting policies

### Basis of accounting

Vedanta Resources plc (the Company) has transitioned from UK Generally Accepted Accounting Practice (UK GAAP) to Financial Reporting Standard 101 'Reduced disclosure framework' (FRS 101), for all periods presented. The Company meets the definition of a qualifying entity under FRS 101 issued by the Financial Reporting Council. Accordingly, in the year ended 31 March 2016 the Company has changed its accounting framework from pre-2015 UK GAAP to FRS 101 and has, in doing so, applied the requirements of IFRS 1.6—33 and related appendices.

These financial statements have been prepared in accordance with FRS 101.

The Company balance sheet and related notes have been prepared under the historical cost convention and in accordance with Financial Reporting Standards 100 'Application of financial reporting requirements' (FRS 100) and FRS 101.

As permitted by section 408 of the Companies Act 2006, the profit and loss account of the Company is not presented as part of these financial statements. The (loss)/profit after tax for the year of the Company amounted to US\$(8.0) million (2015: profit US\$284.7 million).

These financial statements are presented in US dollars, being the functional currency of the Company.

The change in the basis of preparation has not materially altered the recognition and measurement requirements previously applied in accordance with UK GAAP. Consequently, the principal accounting policies are unchanged from the prior year. The change in basis of preparation has enabled the Company to take advantage of all the available disclosure exemptions permitted by FRS 101 in the financial statements because the Group presents the exempted information in the consolidated Group financial statements. There have been no other material amendments to the disclosure requirements previously applied in accordance with UK GAAP, except disclosure of the related party transactions.

#### Significant accounting policies

#### Investments in subsidiaries

Investments in subsidiaries represent equity holdings in subsidiaries except preference shares, valued at cost less any provision for impairment. Investments are reviewed for impairment if events or changes in circumstances indicate that the carrying amount may not be recoverable.

#### Investment in preference shares of subsidiaries

Investments in preference shares of subsidiaries are stated at fair value. The fair value is represented by the face value of the preference shares as the investments are redeemable at any time for their face value at the option of the Company.

#### Cash and cash equivalents

Cash in the balance sheet comprises of cash at bank and cash in hand.

#### Financial asset investments

Financial asset investments are classified as available for sale under IAS 39 and are initially recorded at cost and then remeasured at subsequent reporting dates to fair value. Unrealised gains and losses on financial asset investments are recognised directly in equity. On disposal or impairment of the investments, the gains and losses in equity are recycled to the income statement.

#### Currency translation

Transactions in currencies other than the functional currency of the Company, being US dollars, are translated into US dollars at the spot exchange rates ruling at the date of transaction. Monetary assets and liabilities denominated in other currencies at the balance sheet date are translated into US dollars at year end exchange rates, or at a contractual rate if applicable.

### Tangible fixed assets

Tangible fixed assets are stated at cost less accumulated depreciation and provision for impairment.

#### Deferred taxation

Deferred taxation is provided in full on all timing differences that result in an obligation at the balance sheet date to pay more tax, or a right to pay less tax, at a future date, subject to the recoverability of deferred tax assets. Deferred tax assets and liabilities are not discounted

#### Share-based payments

The cost of equity-settled transactions with employees is measured at fair value at the date at which they are granted. The fair value of share awards with market-related vesting conditions are determined by an external valuer and the fair value at the grant date is expensed on a straight-line basis over the vesting period based on the Company's estimate of shares that will eventually vest. The estimate of the number of awards likely to vest is reviewed at each balance sheet date up to the vesting date at which point the estimate is adjusted to reflect the current expectations. No adjustment is made to the fair value after the vesting date even if the awards are forfeited or not exercised. Amounts recharged to subsidiaries in respect of awards granted to employees of subsidiaries are recognised as intercompany debtors until repaid.

#### **Borrowings**

Interest bearing loans are recorded at the net proceeds received i.e. net of direct transaction costs. Finance charges, including premiums payable on settlement or redemption and direct issue costs, are accounted for on accruals basis and charged to the profit and loss account using the effective interest method and are added to the carrying amount of the instrument to the extent that they are not settled in the period in which they arise.

### Convertible bonds

The convertible bond issued by VRJL and VRJL-II (Note 54) are accounted for as a compound instrument. The gross proceeds (net of issue costs) were lent to the Company by VRJL and VRJL-II. The equity component has been recognised in a separate reserve of the Company and is not subsequently remeasured. The recognition of the equity component by the Company acts to reduce the payable to VRJL and VRJL-II which arises once the gross proceeds are borrowed. The liability component is held at amortised cost. The interest expensed on the liability component is calculated by applying an effective interest rate. The difference between interest expensed and interest paid is added to the carrying amount of the liability component.

The bonds are first convertible into preference shares of the issuer having a principal value of \$100,000 per preference share, which are exchanged immediately for ordinary shares of the Company.

#### Financial instruments

The Company has elected to take the exemption provided in paragraph 8 of FRS 101 in respect of these parent Company financial

statements. Full disclosures are provided in Note 29 to the financial statements of the Group for the period ended 31 March 2016.

#### Derivative financial instruments

Derivative financial instruments are initially recorded at their fair value on the date of the derivative transaction and are re-measured at their fair value at subsequent balance sheet dates.

Changes in the fair value of derivatives that are designated and qualify as fair value hedges are recorded in the profit and loss account. The hedged item is recorded at fair value and any gain or loss is recorded in the profit and loss account and is offset by the gain or loss from the change in the fair value of the derivative.

Derivative financial instruments that do not qualify for hedge accounting are marked to market at the balance sheet date and gains or losses are recognised in the profit and loss account immediately.

Hedge accounting is discontinued when the hedging instrument expires or is sold, terminated or exercised, or no longer qualifies for hedge accounting.

## Cash flow statement

The Company's individual financial statements are outside the scope of FRS 1 'Cash flow statements' because the Company prepares publicly available Group financial statements, which include a consolidated cash flow statement. Accordingly, the Company does not present an individual Company cash flow statement.

#### Financial guarantees

Guarantees issued by the Company on behalf of other Group companies are designated as 'Insurance Contracts'. Accordingly, these are shown as contingent liabilities (Note 57).

#### Debtors

Debtors are stated at their nominal value as reduced by appropriate allowance for estimated irrecoverable amounts. An allowance for impairment for debtors is made where there is an indication of a reduction in the recoverability of the carrying value of the debtor.

#### Creditors

Creditors are stated at their nominal value.

#### 48. Company tangible fixed assets

(US\$ million)	
Cost	
At 1 April 2014	2.3
Additions	0.0
At 31 March 2015	2.3
Additions	0.0
At 31 March 2016	2.3
Accumulated depreciation	
At 1 April 2014	1.6
Charge for the period	0.4
At 31 March 2015	2.0
Charge for the period	0.1
At 31 March 2016	2.1
Net book value	
At 1 April 2014	0.7
At 31 March 2015	0.3
At 31 March 2016	0.2

#### 49. Investments in subsidiaries

At 31 March 2016	1,226.3
At 1 April 2015	1,226.3
At 1 April 2014	1,061.8
Cost	
(US\$ million)	

At 31 March 2016, the Company held 157,538,524 shares in Vedanta Resources Holdings Limited (VRHL) (March 2015: 157,538,524 shares), being 100% of VRHL's issued equity share capital. The Company also held one deferred share in VRHL (March 2015: one). At 31 March 2016, the Company held two shares in Vedanta Finance Jersey Limited (VFJL) (March 2015: two), two shares in Vedanta Resources Jersey Limited (VRJL) (March 2015: two), two shares in Vedanta Resources Jersey II Limited (VRJL-II) (March 2015: two), two shares in Vedanta Jersey Investment Limited (VJIL) (March 2015: two), being 100% of its issued equity share capital.

VRHL is an intermediary holding company incorporated in the United Kingdom (Note 44) and registered in England and Wales. VFJL, VRJL, VJIL and VRJL-II are companies, registered and incorporated in Jersey, established to raise funds for the Vedanta Group.

#### 50. Investment in preference shares of subsidiaries

(US\$ million)	
Fair value	
At 1 April 2015	1.7
Additions	3.0
Disposal	-
At 31 March 2016	4.7
At 1 April 2014	1.7
Additions	-
Disposal	-
At 31 March 2015	1.7

As at 31 March 2016, the Company held 47 preference shares in Vedanta Resources Jersey Limited (VRJL) (31 March 2015: 17 preference shares).

During the year, VRJL received notice from the bondholders to exercise the option to convert US\$3,000,000 bonds into equity shares of the Company in accordance with the provisions of the Offer circular and accordingly 30 preference shares with a nominal value of US\$100,000 each were issued by VRJL to the Company.

## 51. Financial asset investment

(US\$ million)	
Fair value	
At 1 April 2015	0.1
Fair value movement	-
At 31 March 2016	0.1
At 1 April 2014	0.1
Fair value movement	-
At 31 March 2015	0.1

The investment relates to an equity investment in the shares of Victoria Gold Corporation. At 31 March 2016, the investment in Victoria Gold Corporation was revalued and no gain or loss (2015: no gain/loss) was recognised in equity.

#### 52. Company debtors

(US\$ million)	31 March 2016	31 March 2015
Amounts due from subsidiary undertakings	5,188.4	5,485.6
Prepayments and accrued income	0.5	3.5
Other taxes	0.5	0.4
Total	5,189.4	5,489.5
Debtors due within one year	505.5	422.7
Debtors due after one year	4,683.9	5,066.8
Total	5,189.4	5,489.5

#### Amounts due from subsidiary undertakings

At 31 March 2016, the Company had loans due from VRHL of US\$1,737.4 million (2015: US\$1,507.5 million) which represented the funds being loaned to other Group companies for funding the subsidiaries. Out of the total loan, US\$579.2 million bears interest at six month US\$LIBOR plus 350 basis points, US\$500 million at 5.8%, US\$31.2 million at 5.9%, US\$47 million at 9.7%, and US\$580.0 million at US\$LIBOR plus 367 basis points.

At 31 March 2016, the Company had a loan of US\$3,069.6 million (2015: US\$3,590.5 million) from Vedanta Resources Jersey II Limited. Out of the total loan US\$119.2 million bears interest at US\$LIBOR plus 357 basis points, US\$1,413.0 million at 7.45%, US\$1,200 million at 6.50%, US\$107.4 million at LIBOR plus 300 basis points, US\$60 million at 3.15%, US\$63.1 million at 7.25% and US\$106.9 million at six month US\$LIBOR plus 430 basis points.

In addition to the loans, the Company was owed US\$372.1 million of accrued interest from VRHL and Vedanta Resources Jersey II Limited (2015: US\$323.3 million) and US\$9.3 million (2015: US\$64.3 million) other receivables from Group companies.

#### 53. Company current asset investments

(US\$ million)	31 March 2016	31 March 2015
Bank term deposits	28.1	33.2
Total	28.1	33.2
54. Company creditors: amounts falling due within one year		
(US\$ million)	31 March 2016	31 March 2015
Accruals	(104.3)	(97.2)
External borrowings	(742.7)	(270.4)
Loan from subsidiary	(600.3)	_
Derivative liability	-	(2.0)
Total	(1,447.3)	(369.6)

#### 54. Company creditors: amounts falling due within one year continued

The external borrowings as at 31 March 2016 represent 6.75% non-convertible bond of US\$750 million repayable in June 2016. During the year, the Company bought back US\$7 million worth of these bonds from open market. As at 31 March 2016, loans from subsidiaries included a loan of US\$1,140.3 million from VRJL relating to its issue of US\$1,250 million convertible bonds (bond issued in July 2009). In March 2015, as the final maturity was in July 2016, the above loan was classified in amounts falling due after one year and during the year the same was transferred from amounts due after one year to amounts falling due within one year (2015: US\$1,110.5 million). During the year, the Company bought back from the market these bonds of face value of US\$549.3 million for a consideration of US\$522.4 million. The carrying value of this bond as on 31 March 2016 is US\$533.5 million and accrued coupon interest is US\$6.5 million. On maturity of these bought back convertible bonds, there will not be any cash exchange between the Company and its subsidiary, VRJL, but a set off of the Company's bought back amount of the bond and inter-co liability towards this convertible bond. Accordingly, the carrying value of the bought back bond amount along with accrued interest i.e. US\$540 million has been reduced from the inter-co loan outstanding amount of US\$1,140.3 million from the subsidiary, VRJL.

During the year ended 31 March 2016, interest was charged at the effective interest rate of 8.2% (March 2015: 8.27%).

#### 55. Company creditors: amounts falling due after one year

(US\$ million)	31 March 2016	31 March 2015
Loan from subsidiary	(278.0)	(1,430.2)
External borrowings	(4,220.0)	(4,345.7)
Total	(4,498.0)	(5,775.9)

Loans from subsidiaries include a loan of US\$22.2 million due to Richter Holdings Limited and US\$255.8 million to Vedanta Finance UK Limited. As at 31 March 2015, the loan from subsidiaries included US\$1,110.5 million due to VRJL (as discussed in Note 54).

Of the US\$1,250 million non-convertible bond issued during 2008, US\$500 million was repaid in January 2014 and the remaining US\$750 million 9.5% bonds are due for repayment in July 2018.

In July 2011, the Company issued US\$750 million, 6.75% bonds due June 2016, and US\$900 million, 8.25% bonds due June 2021. As at 31 March 2015, the outstanding amount under this facility was US\$1,650.0 million. During the year, the Company bought back US\$7 million 6.75% bonds due June 2016 from the open market, and the outstanding amount of US\$743 million has been shown under creditors falling due within one year and balance US\$900 million in creditors falling due after one year.

In April 2013, the Company entered into a Standby Letter of Credit agreement arranged by Axis Bank for an amount of US\$150 million at a commission of 1% per annum payable quarterly. The facility is funded by Bank of India to the extent of US\$148.5 million and bears interest rate at three month US\$LIBOR plus 290 basis points. The facility is repayable in two equal annual instalments starting April 2017. As at 31 March 2016, the outstanding amount under this facility is US\$148.5 million.

In June 2013, the Company issued US\$1,200 million, 6.00% bonds due January 2019, and US\$500 million, 7.125% bonds due May 2023.

In December 2013, the Company entered into a facility agreement with Bank of India for borrowing up to US\$100 million at an interest rate of US\$LIBOR plus 357 basis points repayable to the extent of 50% in October 2017 and the balance in January 2018. As at 31 March 2016, the outstanding amount under this facility is US\$100 million.

In March 2015, the Company entered into a facility agreement with State Bank of India for borrowing up to US\$350 million. US\$100 million is repayable in March 2020 and bears interest at a rate of US\$LIBOR plus 370 basis points. US\$250 million bears interest at a rate of US\$LIBOR plus 403 basis points repayable in two instalments, being US\$100 million and US\$150 million at the end of 72 and 84 months respectively after initial utilisation. As at 31 March 2016, the outstanding amount under this facility is US\$350 million.

In January 2016, the Company entered into a facility agreement with State Bank of India for borrowing up to US\$300 million. US\$120 million is repayable in February 2022 and bears interest at a rate of US\$LIBOR plus 450 basis points. US\$180 million is repayable in February 2023 and bears interest at a rate of US\$LIBOR plus 460 basis points. As at 31 March 2016, the outstanding amount under this facility is US\$300 million.

## 56. Company reconciliation of movement in equity shareholders' funds

(US\$ million)	Share capital (Note 35)	Share premium	Share-based payment reserve	Convertible bond reserve	Treasury shares	Retained earnings	Other reserves	Total
Equity shareholders' funds at 1 April 2015	30.0	198.5	27.4	38.4	(490.6)	804.2	(2.2)	605.7
Loss for the year	_	_	-	_	_	(8.0)	-	(8.0)
Dividends paid (Note 14)	_	_	_	_	_	$(111.3)^1$	_	$(111.3)^1$
Exercise of LTIP awards (Note 32)	0.1	_	(13.1)	_	_	13.1	_	0.1
Recognition of share-based payments (Note 32)	_	_	15.6	_	_	_	_	15.6
Gift to Employee Benefit Trust	_	_	_	_	_	(0.9)	_	(0.9)
Exercise of conversion of bonds	0.0	3.0	_	(0.1)	_	_	_	2.9
Convertible bond transfer (Note 28)	-	-	_	(27.5)	_	27.5	_	
Equity shareholders' funds at 31 March 2016	30.1	201.5	29.9	10.8	(490.6)	724.6	(2.2)	504.1

<sup>1</sup> Total dividends of US\$111.3 million includes a dividend of US\$0.7 million paid to a separate investment trust which is consolidated in the Group's financial statements with that element of dividends paid by the Company being eliminated (refer Note 14).

(US\$ million)	Share capital (Note 35)	Share premium	Share-based payment reserve	Convertible bond reserve	Treasury shares	Retained earnings	Other reserves	Total
Equity shareholders' funds at 1 April 2014	29.8	198.5	46.9	80.1	(490.6)	601.0	(2.2)	463.5
Profit for the year	_	_	_	_	_	284.7	_	284.7
Dividends paid (Note 14)	_	_	_	_	_	(171.3)	_	(171.3)
Exercise of LTIP awards (Note 32)	0.2	_	(48.1)	_	_	48.1	_	0.2
Recognition of share-based payments (Note 32)	_	_	28.6	_	_	_	_	28.6
Convertible bond transfer (Note 28)	_	_	_	(41.7)	_	41.7	_	_
Equity shareholders' funds at 31 March 2015	30.0	198.5	27.4	38.4	(490.6)	804.2	(2.2)	605.7

#### 57. Company contingent liabilities

- The Company has guaranteed US\$1,250 million convertible bonds issued by VRJL (2015: US\$1,250 million), of the above US\$113.8 million was repaid pursuant to exercise of put option during the year ended 31 March 2015. During the year, the Company bought back US\$549.3 million of these bonds from open market. See Note 28 to the financial statements for further details on the convertible bonds.
- The Company has given a corporate guarantee to Konkola Copper Mines for an amount of US\$897 million.
- The Company has guaranteed US\$883 million convertible bonds issued by VRJL-II (2015: US\$883 million). During the year ended 31 March 2015 and 31 March 2014, US\$65.1 million and US\$809.8 million respectively was repaid to the bondholders on exercise of put option. See Note 28 to the financial statements for further details on the convertible bonds.
- The Company has guaranteed US\$170 million for a loan facility entered by Valliant Jersey Limited with ICICI Bank and US\$180 million for loan facility entered by Vedanta Finance Jersey Limited with ICICI Bank.
- The Company has guaranteed US\$500 million for a syndicated facility agreement entered by Welter Trading Limited with Standard Chartered Bank as facility agent.
- The Company has guaranteed US\$500 million for a loan facility entered by Monte Cello NV with ICICI Bank.
- The Company has guaranteed US\$150 million for a loan facility entered by Twin Star Holdings Limited with ICICI Bank. During the year ended 31 March 2016, US\$90 million was repaid under this facility.
- The Company has guaranteed US\$80 million for a revolving credit facility entered by Twin Star Holdings Limited with National Bank of Abu Dhabi PJSC.
- The Company has guaranteed US\$500 million for a syndicated facility entered by Twin Star Holdings Limited with Axis Bank as lead arranger and facility agent.
- The Company has guaranteed US\$1,200 million for a syndicated facility entered by Twin Star Mauritius Holdings Limited with Standard Chartered Bank as facility agent. During the year ended 31 March 2016, US\$300 million was repaid under this facility.
- The Company has guaranteed US\$500 million for a loan facility entered by Twin Star Mauritius Holdings Limited with Standard
  Chartered Bank and First Gulf Bank PJSC of which US\$250 million is under a commodity murabaha structure (Islamic financing) and
  the balance US\$250 million is under a conventional loan structure. During the year ended 31 March 2016, US\$25 million was repaid
  under this facility.
- The Company has guaranteed US\$1,250 million for a loan facility entered by its subsidiaries THL Zinc Limited with Cairn India Holdings Limited (intercompany loan).
- The Company has guaranteed US\$900 million for a loan facility entered by its subsidiaries Twin Star Mauritius Holdings Limited with Fujairah Gold FZC (intercompany loan).
- The Company has provided a guarantee for the Cairn India Group's obligation under the Production Sharing Contract (PSC).

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#### 58. Related party transactions

During the year the Company entered into transactions, in the ordinary course of business, with other related parties. The Company has taken advantage of the exemption under paragraph 8(k) of FRS 101 not to disclose transactions with wholly owned subsidiaries. Transactions entered into and trading balances outstanding at 31 March with other related parties are as follows:

(US\$ million) Name of company	Relationship	Nature of transaction	2016	2015
Vedanta Limited	Subsidiary	Management fees charged	5.0	5.0
Konkola Copper Mines Plc	Subsidiary	Management and guarantee fees charged	2.8	2.3
Cairn India Limited	Subsidiary	Management fees charged	6.5	15.5
Sterlite Technologies Limited	Related party	Management fees charged	0.0	0.0
Volcan Investments Limited	Holding company	Dividend paid	75.0	115.6
Vedanta Limited	Subsidiary	Receipt of service	0.4	0.4
Vedanta Limited	Subsidiary	Payment of expenses	0.1	0.4
Vedanta Limited	Subsidiary	Recovery against share option expense	11.3	22.9
Konkola Copper Mines Plc	Subsidiary	Recovery against share option expense	1.5	1.4
Copper Mines of Tasmania Pty Limited	Subsidiary	Recovery against share option expense	0.1	0.0
Fujariah Gold FZC	Subsidiary	Recovery against share option expense	0.4	0.2
Vedanta Lisheen Holdings Limited	Subsidiary	Recovery against share option expense	0.0	0.6
Namzinc Pty Limited	Subsidiary	Recovery against share option expense	0.0	0.6
Black Mountain Mining (Pty) Limited	Subsidiary	Recovery against share option expense	0.7	1.1
Western Cluster Limited	Subsidiary	Recovery against share option expense	0.0	0.2
Twin Star Mauritius Holdings Limited	Subsidiary	Reimbursement of expenses	0.0	0.0
Twin Star Energy Holdings Limited	Subsidiary	Reimbursement of expenses	0.0	0.0
THL Zinc Limited	Subsidiary	Reimbursement of expenses	0.0	_
THL Zinc Ventures Limited	Subsidiary	Reimbursement of expenses	0.0	_
Ashurst LLP (was related up to 30 April 2016)	Related party	Receipt of service	0.1	0.4

## Outstanding balances

(US\$ million) Name of company	Relationship	Nature of transaction	2016	2015
Vedanta Limited	Subsidiary	(Payable)/Receivable	(3.9)	29.1
Konkola Copper Mines Plc	Subsidiary	Receivable	2.3	7.2
Cairn India Limited	Subsidiary	Receivable	1.2	2.7
Sterlite Technologies Limited	Related party	Receivable	0.0	0.0
Copper Mines of Tasmania Pty Limited	Subsidiary	Receivable	0.7	0.6
Fujariah Gold FZC	Subsidiary	Receivable	0.6	0.2
Vedanta Lisheen Holdings Limited	Subsidiary	(Payable)/Receivable	(0.0)	0.2
Namzinc Pty Limited	Subsidiary	Receivable/(Payable)	0.0	(0.0)
Black Mountain Mining (Pty) Limited	Subsidiary	Receivable	1.0	0.3
Western Cluster Limited	Subsidiary	Receivable	0.2	0.2
Twin Star Mauritius Holdings Limited	Subsidiary	Receivable	0.0	0.0
Twin Star Energy Holdings Limited	Subsidiary	Receivable	0.0	0.0
THL Zinc Limited	Subsidiary	Receivable	0.0	_
THL Zinc Ventures Limited	Subsidiary	Receivable	0.0	_
Monte Cello BV	Subsidiary	(Payable)	(1.0)	(1.0)

## 59. Company share-based payment

The Company had certain LTIP awards outstanding as at 31 March 2016. See Note 32 to the financial statements for further details on these share-based payments.

## Independent Auditor's Report

To the Members of Vedanta Resources plc

#### Opinion on financial statements of Vedanta Resources plc

In our opinion:

- the financial statements give a true and fair view of the state of the Group's and of the parent Company's affairs as at 31 March 2015 and of the Group's loss for the year then ended;
- the Group financial statements have been properly prepared in accordance with International Financial Reporting Standards (IFRSs) as adopted by the European Union;
- the parent Company financial statements have been properly prepared in accordance with United Kingdom Generally Accepted Accounting Practice; and
- the financial statements have been prepared in accordance with the requirements of the Companies Act 2006 and, as regards the Group financial statements, Article 4 of the IAS Regulation.

The financial statements comprise the Consolidated Income Statement, the Consolidated Statement of Comprehensive Income, the Consolidated and parent Company Balance Sheets, the Consolidated Cash Flow Statement, the Consolidated Statement of Changes in Equity, and the related Notes 1 to 59. The financial reporting framework that has been applied in the preparation of the Group financial statements is applicable law and IFRSs as adopted by the European Union. The financial reporting framework that has been applied in the preparation of the parent Company financial statements is applicable law and United Kingdom Accounting Standards (United Kingdom Generally Accepted Accounting Practice).

#### Going concern

As required by the Listing Rules we have reviewed the Directors' statement contained within the strategic report that the Group is a going concern. We confirm that:

- we have concluded that the Directors' use of the going concern basis of accounting in the preparation of the financial statements is appropriate; and
- · we have not identified any material uncertainties that may cast significant doubt on the Group's ability to continue as a going concern.

However, because not all future events or conditions can be predicted, this statement is not a guarantee as to the Group's ability to continue as a going concern.

#### Our assessment of risks of material misstatement

The assessed risks of material misstatement described below are those that had the greatest effect on our audit strategy, the allocation of resources in the audit and directing the efforts of the engagement team.

#### Rick

#### Impairment of property, plant and equipment (PP&E) assets

There is a risk associated with the assessment of the recoverable amount of certain operating assets included within PP&E, specifically:

- the Rajasthan producing assets within the Oil & Gas business following a significant decrease in oil prices;
- the Lanjigarh expansionary program within the Aluminium business unit which remains on hold pending environmental clearances being obtained;
- the operations in Goa and Karnataka within the Iron Ore business unit as a result of lower iron ore prices and mining approval pending in Goa following state-wide bans on iron ore mining; and
- the KCM operations in Zambia following lower copper prices and continuing operational challenges.

The Group has recognised PP&E assets with a net book value of US\$17,937.9 million at 31 March 2015 and has recorded impairments against PP&E of US\$2,214.4 million in 2015.

For more information see Notes 2(b), 5 and 17 in the financial statements that provide further details and disclosures to this matter.

#### How the scope of our audit responded to the risk

We have:

- audited management's assessment as to whether indicators of impairment exist for operating assets, specifically, in relation to the Rajasthan producing assets, the Lanjigarh expansionary project, the iron ore operations in Goa and Karnataka and the KCM copper operations in Zambia;
- obtained and assessed the valuation models used to determine the higher of value in use or fair value less cost of disposal of the relevant asset by challenging
  the key assumptions made by management in relation to these models, including:
  - the expected timings of approvals and renewal of licences;
  - source of reserve and production estimates;
  - resources to reserves conversion ratios where applicable;
  - · exchange rates; and
  - operating and capital expenditure estimates

by reference to independent third party evidence and consultation with operational management;

- benchmarking and analysis of commodity, oil and gas price assumptions against forward curves and analyst data;
- recalculated and benchmarked discount rates applied to third party evidence and involvement of Deloitte valuation specialists;
- testing the mechanical accuracy of the models used;
- · assessed whether assumptions had been determined and applied on a consistent basis across the Group; and
- assessed the procedures performed by management during the year to progress the approval of environmental clearances where these remain outstanding.

#### Impairment of evaluation and exploration (E&E) assets

Following significant downward pressure on oil, gas and other commodity prices, which are a key assumption in the valuation of the recoverable value of E&E assets, a new risk has been included in our audit opinion in 2015.

The assessment of the carrying value of E&E assets requires management to exercise judgement around complex areas, as described in the Group's critical accounting judgements on page 144. Economic value can often be difficult to determine given the relatively early stages of development. The areas of judgement include the group's intention to proceed with a future work programme for a prospect or licence, the likelihood of licence renewal or extension and the success of drilling and geological analysis.

The net book value of E&E assets at 31 March 2015 is US\$5,414.1 million after the Group has written off E&E assets totalling US\$4,480.0 million in the year.

For more information see Notes 2(b), 5 and 17 in the financial statements that provide further details and disclosures to this matter.

We evaluated management's assessment of the potential impairment indicators on its E&E assets with reference to the criteria of IFRS 6 Exploration for and Evaluation of Mineral Resources and the Group's successful efforts accounting policy (see page 137). In 2015, the Group has reconsidered its exploration strategy and locations for future exploration focus in the context of a lower oil and commodity price environment and the availability of capital in these circumstances.

Our procedures included understanding the Group's ongoing E&E activity, by participating in meetings with operational and finance management at all key locations and obtaining evidence including reviewing minutes of board and executive committee meetings, confirmations of budget allocation, the results of ongoing appraisal activity and the licensing status to assess E&E assets.

Where indicators of impairment were identified, we determined whether management provided in full for the projects that are not expected to proceed or valuations were performed where the projects are progressing but the carrying value may not be fully recoverable.

Where valuations were prepared, we challenged the key assumptions using the same approach as described under the impairment of PPE assets above.

#### Revenue recognition

IAS 18 Revenue and the Group's revenue recognition policy permits revenue to be recognised only when the risks and rewards of ownership have transferred from the seller to the buyer.

The risk is related to:

- inappropriate recognition of sales made during the year on a bill and hold or consignment basis;
- incorrect valuation of provisionally priced sales (where the pricing is only finalised based on market prices subsequent to the balance sheet date);
- the value of regulated sales, and the resulting year-end receivable of US\$114.0 million, made to the Grid Corporation of Odisha Limited ("Gridco") where a dispute regarding the interpretation of the tariff agreement is pending appellate tribunal resolution; and
- the calculation of Cairn's oil and gas sales on an entitlement basis.

For more information see Notes 2a and 4 in the financial statements that provide further details and disclosures to this matter.

We have reviewed the application of the Group's revenue recognition policy and:

- reviewed the terms of bill and hold agreements to conclude on the point at which risk and reward transfer takes place;
- recalculated the value of provisional pricing adjustments and validating the assumptions used to third party data where possible;
- challenged management in respect of whether the Gridco trade receivables are recoverable through the review of state regulatory commission and the appellate tribunal rulings, review of the underlying power purchase agreements and the external legal opinions received and the involvement of Deloitte power specialists to re-assess the tariff calculations; and
- reviewed the terms of Cairn's profit sharing agreement and tested the underlying entitlement calculations.

#### Litigation, environmental and regulatory risk

As is the norm in extractive industries, there are a significant number of legal claims in the Group and a risk exists that the Group may not have provided adequately for liabilities. There is also a risk of the Group's reputation being brought into disrepute resulting in financial and reputational damage.

The Group continues to be involved in a high number of legal claims. It is not unusual for claims to remain outstanding for a number of years, with the regulatory environment becoming increasingly complex and regulators focusing on the environmental and social impacts. These ongoing claims, environmental and regulatory enquiries are a threat to the future operations as well as the Group's current financial performance and reputation.

For more information see Notes 30, 38 and 42 in the financial statements that provide further details and disclosures to these matters.

#### We have:

- reviewed management's legal paper and challenged their assessment of the probability of success in these cases, the magnitude of any potential loss and their
  conclusions reached through discussions with the head of legal and operational management;
- · inspected external legal opinions (where considered necessary) and other evidence that supports factual information in management's responses; and
- focused our procedures on the terms and conditions of mining licenses and performed procedures to gain assurance over the compliance and validity of all mining licences and environmental clearances.

We have assessed the appropriateness of provisions and considered the impact of the procedures performed above on the financial statements and whether the disclosures therein are in accordance with IAS 37 Provisions, contingent liabilities and contingent assets.

#### Taxation

There is a risk that the Group's aggregated taxation exposure in all jurisdictions, including the exposure to withholding taxes following past acquisitions, financing and transfer pricing arrangements, sales taxes and recognition of deferred taxation assets and liabilities, may not have been adequately valued and disclosed in the financial statements due to the complexities, timescales for resolution and the need to negotiate with various tax authorities.

In the current year, Cairn India received an order form the Indian Tax Authority for an amount of US\$3,274.4 million relating to withholding taxes not paid on the acquisition of Cairn India by the previous owner, Cairn Energy plc.

At 31 March 2015, US\$2,588.7 million has been recognised as a deferred taxation liability, US\$1,252.6 million has been recognised as a deferred taxation asset and US\$34.1 million has been recognised as a net current tax payable, with a total tax credit of US\$1,852.5 million recorded in the consolidated income statement.

For more information see Notes 12, 31 and 38 in the financial statements that provide further details and disclosures to these matters.

We reviewed the potential taxation exposures within the Group and, through discussions with the Group's taxation department, the tax specialists within the audit team and review of relevant documentation, including external legal advice and correspondence with tax authorities, we evaluated the appropriateness of the provisions raised and contingent liability disclosures.

We considered, in the context of our tax specialists' prior experience of similar issues, the Group's exposure to withholding taxes following past acquisitions, the current tax exposure following the Group's internal restructuring, transfer pricing arrangements and deferred taxation assets and liabilities recognised to assess whether these matters were appropriately reflected and disclosed in the financial statements.

The description of risks above should be read in conjunction with the significant issues considered by the Audit Committee discussed on page 95.

Our audit procedures relating to these matters were designed in the context of our audit of the financial statements as a whole, and not to express an opinion on individual accounts or disclosures. Our opinion on the financial statements is not modified with respect to any of the risks described above, and we do not express an opinion on these individual matters.

#### Our application of materiality

We define materiality as the magnitude of misstatement in the financial statements that makes it probable that the economic decisions of a reasonably knowledgeable person would be changed or influenced. We use materiality both in planning the scope of our audit work and in evaluating the results of our work.

We determined materiality for the Group to be US\$50 million (2014: US\$75 million), which is approximately 5% (2014: 5%) of normalised profit before tax, and below 1% (2014: 1%) of equity. Profit before tax has been normalised by adjusting for specific one-off items: the impairment charges recognised on the PP&E and E&E assets during the year following a significant decrease in commodity and oil and gas prices. Normalised profit before tax is considered a more appropriate and less volatile measure reflecting the underlying scale of the Group.

We agreed with the Audit Committee that we would report to the Committee all audit differences in excess of US\$1.0 million (2014: US\$1.5 million), as well as differences below that threshold that, in our view, warranted reporting on qualitative grounds. We also report to the Audit Committee on disclosure matters that we identified when assessing the overall presentation of the financial statements.

Our Group audit was scoped by obtaining an understanding of the Group and its environment, including Group-wide controls, and assessing the risks of material misstatement at the Group level. Based on that assessment, we focused our Group audit scope primarily on the audit work at 16 locations. 12 of these were subject to a full audit, whilst the remaining four were subject to an audit of specified account balances where the extent of our testing was based on our assessment of the risks of material misstatement and of the materiality of the Group's operations at those locations. These 16 locations represent the principal business units and account for 94% (2014: 100%) of the Group's net assets, 99% (2014: 100%) of the Group's revenue and 91% (2014: 100%) of the Group's profit before tax offset on consolidation by losses elsewhere in the Group. They were also selected to provide an appropriate basis for undertaking audit work to address the risks of material misstatement identified above. Our audit work at the 16 locations was executed at levels of materiality applicable to each individual entity and which were lower than Group materiality.

At the parent entity level we also tested the consolidation process and carried out analytical procedures to confirm our conclusion that there were no significant risks of material misstatement of the aggregated financial information of the remaining components not subject to audit or audit of specified account balances.

The Group audit team continued to follow a programme of planned visits that has been designed so that the Senior Statutory Auditor or a senior member of the Group audit team visits each of the locations where the Group audit scope was focused at least once every five years. At each six month reporting date we include the component audit partners and teams in our team briefing, discuss their risk assessment, and review documentation of the findings from their work.

#### Opinion on other matters prescribed by the Companies Act 2006

In our opinion:

- the part of the Directors' Remuneration Report to be audited has been properly prepared in accordance with the Companies Act 2006; and
- the information given in the strategic report and the Directors' report for the financial year for which the financial statements are prepared is consistent with the financial statements

Matters on which we are required to report by exception Adequacy of explanations received and accounting records Under the Companies Act 2006 we are required to report to you if, in our opinion:

- we have not received all the information and explanations we require for our audit; or
- adequate accounting records have not been kept by the parent Company, or returns adequate for our audit have not been received from branches not visited by
  us; or
- the parent Company financial statements are not in agreement with the accounting records and returns.

We have nothing to report in respect of these matters.

#### Directors' remuneration

Under the Companies Act 2006 we are also required to report if in our opinion certain disclosures of Directors' remuneration have not been made or the part of the Directors' Remuneration Report to be audited is not in agreement with the accounting records and returns. We have nothing to report arising from these matters.

#### Corporate Governance Statement

Under the Listing Rules we are also required to review the part of the Corporate Governance Statement relating to the Company's compliance with ten provisions of the UK Corporate Governance Code. We have nothing to report arising from our review.

#### Our duty to read other information in the annual report

Under International Standards on Auditing (UK and Ireland), we are required to report to you if, in our opinion, information in the Annual Report is:

- · materially inconsistent with the information in the audited financial statements; or
- apparently materially incorrect based on, or materially inconsistent with, our knowledge of the Group acquired in the course of performing our audit; or
- · otherwise misleading.

In particular, we are required to consider whether we have identified any inconsistencies between our knowledge acquired during the audit and the Directors' statement that they consider the Annual Report is fair, balanced and understandable and whether the Annual Report appropriately discloses those matters that we communicated to the Audit Committee which we consider should have been disclosed. We confirm that we have not identified any such inconsistencies or misleading statements.

#### Respective responsibilities of Directors and auditor

As explained more fully in the Directors' Responsibilities Statement, the Directors are responsible for the preparation of the financial statements and for being satisfied that they give a true and fair view. Our responsibility is to audit and express an opinion on the financial statements in accordance with applicable law and International Standards on Auditing (UK and Ireland). Those standards require us to comply with the Auditing Practices Board's Ethical Standards for Auditors. We also comply with International Standard on Quality Control 1 (UK and Ireland). Our audit methodology and tools aim to ensure that our quality control procedures are effective, understood and applied. Our quality controls and systems include our dedicated professional standards review team and independent partner reviews.

This report is made solely to the Company's members, as a body, in accordance with Chapter 3 of Part 16 of the Companies Act 2006. Our audit work has been undertaken so that we might state to the Company's members those matters we are required to state to them in an auditor's report and for no other purpose. To the fullest extent permitted by law, we do not accept or assume responsibility to anyone other than the Company and the Company's members as a body, for our audit work, for this report, or for the opinions we have formed.

#### Scope of the audit of the financial statements

An audit involves obtaining evidence about the amounts and disclosures in the financial statements sufficient to give reasonable assurance that the financial statements are free from material misstatement, whether caused by fraud or error. This includes an assessment of: whether the accounting policies are appropriate to the Group's and the parent Company's circumstances and have been consistently applied and adequately disclosed; the reasonableness of significant accounting estimates made by the directors; and the overall presentation of the financial statements. In addition, we read all the financial and non-financial information in the Annual Report to identify material inconsistencies with the audited financial statements and to identify any information that is apparently materially incorrect based on, or materially inconsistent with, the knowledge acquired by us in the course of performing the audit. If we become aware of any apparent material misstatements or inconsistencies we consider the implications for our report.

Andrew Kelly (senior statutory auditor)
For and on behalf of Deloitte LLP
Chartered Accountants and Statutory Auditor
London, United Kingdom
13 May 2015

# **Consolidated Income Statement**

		Year e	nded 31 March 20	115	Year ended 31 March 2014 <sup>1</sup>		
	_	Before special			Before special		
(US\$ million except as stated)	Note	items	Special items	Total	items	Special items	Total
Revenue	4	12,878.7	_	12,878.7	12,945.0	_	12,945.0
Cost of sales		(10,463.9)	_	(10,463.9)	(10,043.2)	_	(10,043.2)
Gross profit		2,414.8	_	2,414.8	2,901.8	_	2,901.8
Other operating income		104.0	_	104.0	84.0	_	84.0
Distribution costs		(245.2)	_	(245.2)	(237.6)	_	(237.6)
Administrative expenses		(538.1)	_	(538.1)	(460.1)	_	(460.1)
Special items	5	_	(6,744.2)	(6,744.2)	_	(138.0)	(138.0)
Operating profit/(loss)		1,735.5	(6,744.2)	(5,008.7)	2,288.1	(138.0)	2,150.1
Investment revenue	6	832.6	_	832.6	687.7	_	687.7
Finance costs	7	(1,387.2)	_	(1,387.2)	(1,439.8)	_	(1,439.8)
Other gains and (losses) [net]	8	(76.9)	_	(76.9)	(279.9)	_	(279.9)
Profit/(loss) before taxation (a)		1,104.0	(6,744.2)	(5,640.2)	1,256.1	(138.0)	1,118.1
Tax credit – special items	12	_	2,205.1	2,205.1	_	29.4	29.4
Net tax expense – others	12	(352.6)	_	(352.6)	(158.1)	_	(158.1)
Net tax credit/(expense) (b)	12	(352.6)	2,205.1	1,852.5	(158.1)	29.4	(128.7)
Profit/(loss) for the year from continuing operations (a+b)	9	751.4	(4,539.1)	(3,787.7)	1,098.0	(108.6)	989.4
Attributable to:							_
Equity holders of the parent		(74.7)	(1,723.9)	(1,798.6)	(123.0)	(73.0)	(196.0)
Non-controlling interests		826.1	(2,815.2)	(1,989.1)	1,221.0	(35.6)	1,185.4
Profit/(loss) for the year from continuing operations		751.4	(4,539.1)	(3,787.7)	1,098.0	(108.6)	989.4
Loss per share (US cents)							
Basic loss per ordinary share	13	(27.2)	(627.3)	(654.5)	(45.0)	(26.7)	(71.7)
Diluted loss per ordinary share	13	(27.2)	(627.3)	(654.5)	(45.0)	(26.7)	(71.7)

<sup>1</sup> Restated refer Note 1.

# Consolidated Statement of Comprehensive Income

(US\$ million)	Year ended 31 March 2015	Year ended 31 March 2014
(Loss)/profit for the year from continuing operations	(3,787.7)	989.4
Income and expenses recognised directly in equity:		
Items that will not be reclassified subsequently to income statement:		
Remeasurement of net defined benefit plans	(14.0)	(4.2)
Tax effects on items recognised directly in equity	4.6	1.5
Total (a)	(9.4)	(2.7)
Items that may be reclassified subsequently to income statement:		
Exchange differences arising on translation of foreign operations	(582.0)	(1,239.6)
Change in fair value of available-for-sale financial assets (Note 18)	2.1	(0.1)
Change in fair value of cash flow hedges deferred in reserves	(27.4)	(47.1)
Tax effects arising on cash flow hedges deferred in reserves	0.8	(3.7)
Change in fair value of cash flow hedges transferred to income statement	(17.8)	(0.9)
Tax effects arising on cash flow hedges transferred to income statement	6.0	0.3
Total (b)	(618.3)	(1,291.1)
Other comprehensive loss for the year (a+b)	(627.7)	(1,293.8)
Total comprehensive loss for the year	(4,415.4)	(304.4)
Attributable to:		
Equity holders of the parent	(2,089.8)	(773.8)
Non-controlling interests	(2,325.6)	469.4
Total comprehensive loss for the year	(4,415.4)	(304.4)

# Consolidated Balance Sheet

are at a		As at year ended	
(US\$ million) Assets	Note	31 March 2015	31 March 2014
Non-current assets			
Goodwill	15	16.6	16.6
Intangible assets	16	101.9	108.6
Property, plant and equipment	17	23,352.0	31,043.5
Financial asset investments	18	4.2	1.7
Non-current tax assets		394.0	_
Other non-current assets	19	156.0	132.1
Financial instruments (derivatives)	29	0.2	16.2
Deferred tax assets	31	1,252.6	1,223.7
Comment and to		25,277.5	32,542.4
Current assets Inventories	20	1,605.7	1,742.5
Trade and other receivables	21	1,839.2	1,739.9
Financial instruments (derivatives)	29	16.6	54.0
Current tax assets		40.1	357.6
Liquid investments	22	7,856.1	8,568.5
Cash and cash equivalents	23	353.7	369.4
		11,711.4	12,831.9
Total assets		36,988.9	45,374.3
Liabilities  Comment Vishilidian			
Current liabilities Short-term borrowings	24	(2.170.2)	(2.427.0)
Convertible bonds	24 28	(3,179.2)	(2,437.0) (1,921.5)
Trade and other payables	27a	(4,730.0)	(4,690.0)
Financial instruments (derivatives)	29	(45.7)	(118.7)
Retirement benefits	33	(12.7)	(4.8)
Provisions	30	(140.8)	(88.7)
Current tax liabilities		(74.2)	(29.3)
		(8,182.6)	(9,290.0)
Net current assets		3,528.8	3,541.9
Non-current liabilities			
Medium and long-term borrowings	24	(12,385.6)	(12,512.7)
Convertible bonds	28	(1,103.0)	-
Trade and other payables	27b	(194.3)	(203.3)
	29	(0.1)	(27.4)
Financial instruments (derivatives)	2.1		
Deferred tax liabilities	31	(2,588.7)	(4,960.1)
Deferred tax liabilities Retirement benefits	33	(2,588.7) (61.9)	(58.1)
Deferred tax liabilities Retirement benefits Provisions	33 30	(2,588.7) (61.9) (203.4)	(58.1) (336.0)
Deferred tax liabilities Retirement benefits	33	(2,588.7) (61.9) (203.4) (11.9)	(58.1) (336.0) (11.9)
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests	33 30	(2,588.7) (61.9) (203.4) (11.9) (16,548.9)	(58.1) (336.0) (11.9) (18,109.5)
Deferred tax liabilities Retirement benefits Provisions	33 30	(2,588.7) (61.9) (203.4) (11.9)	(58.1) (336.0) (11.9)
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities	33 30	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5)	(58.1) (336.0) (11.9) (18,109.5) (27,399.5)
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities	33 30 25	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities Net assets  (USS million)	33 30 25	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5)	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities Net assets  (USS million) Equity	33 30 25 Note	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4 As at year ended 31 March 2015	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8 As at year ended 31 March 2014
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities Net assets  (USS million) Equity Share capital	33 30 25	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4 As at year ended 31 March 2015	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8 As at year ended 31 March 2014
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities Net assets  (USS million) Equity Share capital Share premium	33 30 25 Note	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4 As at year ended 31 March 2015	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8 As at year ended 31 March 2014
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities Net assets  (USS million)  Equity Share capital Share premium Treasury shares	33 30 25 Note	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4 As at year ended 31 March 2015 30.0 198.5 (556.9)	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8 As at year ended 31 March 2014 29.8 198.5 (556.9)
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities Net assets  (USS million)  Equity Share capital Share premium Treasury shares Share-based payment reserve	33 30 25 Note	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4 As at year ended 31 March 2015 30.0 198.5 (556.9) 27.4	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8 As at year ended 31 March 2014 29.8 198.5 (556.9) 46.9
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities Net assets  (USS million) Equity Share capital Share premium Treasury shares Share-based payment reserve Convertible bond reserve	33 30 25 Note	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4 As at year ended 31 March 2015 30.0 198.5 (556.9) 27.4 38.4	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8 As at year ended 31 March 2014 29.8 198.5 (556.9) 46.9 80.1
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities  Net assets  (USS million)  Equity Share capital Share premium Treasury shares Share-based payment reserve Convertible bond reserve Hedging reserve	33 30 25 Note	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4 As at year ended 31 March 2015 30.0 198.5 (556.9) 27.4 38.4 (74.7)	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8 As at year ended 31 March 2014 29.8 198.5 (556.9) 46.9 80.1 (50.4)
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities  Net assets  (USS million)  Equity Share capital Share premium Treasury shares Share-based payment reserve Convertible bond reserve Hedging reserve Other reserves	33 30 25 Note	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4 As at year ended 31 March 2015 30.0 198.5 (556.9) 27.4 38.4 (74.7) 339.9	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8 As at year ended 31 March 2014 29.8 198.5 (556.9) 46.9 80.1 (50.4) 471.6
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities  Net assets  (USS million)  Equity Share capital Share premium Treasury shares Share-based payment reserve Convertible bond reserve Hedging reserve Other reserves Retained earnings	33 30 25 Note	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4  As at year ended 31 March 2015  30.0 198.5 (556.9) 27.4 38.4 (74.7) 339.9 1,600.5	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8 As at year ended 31 March 2014 29.8 198.5 (556.9) 46.9 80.1 (50.4) 471.6 3,790.8
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities  Net assets  (US\$ million)  Equity Share capital Share premium Treasury shares Share-based payment reserve Convertible bond reserve Hedging reserve Other reserves Retained earnings Equity attributable to equity holders of the parent	33 30 25 Note 35	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4 As at year ended 31 March 2015 30.0 198.5 (556.9) 27.4 38.4 (74.7) 339.9 1,600.5 1,603.1	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8 As at year ended 31 March 2014 29.8 198.5 (556.9) 46.9 80.1 (50.4) 471.6 3,790.8 4,010.4
Deferred tax liabilities Retirement benefits Provisions Non-equity non-controlling interests  Total liabilities  Net assets  (USS million)  Equity Share capital Share premium Treasury shares Share-based payment reserve Convertible bond reserve Hedging reserve Other reserves Retained earnings	33 30 25 Note	(2,588.7) (61.9) (203.4) (11.9) (16,548.9) (24,731.5) 12,257.4  As at year ended 31 March 2015  30.0 198.5 (556.9) 27.4 38.4 (74.7) 339.9 1,600.5	(58.1) (336.0) (11.9) (18,109.5) (27,399.5) 17,974.8 As at year ended 31 March 2014 29.8 198.5 (556.9) 46.9 80.1 (50.4) 471.6 3,790.8

The financial statements of Vedanta Resources plc, registration number 4740415 were approved by the Board of Directors on 13 May 2015 and signed on their behalf by:

#### Tom Albanese

Chief Executive Officer

# Consolidated Cash Flow Statement

		Year ended 31	Year ended 31 March
(USS million)	Note	March 2015	20141
Operating activities (Loss)/profit before taxation		(5 640 2)	1,118.1
Adjustments for:		(5,640.2)	1,110.1
Depreciation and amortisation		2,005.7	2,203.1
Investment revenue		(832.6)	(687.7)
Finance costs		1,387.2	1,439.8
Other gains and (losses) [net]		76.9	279.9
Loss on disposal of property, plant and equipment		4.6	4.4
Write-off of unsuccessful exploration costs		128.7	10.8
Share-based payment charge		28.6	32.9
Impairment of mining reserves and assets		6.694.4	81.6
Other non-cash items		40.8	48.3
Operating cash flows before movements in working capital		3,894.1	4,531.2
Decrease in inventories		40.0	75.0
Increase in receivables		(134.5)	(123.4)
Increase in payables		225.2	678.8
Cash generated from operations		4,024.8	5,161.6
Dividends received		0.3	1.0
Interest income received		587.7	337.8
Interest paid		(1,334.0)	(1,115.3)
Income taxes paid		(601.7)	(861.6)
Dividends paid		(171.3)	(162.5)
Net cash inflow from operating activities		2,505.8	3,361.0
Cash flows from investing activities		,	
Purchases of property, plant and equipment and intangibles		(2,289.1)	(2,185.3)
Proceeds on disposal of property, plant and equipment		25.7	9.3
Sale/(purchase) of liquid investments	26	671.7	(2,857.0)
Sale of financial asset investments		_	18.2
Net cash used in investing activities		(1,591.7)	(5,014.8)
Cash flows from financing activities			
Issue of ordinary shares		0.2	0.0
Dividends paid to non-controlling interests of subsidiaries		(340.4)	(345.9)
Acquisition of additional interests in subsidiaries/share buyback by subsidiary		(819.1)	_
Decrease in short-term borrowings	26	(818.8)	(2,832.7)
Proceeds from long-term borrowings	26	3,748.1	5,429.7
Repayment of long-term borrowings	26	(2,698.0)	(2,299.0)
Net cash used in financing activities		(928.0)	(47.9)
Net decrease in cash and cash equivalents	26	(13.9)	(1,701.7)
Effect of foreign exchange rate changes	26	(1.8)	(129.1)
Cash and cash equivalents at beginning of year		369.4	2,200.2
Cash and cash equivalents at end of year	23	353.7	369.4

<sup>1</sup> Restated refer Note 1.

# Consolidated Statement of Changes in Equity

				Attributable to e	equity holders of the	ne Company					
(US\$ million)	Share capital (Note 35)	Share premium T	reasury shares	Share-based payment reserves	Convertible bond reserveHe	edging reserve	Other reserves <sup>1</sup>	Retained earnings	Total	Non-controlling interests	Total equity
At 1 April 2014	29.8	198.5	(556.9)	46.9	80.1	(50.4)	471.6	3,790.8	4,010.4	13,964.4	17,974.8
Loss for the year	_	_	_	_	_	-	_	(1,798.6)	(1,798.6)	(1,989.1)	(3,787.7)
Other comprehensive loss											
for the year	_	_	_	_	_	(24.3)	(266.9)	_	(291.2)	(336.5)	(627.7)
Total comprehensive loss											
for the year						(24.3)	(266.9)	(1,798.6)	(2,089.8)	(2,325.6)	(4,415.4)
Convertible bond transfer											
(Note 28)	_	_	_	_	(41.7)	_	_	41.7	-	_	_
Transfers <sup>2</sup>	_	_	_	_	_	_	135.2	(135.2)	-	_	_
Dividends paid (Note 14)	_	_	_	_	_	-	_	(171.3)	(171.3)	(340.4)	(511.7)
Additional investment in											
subsidiary/share buyback											
by subsidiary	_	_	_	_	_	_	_	(175.0)	(175.0)	,	(819.1)
Exercise of LTIP awards	0.2	_	_	(48.1)	_	_	_	48.1	0.2	_	0.2
Recognition of share-based											
payment (Note 32)	_		_	28.6	_	_	_	_	28.6	_	28.6
At 31 March 2015	30.0	198.5	(556.9)	27.4	38.4	(74.7)	339.9	1,600.5	1,603.1	10,654.3	12,257.4

				Attributable to e	quity holders of the	ne Company					
(US\$ million)	Share capital (Note 35)	Share premium T	reasury shares	Share-based payment reserves	Convertible bond reserveHe	edging reserve	Other reserves <sup>1</sup>	Retained earnings	Total	Non-controlling interests	Total equity
At 1 April 2013	29.8	196.8	(556.9)	29.0	302.9	(22.2)	789.3	3,632.6	4,401.3	14,467.7	18,869.0
Profit/(loss) for the year	_	_	_	_	_	_	_	(196.0)	(196.0)	1,185.4	989.4
Other comprehensive loss											
for the year	-	_	_	_	_	(28.2)	(549.6)	-	(577.8)	(716.0)	(1,293.8)
Total comprehensive											
income/(loss) for											
the year						(28.2)	(549.6)	(196.0)	(773.8)	469.4	(304.4)
Convertible bond transfers											
(Note 28)	-	_	_	_	(110.7)	_	_	110.7	_	_	_
Repayment of Convertible											
bond	-	_	_	_	(111.6)	_	_	(3.9)	(115.5)	_	(115.5)
Conversion of convertible											
bond	0.0	1.7	_	_	(0.5)	_	_	_	1.2	_	1.2
Transfers <sup>2</sup>	_	_	_	_	_	_	231.9	(231.9)	_	_	_
Dividends paid (Note 14)	-	_	_	_	_	_	_	(162.5)	(162.5)	(345.9)	(508.4)
Change in non-controlling											
interests due to merger											
(Note 36)	_	_	_	_	_	_	_	626.8	626.8	(626.8)	_
Exercise of LTIP awards	0.0	_	-	(15.0)	_	-	-	15.0	0.0	_	0.0
Recognition of share-based											
payment (Note 32)	_	_	_	32.9	_	_	_	_	32.9	_	32.9
At 31 March 2014	29.8	198.5	(556.9)	46.9	80.1	(50.4)	471.6	3,790.8	4,010.4	13,964.4	17,974.8

## 1. OTHER RESERVES COMPRISE

	Currency	Merger	Investment revaluation		
(US\$ million)	translation reserve	reserve <sup>3</sup>	reserve General reserves		Total
At 1 April 2013	(1,064.2)	4.4	1.2	1,847.9	789.3
Exchange differences on translation of foreign operations	(548.5)	_	_	_	(548.5)
Remeasurements	_	_	_	(1.1)	(1.1)
Transfer from retained earnings <sup>2</sup>	_	_	_	231.9	231.9
At 31 March 2014	(1,612.7)	4.4	1.2	2,078.7	471.6
Exchange differences on translation of foreign operations	(263.8)	_	_	_	(263.8)
Revaluation of available-for-sale investments	_	_	1.4	_	1.4
Remeasurements	_	_	_	(4.5)	(4.5)
Transfer from retained earnings <sup>2</sup>	_	_	_	135.2	135.2
At 31 March 2015	(1,876.5)	4.4	2.6	2,209.4	339.9

<sup>2</sup> Under Indian law, a general reserve is created through an annual transfer of net income to general reserves at a specified percentage in accordance with applicable regulations. The purpose of these transfers is to ensure that the total dividend distribution is less than the total distributable results for that year. Transfer to general reserves also includes US\$30 million of debenture redemption reserve and US\$4.5 million of remeasurement reserve.

<sup>3</sup> The merger reserve arose on incorporation of the Company during the year ended 31 March 2004. The investment in Twin Star had a carrying amount value of US\$20.0 million in the accounts of Volcan. As required by the Companies Act 1985, Section 132, upon issue of 156,000,000 ordinary shares to Volcan, Twin Star's issued share capital and share premium account have been eliminated and a merger reserve of US\$4.4 million arose, being the difference between the carrying value of the investment in Twin Star in Volcan's accounts and the nominal value of the shares issued to Volcan.

## Notes to the Financial Statements

## 1. Presentation of financial statements

#### General information

Vedanta Resources plc (the Company) is a company incorporated and domiciled in the United Kingdom and is a London listed diversified global natural resources major. The Group produces aluminium, copper, zinc, lead, silver, iron ore, oil & gas and commercial power. Vedanta has operations in India, Zambia, Namibia, South Africa, Ireland, Liberia, Australia, UAE and Sri Lanka. These financial statements are presented in US dollars being the functional currency of the Company and all values are rounded to one decimal of the nearest million except where otherwise indicated.

#### Compliance with applicable law and IFRS

The financial statements have been prepared in accordance with those parts of the Companies Act 2006 applicable to companies reporting under International Financial Reporting Standards (IFRS), Article 4 of the IAS Regulation and IFRS as adopted by the European Union and related interpretations.

#### Basis of preparation

The financial statements have been prepared on a historical cost basis, except for derivative financial instruments, available-for-sale financial assets, fixed rate bonds and defined benefit pension obligations that have been measured at fair value as per the principles of Fair value measurement under IFRS 13.

#### Restatement

The Group has revised the presentation of forward premium on the forward covers within finance costs rather than other gains and losses, as these more appropriately reflects the substance of the transaction. US\$84.1 million for the comparative year ended 31 March 2014 have been reclassified.

The following Standards have been issued but not yet effective up to the date of authorisation of these financial statements (and in some cases had not yet been adopted by EU):

#### IFRS 9 - Financial Instruments

In July 2014, the International Accounting Standards Board issued the final version of IFRS 9, Financial Instruments. The standard reduces the complexity of the current rules on financial instruments as mandated in IAS 39. IFRS 9 has fewer classification and measurement categories as compared to IAS 39 and has eliminated the categories of held to maturity, available-for-sale and loans and receivables. Further it eliminates the rule based requirement of segregating embedded derivatives and tainting rules pertaining to held to maturity investments. For an investment in an equity instrument which is not held for trading, IFRS 9 permits an irrevocable election, on initial recognition, on an individual share-by-share basis, to present all fair value changes from the investment in other comprehensive income. No amount recognised in other comprehensive income would ever be reclassified to profit or loss. It requires the entity, which chooses to measure a liability at fair value, to present the portion of the fair value change attributable to the entity's own credit risk in the other comprehensive income. IFRS 9 replaces the 'incurred loss model' in IAS 39 with an 'expected credit loss' model. The measurement uses a dual measurement approach, under which the loss allowance is measured as either 12 month expected credit losses or lifetime expected credit losses. The standard also introduces new presentation and disclosure requirements. The effective date for adoption of IFRS 9 is annual periods beginning on or after 1 January 2018, though early adoption is permitted.

#### IFRS 15 - Revenue from Contracts with Customers

IFRS 15 – Revenue from Contracts with Customers outlines a single comprehensive model for entities to use in accounting for revenue arising from contracts with customers. The standard replaces most current revenue recognition guidance, including industry-specific guidance. The core principle of the new standard is for companies to recognise revenue to depict the transfer of goods or services to customers in amounts that reflect the consideration to which the Company expects to be entitled in exchange for those goods or services. The new standard also will result in enhanced disclosures about revenue, provide guidance for transactions that were not previously addressed comprehensively including service revenues and contract modifications and improve guidance for multiple-element arrangements. The new Standard will come into effect on 1 January 2017 with early application permitted.

Following other standard, improvements and amendments to the standards have been issued up to the date of authorisation of these financial statements.

- a) IFRS 14 Regulatory Deferral Accounts
- b) Amendments to IAS 1: Disclosure Initiative
- c) Annual Improvements to IFRSs: 2012-2014 Cycle
- d) Amendments to IAS 27: Equity method in separate financial statements
- e) Amendments to IAS 16 and IAS 41: Bearer plants
- f) Amendments to IAS 16 and IAS 38: Clarification of Acceptable Methods of Depreciation and Amortisation
- g) Amendments to IFRS 11: Accounting for Acquisitions of Interests in Joint Operations
- h) Amendments to IAS 19: Defined benefit plans: Employee Contributions

The Group is evaluating the requirements of these standards, improvements and amendments and has not yet determined the impact on the consolidated financial statements.

#### Adoption of new and revised standards

The Group has adopted with effect from 1 April 2014, the following new and revised standards and interpretations. Their adoption has not had any significant impact on the amounts reported in the financial statements.

Accounting pronouncements that became effective in the current year:

#### Amendments to IAS 36 Impairment of Assets: Recoverable amount disclosure for Non-Financial Assets

The amendment requires the disclosure of the recoverable amount of an asset (or CGU) only in periods in which impairment is recorded or reversed in respect of that asset (or CGU). The amendment also expands and requires the disclosure when an asset's (CGUs) recoverable amount is determined on the basis of fair value less cost of disposal.

Amendments to IAS 39 Financial Instruments: Recognition and measurement: Novation of Derivatives and Continuation of Hedge accounting
The amendment states that the novation of hedging instrument should not be considered an expiration or termination giving rise to discontinuation of hedge
accounting when a hedging derivative is novated. It provides relief from discontinuing an existing hedging relationship when a novation that is not contemplated in
the original hedging documentation meets specific criteria.

Amendments to IAS 32 Financial Instruments: Offsetting Financial Assets and Financial Liabilities

The amendments to IAS 32 (amended) – offsetting financial assets and liabilities do not change the current offsetting model in IAS 32. The current offsetting model requires an entity to offset a financial asset and financial liability in the statement of financial position only when the entity currently has a legally enforceable right of set-off and intends either to settle the asset and liability on a net basis or to realise the asset and settle the liability simultaneously. Through these amendments, IASB has clarified the meaning of 'currently have a legally enforceable right to set-off' and 'simultaneous realisation and settlement'.

The amendments clarify that to result in offset of a financial asset and financial liability, a right to set off must be available today rather than being contingent on a future event and must be exercisable by any of the counterparties. It must be legally enforceable in the normal course of business.

#### Amendments to IFRS 10, IFRS 12 and IAS 27 (October 2012) Investment entities

The amendments define an investment entity and introduce an exception to consolidating the investment entities. These amendments require an investment entity to measure those subsidiaries at fair value through profit or loss in accordance with IFRS 9 Financial Instruments in its consolidated and separate financial statements. The amendments also introduce new disclosure requirements for investment entities in IFRS 12 and IAS 27. The amendments also introduce new disclosure requirements related to investment entities and provide scope exemption for investment entities from IFRS 3 Business Combinations.

## The Group has early adopted IFRIC 21 Levies which has been endorsed by the EU but is effective for the annual periods beginning on or after 17 June 2014

IFRIC 21 provides guidance for recognition of a liability for a levy imposed by a government, both for levies that are accounted for in accordance with IAS 37 Provisions, Contingent Liabilities and Contingent Assets and those where the timing and amount of the levy is certain. This interpretation clarifies that the obligating event that gives rise to a liability to pay a government levy is the activity that triggers the payment of levy as set out in the relevant legislation. An entity does not have constructive obligation to pay a levy that will be triggered by operating in a future period. However, it does not include income taxes, fines and other penalties, liabilities arising from emissions trading schemes and outflows within the scope of other Standards.

This did not have any significant impact on the amounts reported in the financial statements.

The Group has not early adopted any other amendments, standards or interpretations that have been issued but are not yet effective.

#### Going concern

The financial statements have been prepared in accordance with the going concern basis of accounting. The use of this basis of accounting takes into consideration the Group's current and forecast financing position, additional details of which are provided in the Going Concern section of the strategic report.

#### Parent Company financial statements

The financial statements of the parent Company, Vedanta Resources plc, incorporated in the United Kingdom, have been prepared in accordance with UK GAAP and UK company law. The Company Balance Sheet is presented in Note 47.

# 2(a) Accounting policies (i) Basis of consolidation

#### Subsidiaries.

The consolidated financial information incorporates the results of the Company and all its subsidiaries (the Group), being the companies that it controls. Control is evidenced where the Company has power over the investee, is exposed, or has rights, to variable returns from its involvement with the investee and has the ability to affect those returns through its power over the investee. Power is demonstrated through existing rights that give the ability to direct relevant activities, which significantly affect the entity returns.

The financial statements of subsidiaries are prepared for the same reporting year as the parent Company. Where necessary, adjustments are made to the financial statements of subsidiaries to bring the accounting policies used into line with accounting policies used by the Group.

For non-wholly owned subsidiaries, a share of the profit for the financial year and net assets is attributed to the non-controlling interests as shown in the consolidated income statement, consolidated statement of comprehensive income and consolidated balance sheet.

For acquisitions of additional interests in subsidiaries, where there is no change in control, the Group recognises a reduction to the non-controlling interest of the respective subsidiary with the difference between this figure and the cash paid, inclusive of transaction fees, being recognised in equity. In addition, upon dilution of controlling interests the difference between the cash received from sale or listing of the subsidiary shares and the increase to non-controlling interest is also recognised in equity. The results of subsidiaries acquired or disposed of during the year are included in the consolidated income statement from the effective date of acquisition or up to the effective date of disposal, as appropriate.

All intercompany balances and transactions, including unrealised profits arising from intra-Group transactions, have been eliminated in full. Unrealised losses are eliminated unless costs cannot be recovered.

#### Joint arrangements

A Joint arrangement is an arrangement of which two or more parties have joint control. Joint control is considered when there is contractually agreed sharing of control of an arrangement, which exists only when decisions about the relevant activities require the unanimous consent of the parties sharing control.

The Group has joint operations within its Oil & Gas segment, the Group participates in several unincorporated joint operations which involve the joint control of assets used in oil & gas exploration and producing activities. The Group accounts for its share of assets, liabilities, income and expenditure of joint ventures in which the Group holds an interest, classified in the appropriate balance sheet and income statement headings. In addition, where the Group acts as operator to the joint venture, the gross liabilities and receivables (including amounts due to or from non-operating partners) of the joint operations are included in the Group balance sheet.

#### (ii) Revenue recognition

Revenue is measured at the fair value of consideration received or receivable and represents the net invoice value of goods and services provided to third parties after deducting discounts, volume rebates, outgoing sales taxes and duties, and are recognised when all significant risks and rewards of ownership of the asset sold are transferred to the customer or services have been provided. This is usually when the title passes to the customer as per the contract.

Certain of the Group's sales contracts provide for provisional pricing based on the price on the London Metal Exchange Limited (LME), as specified in the contract, when shipped. Final settlement of the prices is based on the applicable price for a specified future period. The Company's provisionally priced sales are marked to market using the relevant forward prices for the future period specified in the contract with a corresponding adjustment to revenue.

Revenue from oil, gas and condensate sales represent the Group's share of oil, gas and condensate production, recognised on a direct entitlement basis, and tariff income received for third party use of operating facilities and pipelines in accordance with agreements.

- Revenue from holding certificate contracts is recognised when goods have been delivered to a distribution warehouse or has been identified and kept separately, have been inspected by a nominee of the buyer and cash has been received. Under these arrangements, revenue is recognised once legal title has passed and all significant risks and rewards of ownership of the asset sold are transferred to the customer.
- Revenue from the sale of power is recognised when the electricity is supplied and measured based on contractually agreed tariff rates as approved by the
  electricity regulatory authorities.
- Revenues from sale of material by-products are recognised when the significant risks and rewards of ownership of the goods sold are transferred to the customer.
- Dividend income is recognised when the shareholders' right to receive payment is established.
- Interest income is recognised on an accrual basis in the income statement.

#### (iii) Special items

Special items are those items that management considers, by virtue of their size or incidence (including but not limited to impairment charges and acquisition and restructuring related costs), should be disclosed separately to ensure that the financial information allows an understanding of the underlying performance of the business in the year, so as to facilitate comparison with prior periods. Also tax charges related to Special items and certain one-time tax effects are considered Special. Such items are material by nature or amount to the year's result and require separate disclosure in accordance with IAS 1 paragraph 97. The determination as to which items should be disclosed separately requires a degree of judgement.

#### (iv) Business combinations

The results of subsidiaries acquired or sold during the year are consolidated for the periods from, or to, the date on which control passed. Acquisitions are accounted for under the acquisition method. The acquirer's identifiable assets, liabilities and contingent liabilities that meet the conditions for recognition are recognised at their fair value at the acquisition date, except certain assets and liabilities required to be measured as per the applicable standards.

The identifiable assets, liabilities and contingent liabilities of a subsidiary, a joint arrangement or an associate, which can be measured reliably, are recorded at their provisional fair values at the date of acquisition. The difference between the fair value of the consideration transferred (including contingent consideration and previously held non-controlling interests) and the Group's share of the fair value of the identifiable net assets on acquisition is recognised as Goodwill. Goodwill arising on acquisitions is reviewed for impairment at least annually.

Where the fair values of the identifiable assets and liabilities exceed the cost of acquisition, the surplus is credited to the income statement in the period of acquisition.

Where it is not possible to complete the determination of fair values by the date on which the first post-acquisition financial statements are approved, a provisional assessment of fair values is made and any adjustments required to those provisional fair values, and the corresponding adjustments to purchased goodwill, are finalised within 12 months of the acquisition date.

Any non-controlling interest in an acquiree is measured at fair value or as the non-controlling interest's proportionate share of the acquiree's identifiable net assets, excluding goodwill. This accounting choice is made on a transaction-by-transaction basis.

Acquisition expenses are charged to the income statement.

If the Group acquires a group of assets or equity in a company that does not constitute a business combination in accordance with IFRS 3 Business Combinations, the cost of the acquired group of assets or equity is allocated to the individual identifiable assets acquired based on their relative fair value.

## (v) Intangible assets

Intangible assets are measured at cost less accumulated amortisation and accumulated impairment losses, if any. The Group determines the amortisation period as the period over which the future economic benefits will flow to the Group after taking into account all relevant facts and circumstances. Amortisation method, residual values and estimated useful life of intangible assets are reviewed annually or more frequently if events or changes in circumstances indicate a potential impairment. The Group does not have any indefinite life intangible assets.

Intangible assets arising out of service concession arrangements are accounted for as intangible assets where the Company has a contractual right to charge users of services when the projects are completed and is measured at the cost of such construction services completed. Such assets are amortised on a straight-line basis over the balance of license period, usually between three to 30 years.

#### (vi) Property, plant and equipment

#### Relating to mineral assets - mining properties and leases

The costs of mining properties and leases, which include the costs of acquiring and developing mining properties and mineral rights, are capitalised as property, plant and equipment under the heading 'Mining properties and leases' in the year in which they are incurred.

When a decision is taken that a mining property is viable for commercial production (i.e. when the Group determines that the mining property will provide sufficient and sustainable returns relative to the risk and decides to proceed with the development), all further pre-production primary development expenditure other than land, buildings, plant and equipment is capitalised as part of the cost of the mining property until the mining property is capable of commercial production. From that point, capitalised mining properties and lease costs are amortised on a unit-of-production basis over the total estimated remaining commercial reserves of each property or group of properties.

Exploration and evaluation assets acquired are recognised as assets at their cost of acquisition subject to meeting the commercial production criteria mentioned above and are subject to an impairment review on an annual basis.

Exploration and evaluation expenditure incurred after obtaining the right to mine or the legal right to explore, is capitalised as property, plant and equipment and stated at cost less any impairment. Exploration and evaluation assets are transferred to the appropriate category of property, plant and equipment when the technical feasibility and commercial viability has been determined. Exploration and evaluation assets are assessed for impairment and impairment loss, if any, is recognised prior to reclassification. Exploration and evaluation expenditure incurred prior to obtaining the mining right or the legal right to explore are expensed as incurred.

Exploration expenditure includes all direct and allocated indirect expenditure associated with finding specific mineral resources which includes depreciation and applicable operating costs of related support equipment and facilities and other costs of exploration activities:

- a. Acquisition costs costs associated with acquisition of licences and rights to explore, including related professional fees.
- b. General exploration costs costs of surveys and studies, rights of access to properties to conduct those studies (e.g. costs incurred for environment clearance, defence clearance, etc.), and salaries and other expenses of geologists, geophysical crews and other personnel conducting those studies.
- c. Costs of exploratory drilling and equipping exploratory and appraisal wells.

The stripping cost incurred during the production phase of a surface mine is deferred to the extent the current period stripping cost exceeds the average period stripping cost over the life of the mine and recognised as an asset if such cost provides a benefit in terms of improved access to ore in future periods and certain criteria are met. Deferred stripping costs are included in mining properties within property, plant and equipment and disclosed as a part of mining properties. After initial recognition, the stripping activity asset is depreciated on a unit of production method over the expected useful life of the identified component of the ore body.

In circumstances where a mining property is abandoned, the cumulative capitalised costs relating to the property are written off in the period in which it occurs i.e. when the Group determines that the mining property will not provide sufficient and sustainable returns relative to the risks and the Group decides not to proceed with the mine development.

Commercial reserves are proved and probable reserves as defined by the 'JORC' Code and 'SAMREC' Code. Changes in the commercial reserves affecting unit of production calculations are dealt with prospectively over the revised remaining reserves.

### Relating to oil & gas assets - Exploration & evaluation assets and developing/producing assets

For oil & gas assets a successful efforts based accounting policy is followed. Costs incurred prior to obtaining the legal rights to explore an area are expensed immediately to the income statement. Expenditure incurred on the acquisition of a licence interest is initially capitalised on a licence-by-licence basis. Costs are held, are not amortised or depreciated, within exploration and evaluation assets until such time as the exploration phase on the licence area is complete or commercial reserves have been discovered.

Exploration expenditure incurred in the process of determining oil & gas exploration targets is capitalised initially within property, plant and equipment – exploration and evaluation assets and subsequently allocated to drilling activities (under oil & gas properties and/or exploration and evaluation assets as appropriate). Exploration drilling costs are initially capitalised on a well-by-well basis until the success or otherwise of the well has been established. The success or failure of each exploration effort is judged on a well-by-well basis. Drilling costs are written off on completion of a well unless the results indicate that hydrocarbon reserves exist and there is a reasonable prospect that these reserves are commercial.

Following appraisal of successful exploration wells, if commercial reserves are established and technical feasibility for extraction demonstrated, then the related capitalised exploration costs are transferred into a single field cost centre within property, plant and equipment – development/producing assets (oil & gas properties) after testing for impairment. Where results of exploration drilling indicate the presence of hydrocarbons which are ultimately not considered commercially viable, all related costs are written off to the income statement.

All costs incurred after the technical feasibility and commercial viability of producing hydrocarbons has been demonstrated are capitalised within property, plant and equipment – development/producing assets (oil & gas properties) on a field-by-field basis. Subsequent expenditure is capitalised only where it either enhances the economic benefits of the development/producing asset or replaces part of the existing development/producing asset. Any remaining costs associated with the part replaced are expensed.

Net proceeds from any disposal of an exploration asset are initially credited against the previously capitalised costs. Any surplus proceeds are credited to the income statement. Net proceeds from any disposal of development/producing assets are credited against the previously capitalised cost. A gain or loss on disposal of a development/producing asset is recognised in the income statement to the extent that the net proceeds exceed or are less than the appropriate portion of the net capitalised costs of the asset.

### Other property, plant and equipment

The initial cost of property, plant and equipment comprises its purchase price, including import duties and non-refundable purchase taxes, and any directly attributable costs of bringing an asset to working condition and location for its intended use, including relevant borrowing costs and any expected costs of decommissioning. Expenditure incurred after the property, plant and equipment have been put into operation, such as repairs and maintenance, are charged to the income statement in the period in which the costs are incurred. Major shut-down and overhaul expenditure is capitalised as the activities undertaken improve the economic benefits expected to arise from the asset.

# (vii) Assets in the course of construction

Assets in the course of construction are capitalised in the assets under construction account. At the point when an asset is operating at management's intended use, the cost of construction is transferred to the appropriate category of property, plant and equipment and depreciation commences (see below). Costs associated with the commissioning of an asset and any obligatory decommissioning costs are capitalised where the asset is available for use but incapable of operating at normal levels until a period of commissioning has been completed. Revenue generated from production during the trial period is capitalised. Borrowing costs and certain foreign exchange gains or losses are in certain circumstances capitalised in the cost of the asset under construction. This policy is set out under 'Borrowing Costs'.

### (viii) Depreciation and amortisation

### Relating to mining properties

Mining properties and other assets in the course of development or construction, freehold land and goodwill are not depreciated or amortised. Capitalised mining properties and lease costs are amortised once commercial production commences, as described in 'Property, plant and equipment – mining properties and leases'. Leasehold land and buildings are depreciated over the period of the lease or, if shorter, their useful economic life.

#### Relating to oil & gas assets

All expenditure carried within each field is amortised from the commencement of production on a unit of production basis, which is the ratio of oil & gas production in the period to the estimated quantities of commercial reserves at the end of the period plus the production in the period, generally on a field-by-field basis or group of fields which are reliant on common infrastructure.

Commercial reserves are proven and probable oil & gas reserves, which are defined as the estimated quantities of crude oil, natural gas and natural gas liquids which geological, geophysical and engineering data demonstrate with a specified degree of certainty to be recoverable in future years from known reservoirs and which are considered commercially producible. There should be a 50% statistical probability that the actual quantity of recoverable reserves will be more than the amount estimated as proven and probable reserves and a 50% statistical probability that it will be less.

Costs used in the unit of production calculation comprise the net book value of capitalised costs plus the estimated future field development costs required to access commercial reserves. Changes in the estimates of commercial reserves or future field development costs are dealt with prospectively.

#### Others

Other buildings, plant and equipment, office equipment and fixtures, and motor vehicles are stated at cost less accumulated depreciation and any provision for impairment. Depreciation commences when the assets are ready for their intended use. Depreciation is provided at rates calculated to write off the cost, less estimated residual value, of each asset on a straight-line basis over its expected useful life, as follows:

Buildings operations and administration	30-60 years
Plant and machinery	
<ul> <li>Continuous process plant</li> </ul>	15 years
<ul> <li>Other than Continuous process plant</li> </ul>	40 years
<ul> <li>Used in manufacture of non-ferrous metals</li> </ul>	25 years
Office equipment and fixtures	5-10 years
Motor vehicles	8-10 years

The Group reviews the residual value and useful life of an asset annually and, if expectations differ from previous estimates, the change is accounted for as a change in accounting estimate.

Major overhaul costs are depreciated over the estimated life of the economic benefit to be derived from the overhaul. The carrying amount of the remaining previous overhaul cost is charged to the income statement if the next overhaul is undertaken earlier than the previously estimated life of the economic benefit.

Property, plant and equipment held for sale or which is part of a disposal group held for sale is not depreciated. Property, plant and equipment held for sale is carried at the lower of its carrying value and fair value less disposal cost and is presented separately on the face of the balance sheet.

During the year ended 31 March 2015, in line with its accounting policy, the Group has carried out the review of the useful life of its assets. Considering the physical condition of the assets and benchmarking analysis, the Group has revised the useful life. The carrying value of the assets has been depreciated over the revised remaining useful life effective 1 October 2014.

As a result the net depreciation charge for the year is lower by US\$67.4 million and profit after tax is higher by US\$44.5 million (net of deferred tax impact of US\$22.9 million). The changes made to the useful economic lives is expected to have an impact on the depreciation charge going forward, although the quantum per asset class will vary depending on whether the useful life has increased or decreased.

# (ix) Impairment

# Financial assets

A financial asset is assessed at each reporting date to determine whether there is any objective evidence that it is impaired. A financial asset is considered to be impaired if objective evidence indicates that one or more events have had a negative effect on the estimated future cash flows of that asset.

An impairment loss in respect of a financial asset measured at amortised cost is calculated as the difference between its carrying amount, and the present value of the estimated future cash flows discounted at the original effective interest rate. An impairment loss in respect of an available-for-sale financial asset is calculated by reference to its fair value.

Significant financial assets are tested for impairment on an individual basis. The remaining financial assets are assessed collectively in groups that share similar credit risk characteristics. All impairment losses are recognised in the consolidated statements of income. Any cumulative loss in respect of an available-for-sale financial asset recognised previously in the consolidated statements of comprehensive income is transferred to the consolidated statements of income on recognition of impairment. An impairment loss is reversed if the reversal can be related objectively to an event occurring after the impairment loss was recognised. For financial assets measured at amortised cost and available-for-sale financial assets that are debt securities, the reversal is recognised in the consolidated statements of income. For available-for-sale financial assets that are equity securities, the change in fair value is recognised directly in the consolidated statements of comprehensive income.

The allowance accounts in respect of trade and other receivables are used to record impairment losses unless the Company is satisfied that no recovery of the amount owing is possible; at that point the amounts are considered irrecoverable and are written off against the financial asset directly.

#### Non-financial assets

Impairment charges and reversals are assessed at the level of cash-generating units. A cash-generating unit (CGU) is the smallest identifiable group of assets that generate cash inflows that are largely independent of the cash inflows from other assets or group of assets.

Formal impairment tests are carried out annually for goodwill. In addition, formal impairment tests for all assets are performed when there is an indication of impairment. The Group conducts an internal review of asset values annually, which is used as a source of information to assess for any indications of impairment or reversal of previously recognised impairment losses. External factors, such as changes in expected future prices, costs and other market factors are also monitored to assess for indications of impairment or reversal of previously recognised impairment losses.

If any such indication exists then an impairment review is undertaken, the recoverable amount is calculated, as the higher of fair value less costs of disposal and the asset's value in use.

Fair value less costs of disposal is the price that would be received to sell the asset in an orderly transaction between market participants and does not reflect the effects of factors that may be specific to the entity and not applicable to entities in general. Fair value for mineral and oil & gas assets is generally determined as the present value of the estimated future cash flows expected to arise from the continued use of the asset, including any expansion prospects, and its eventual disposal, using assumptions that an independent market participant may take into account. These cash flows are discounted at an appropriate post tax discount rate to arrive at the net present value.

Value in use is determined as the present value of the estimated future cash flows expected to arise from the continued use of the asset in its present form and its eventual disposal. The cash flows are discounted using a pre-tax discount rate that reflects current market assessments of the time value of money and the risks specific to the asset for which estimates of future cash flows have not been adjusted. Value in use is determined by applying assumptions specific to the Group's continued use and cannot take into account future development. These assumptions are different to those used in calculating fair value and consequently the value in use calculation is likely to give a different result to a fair value calculation.

The carrying amount of the CGU is determined on a basis consistent with the way the recoverable amount of the CGU is determined. The carrying amount includes the deferred tax liability recognised in the fair value of the assets acquired in a business combination.

If the recoverable amount of an asset or CGU is estimated to be less than its carrying amount, the carrying amount of the asset or CGU is reduced to its recoverable amount. An impairment loss is recognised in the income statement.

Any reversal of the previously recognised impairment loss is limited to the extent that the asset's carrying amount does not exceed the carrying amount that would have been determined if no impairment loss had previously been recognised.

Exploration and evaluation assets:

In assessing whether there is any indication that an exploration and evaluation asset may be impaired, the Company considers, as a minimum, the following indications:

- the period for which the entity has the right to explore in the specific area has expired during the period or will expire in the near future, and is not expected to be renewed;
- substantive expenditure on further exploration for and evaluation of mineral resources in the specific area is neither budgeted nor planned;
- exploration for and evaluation of mineral resources in the specific area have not led to the discovery of commercially viable quantities of mineral resources and the entity has decided to discontinue such activities in the specific area;
- sufficient data exist to indicate that, although a development in the specific area is likely to proceed, the carrying amount of the exploration and evaluation asset is unlikely to be recovered in full from successful development or by sale; and
- · reserve information prepared annually by external experts.

When a potential impairment is identified, an assessment is performed for each area of interest in conjunction with the Group of operating assets (representing a cash-generating unit) to which the exploration and evaluation assets is attributed. Exploration areas in which reserves have been discovered but require major capital expenditure before production can begin, are continually evaluated to ensure that commercial quantities of reserves exist or to ensure that additional exploration work is under way or planned. To the extent that capitalised expenditure is no longer expected to be recovered, it is charged to the income statement.

# (x) Non-current assets held for sale and discontinued operations

Non-current assets are classified as held for sale if their carrying amount will be recovered principally through a sale transaction rather than through continuing use. This condition is regarded as met only when a sale is highly probable from the date of classification, management are committed to the sale and the asset is available for immediate sale in its present condition. Non-current assets are classified as held for sale from the date these conditions are met and are measured at the lower of carrying amount and fair value (less costs to sell). Any resulting impairment loss is recognised in the income statement as a special item. On classification as held for sale the assets are no longer depreciated.

### (xi) Government grants

Government grants relating to property, plant and equipment are treated as deferred income and released to the income statement over the expected useful lives of the assets concerned. Other grants are credited to the income statement as and when the related expenditure is incurred.

### (xii) Inventories

Inventories and work-in-progress are stated at the lower of cost and net realisable value.

Cost is determined on the following basis:

- Purchased copper concentrate is recorded at cost on a first-in, first-out (FIFO) basis; all other materials including stores and spares are valued on weighted
  average basis; except at Cairn where stores and spares are valued on a FIFO basis.
- Finished products are valued at raw material cost plus costs of conversion, comprising labour costs and an attributable proportion of manufacturing overheads based on normal levels of activity; and by-products and scrap are valued at net realisable value.

Net realisable value is determined based on estimated selling price, less further costs expected to be incurred to completion and disposal.

#### (xiii) Taxation

Tax expense represents the sum of tax currently payable and deferred tax.

Current tax is provided at amounts expected to be paid (or recovered) using the tax rates and laws that have been enacted or substantively enacted by the balance sheet date.

Deferred tax is provided, using the balance sheet method, on all temporary differences at the balance sheet date between the tax bases of assets and liabilities and their carrying amounts for financial reporting purposes. Exceptions to this principle are:

- Tax payable on the future remittance of the past earnings of subsidiaries where the timing of the reversal of the temporary differences can be controlled and it is probable that the temporary differences will not reverse in the foreseeable future;
- Deferred income tax is not recognised on the impairment of goodwill which is not deductible for tax purposes or on the initial recognition of an asset or liability in a transaction that is not a business combination, which at the time of the transaction, affects neither the accounting profit nor taxable profit or loss; and
- Deferred tax assets are recognised only to the extent that it is more likely than not that they will be recovered.

Deferred tax assets and liabilities are measured at the tax rates that are expected to apply to the year when the asset is realised or the liability is settled, based on tax rates (and tax laws) that have been enacted or substantively enacted at the balance sheet date. Tax relating to items recognised directly in equity is recognised in equity and not in the income statement.

The carrying amount of deferred tax assets is reviewed at each balance sheet date and is adjusted to the extent that it is no longer probable that sufficient taxable profit will be available to allow all or part of the asset to be recovered.

Deferred tax assets and deferred tax liabilities are offset, if a legally enforceable right exists to set off current income tax assets against current income tax liabilities and the deferred taxes relate to the same taxable entity and the same taxation authority.

Deferred tax is provided on temporary differences arising on acquisitions that are categorised as Business Combinations. Deferred tax is recognised at acquisition as part of the assessment of the fair value of assets and liabilities acquired. Any deferred tax is charged or credited in the income statement as the underlying temporary difference is reversed.

# (xiv) Retirement benefit schemes

The Group operates or participates in a number of defined benefits and contribution schemes, the assets of which are (where funded) held in separately administered funds.

For defined benefit schemes the cost of providing benefits under the plans is determined each year separately for each plan using the projected unit credit method by independent qualified actuaries.

Actuarial gains and losses arising in the year are recognised in Other Comprehensive Income and are not recycled to the income statement.

Net interest is calculated by applying a discount rate to the net defined benefit liability or asset. Defined benefit costs are split into current service cost, past service cost, net interest expense or income and remeasurement.

Current service cost and past service cost is recognised within cost of sales and administrative expenses. Net interest expense or income is recognised within finance costs.

For defined contribution schemes, the amount charged to the income statement in respect of pension costs and other post-retirement benefits is the contributions payable in the year.

### (xv) Share-based payments

Certain employees (including Executive Directors) of the Group receive part of their remuneration in the form of share-based payment transactions, whereby employees render services in exchange for shares or rights over shares ('equity-settled transactions').

The cost of equity-settled transactions with employees is measured at fair value at the date at which they are granted. The fair value of share awards with market-related vesting conditions are determined with the assistance of an external valuer and the fair value at the grant date is expensed on a straight-line basis over the vesting period based on the Group's estimate of shares that will eventually vest. The estimate of the number of awards likely to vest is reviewed at each balance sheet date up to the vesting date at which point the estimate is adjusted to reflect the current expectations.

### (xvi) Provisions for liabilities and charges

Provisions are recognised when the Group has a present obligation (legal or constructive), as a result of past events, and it is probable that an outflow of resources, that can be reliably estimated, will be required to settle such an obligation. If the effect of the time value of money is material, provisions are determined by discounting the expected future cash flows to net present value using an appropriate pre-tax discount rate that reflects current market assessments of the time value of money and, where appropriate, the risks specific to the liability. Unwinding of the discount is recognised in the income statement as a finance cost. Provisions are reviewed at each balance sheet date and are adjusted to reflect the current best estimate.

#### (xvii) Restoration, rehabilitation and environmental costs

An obligation to incur restoration, rehabilitation and environmental costs arises when environmental disturbance is caused by the development or ongoing production of a mine or oil field. Costs arising from the decommissioning of plant and other site preparation work are provided for based on their discounted net present value, with a corresponding amount being capitalised at the start of each project. The amount provided for is recognised, as soon as the obligation to incur such costs arises. These costs are charged to the income statement over the life of the operation through the depreciation of the asset and the unwinding of the discount on the provision. The cost estimates are reviewed periodically and are adjusted to reflect known developments which may have an impact on the cost estimates or life of operations. The cost of the related asset is adjusted for changes in the provision due to factors such as updated cost estimates, new disturbance and revisions to discount rates. The adjusted cost of the asset is depreciated prospectively over the lives of the assets to which they relate. The unwinding of the discount is shown as a finance cost in the income statement.

Costs for restoration of subsequent site damage which is caused on an ongoing basis during production are provided for at their net present values and charged to the income statement as extraction progresses. Where the costs of site restoration are not anticipated to be significant, they are expensed as incurred.

### (xviii) Operating leases

Rentals under operating leases are charged on a straight-line basis over the lease term, even if the payments are not made on such a basis.

### (xix) Finance leases

Assets held under finance leases are recognised as assets of the Group at their fair value at the inception of the lease or, if lower, at the present value of the minimum lease payments. The corresponding liability to the lessor is included in the balance sheet as a finance lease obligation. Lease payments are apportioned between finance charges and reduction of the lease obligation so as to achieve a constant rate of interest on the remaining balance of the liability. Finance charges are charged to the Income Statement, unless they are directly attributable to qualifying assets, in which case they are capitalised in accordance with the Group's policy on borrowing costs.

The Group has reviewed the terms and conditions of the lease arrangements and determined that all risks and rewards of ownership lie with the Group and has therefore accounted for the contracts as finance leases.

# (xx) Foreign currency translation

The functional currency for each entity in the Group is determined as the currency of the primary economic environment in which it operates. For all principal operating subsidiaries, the functional currency is the local currency of the country in which it operates with the exception of KCM and Cairn which has a US dollar functional currency as that is the currency of primary economic environment in which it operates. In the financial statements of individual Group companies, transactions in currencies other than the functional currency are translated into the functional currency at the exchange rates ruling at the date of transaction. Monetary assets and liabilities denominated in other currencies are translated into the functional currency at exchange rates prevailing on the balance sheet date.

All exchange differences are included in the income statement, except, where the monetary item is designated as an effective hedging instrument of the currency risk of designated forecast sales, where exchange differences are recognised in equity and exchange differences on foreign currency borrowings relating to asset under construction, and for future productive use, which are included in the cost of those assets when they are regarded as an adjustment to interest costs on those foreign currency borrowings.

For the purposes of consolidation, the income statement items of those entities for which the US dollar is not the functional currency are translated into US dollars at the average rates of exchange during the period. The related balance sheets are translated at the rates ruling at the balance sheet date. Exchange differences arising on translation of the opening net assets and results of such operations, and on foreign currency borrowings to the extent that they hedge the Group's investment in such operations, are reported in other comprehensive income and accumulated in equity.

On disposal of entities with a different functional currency to the Company's functional currency, the deferred cumulative exchange differences recognised in equity relating to that particular operation is reclassified to the income statement.

### (xxi) Financial asset investments

Financial asset investments are classified as available for sale under IAS 39 and are initially recorded at cost and then remeasured at subsequent reporting dates to fair value. Unrealised gains and losses on financial asset investments are recognised directly in equity. On disposal or impairment of the investments, the gains and losses in equity are recycled to the income statement.

Investments in unquoted equity instruments that do not have a market price and whose fair value cannot be reliably measured are measured at cost.

Investments in equity instruments are recorded in non-current assets unless they are expected to be sold within one year.

### (xxii) Liquid investments

Liquid investments represent short-term investments that do not meet the definition of cash and cash equivalents for one or more of the following reasons:

- They have a maturity profile greater than 90 days.
- They may be subject to a greater risk of changes in value than cash.
- They are held for investment purposes.

The value of trading investments incorporates any dividend and interest earned on the held for trading investments.

# (xxiii) Cash and cash equivalents

Cash and cash equivalents in the balance sheet comprise cash at bank and in hand, short-term deposits with banks and short-term highly liquid investments that are readily convertible into cash which are subject to insignificant risk of changes in value and are held for the purpose of meeting short-term cash commitments.

### (xxiv) Trade receivables

Trade receivables are stated at their nominal value as reduced by appropriate allowances for estimated irrecoverable amounts. An allowance for impairment of trade receivables is made where there is an event, which based on previous experience, is an indication of a reduction in the recoverability of the carrying value of the trade receivables.

### (xxv) Trade payables

Trade payables are stated at their nominal value.

### (xxvi) Equity instruments

Equity instruments issued by the Company are recorded at the proceeds received, net of direct issue costs.

#### (xxvii) Borrowings

Interest bearing loans and overdrafts are recorded at the proceeds received. Finance charges, including premiums payable on settlement or redemption and direct issue costs, are accounted for on an accruals basis and charged to the income statement using the effective interest method. They are added to the carrying amount of the instrument to the extent that they are not settled in the period in which they arise.

### (xxviii) Convertible bonds

Convertible bonds denominated in the functional currency of the issuing entity are accounted for as compound instruments. The equity components and the liability components are separated out on the date of the issue. The equity component is recognised in a separate reserve and is not subsequently remeasured. The liability component is held at amortised cost. The interest expense on the liability component is calculated by applying the effective interest rate, being the prevailing market interest rate at the date of issuance for similar non-convertible debt. The difference between this amount and interest paid is added to the carrying amount of the liability component.

Convertible bonds not denominated in the functional currency of the issuing entity or where a cash conversion option exists, are split into two components: a debt component and a component representing the embedded derivative in the convertible bond. The debt component represents a liability for future coupon payments and the redemption of the principal amount. The embedded derivative, a financial liability, represents the value of the option that bondholders have to convert into ordinary shares. At inception the embedded derivative is recorded at fair value and the remaining balance, after deducting a share of issue costs, is recorded as the debt component. Subsequently, the debt component is measured at amortised cost and the embedded derivative is measured at fair value at each balance sheet date with the change in the fair value recognised in the income statement. The embedded derivative and the debt component are disclosed together and the current/non-current classification follows the classification of the debt component which is the host contract.

### (xxix) Borrowing costs

Borrowing costs directly relating to the acquisition, construction or production of a qualifying capital project under construction are capitalised and added to the project cost during construction until such time that the assets are substantially ready for their intended use in accordance with the Group policy which is when they are capable of commercial production. Where funds are borrowed specifically to finance a project, the amount capitalised represents the actual borrowing costs incurred. Where surplus funds are available out of money borrowed specifically to finance a project, the income generated from such short-term investments is also capitalised to reduce the total capitalised borrowing cost.

All other borrowing costs are recognised in the income statement in the period in which they are incurred.

Capitalisation of interest on borrowings related to construction or development projects is ceased when substantially all the activities that are necessary to make the assets ready for their intended use are complete or when delays occur outside of the normal course of business.

### (xxx) Available for sale financial assets

Listed equity shares and debt instruments held by the Group that are traded in an active market are classified as being available for sale (AFS) financial assets and are stated at fair value. Unrealised gains and losses on financial asset investments are recognised directly in equity. On disposal or impairment of the investments, the gains and losses in equity are recycled to the income statement. Dividends received from investees accounted for as equity instruments are recognised in the income statement when the right to receive the payment is established.

# (xxxi) Financial instruments fair valued through profit and loss

# Held for trading financial assets

Financial assets are classified as held for trading if they have been acquired principally for the purpose of selling in the near term. The change in fair value of trading investments incorporates any dividend and interest earned on the held for trading investments and is accounted for in the income statement.

### Derivative financial instruments

In order to hedge its exposure to foreign exchange, interest rate and commodity price risks, the Group enters into forward contracts, option contracts, swap contracts and other derivative financial instruments. The Group does not hold derivative financial instruments for speculative purposes.

Derivative financial instruments are initially recorded at their fair value on the date of the derivative transaction and are remeasured at their fair value at subsequent balance sheet dates. The resultant gains or losses are recognised in the income statement unless these are designated as effective hedging instruments.

### (xxxii) Hedge accounting

The Group designates certain hedging instruments, which include derivatives and non-derivatives in respect of foreign currency risk, as either fair value hedges or cash flow hedges. Changes in the fair value of derivatives that are designated and qualify as fair value hedges are recorded in the income statement. The hedged item is recorded at fair value and any gain or loss is recorded in the income statement and is offset by the gain or loss from the change in the fair value of the derivative.

Changes in the fair value of derivatives that are designated and qualify as cash flow hedges are recorded in equity. This includes certain non-derivative liabilities that are designated as a hedge of the foreign currency risk on future, highly probable, forecast sales. Amounts deferred in equity are recycled to the income statement in the periods when the hedged item is recognised in the income statement.

The gain or loss on hedging instruments relating to the effective portion of a net investment hedge is recognised in equity. The ineffective portion is recognised immediately in the income statement. Gains or losses accumulated in equity are reclassified to the income statement on disposal of the foreign operations to which they relate.

Hedge accounting is discontinued when the hedging instrument expires or is sold, terminated or exercised, or no longer qualifies for hedge accounting. Any cumulative gain or loss on the hedging instrument recognised in equity is kept in equity until the forecast transaction occurs. If a hedged transaction is no longer expected to occur, the net cumulative gain or loss recognised in equity is transferred to the income statement.

Derivatives embedded in other financial instruments or other host contracts are treated as separate derivatives when their risks and characteristics are not closely related to those of the host contracts and the host contracts are not carried at fair value with unrealised gains or losses recognised in the income statement.

### (xxxiii) Held-to-maturity financial assets

Financial instruments with fixed or determinable payments and fixed maturity dates that the Group has the positive intent and ability to hold to maturity are classified as held-to-maturity investments. Held-to-maturity investments are measured at amortised cost using the effective interest method.

### 2(b) Critical accounting judgement and estimation uncertainty

The preparation of financial statements in conformity with IFRS requires management to make judgements, estimates and assumptions, that affect the application of accounting policies and the reported amounts of assets, liabilities, income, expenses and disclosures of contingent assets and liabilities at the date of these consolidated financial statements and the reported amounts of revenues and expenses for the years presented. Actual results may differ from these estimates under different assumptions and conditions.

Estimates and underlying assumptions are reviewed on an ongoing basis. Revisions to accounting estimates are recognised in the period in which the estimate is revised and future periods affected. Vedanta considers the following areas as the key sources of estimation uncertainty:

# (i) Oil & Gas reserves

Oil & Gas reserves are estimated on a proved and probable entitlement interest basis. Proven and probable reserves are estimated using standard recognised evaluation techniques. The estimate is reviewed regularly. Future development costs are estimated taking into account the level of development required to produce the reserves by reference to operators, where applicable, and internal engineers.

Net entitlement reserves estimates are subsequently calculated using the Group's current oil price and cost recovery assumptions, in line with the relevant agreements.

Changes in reserves as a result of factors such as production cost, recovery rates, grade of reserves or commodity prices could impact the depreciation rates, carrying value of assets and environmental and restoration provisions.

### (ii) Carrying value of exploration and evaluation assets

Where a project is sufficiently advanced the recoverability of IFRS 6 Exploration assets are assessed by comparing the carrying value to higher of fair value less cost of disposal or value in use. Exploration assets are inherently judgemental to value and further details on the accounting policy are included in accounting note above. The amounts for exploration and evaluation assets represent active exploration projects. These amounts will be written off to the income statement as exploration costs unless commercial reserves are established or the determination process is not completed and there are no indications of impairment. The outcome of ongoing exploration, and therefore whether the carrying value of exploration and evaluation assets will ultimately be recovered, is inherently uncertain.

Details of impairment charge and the assumptions used are disclosed in Note 5.

### (iii) Carrying value of developing/producing oil & gas assets

Management perform impairment tests on the Group's developing/producing oil & gas assets at least annually with reference to indicators in IAS 36.

The impairment assessments are based on a range of estimates and assumptions, including:

Estimates/assumptions	Basis
Future production	proved and probable reserves, resource estimates and, in certain cases, expansion projects
Commodity prices	management's best estimate benchmarked with external sources of information, to ensure they are within the range of available
	analyst forecast
Exchange rates	management best estimate benchmarked with external sources of information
Discount rates	cost of capital risk-adjusted for the risk specific to the asset/CGU
Extension of PSC	assumed that PSC for Rajasthan block would be extended until 2030 on the same commercial terms

Other key assumptions in the impairment models based on management expectations are that government approval will be received to further increase production rates and that the Enhanced Oil Recovery programme will be successfully implemented.

Any subsequent changes to cash flows due to changes in the above mentioned factors could impact the carrying value of the assets. Details of impairment charge and the assumptions used are disclosed in Note 5.

# (iv) Mining properties and leases

The carrying value of mining property and leases is arrived at by depreciating the assets over the life of the mine using the unit of production method based on proved and probable reserves. The estimate of reserves is subject to assumptions relating to life of the mine and may change when new information becomes available. Changes in reserves as a result of factors such as production cost, recovery rates, grade of reserves or commodity prices could thus impact the carrying values of mining properties and leases and environmental and restoration provisions.

Details of impairment charge are disclosed in Note 5.

### (v) Useful economic lives and impairment of other assets

Property, plant and equipment other than mining properties, oil & gas properties, and leases are depreciated over their useful economic lives. Management reviews the useful economic lives at least once a year and any changes could affect the depreciation rates prospectively and hence the asset carrying values. The Group also reviews its property, plant and equipment, including mining properties and leases, for possible impairment if there are events or changes in circumstances that indicate that carrying values of the assets may not be recoverable. In assessing the property, plant and equipment for impairment, factors leading to significant reduction in profits such as changes in commodity prices, the Group's business plans and changes in regulatory environment are taken into consideration. The carrying value of the assets of a cash generating unit (CGU) is compared with the recoverable amount of those assets, that is, the higher of fair value less costs of disposal and value in use. Recoverable value is based on the management estimates of commodity prices, market demand and supply, economic and regulatory climates, long-term plan, discount rates and other factors. Any subsequent changes to cash flow due to changes in the above-mentioned factors could impact the carrying value of the assets.

### (vi) Assessment of impairment at Lanjigarh Refinery

The Group has considered that the delay in obtaining environment clearances for the expansion of the alumina refinery at Lanjigarh and regulatory approval for bauxite mining as an indication of impairment. Hence, the Group have reviewed the carrying value of its property, plant and equipments at Lanjigarh as at balance sheet date, estimated the recoverable amounts of these assets and concluded that there was no impairment because the recoverable amount (estimated based on value in use) exceeded the carrying amounts.

The key assumptions and estimates used in determining the value in use of these assets were:

- The State of Odisha has abundant bauxite resources and under the terms of the Memorandum of Understanding (MOU) with the Government of Odisha, management is confident that bauxite will be made available in the short to medium term. The Company has entered into agreements with various suppliers internationally and domestically to ensure the availability of bauxite to run its refinery. In the initial years, the Company has assumed that bauxite will be purchased from third party suppliers in India and other countries, until the bauxite is sourced from its own mines.
- The State of Odisha has taken certain measures including reservation of areas for mining operations or undertaking prospecting and the constitution of the Ministerial Committee for formulation of a policy for supply of ores to Odisha-based industries on a long-term basis. On 12 January 2015, the Government of India came out with an ordinance to amend the existing MMDR act. The major change is in the process of grant of concessions i.e. from a first come first served basis to a more transparent process of auction and to expedite the grant process.
- The management expects that the conditions for construction of the alumina refinery will be fulfilled and it is assumed that the approval for the expansion of the refinery would be received for commencement of production by fiscal 2018.

Management expects that approvals for mining and the statutory approvals for the expansion project will be received as anticipated. Additionally the Group carries out impairment assessment for carrying value of these assets every half year and challenges these assumptions.

As at 31 March 2015, the carrying amount of property plant and equipment related to alumina refinery operations at Lanjigarh and related mining assets is US\$1,165 million (31 March 2014: US\$1,231 million).

# (vii) Assessment of Impairment of Karnataka and Goa iron ore mines:

### Karnataka mining

The mining ban in Karnataka was lifted on 17 April 2013 and the mining operations resumed in December 2013. The mining operations were suspended since August 2014 for want of environment clearances. On execution of the Mining Lease Deed and final forest clearance, the operations were resumed towards the end of February 2015. The carrying value of assets as at 31 March 2015 is US\$168.1 million (31 March 2014: US\$180.3 million).

### Goa mining

The Ministry of Environment and Forests revoked its earlier order which had kept the environment clearances for iron ore mines in Goa in abeyance. The State Government has issued a mining policy and has lifted the ban on iron ore mining in Goa. We have been allocated with an interim annual mining quantity of 5.5mt (out of the total cap of 20mt for FY2015) of saleable ore which is expected to progressively increase in coming years.

The State Government of Goa, has renewed the mining leases and Vedanta expects to start mining activities at iron ore mines at Goa in the second half of fiscal 2016, after receipt of all other regulatory clearances. The carrying value of assets affected as at 31 March 2015 is US\$736.3 million (31 March 2014: US\$709.9 million).

Management has reviewed the carrying value of the assets as at the balance sheet date, estimated the recoverable amounts of these assets and concluded that there was no impairment as the recoverable amount (estimated based on fair value less costs of disposal) exceeded the carrying amounts.

### (viii) Assessment of Impairment at Western Cluster Limited (WCL)

The Project in Liberia is at the exploratory stage and the Group has considered the suspension of exploration in Liberia due to the Ebola epidemic and falling iron ore prices as an indication for impairment. The Group expects to start mining activities at iron ore mines in Liberia during fiscal 2020, after receipt of all regulatory clearances and approval of mining leases. Hence, the Group has reviewed the carrying value of its property, plant and equipment at WCL as at balance sheet date, estimated the recoverable amounts of these assets and concluded that there was no impairment because the recoverable amount (estimated based on fair value less costs of disposal) exceeded the carrying amounts. The carrying value of assets as at 31 March 2015 is US\$224.8 million.

### (ix) Assessment of Impairment at Konkola Copper Mines (KCM)

The KCM operations in Zambia have experienced operational challenges, a more challenging price environment, combined with rising electricity costs and increases in mining royalties. Due to these factors, the Group has reviewed the carrying value of its property, plant and equipment at KCM as at the balance sheet date, estimated the recoverable amounts of the assets and concluded that other than the specific assets identified and disclosed in Note 5, there was no impairment because the recoverable amount (estimated based on fair value less costs of disposal) exceeded the carrying amounts. The carrying value of assets as at 31 March 2015 is US\$2,010.3 million.

### (x) Restoration, rehabilitation and environmental costs

Provision is made for costs associated with restoration and rehabilitation of mining sites as soon as the obligation to incur such costs arises. Such restoration and closure costs are typical of extractive industries and they are normally incurred at the end of the life of the mine. The costs are estimated on the basis of closure plans and the estimated discounted costs of dismantling and removing these facilities and the costs of restoration are capitalised as soon as the obligation to incur such costs arises. A corresponding provision is created on the liability side. The capitalised asset is charged to the income statement over the life of the operation through the depreciation of the asset and the provision is increased each period via unwinding the discount on the provision. Management estimates are based on local legislation and/or other agreements. The actual costs and cash outflows may differ from estimates because of changes in laws and regulations, changes in prices, analysis of site conditions and changes in restoration technology.

### (xi) Provisions and liabilities

Provisions and liabilities are recognised in the period when it becomes probable that there will be a future outflow of funds resulting from past operations or events that can be reasonably estimated. The timing of recognition requires the application of judgement to existing facts and circumstances which may be subject to change especially when taken in the context of the legal environment in India. The actual cash outflows may take place over many years in the future and hence the carrying amounts of provisions and liabilities are regularly reviewed and adjusted to take into account the changing circumstances and other factors that influence the provisions and liabilities.

### (xii) Contingencies and commitments

In the normal course of business, contingent liabilities may arise from litigation, taxation and other claims against the Group. Where it is management's assessment that the outcome cannot be reliably quantified or is uncertain the claims are disclosed as contingent liabilities unless the likelihood of an adverse outcome is remote. Such liabilities are disclosed in the notes but are not provided for in the financial statements.

While considering the possible, probable and remote analysis of taxation, legal and other claims, there is always a certain degree of judgement involved pertaining to the application of the legislation which in certain cases is supported by views of tax experts and/or earlier precedents in similar matters. Although there can be no assurance regarding the final outcome of the legal proceedings, the Group does not expect them to have a materially adverse impact on the Group's financial position or profitability. These are set out in Note 38 and Note 42.

### (xiii) The HZL and BALCO call options

The Group had exercised its call option to acquire the remaining 49% interest in BALCO and 29.5% interest in HZL. The Government of India has however, contested the validity of the options and disputed their valuation performed in terms of the relevant agreements the details of which are set out in Note 39. In view of the lack of resolution on the options, the non-response to the exercise and valuation request from the Government of India, the resultant uncertainty surrounding the potential transaction and the valuation of the consideration payable, the Group considers the strike price of the options to be at fair value, accordingly, the value of the option would be nil, and hence, the call options have not been recognised in the financial statements.

### 3. Segment information

The Group is a diversified natural resources group engaged in exploring, extracting and processing minerals and oil & gas. We produce zinc, lead, silver, copper, aluminium, iron ore, oil & gas and commercial power and have presence across India, Zambia, South Africa, Namibia, Ireland, Australia, Liberia, UAE and Sri Lanka. The Group is also in the business of port operations in India.

The Group's reportable segments defined in accordance with IFRS 8 are as follows:

- Zinc-India
- Zinc-International
- Oil & Gas
- Iron Ore
- Copper-India/Australia
- Copper-Zambia
- Aluminium
- Power

The components not meeting the quantitative threshold for reporting are being reported as 'Others'.

Management monitors the operating results of reportable segments for the purpose of making decisions about resources to be allocated and for assessing performance. Segment performance is evaluated based on the EBITDA of each segment. Business segment financial data includes certain corporate costs, which have been allocated on an appropriate basis. Inter-segment sales are charged based on prevailing market prices.

The following tables present revenue and profit information and certain asset and liability information regarding the Group's reportable segments for the year ended 31 March 2015 and 31 March 2014. Items after operating profit are not allocated by segment.

### (a) Reportable segments

# Year ended 31 March 2015

(US\$ million)	Zina India Zir	nc-International	Oil & Gas	Iron Orol	Copper- ndia/Australia (	Cannar Zambia	Aluminium	Power	Fotal reportable El		Total operations
REVENUE	Zinc-muia Zii	ic-international	Oii & Gas	Hon Ore	nuia/Austrana C	opper-zamoia	Aluminium	rowei	segment	18	Total operations
Sales to external											
customers	2,357.0	586.9	2,397.5	311.4	3,682.7	883.5	2,078.1	552.8	12,849.9	28.8	12,878.7
Inter-segment sales <sup>3</sup>	2,337.0	_	2,377.3	15.1	18.0	193.6	3.8	119.1	349.6	(349.6)	12,070.7
Segment revenue	2,357.0	586.9	2,397.5	326.5	3,700.7	1,077.1	2,081.9	671.9	13,199.5	(320.8)	12,878.7
Segment result	,		,								
EBITDA <sup>1</sup>	1,192.5	180.8	1,476.8	31.4	281.0	(3.8)	415.5	153.8	3,728.0	13.2	3,741.2
Depreciation and						. ,					
amortisation <sup>2</sup>											(2,005.7)
Special items (Note 5)											(6,744.2)
Operating profit											(5,008.7)
Investment revenue											832.6
Finance costs											(1,387.2)
Other gains and (losses)											
[net]											(76.9)
LOSS BEFORE											
TAXATION											(5,640.2)
Segments assets	7,356.8	694.1	12,948.8	1,924.3	1,357.8	2,387.1	6,653.8	3,235.5	36,558.2	58.4	36,616.6
Unallocated assets											372.3
TOTAL ASSETS											36,988.9
Segment liabilities	(277.9)	(253.0)	(3,105.7)	(1,329.8)	(1,286.6)	(1,474.2)	(5,220.2)	(2,339.9)	(15,287.3)	(113.9)	(15,401.2)
Unallocated liabilities											(9,330.3)
TOTAL											
LIABILITIES											(24,731.5)
Other segment											
information											
Additions to property,											
plant and equipment	217.7	34.4	1,079.6	42.1	29.7	58.2	148.9	140.3	1,750.9	1.1	1,752.0
Depreciation and											
amortisation	(133.2)	(111.1)	(1,270.3)	(42.3)	(51.6)	(187.2)	(140.2)	(65.8)	(2,001.7)	(4.0)	(2,005.7)
Impairment losses (Note											
5)	_	_	(6,642.1)	_	_	(52.3)	_	_	(6,694.4)	_	(6,694.4)

EBITDA is a non-IFRS measure and represents operating profit before special items, depreciation and amortisation.

Depreciation and amortisation is also provided to the chief operating decision maker on a regular basis.

Transfer prices between operating segment sales are on an arm's length basis in a manner similar to transactions with third parties except sales from power segment amounting to US\$83.8 million for the year ended 31 March 2015 (March 2014: US\$36.6 million), which is at cost, within the same legal entity.

### Year ended 31 March 2014

(TION 1111 )	a a.		07.00		Copper-				Total reportable Eli		
(US\$ million)	Zinc-India Zin	c-International	Oil & Gas	Iron Ore	India/Australia (	Copper-Zambia	Aluminium	Power	segment	rs	Total operations
REVENUE											
Sales to external	2 101 7	661.4	2 002 0	266.4	2 200 0	964.5	1 702 1	570.4	12 020 1	160	12 045 0
customers	2,181.7		3,092.8	266.4	3,399.8		1,782.1	579.4	12,928.1	16.9	12,945.0
Inter-segment sales	13.7	-		0.7	5.0	306.9	3.3	42.3	371.9	(371.9)	
Segment revenue	2,195.4	661.4	3,092.8	267.1	3,404.8	1,271.4	1,785.4	621.7	13,300.0	(355.0)	12,945.0
Segment Result											
EBITDA	1,145.0	213.4	2,347.0	(24.2)	197.9	156.3	287.3	168.4	4,491.1	0.1	4,491.2
Depreciation and											
amortisation											(2,203.1)
Special items (Note 5)											(138.0)
Operating profit											2,150.1
Investment revenue											687.7
Finance costs											(1,439.8)
Other gains and											
(losses) [net]											(279.9)
PROFIT BEFORE											
TAXATION											1,118.1
Segments assets	6,557.8	902.2	21,094.4	2,043.6	1,642.6	2,422.8	6,976.4	3,184.3	44,824.1	104.2	44,928.3
Unallocated assets											446.0
TOTAL ASSETS											45,374.3
Segment liabilities	(258.7)	(310.7)	(5,142.9)	(1,104.2)	(2,123.0)	(1,458.8)	(5,121.5)	(2,115.9)	(17,635.7)	(85.2)	(17,720.9)
Unallocated liabilities	` ′	, ,			,	, , ,	. , ,	, , ,	` ' '	` /	(9,678.6)
TOTAL											
LIABILITIES											(27,399.5)
Other segment											
information											
Additions to property,											
plant and equipment	345.7	44.2	649.1	43.6	56.1	150.5	165.2	289.4	1,743.8	1.5	1,745.3
Depreciation and									ŕ		,
amortisation	(114.8)	(137.3)	(1,413.4)	(45.8)	(42.1)	(171.5)	(174.7)	(99.1)	(2,198.7)	(4.4)	(2,203.1)
Impairment losses	` /	` /		` /	` /	` /	` /	` /		. ,	,
(Note 5)	_	(47.5)	_	_	_	(23.1)	(11.0)	_	(81.6)	_	(81.6)

# (b) Geographical segmental analysis

The Group's operations are located in India, Zambia, Namibia, South Africa, Liberia, Ireland, Australia, UAE and Sri Lanka. The following table provides an analysis of the Group's sales by country in which the customer is located, irrespective of the origin of the goods.

(US\$ million)	Year ended 31 March 2015	Percentage	Year ended 31 March 2014	Percentage
India	7,872.0	61.1%	8,234.1	63.6%
China	1,314.2	10.2%	1,742.0	13.5%
Far East Asia	1,168.4	9.1%	1,003.2	7.7%
Middle East	1,143.7	8.9%	724.2	5.6%
Europe	643.3	5.0%	537.0	4.1%
Africa	192.3	1.5%	213.0	1.6%
Asia Others	118.9	0.9%	83.8	0.6%
UK	2.2	0.0%	19.1	0.1%
Others	423.7	3.3%	388.6	3.0%
Total	12,878.7	100.0%	12,945.0	100.0%

The following is an analysis of the carrying amount of segment assets and additions to property, plant and equipment, analysed by the country in which the assets are located. No material non-current assets are located in the United Kingdom and no significant additions to property, plant and equipment have been made there.

	Carrying amount of assets		Additions to property, plant and equipment	
(US\$ million)	As at 31 March 2015	As at 31 March 2014	Year ended 31 March 2015	Year ended 31 March 2014
Australia	13.4	24.3	3.8	8.1
India	20,996.2	27,548.7	1,635.7	1,497.7
Zambia	1,905.4	2,091.7	58.2	150.9
Namibia	128.5	204.6	21.5	13.4
Ireland	37.7	69.7	12.7	19.6
South Africa	335.9	375.2	5.9	27.5
Sri Lanka	_	787.6	2.7	_
Other	213.6	200.7	11.5	28.1
Total	23,630.7	31,302.5	1,752.0	1,745.3

<sup>1</sup> Non-current assets do not include deferred tax assets, non-current tax assets and derivative receivables.

# Information about major customer

Included in revenue from the Oil & Gas segment are revenues of US\$1,393.2 million (US\$1,742.6 million year ended 31 March 2014), which arose from sales to

the Group's largest customer. No other customer contributed 10% or more to the Group's revenue during the year ended 31 March 2015.

### 4. Total revenue

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
Revenue from sales of goods	12,878.7	12,945.0
Other operating income	104.0	84.0
Investment revenue	832.6	687.7
Total	13,815.3	13,716.7

### 5. Special items

	Year end	Year e	ended 31 March 2014	1		
(US\$ million)	ite Special items	Tax effect of special ms/special tax items	Special items after tax	Special items	Tax effect of Spe special items	cial items after
Impairment of oil & gas assets <sup>1a</sup>	(6,642.1)	2,138.0	(4,504.1)	_	_	_
Impairment of mining reserves and assets <sup>1b</sup>	(52.3)	_	(52.3)	(81.6)	17.8	(63.8)
Total impairment charge	(6,694.4)	2,138.0	(4,556.4)	(81.6)	17.8	(63.8)
Voluntary retirement schemes (redundancy costs) <sup>2</sup>	_		_	(15.1)	5.1	(10.0)
Provision for receivables <sup>3</sup>	(36.6)	12.5	(24.1)	_	_	_
Provision for investment in coal blocks <sup>4</sup>	(5.4)	1.8	(3.6)	_	_	_
Acquisition & restructuring related costs <sup>5</sup>	0.4	_	0.4	(2.6)	_	(2.6)
Land regularisation fee <sup>6</sup>	_	_	_	(16.6)	_	(16.6)
Provision for contractor dispute <sup>7</sup>	(8.2)	_	(8.2)	(22.1)	6.5	(15.6)
Special tax item <sup>8</sup>	_	52.8	52.8	_	_	
Special items	(6,744.2)	2,205.1	(4,539.1)	(138.0)	29.4	(108.6)

#### 1 Impairment charge

### During the year ended 31 March 2015, the Group has recognised:

a) Impairment charge on its oil & gas assets of US\$6,642.1 million mainly relating to the Rajasthan block and Sri Lanka block, triggered by the significant fall in crude oil prices. Of this charge, US\$2,162.1 million has been recorded against oil & gas properties and US\$4,480.0 million against exploratory and evaluation assets. The valuation remains sensitive to price and further deterioration in long-term prices may result in additional impairment.

For oil & gas properties, CGUs identified are on the basis of a PSC (Production Sharing Contract) level as it is the smallest group of assets that generates cash inflows that are largely independent of the cash inflows from other assets or group of assets.

The recoverable amount of the CGU, US\$5,825.5 million, was determined based on the fair value less costs of disposal approach, a level-3 valuation technique in the fair value hierarchy, as it more accurately reflect the recoverable amount based on our view of the assumptions that would be used by a market participant. This is based on the cash flows expected to be generated by the projected oil or natural gas production profiles up to the expected dates of cessation of production sharing contract (PSC)/cessation of production from each producing field based on current estimates of reserves and risked resources. Reserves assumptions for fair value less costs of disposal discounted cash flow tests consider all reserves that a market participant would consider when valuing the asset, which are usually broader in scope than the reserves used in a value-in-use test. Discounted cash flow analysis, used to calculate fair value less costs of disposal uses assumption for short-term (five years) oil price and the long-term nominal price of US\$84 per barrel derived from a consensus of various analyst recommendations. Thereafter, these have been inflated at a rate of 2.5%. The cash flows are discounted using the post-tax nominal discount rate of 10.32% derived from the Group's post-tax weighted average cost of capital.

The impairment loss relates to the 'Oil & Gas' business reportable segments, however this has been shown as special items and does not form part of the segment result for the purpose of segment reporting.

The impairment charge of US\$4,480.0 million of exploratory and evaluation assets also includes a US\$788.1 million impairment charge relating to exploratory wells in Sri Lanka, as the development of hydrocarbons in the said block is not commercially viable at the current prices.

b) US\$52.3 million impairment charge relating to underground assets in Nchanga in Konkola Copper Mines Plc on account suspension of operations and the fall in copper prices. Of this charge, US\$47.2 million has been recorded against mining property and leases and US\$5.1 million against plant and equipment.

### Impairment for the year ended 31 March 2014 includes:

- US\$47.5 million, impairment of mining reserve and Land assets at Lisheen. This is as a result of fall in the forecasted LME prices of Zinc and Lead.
- US\$11.0 million, impairment of mining assets of Jharsuguda Aluminium at Lanjigarh as the MOEF has rejected the Stage II forest clearance for the Niyamgiri mining project.
- US\$23.1 million, impairment of COP F&D mining assets of KCM at Nchanga, Zambia as the mine has been put under maintenance following a dispute with the mining contractor.
- 2 During the year ended 31 March 2014, voluntary retirement schemes were considered by management to be a one off in nature and therefore classified as special items. Following management's review, non-material voluntary retirement scheme costs incurred during the year have been deemed as operational costs not classified as special items.
- 3 In respect of iron ore mining at Goa, the Supreme Court has ruled that, out of the sale proceeds of inventory of excavated ore lying unsold, the leaseholder would be paid only the average cost of excavation. However, the carrying value includes the amortisation based on the fair value of mining reserves determined at the time of acquisition. Consequently, the excess of the carrying value of receivables over the net realisable value has been written off.
- 4 Relates to the provision recognised in respect of expenditure incurred on cancelled coal blocks allotted to Company's subsidiaries, pursuant to the order of the Supreme Court of India.
- 5 Acquisition related costs include costs of Group simplification and restructuring and other acquisition related costs.
- 6 Payments made pursuant to amendment during the year ended 31 March 2014 under the Land Revenue Code for regulating mining dumps at Goa.

- 7 Relates to a provision recognised following a dispute with a mining contractor at KCM Zambia.
- 8 As a result of amendments to the Zambian Mining Tax regime, effective from 1 January 2015, the tax rate on mining operations (excluding 'mineral processing' activities) was reduced from 30% to 0%. The deferred tax liability in relation to mining operations was therefore reversed in the period, resulting in a credit to the income statement of US\$52.8 million. An announcement from the Zambian cabinet on 20 April 2015 stated that further amendments will be made to the Zambian Mining Tax regime, effective from 1 July 2015. The changes will include reinstating the tax rate on mining operations from 0% to 30%, and increasing the tax rate on mineral processing to 35%. These rates were not enacted as at 31 March 2015 and therefore have not been used to measure deferred tax balances at 31 March 2015. Further guidance is being sought from the Government to determine the impact of the proposed amendment.

#### 6. Investment revenue

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
Interest income on loans and receivables	29.3	31.3
Interest income on cash and bank balances	139.9	202.3
Change in fair value of financial assets held for trading	250.8	383.5
Profit on disposal of financial assets held for trading	406.1	65.1
Dividend income on financial assets held for trading	0.3	0.9
Foreign exchange gain on cash and liquid investments	6.2	4.8
Capitalisation of interest income	_	(0.2)
	832 6	687.7

### 7. Finance costs

(US\$ million)	Year ended 31 March 2015	Year ended 31 March 2014
Interest on loans, overdrafts and bonds (a)	1,116.8	1,115.2
Coupon interest on convertible bonds (Note 28)	86.8	108.7
Accretive interest on convertible bonds (Note 28)	76.6	187.2
Total interest charge on convertible bonds (b)	163.4	295.9
Other borrowing and finance costs (c)	194.1	83.5
Total interest cost (a+b+c)	1,474.3	1,494.6
Unwinding of discount on provisions (Note 30)	36.8	21.8
Net interest on defined benefit arrangements (Note 33)	9.2	6.8
Capitalisation of borrowing costs (Note 17) <sup>2</sup>	(133.1)	(83.4)
	1,387.2	1,439.8

<sup>1</sup> Restated refer Note 1.

### 8. Other gains and (losses) [net]

(US\$ million)	Year ended 31 March 2015	31 March 2014
Gross foreign exchange gains and losses	(80.8)	(360.3)
Qualifying exchange losses capitalised (Note 17)	14.4	73.0
Net foreign exchange gains and losses	(66.4)	(287.3)
Change in fair value of financial liabilities measured at fair value	(1.1)	(1.1)
Change in fair value of embedded derivative on convertible bonds (Note 28)	_	4.7
Net (loss)/gain arising on qualifying hedges and non-qualifying hedges	(9.4)	3.8
	(76.9)	(279.9)

<sup>1</sup> Restated refer Note 1.

<sup>2</sup> All borrowing costs are capitalised using rates based on specific borrowings with the interests ranging between 1.9% to 12.2% per annum except in the Aluminium segment where general borrowing costs were capitalised at a rate of 9.0% per annum.

### 9. Profit for the year has been stated after charging/(crediting):

(US\$ million)	Year ended 31 March 2015	Year ended 31 March 2014
Depreciation & amortisation	2,005.7	2,203.1
Costs of inventories recognised as an expense	3,905.0	4,014.2
Auditor's remuneration for audit services	2.4	2.4
Research and development	0.8	0.5
Loss on disposal of property, plant and equipment	4.6	4.4
Provision for receivables	80.4	35.5
Impairment of mining reserves and assets	52.3	81.6
Impairment of oil & gas assets	6,642.1	_
Staff costs	812.8	801.6
Foreign exchange gains and losses <sup>1</sup>	82.8	305.7

<sup>1</sup> Includes foreign exchange losses on non-operational monetary items of US\$66.4 million (31 March 2014: US\$287.3 million), and on operational monetary items of US\$2.6 million (31 March 2014: US\$23.2 million). It also includes Foreign exchange gain on cash and liquid investments of US\$6.2 million (31 March 2014: US\$4.8 million).

### 10. Auditor's remuneration

The table below shows the fees payable globally to the Company's auditor, Deloitte LLP, for statutory external audit and audit related services, as well as fees paid to other accountancy firms for statutory external audit and audit related services in each of the two years ended 31 March:

(US\$ million)	Year ended 31 March 2015	Year ended 31 March 2014
Fees payable to the Company's auditor for the audit of Vedanta Resources plc annual accounts	0.9	0.8
The audit of the Company's subsidiaries pursuant to legislation	1.6	1.6
Total audit fees	2.5	2.4
Fees payable to the Company's auditor and their associates for other services to the Group		
Other services pursuant to legislation <sup>1</sup>	1.4	1.3
Tax services <sup>2</sup>	0.4	0.5
Corporate finance services <sup>3</sup>	0.5	0.6
Other services <sup>4</sup>	0.2	0.4
Total non-audit fees	2.5	2.8
Total fees paid to the Company's auditor	5.0	5.2
Audit fees payable to other auditors of the Group's subsidiaries	0.4	0.5
Non-audit fees payable to other auditors of the Group's subsidiaries	0.1	0.1
Total fees paid to other auditors	0.5	0.6

- Other services pursuant to legislation principally comprise assurance services, being quarterly reviews of the Group's subsidiaries results and the half year review of the Group's results. Tax services principally comprise certification and assurance services as required by Indian tax regulations.

  Corporate finance services principally comprise Group simplification and other acquisition related certifications. These assurance-related services are ordinarily provided by the auditor. Includes certification related services.

### 11. Employee numbers and costs

Average number of persons employed by the Group in the year

Class of business	Year ended 31 March 2015	Year ended 31 March 2014
Zinc	7,428	7,681
– India	5,439	5,797
- International	1,989	1,884
Iron ore	3,465	3,708
Copper	8,710	9,142
- India/Australia	1,185	1,268
– Zambia	7,525	7,874
Aluminium	5,932	6,404
Power	358	349
Oil & gas	1,684	1,734
Other	140	136
	27,717	29,154

### Costs incurred during the year in respect of employees and Executive Directors

	y ear ended	y ear ended
(US\$ million)	31 March 2015	31 March 2014
Salaries and wages	733.8	726.3
Defined contribution pension scheme costs (Note 33)	30.7	25.7
Defined benefit pension scheme costs (Note 33)	19.7	16.7
Share-based payments charge	28.6	32.9
	812.8	801.6

### 12. Tax

(US\$ million)	Year ended 31 March 2015	Year ended 31 March 2014
Current tax:		
UK Corporation tax	(19.3)	19.3
Foreign tax		
– India	562.7	494.4
– Zambia	1.0	_
– Australia	(0.1)	(0.8)
– Africa and Europe	22.1	37.7
- Other	4.4	3.7
	570.8	554.3
Deferred tax: (Note 31)		
Deferred tax impact on impairment on Oil & Gas assets (Note 5)	(2,138.0)	_
Deferred tax reversal due to change in tax regime at Zambia (Note 5)	(52.8)	_
Deferred tax others	(232.5)	(425.6)
	(2,423.3)	(425.6)
Net tax (credit)/charge <sup>1</sup>	(1,852.5)	128.7
Effective tax rate	32.8%	11.5%

<sup>1</sup> Includes tax credit on special items and tax credit – special items of US\$2,205.1 million during the year ended 31 March 2015 (31 March 2014: US\$29.4 million).

The deferred tax benefit recycled from equity to the income statement is US\$6.0 million (2014: US\$0.3 million).

During year ended 31 March 2014, consequent to Group restructuring (Note 45), the income tax returns of the Indian subsidiaries subject to the merger were refiled on a combined basis as the newly amalgamated Indian subsidiary, Vedanta Limited (formerly known as Sesa Sterlite Limited). The effective date of the merger was 1 January 2011 and refiling the tax returns from this date resulted in a lower tax liability through offsetting previously unutilised losses which arose in some merged entities in these years against taxable profits which arose in other merged entities. This resulted in a reversal of the current tax provision of US\$257 million partially offset by the related net reversal of deferred tax assets of US\$81.1 million. Since this was not directly related to the equity restructuring, the net tax credit of US\$175.9 million was recognised in the income statement.

### Tax expense

	Year ended 31 March 2015	Year ended 31 March 2014
Tax effect of Special items (Note 5)	(2,152.3)	(29.4)
Special tax item – deferred tax reversal due to a change in the tax regime in Zambia (Note 5)	(52.8)	_
Net tax credit – special items	(2,205.1)	(29.4)
Tax expense – others	352.6	158.1
Net tax (credit)/expense	(1,852.5)	128.7

# Deferred tax recognised in the income statement:

(US\$ million)	Year ended 31 March 2015	Year ended 31 March 2014
Accelerated capital allowances (including fair value adjustments)	(2,634.1)	(463.1)
Unutilised tax losses	203.4	517.1
Other temporary differences	7.4	371.6
	(2,423.3)	425.6

No deferred tax has been recognised in respect of temporary differences associated with investments in subsidiaries where the Group is in a position to control the timing of the reversal of the temporary differences and it is probable that such differences will not reverse in the foreseeable future. The aggregate amount of temporary differences associated with such investments in subsidiaries is represented by the contribution of those investments to the Group's retained earnings and amounted to US\$5,768.3 million (2014: US\$6,662.7 million).

A reconciliation of income tax expense applicable to accounting profit before tax at the Indian statutory income tax rate to income tax expense at the Group's effective income tax rate for the year ended 31 March 2015 is as follows:

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
Accounting (loss)/profit before tax	(5,640.2)	1,118.1
At Indian statutory income tax rate of 33.99% (2014: 33.99%)	(1,917.1)	380.0
Unrecognised tax losses	107.6	110.6
Disallowable expenses/other permanent differences	86.5	69.0
Dividend distribution tax	68.1	64.4
Non-taxable income	(73.0)	(63.0)
Impact of tax rate difference	118.8	256.4
Impact of increase in income tax surcharge <sup>1</sup>	_	151.0
Impact of change in tax regime (Note 5)	(52.8)	_
Tax holiday and similar exemptions	(238.8)	(642.0)
Minimum alternative tax	_	(31.3)
Adjustments in respect of previous years	48.2	9.5
Vedanta Limited merger impact <sup>2</sup>	_	(175.9)
At effective income tax rate of 32.8% (2014: 11.5%)	(1,852.5)	128.7

- 1 The deferred tax liability arising in respect of the fair values uplift of Cairn India increased due to an increase in the surcharge payable by Indian companies from 5% to 10%.
- 2 Relates to a reversal of the current tax provision of US\$257 million consequent to Group restructuring (refer Note 45), partially offset by the related net reversal of deferred tax assets of US\$81.1 million.

Certain businesses of the Group within India are eligible for specified tax incentives in the form of tax exemptions. Most of such tax exemptions are relevant for the companies operating in India. These are briefly described as under:

#### The location-based exemption

In order to boost industrial and economic development in undeveloped regions, provided certain conditions are met, profits of newly established undertakings located in certain areas in India may benefit from a tax holiday. Such a tax holiday works to exempt 100% of the profits for the first five years from the commencement of the tax holiday, and 30% of profits for the subsequent five years. This deduction is available only for units established up to 31 March 2012. However, such undertaking would continue to be subject to the Minimum Alternative Tax (MAT).

The Group has such types of undertakings at Haridwar and Pantnagar, which are part of Hindustan Zinc Limited (Zinc India).

#### Sectoral benefit - power plants

To encourage the establishment of certain power plants, provided certain conditions are met, tax incentives exist to exempt 100% of profits and gains for any 10 consecutive years within the 15-year period following commencement of the power plant's operation. The Group currently has total operational capacity of 5,039MW of thermal based power generation facilities and wind power capacity of 273MW. However, such undertakings generating power would continue to be subject to the MAT provisions.

The Group has power plants which benefit from such deductions, at the various locations of Hindustan Zinc Limited and Bharat Aluminium Company Limited (where such benefits have been drawn) and Vedanta Limited (where no benefits have been drawn).

### Sectoral benefit - oil & gas

Provided certain conditions are met, profits of newly constructed industrial undertakings engaged in the oil & gas sector may benefit from a deduction of 100% of the profits of the undertaking for a period of seven consecutive years. This deduction is only available to blocks licensed prior to 31 March 2011. However, such businesses would continue to be subject to the MAT provisions.

In the Group, Cairn India Limited benefits from such deductions.

In addition, the subsidiaries incorporated in Mauritius are eligible for tax credit to the extent of 80% of the applicable tax rate on foreign source income.

The total effect of such tax holidays and exemptions was US\$238.8 million for the year ended 31 March 2015 (31 March 2014: US\$642.0 million).

### 13. Earnings per share

Basic earnings per share amounts are calculated by dividing net profit for the year attributable to ordinary equity holders of the parent by the weighted average number of ordinary shares outstanding during the year.

24,206,816 treasury shares are excluded from the total outstanding shares for the calculation of EPS.

Diluted earnings per share amounts are calculated by dividing the net profit attributable to ordinary equity holders by the weighted average number of ordinary shares outstanding during the year (adjusted for the effects of dilutive options and the Group's convertible bonds). The following reflects the income and share data used in the basic and diluted earnings per share computations:

Year ended	Year ended
(US\$ million) 31 March 2015	31 March 2014
Net loss attributable to equity holders of the parent (1,798.6)	(196.0)
Year ended	Year ended
(USS million except as stated) 31 March 2015	31 March 2014
Weighted average number of ordinary shares for basic earnings per share (million) 274.8	273.5
Effect of dilution:	
Share options 4.0	8.0
Adjusted weighted average number of ordinary shares for diluted earnings per share 278.8	281.5

### Loss per share based on loss for the year

Basic loss per share on loss for the year

	Year ended	Year ended
(US\$ million except as stated)	31 March 2015	31 March 2014
Loss for the year attributable to equity holders of the parent (US\$ million)	(1,798.6)	(196.0)
Weighted average number of shares of the Company in issue (million)	274.8	273.5
Loss per share on loss for the year (US cents per share)	(654.5)	(71.7)

### Diluted loss per share on loss for the year

	Year ended	Year ended
(US\$ million except as stated)	31 March 2015	31 March 2014
Loss for the year attributable to equity holders of the parent (US\$ million)	(1,798.6)	(196.0)
Loss for the year after dilutive adjustment (US\$ million)	(1,798.6)	(196.0)
Adjusted weighted average number of shares of the Company in issue (million)	274.8	273.5
Diluted loss per share on loss for the year (US cents per share)	(654.5)	(71.7)

The effect of 4 million (2014: 8 million) potential ordinary shares, which relate to share option awards under the LTIP scheme, on the attributable loss for the year is anti-dilutive and thus these shares are not considered in determining diluted loss per share. However, the effect of these awards on underlying attributable earnings is dilutive for the year ended 31 March 2014, and hence the potential ordinary shares are considered in determining underlying EPS below.

The loss for the year would be decreased if holders of the convertible bonds in Vedanta exercised their right to convert their bond holdings into Vedanta equity. The impact on loss for the year of this conversion would be the reduction in interest payable on the convertible bond.

The adjustment in respect of convertible bonds has an anti-dilutive impact on earnings and is thus not considered in determining diluted EPS.

# Earnings/(loss) per share based on underlying profit/(loss) for the year (non-GAAP)

Underlying earnings is an alternative earnings measure, which the management considers to be a useful additional measure of the Group's performance. The Group's underlying profit/(loss) is the profit/(loss) for the year after adding back special items, other losses/(gains) net (Note 8) and their resultant tax (including taxes classified as special items) and non-controlling interest effects. This is a non-GAAP measure.

(105 m215 m)	NT-4-	Year ended	Year ended
(USS million)	Note	31 March 2015	31 March 2014
Loss for the year attributable to equity holders of the parent	-	(1,798.6)	(196.0)
Special items	5	6,744.2	138.0
Other losses/(gains) net		76.9	279.9
Tax and non-controlling interest effect of special items (including taxes classified as special items) and other			
losses/(gains)		(5,061.4)	(181.7)
Underlying attributable (loss)/profit for the year		(38.9)	40.2
Basic (loss)/earnings per share on Underlying (loss)/profit for the year (non-GAAP)			
		Year ended	Year ended
(US\$ million except as stated)		31 March 2015	31 March 2014
Underlying (loss)/profit for the year (US\$ million)		(38.9)	40.2
Weighted average number of shares of the Company in issue (million)		274.8	273.5
(Loss)/earnings per share on underlying (loss)/profit for the year (US cents per share)		(14.2)	14.7
Diluted (loss)/earnings per share on underlying (loss)/profit for the year (non-GAAP)			
		Year ended	Year ended
(US\$ million except as stated)		31 March 2015	31 March 2014
Underlying (loss)/profit for the year (US\$ million)		(38.9)	40.2
Adjusted weighted average number of shares of the Company (million)		274.8	281.5
Diluted (loss)/earnings per share on underlying (loss)/profit for the year (US cents per share)		(14.2)	14.3

### 14. Dividends

(USS million)	Year ended 31 March 2015	Year ended 31 March 2014
Amounts recognised as distributions to equity holders:		
Equity dividends on ordinary shares:		
Final dividend for 2013–14: 39.0 US cents per share (2012–13: 37.0 US cents per share)	107.5	101.8
Interim dividend paid during the year: 23.0 US cents per share (2013–14: 22.0 US cents per share)	63.8	60.7
	171.3	162.5
Proposed for approval at AGM		
Equity dividends on ordinary shares:		
Final dividend for 2014–15: 40 US cents per share (2013–14: 39 US cents per share)	110.8	107.5

# 15. Goodwill

(US\$ million)	Year ended 31 March 2015	Year ended 31 March 2014
Cost (gross carrying amount)	16.6	16.6
Accumulated impairment losses	_	_

Goodwill is allocated for impairment testing purposes to the following Cash Generating Units (CGUs). The allocation of goodwill to CGUs is as follows:

- US\$12.2 million Copper India.
- US\$4.4 million arising on acquisition of Goa Energy Limited.

The Group tests goodwill annually for impairment or more frequently if there are indications that goodwill might be impaired.

The Company has undertaken an impairment review of goodwill of US\$16.6 million as at 31 March 2015. The carrying amount of goodwill allocated to the relevant cash generating unit is considered to be insignificant in comparison with the total carrying value of the cash generating unit. The carrying amount of goodwill was evaluated using the higher of fair value less cost of disposal (FVLCD) or value in use based on discounted future cash flows of the entities to which the goodwill pertains and comparing this to the total carrying value of the relevant cash generating units. It was determined that the carrying amount of goodwill is not impaired.

#### 16. Intangible assets

Intangible assets include Port concession rights to operate a general cargo berth for handling coal at the outer harbour of the Visakhapatnam port on the east coast of India, rights to use treated water from a sewage treatment plant at Zinc India operations and software licences.

	Port concession	2	
(US\$ million)	rights <sup>1</sup>	Others <sup>2</sup>	Total
Cost			
As at 1 April 2013	_	_	-
Addition	1.1	8.3	9.4
Transfer from tangible assets	98.1	8.0	106.1
Foreign exchange differences	0.7	(1.5)	(0.8)
As at 1 April 2014	99.9	14.8	114.7
Addition	0.8	4.7	5.5
Foreign exchange differences	(4.0)	(0.9)	(4.9)
As at 31 March 2015	96.7	18.6	115.3
Accumulated amortisation			
As at 1 April 2013	_	_	_
Charge for the year	3.5	3.0	6.5
Foreign exchange differences	_	(0.4)	(0.4)
As at 1 April 2014	3.5	2.6	6.1
Charge for the year	3.6	3.9	7.5
Foreign exchange differences	0.2	(0.4)	(0.2)
As at 31 March 2015	7.3	6.1	13.4
Net book value			
As at 1 April 2013	_	_	_
As at 1 April 2014	96.4	12.2	108.6
As at 31 March 2015	89.4	12.5	101.9

<sup>1</sup> Vizag General Cargo Berth Private Limited (VGCB), a special purpose vehicle, was incorporated for the coal berth mechanisation and upgrades at Visakhapatnam port. VGCB is owned by Vedanta Limited and Leighton Welspun Contractors Private Limited in the ratio of 99.99: 0.01 as on 31 March 2015 (74:26 as on 31 March 2014). The project is to be carried out on a design, build, finance, operate, transfer basis and the concession agreement between Visakhapatnam Port and VGCB was signed in June 2010. In October 2010, VGCB was awarded with the concession after fulfilling conditions stipulated as a precedent to the concession agreement. Visakhapatnam Port has provided, in lieu of a license fee, an exclusive license to VGCB for designing, engineering, financing, constructing, equipping, operating, maintaining, and replacing the project/project facilities and services. The concession period is 30 years from the date of the award of the concession. The capacity of the upgraded berth would be 10.18mmtpa and that the Visakhapatnam Port would be entitled to receive a 38.10% share of the gross revenue as royalty. VGCB is entitled to recover a tariff from the user(s) of the project facilities and services as per its tariff notification. The tariff rates are linked to the Wholesale Price Index (WPI) and would accordingly be adjusted as specified in the concession agreement every year. The ownership of all infrastructure assets, buildings, structures, berths, wharfs, equipment and other immovable and movable assets constructed, installed, located, created or provided by VGCB at the project site and/or in the port's assets pursuant to a concession agreement would be with VGCB until expiry of this concession agreement. The cost of any repair, replacement or restoration of the project facilities and services shall be borne by VGCB during the concession period. VGCB has to transfer all its rights, titles and interest in the project facilities and services free of cost to Visakhapatnam Port at the end of the concession period

<sup>2</sup> Others include right to use of sewage treatment plant at Zinc-India which is amortised over 25 years. The carrying value was US\$7.7 million as on 31 March 2015. It also includes Software licences which are amortised over a period of three years.

### 17. Property, plant and equipment

(US\$ million)	Mining property and leases	Leasehold land Fro and buildings	eehold land and buildings	Plant and equipment <sup>1</sup>	Assets under construction		Exploratory and evaluation assets	Others	Total
Cost	and reases	and bandings	ounungo	equipment	construction	properties	o raradion about	Others	Tom
At 1 April 2013	3,192.7	146.5	1,158.9	10,663.9	6,661.2	7,849.9	10,054.5	98.3	39,825.9
Additions	49.9	15.7	133.0	272.6	581.0	387.1	253.0	53.0	1745.3
Transfers	50.7	3.1	2.1	205.3	(270.8)	_	_	9.6	_
Transfers to intangible	_	_	_	(8.0)	(98.0)	_	_	_	(106.0)
Reclassification from accumulated				. ,	` /				, ,
depreciation	133.8	_	(2.4)	(202.6)	_	_	_	(1.1)	(72.3)
Unsuccessful exploration costs	_	_	` _	_	_	_	(10.8)	` _	(10.8)
Disposals	(7.4)	(0.7)	(12.6)	(251.4)	(2.7)	_	` _	(0.9)	(275.7)
Foreign exchange differences	(245.3)	(4.1)	(104.7)	(745.3)	(613.2)	_	(22.9)	(4.3)	(1,739.8)
At 1 April 2014	3,174.4	160.5	1,174.3	9,934.5	6,257.5	8,237.0	10,273.8	154.6	39,366.6
Additions	25.8	11.1	44.2	212.3	372.8	865.0	204.2	16.6	1,752.0
Transfers	66.0	_	134.7	996.5	(1,291.4)	533.7	(439.7)	0.2	_
Unsuccessful exploration costs	_	_	_	_	_	_	(128.7)	_	(128.7)
Disposals	(7.2)	(0.7)	(0.3)	(37.4)	(0.6)	-	_	(0.3)	(46.5)
Foreign exchange differences	(133.3)	(2.4)	(62.5)	(390.8)	(226.3)	-	(1.9)	(24.0)	(841.2)
At 31 March 2015	3,125.7	168.5	1,290.4	10,715.1	5,112.0	9,635.7	9,907.9	147.1	40,102.2
Accumulated depreciation and									
impairment									
At 1 April 2013	1,474.8	57.8	184.2	3,164.2	17.8	1,756.3	14.3	23.9	6,693.3
Charge for the year	162.3	0.9	43.4	580.5	_	1,401.1	_	8.4	2,196.6
Impairment of assets (Note 5)	66.6	_	4.0	_	11.0	_	_	_	81.6
Disposals	(6.6)	_	(10.7)	(233.7)	_	_	_	(0.2)	(251.2)
Reclassification	39.3	0.2	(6.3)	(107.3)	_	-	_	1.8	(72.3)
Foreign exchange differences	(106.8)	(0.7)	(15.7)	(199.8)	_	_	_	(1.9)	(324.9)
At 1 April 2014	1,629.6	58.2	198.9	3,203.9	28.8	3,157.4	14.3	32.0	8,323.1
Charge for the year	103.6	1.8	45.9	544.4	_	1,258.1	_	44.4	1,998.2
Impairment of assets (Note 5)	47.2	_	_	5.1	_	2,162.1	4,480.0	_	6,694.4
Disposal	(2.0)	_	(0.2)	(23.2)	_	-	_	(0.1)	(25.5)
Foreign exchange differences	(82.9)	(0.3)	(15.5)	(123.2)	_	_	(0.7)	(17.4)	(240.0)
At 31 March 2015	1,695.5	59.7	229.1	3,607.0	28.8	6,577.6	4,493.6	58.9	16,750.2
Net book value									
At 1 April 2013	1,717.9	88.7	974.7	7,499.7	6,643.4	6,093.6	10,040.2	74.4	33,132.6
At 1 April 2014	1,544.8	102.3	975.4	6,730.6	6,228.7	5,079.6	10,259.5	122.6	31,043.5
At 31 March 2015	1,430.2	108.8	1,061.3	7,108.1	5,083.2	3,058.1	5,414.1	88.2	23,352.0

Plant and equipment include refineries, smelters, power plants and related facilities. Other tangible fixed assets include office equipment and fixtures, and light vehicles. At 31 March 2015, land with a carrying value of US\$125.9 million (31 March 2014: US\$122.8 million) was not depreciated.
 During the year ended 31 March 2015, interest and foreign exchange losses capitalised was US\$147.5 million (31 March 2014: US\$156.4 million).

# 18. Financial asset investments

Financial asset investments are required to be classified and accounted for as either available-for-sale or fair value through profit or loss. The Group only has financial asset investments classified as available-for-sale.

# Available-for-sale investments

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
At 1 April	1.7	20.6
Disposal	_	(16.4)
Movements in fair value	2.1	_
Exchange difference	0.4	(2.5)
At 31 March	4.2	1.7

Financial assets investment represents quoted investments in equity shares that present the Group with an opportunity for returns through dividend income and gains in value. These securities are held at fair value based on market prices. These are classified as non-current as on 31 March 2015.

# 19. Other non-current assets

(US\$ million)	As at 31 March 2015	As at 31 March 2014
Deposits, advances and other receivables due after one year	156.0	132.1
	156.0	132.1

During the year ended 31 March 2015, interest and foreign exchange losses capitalised was US\$147.5 million (31 March 2014: US\$156.4 million).
 Certain property, plant and equipment are pledged as collateral against borrowings, the details related to which have been described in Note 24 on Borrowings.

#### 20. Inventories

(US\$ million)	As at 31 March 2015	As at 31 March 2014
Raw materials and consumables	975.8	952.9
Work-in-progress	486.0	557.7
Finished goods	143.9	231.9
	1,605.7	1,742.5

Inventories with a carrying amount of US\$801.8 million (2014: US\$879.5 million) have been pledged as security against certain bank borrowings of the Group.

### 21. Trade and other receivables

	As at 31 March	As at 31 March
(US\$ million)	2015	2014
Trade receivables	555.0	706.0
Amounts due from related parties (Note 39)	4.9	8.5
Prepayments	31.0	61.2
Deposits with Governments	281.3	169.9
Other receivables	967.0	794.3
	1,839.2	1,739.9

The credit period given to customers ranges from zero to 90 days. Other receivables primarily include excise balances, customs balances, advances to suppliers and claims receivables.

### 22. Liquid investments

(US\$ million)	As at 31 March 2015	As at 31 March 2014
Bank deposits <sup>1</sup>	1,850.1	2,655.3
Other investments	6,006.0	5,913.2
	7,856.1	8,568.5

<sup>1</sup> Includes US\$29.8 million of bank deposits at Jharsuguda Aluminium that is restricted in use as it relates to security deposits as directed by the courts in relation to a relief claim filed by a vendor (Note 38).

Bank deposits are made for periods of between three months and one year, depending on the cash requirements of the companies within the Group and earn interest at the respective deposit rates.

Other investments include mutual fund investments which are recorded at fair value with changes in fair value reported through the income statement. Liquid investments do not qualify for recognition as cash and cash equivalents due to their maturity period and risk of change in value of the investments.

### 23. Cash and cash equivalents

	As at 31 March	As at 31 March
(US\$ million)	2015	2014
Cash at bank and in hand	211.6	202.8
Short-term deposits <sup>1</sup>	142.1	166.6
	353.7	369.4

<sup>1</sup> Includes US\$66.5 million (2014: US\$88.8 million) of cash held in short-term deposit accounts that is restricted in use as it relates to unclaimed dividends, closure costs and future redundancy payments.

Short-term deposits are made for periods of between one day and three months, depending on the immediate cash requirements of the Group and earn interest at the respective short-term deposit rates.

### 24. Borrowings

(US\$ million)	As at 31 March 2015	As at 31 March 2014
Bank loans	11,474.9	10,916.2
Bonds	4,075.4	4,017.9
Other loans	14.5	15.6
Total	15,564.8	14,949.7
Borrowings are repayable as:		
Within one year (shown as current liabilities)	3,179.2	2,437.0
More than one year	12,385.6	12,512.7
Total	15,564.8	14,949.7

At 31 March 2015, the Group had available US\$2,177.9 million (2014: US\$2,370.6 million) of undrawn committed borrowing facilities in respect of which all conditions precedent had been met. The Group facilities are subject to certain financial and non-financial covenants. During the year ended 31 March 2015, the Group has complied with all the covenants attached to the borrowing facilities, except for one facility at BALCO, where the Company expected a potential breach in Net Debt to EBITDA ratio. For this expected breach, BALCO obtained a letter from the lender in February 2015 for waiver of testing of covenants for 2014–15. The Group also obtained a permanent waiver from a lender for testing of 'minimum consolidated net worth' covenant for the loans availed by the Company and at THL, MCNV, VAJL and VFJL. The primary covenants which must be complied with include fixed charge cover ratio, net borrowing to EBITDA ratio, total net assets to borrowings ratio and net interest expense to EBITDA ratio. The principal loans held by Group companies at 31 March 2015 were as follows:

# Vedanta Resources plc

Long-term bonds

In July 2008, the Company issued US\$500.0 million bonds bearing a coupon rate of 8.75% and US\$750.0 million bonds bearing a coupon rate of 9.50%. US\$500.0 million bonds due in January 2014 were duly paid. As at 31 March 2015, the amount outstanding is US\$750.0 million (2014: US\$750.0 million).

In July 2011, the Company issued US\$750.0 million bonds bearing a coupon rate of 6.75% and US\$900.0 million bonds bearing a coupon rate of 8.25%. The same is due for repayment in June 2016 and June 2021 respectively. As at 31 March 2015, the amount outstanding is US\$1,650.0 million (2014: US\$1,650.0 million).

In June 2013, the Company issued US\$1,200 million bonds bearing a coupon rate of 6% and US\$500.0 million at a coupon rate of 7.125%. The same is due for repayment in January 2019 and May 2023. As at 31 March 2015, the amount outstanding is US\$1,700.0 million (2014: US\$ 1,700.0 million).

All the above bonds are issued in the United States of America (USA) pursuant to Rule 144A of the US Securities Act of 1933 ('Securities Act') and outside of the USA in compliance with Regulations pursuant to the Securities Act. The bonds are unsecured and are currently rated BB (-) by Standard & Poor's and (-) Ba3 by Moody's.

#### Term loan

In December 2010, the Company availed a facility from the ICICI Bank for US\$180.0 million bearing an interest rate of three month GBP LIBOR plus 385 basis points. The first instalment of US\$90.0 million due in December 2014 was duly repaid and the balance US\$90.0 million is repayable in December 2015. As at 31 March 2015, the amount outstanding is US\$90.0 million (2014: US\$180.0 million).

In January 2011, the Company availed a facility from the ICICI Bank for US\$150.0 million bearing an interest rate of three month US\$LIBOR plus 389 basis points. The same is repayable as US\$75.0 million in January 2016 and the balance US\$75.0 million in January 2017. As at 31 March 2015, the amount outstanding is US\$150.0 million (2014: US\$ 150.0 million).

In July 2011, the Company availed a facility from the ICICI Bank for US\$500.0 million bearing an interest rate of three month US\$LIBOR plus 390 basis points. The same is repayable as US\$250.0 million in January 2018 and the balance US\$250.0 million in July 2018. As at 31 March 2015, the amount outstanding is US\$500.0 million (2014: US\$500.0 million).

In March 2012, the Company availed a facility of US\$300.0 million with the Standard Chartered Bank bearing an interest rate of LIBOR plus 415 basis points. The same was due for repayment in June 2015. This loan was fully prepaid in the month of May 2014.

In December 2012, the Company availed a syndicated facility with the State Bank of India as an agent for US\$595.0 million bearing an interest rate of three month US\$LIBOR plus 440 basis points. The same is repayable in four equal instalments in February 2017, August 2017, July 2018 and January 2019. This loan was fully prepaid in September 2014.

In March 2013, the Company entered into a three-year facility agreement with Deutsche Bank as an agent for an amount of US\$185.0 million bearing an interest rate of US\$LIBOR plus 315 basis points. The same is repayable in March 2016. As at 31 March 2015, the amount outstanding is US\$185.0 million (2014: US\$185.0 million).

In March 2013, the Company entered into two facility agreements with the ICICI Bank for an amount of US\$170.0 million and US\$180.0 million. The loans bear interest rates of US\$LIBOR plus 430 basis points and US\$LIBOR plus 427 basis points respectively. Of the said loan, US\$170.0 million is repayable in three annual instalments beginning April 2018 (the first instalment being 20% and the balance of two instalments being 40% each) and the US\$180.0 million facility is repayable in three equal annual instalments beginning February 2017. As at 31 March 2015, the amount outstanding is US\$350.0 million (2014: US\$350.0 million).

In April 2013, the Company entered into a Standby Letter of Credit agreement arranged by Axis Bank for an amount of US\$150 million bearing an interest rate at three month US\$LIBOR plus 290 basis points. The facility is repayable in two equal annual instalments in April 2017 and April 2018. As at 31 March 2015, the amount outstanding is US\$148.5 million (2014: US\$148.5 million).

In October 2013, the Company entered into a syndicated facility agreement with the Standard Chartered Bank as facility agent for borrowing up to US\$500 million bearing an interest rate US\$LIBOR plus 357 basis points. The same is repayable as two equal instalments of US\$250.0 million each in October 2017 and January 2018. As at 31 March 2015, the amount outstanding is US\$500.0 million (2014: US\$500.0 million).

In November 2013, the Company entered into a two-year Revolving Credit Facility arranged by The Royal Bank of Scotland and Standard Chartered Bank for borrowing up to US\$100 million at an interest rate US\$LIBOR plus 250 basis points. The same is repayable in August 2015. As at 31 March 2015, the amount outstanding is US\$100.0 million (2014: US\$81.0 million).

In December 2013, the Company entered into a facility agreement with the Bank of India for borrowing up to US\$100 million at an interest rate US\$LIBOR plus 357 basis points. The same is repayable in two equal instalments of US\$50.0 million each in October 2017 and January 2018. As at 31 March 2015, the amount outstanding is US\$100.0 million (2014: US\$100.0 million).

In March 2014, the Company entered into a US\$500 million syndicated facility agreement with Axis Bank as the lead arranger. The facility bears an interest rate of US\$LIBOR plus 352 basis points. The facility was fully drawn in September 2014. The same is repayable as US\$100.0 million in December 2018, US\$150.0 million in March 2019 and US\$250.0 million in September 2019. As at 31 March 2015, the amount outstanding is US\$500.0 million.

In March 2015, the Company entered into a facility agreement with the State Bank of India for US\$350 million. Out of said facility US\$100 million (Undrawn US\$75.0 million) bears an interest rate of US\$LIBOR plus 370 basis points and is repayable in March 2020. Balance undrawn facility of US\$250 million bears an interest rate of US\$LIBOR plus 403 basis points with repayment in two instalments being US\$100 million and US\$150 million at the end of 72 and 84 months respectively after initial draw down. As at 31 March 2015, the amount outstanding is US\$25.0 million.

### Twin Star Mauritius Holdings Limited (TMHL)

### Term loan

In May 2013, the Group tied up a term loan facility of US\$1,200 million borrowed by TMHL through a syndicate of banks with the Standard Chartered Bank (SCB) as facility agent to partly refinance US\$2,664 million drawn to meet the funding requirements for the acquisition of a 28.5% stake in Cairn India Limited in December 2011. The facility bears an interest rate of LIBOR plus 275 basis points and is due for repayment in four equal annual instalments starting June 2015. The facility of US\$2,664 million due for repayment as US\$1,350.0 million in June 2013 and US\$1,314.4 million in December 2014 was fully prepaid in June 2013. As at 31 March 2015, the amount outstanding is US\$1,200.0 million (2014: US\$1,200.0 million).

In August 2014, the Group tied up a US\$500 million facility with the Standard Chartered Bank and First Gulf Bank PJSC of which US\$250 million is under a commodity murabaha structure (Islamic financing) and balance US\$250 million is under a conventional loan structure. Out of the said facility US\$287.5 million bears an interest rate of LIBOR plus 275 basis points with an average maturity of about five years from the date of first drawdown in August 2014 and balance amount of US\$212.5 million bears an interest rate of LIBOR plus 340 basis points with an average maturity of about six years from the date of first drawdown in August 2014. As at 31 March 2015, the amount outstanding is US\$500.0 million.

### Vedanta Limited

#### Term Ioan

Jharsuguda Aluminium has obtained a US\$1,599.6 million loan from the State Bank of India (SBI) at a floating interest rate of SBI bank base rate plus 175 basis points, secured by a first priority charge by way of pledge of all present and future unencumbered and encumbered movable fixed assets for the project, a first charge by way of mortgage on all present and future immovable fixed assets for the project and second charge on the current assets of the Aluminium division of the project. During the current year, the total outstanding amount as at 31 March 2014 has been repaid.

In March 2014, Jharsuguda Aluminium had availed a facility of US\$287.5 million from Axis Bank at an average interest rate of bank base rate plus 25 basis points per annum. In May 2014, the said facility was further enhanced by US\$32.0 million. During the year, the same has been down sell to the following banks:

- a) Axis Bank US\$39.9 million at an average interest rate of bank base rate plus 25 basis points per annum. The facility is secured by first charge by way of mortgage/pledge of movable/immovable all present and future fixed assets of the Aluminium division for the project. The same is repayable as US\$32.0 million in February 2017 and US\$7.9 million in February 2018. As at 31 March 2015, the amount outstanding is US\$39.9 million.
- b) Bank of India US\$79.9 million at an average interest rate of Bank base rate plus 25 basis points per annum. The facility is secured by first charge by way of mortgage/pledge of movable/immovable all present and future fixed assets of the Aluminium division for the project. The same is repayable as US\$32.0 million in February 2017, US\$32.0 million in February 2018 and US\$15.9 million in February 2019. As at 31 March 2015, the amount outstanding is US\$79.9 million
- c) Corporation Bank US\$79.9 million at an average interest rate of bank base rate plus 25 basis points per annum. The facility is secured by first charge by way of mortgage/pledge of movable/immovable all present and future fixed assets of the Aluminium division for the project. The same is repayable as US\$12.0 million in February 2017, US\$27.9 million in February 2018 and US\$40.0 million in February 2019. As at 31 March 2015, the amount outstanding is US\$79.9 million.
- d) Syndicate Bank US\$79.9 million at an average interest rate of bank base rate plus 25 basis points per annum. The facility is secured by first charge by way of mortgage/pledge of movable/immovable all present and future fixed assets of the Aluminium division for the project. The same is repayable as US\$12.0 million in February 2017, US\$27.9 million in February 2018 and US\$40.0 million in February 2019. As at 31 March 2015, the amount outstanding is US\$79.9 million.
- e) Vijaya Bank US\$39.9 million at an average interest rate of bank base rate plus 25 basis points per annum. The facility is secured by first charge by way of mortgage/pledge of movable/immovable all present and future fixed assets of the Aluminium division for the project. The same is repayable as US\$7.9 million in February 2017, US\$16.0 million in February 2018 and US\$16.0 million in February 2019. As at 31 March 2015, the amount outstanding is US\$39.9 million.

In July 2014, Jharsuguda Aluminium has availed a facility of US\$798.8 million from the State Bank of India (SBI) at a floating interest rate of SBI Base rate plus 60 basis points. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2021. As at 31 March 2015, the amount outstanding is US\$692.2 million.

In April 2014, Jharsuguda Aluminium has availed a facility of US\$319.5 million from the Bank of Baroda at a floating interest rate of bank base rate plus 25 basis points. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2020. As at 31 March 2015, the amount outstanding is US\$316.3 million.

In April 2014, Jharsuguda Aluminium has availed a facility of US\$319.5 million from the Bank of India at a floating interest rate of bank base rate plus 25 basis points. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2020. As at 31 March 2015, the amount outstanding is US\$304.4 million.

In April 2014, Jharsuguda Aluminium availed a facility of US\$79.9 million from the State Bank of Bikaner & Jaipur at a floating interest rate of bank base rate plus 25 basis points. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2020. As at 31 March 2015, the amount outstanding is US\$79.1 million.

In April 2014, Jharsuguda Aluminium has availed a facility of US\$163.8 million from the Syndicate Bank at a floating interest rate of the bank base rate plus 25 basis points. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2020. As at 31 March 2015, the amount outstanding is US\$162.1 million.

In April 2014, Jharsuguda Aluminium has availed a facility of US\$159.8 million from the Union Bank of India at a floating interest rate of bank base rate plus 25 basis points. The facility is secured by creating first pari passu charge by way of hypothecation of the movable fixed assets and mortgage on immovable fixed assets of the Aluminium division, both present and future. The same is repayable in quarterly instalments up to December 2020. As at 31 March 2015, the amount outstanding is US\$157.4 million.

In September 2013, Jharsuguda's 2,400MW power plant has availed a facility of US\$159.8 million from the Axis Bank at an interest rate of 10.50% per annum. The facility is secured by way of mortgage and charge on all the immovable properties, both present and future, of Jharsuguda's 2,400MW power plant except IPP Agricultural Land and a second charge by way of pledge on all the movable fixed assets of the Power division. As at 31 March 2014, the amount outstanding was US\$159.8 million. The same has been duly repaid in September 2014.

In December 2013, Jharsuguda 2,400MW power plant has availed a facility of US\$62.9 million from the Canara Bank at an interest rate of 10.2% per annum. In August 2014, this facility has further been enhanced by US\$95.9 million. The facility is secured by way of mortgage and charge on all the immovable properties, both present and future, of Jharsuguda's 2,400MW power plant except IPP Agricultural Land and a second charge by way of pledge on all the movable fixed assets of the Power division. The loan is repayable in 16 quarterly instalments from end of quarter starting after the moratorium period up to December 2018. As at 31 March 2015, the amount outstanding is US\$149.8 million.

#### Short-term loans

In January 2015, Jharsuguda Aluminium availed a short-term borrowing facility in the form of export packing credit from Bank of America at an average rate of 9.50% per annum. These loans were obtained to meet the working capital requirements. The same is repayable in April 2015. As at 31 March 2015, the amount outstanding is US\$32.0 million.

In October 2014, Jharsuguda Aluminium availed a short-term borrowing facility in foreign currency in the form of pre shipment/export packing credit from the Bank of America at an average rate of LIBOR plus 65–70 basis points. These loans were obtained to meet the working capital requirements. The same is repayable as US\$32.6 million in April 2015 and US\$14.6 million in May 2015. As at 31 March 2015, the amount outstanding is US\$47.2 million.

Iron Ore Sesa obtained a short-term borrowing facility in foreign currency in the form of pre shipment/export packing credit from various banks at average rate of US\$LIBOR plus 55 basis points. These loans were obtained to meet the working capital requirements of the Iron Ore Division. As at 31 March 2015, the amount outstanding is US\$36.0 million (2014: US\$48.5 million).

#### **NCDs**

In October 2008, Jharsuguda Aluminium has issued NCDs of US\$66.6 million to the Life Insurance Corporation of India at a rate of 11.5% per annum. These NCDs are secured and have the first pari passu charge over the identified assets (including land and building) of the issuer to the extent of 1.33 times of the issued amount. These NCDs are repayable in three equal annual instalments starting October 2013. The First two instalments, due for repayment of US\$22.2 million each, has been paid in October 2013 and October 2014 respectively. The balance of US\$22.2 million is due for repayment in October 2015. As at 31 March 2015, the amount outstanding is US\$22.2 million.

In December 2012, April 2013 and July 2013, Vedanta Limited had issued NCDs in three tranches for US\$79.8 million, US\$191.7 million and US\$399.4 million with an interest rate of 9.24%, 9.17% and 9.10% per annum respectively. Out of the total NCDs US\$191.7 million are secured by way of a mortgage on the immovable property of Vedanta Limited situated at Sanaswadi in the state of Maharashtra and also by way of pledge on the movable fixed assets of Jharsuguda Aluminium division with a security cover of 1.25 times on the face value of outstanding NCDs at all times during the tenure of NCDs. The balance NCDs of US\$479.3 million are secured by way of mortgage on the immovable property of Vedanta Limited situated at Sanaswadi in the state of Maharashtra and also by way of pledge on the movable fixed assets of Jharsuguda's 2,400MW power plant with a security cover of 1.25 times on the face value of outstanding NCDs at all times during the tenure of NCDs. Of the total outstanding NCDs, US\$79.8 million is repayable in December 2022, US\$399.4 million in April 2023 and US\$191.7 million in July 2023. The NCDs have put and call options respectively at the end of five years from the respective date of allotment. As at 31 March 2015, the amount outstanding is US\$671.0 million.

In October, November and December 2012, Vedanta Limited had also issued NCDs in three tranches for US\$79.9 each per tranche with an interest rate of 9.24%, 9.40% and 9.40% per annum respectively. These NCDs are secured by way of a mortgage on the immovable property of Vedanta Limited situated at Sanaswadi in the state of Maharashtra and also by way of a pledge on the movable fixed assets of Jharsuguda's 2,400MW power plant with a security cover of 1.25 times on the face value of outstanding NCDs at all times during the tenure of NCDs. Of the total outstanding NCDs, US\$79.9 million is repayable in October 2022, US\$79.9 million in November 2022 and US\$79.9 million in December 2022. The NCDs have put and call options respectively at the end of five years from the respective date of allotment of the NCDs. As at 31 March 2015, the amount outstanding is US\$239.6 million.

In October 2014, Iron Ore Sesa has also issued NCDs of US\$239.7 million with an interest rate of 9.36% per annum. These NCDs are secured by way of a mortgage on the immovable property of Vedanta Limited situated at Tuticorin in the State of Tamil Nadu and also by way of first ranking pari passu charge over 'movable fixed assets' in relation to Vedanta Limited's Iron Ore Sesa business (pig iron & met coke assets) and Power Plant assets located in Goa and the Copper plant assets located at Tuticorin with a security cover of 1.25 times on the face value of outstanding NCDs at all times during the tenure of the NCDs. These NCDs are redeemable in two instalments as US\$155.8 million in October 2017 and US\$83.9 million in December 2017. As at 31 March 2015, the amount outstanding is US\$239.7 million.

### External commercial borrowing

In August 2008, Jharsuguda Aluminium obtained an External Commercial Borrowing from the ICICI Bank, Singapore of US\$100.0 million at an interest rate of US\$LIBOR plus 240 basis points secured by negative lien undertaking on the assets of the Jharsuguda project of Aluminium division, both present and future, excluding assets already charged in favour of ICICI Bank and other lenders. The same was repayable in August 2014. As at 31 March 2014, the amount outstanding was US\$25.0 million which has been duly repaid.

During the year Jharsuguda Aluminium obtained an External Commercial Borrowing from Axis Bank of US\$500.0 million which has been refinanced by ICICI Bank and SCB at an interest rate of US\$LIBOR plus 170 basis points (prior to refinancing at an interest rate of US\$LIBOR plus 400 basis points) having a subservient charge on all present and future movable assets of Aluminium division. The repayment is to be made in three equal instalments starting from April 2015. As at 31 March 2015, the amount outstanding is US\$500.0 million (2014: US\$500.0 million).

During the year ended 31 March 2013, a part of intercompany borrowing from Welter Trading Limited was refinanced through Axis Bank. This has been further refinanced from Standard Chartered Bank for US\$44.5 million at an interest rate of US\$LIBOR plus 129 basis point (prior to refinancing at an interest rate of US\$LIBOR plus 360 basis points) having a subservient charge on all present and future movable assets of Jharsuguda Aluminium. The entire loan is repayable in July 2015. As at 31 March 2015, the amount outstanding is US\$44.5 million (2014: US\$44.5 million).

### Project buyers' credit

Jharsuguda Aluminium had extended credit terms relating to purchases of property, plant and equipment bearing an average interest rate of LIBOR plus 26–55 basis points. These are secured by all of the fixed assets of Jharsuguda Aluminium, immovable or movable, present and future, on a pari passu basis with other term lenders and with priority over other creditors. Project buyers' credit have an average maturity of May 2015. As at 31 March 2015, the amount outstanding is US\$2.0 million (2014: US\$21.8 million).

### Commercial papers

During the year, Jharsuguda's 2,400MW power plant has issued commercial paper to various asset management companies bearing an average coupon rate of 8.72% for funding project payables. As at 31 March 2015, the amount outstanding is US\$180.5 million (2014: US\$257.1 million).

During the year, Iron Ore Sesa has issued commercial papers for periods ranging up to one year bearing average interest rates ranging between 8.79% to 9.25%. These commercial papers are used to meet working capital requirements of the Iron Ore division and are repayable in the next financial year. As at 31 March 2015, the outstanding balance was US\$380.2 million (2014: US\$280.2 million).

#### KCM

A term loan facility of US\$820 million (2014: US\$700 million) has been obtained by KCM from Standard Bank. The term loan facility is made up of three tranches: US\$300 million ('Facility A'), US\$120 million ('Facility A1') and US\$400 million ('Facility B') drawn down on various dates with the last amount drawn in June 2014. The facility was restructured in 2014. The loan is secured against the fixed assets of KCM and a US\$400.0 million corporate guarantee from Vedanta Resources plc. Interest is payable quarterly at LIBOR plus 350 basis points for Facility A & A1 and LIBOR plus 250 basis points for Facility B. The facility is repayable in 16 quarterly instalments commencing June 2015. As at 31 March 2015, the amount outstanding is US\$710.9 million (2014: US\$590.9 million).

A general short-term banking facility incorporating multiple sub-facilities amounting to US\$30 million (2014: US\$50 million) was provided by Stanbic Bank. The facility was agreed upon on 1 June 2011. Interest is payable monthly at three month US\$LIBOR plus 350 basis points. The facility is repayable strictly on demand. The tenure for the facility is 12 months. The amount drawn as at 31 March 2015 under this facility is US\$27.8 million (2014: US\$49.9 million).

A general short-term banking facility incorporating multiple sub-facilities amounting to US\$50 million (2014: US\$85 million) was provided by Standard Chartered Bank. The facility was agreed upon on 26 May 2011. The facility bears an interest rate of LIBOR plus 300 basis points. The facilities are repayable strictly on demand. The tenure for the facility is 12 months. As at 31 March 2015, the amount outstanding is US\$50.0 million (2014: US\$49.6 million).

#### BALCO

#### Non-convertible debentures (NCDs)

In November 2008, BALCO issued NCDs of US\$79.9 million to the Life Insurance Corporation of India at a rate of 12.25% per annum. These NCDs are secured and have the first pari passu charge on the fixed assets of BALCO including land and buildings. These NCDs were repayable in three equal instalments in November 2013, November 2014 and November 2015. The first two instalments had been duly repaid. As at 31 March 2015, the amount outstanding is US\$26.6 million repayable in November 2015.

In May 2013, BALCO issued NCDs of US\$79.9 million to Kotak Mahindra Bank, Axis Bank Limited and Wipro Limited at an interest rate of 8.58% per annum (Series-I) and 8.60% per annum (Series-II). These NCDs are secured and have the first pari passu charge on the fixed assets of BALCO. These NCDs are repayable in two equal instalments in November 2015 and May 2016. As at 31 March 2015, the amount outstanding is US\$79.9 million.

In August 2014, BALCO issued NCDs of US\$79.9 million to Banks and Financial Institutions arranged by Deutche Bank at an interest rate of 10.25% per annum. These NCDs are secured and have the first pari passu charge on the fixed assets of BALCO. These NCDs are repayable in August 2017. As at 31 March 2015, the amount outstanding is US\$79.9 million.

### Project buyers' credit

BALCO has extended credit terms relating to the purchase of property, plant and equipment at an average interest rate of US\$LIBOR plus 112 basis points. Project buyers' credits have an average maturity of August 2016. As at 31 March 2015, the amount outstanding is US\$59.6 million (2014: US\$114.5 million).

#### External commercial borrowing

In August 2011, BALCO obtained an External Commercial Borrowing loan from the State Bank of India, London of US\$200 million at an interest rate of six month US\$LIBOR plus 260 basis points secured by first pari passu charges on all the fixed assets (excluding land) of BALCO projects both present and future along with secured lenders. The above loan is repayable in three equal annual instalments starting August 2016. As at 31 March 2015, the amount outstanding is US\$200.0 million (2014: US\$200.0 million).

In November 2008, BALCO has also obtained an External Commercial Borrowing loan from DBS Bank Singapore of US\$24.8 million at an interest rate of six month US\$LIBOR plus 345 basis points secured by first pari passu charges on all movable fixed assets including plant and machinery related to 1,200MW power project and 3.25 LTPA Smelter projects both present and future along with secured lenders. First instalment due for repayment of US\$8.3 million has been paid in November 2013. The balance two equal instalments were due for repayment in November 2014 and November 2015. The above loan had been fully prepaid in November 2014.

### Commercial paper

During the year, BALCO has issued commercial papers bearing an average coupon rate of 8.95% per annum to various asset management companies for the funding of project loan repayment and other payables. As at 31 March 2015, the amount outstanding is US\$317.1 million (2014: US\$186.4 million).

### Talwandi Sabo

#### NCDs

In December 2010 and January 2011, Talwandi Sabo has issued NCDs of US\$239.7 million to the ICICI Bank at a rate of 9.8% per annum. These NCDs are secured by first pari passu charge on the assets of Talwandi Sabo both present and future, with an unconditional and irrevocable corporate guarantee by Vedanta Limited. These NCDs have tenure of 13 years and are repayable in 12 equal instalments after 10 years after allotment. These NCDs have a call option, five years after allotment. As at 31 March 2015, the amount outstanding is US\$239.7 million.

In September 2014 (two tranches), November 2014 and March 2015, Talwandi Sabo has also issued NCDs of US\$131.8 million in four tranches of US\$19.1 million, US\$28.8 million, US\$32.0 million and US\$51.9 million respectively at an interest rate of 9.60% per annum, 9.70% per annum, 9.27% per annum and 8.91% per annum respectively, to various asset management companies for fresh project funding and repayment of loan. These NCDs are secured by first pari passu charge on the assets of Talwandi Sabo both present and future, with an unconditional and irrevocable corporate guarantee by Vedanta Limited. These NCDs are repayable in tranches as US\$19.1 million in September 2016, US\$28.8 million in September 2017, US\$32.0 million in November 2017 and balance US\$51.9 million in April 2018. As at 31 March 2015, the amount outstanding is US\$131.8 million.

#### Term loan

In September 2014, Talwandi Sabo has availed a rupee term loan facility of US\$79.9 million from the Kotak Mahindra Bank Limited at an interest rate of 10.10% per annum. The facility is secured by first pari passu charge on the assets of Talwandi Sabo both present and future, with an unconditional and irrevocable corporate guarantee by Vedanta Limited. The facility is repayable as first 50% of the loan amount in 24 equal quarterly instalments starting from December 2015 and balance of 50% of loan amount in March 2021. As at 31 March 2015, the amount outstanding is US\$79.9 million.

### Project buyers' credit

Talwandi Sabo has accessed buyers credit in respect of purchase of capital goods at an average rate of a six month US\$LIBOR plus 69 basis points. The average maturity of the project buyers' credit is January 2016. As at 31 March 2015, the amount outstanding is US\$177.1 million (2014: US\$481.0 million).

### Commercial paper

During the year, Talwandi Sabo has issued commercial paper to various asset management companies for the funding of project loan repayment bearing an average coupon rate of 9.06% per annum. As at 31 March 2015, Talwandi Sabo had an outstanding balance of US\$417.0 million (2014: US\$106.5 million).

#### **VGCB**

#### NCDs

In May 2013, VGCB has issued NCDs of US\$47.9 million to IDFC Limited at a rate of 9% per annum to refinance the existing term loan from Axis Bank. These NCDs are secured by 1.1 times on the face value of outstanding debentures, by way of charge on the fixed assets of VGCB at all time during the currency of the debentures. Debentures have a tenure of three years with put and call option at the end of the second year. As at 31 March 2015, the amount outstanding is US\$47.9 million.

### 25. Non-equity non-controlling interests

As at 31 March 2015, non-equity non-controlling interests amounts to US\$11.9 million, being deferred shares in KCM held by ZCCM. The deferred shares have no voting rights or rights to KCM's dividends, but are entitled on a winding up to a return of up to US\$0.99 per share once all of KCM's ordinary shares have received a distribution equal to their par value and any share premium created on their issue and which remains distributable to them.

The deferred shares are held at historic cost, being the fair value attributed to them at the time of initial acquisition of KCM in the year ended 31 March 2005. They are classified as non-current liabilities as they are repayable only on the winding up of KCM, for an amount different than the pro rata share of net assets upon liquidation. The shares have been valued at US\$0.99 per share, which is the maximum amount payable to the deferred shareholders. These deferred shares have not been discounted as the effect would not be material.

### 26. Movement in net debt1

			I	Debt due within			
				one year	Debt due afte	r one year	
	Cash and cash	Liquid	Total cash and	Debt carrying	Debt carrying	Debt-related	
(US\$ million)	equivalents	investments liq	uid investments	value	value	derivatives <sup>2</sup>	Total net debt
At 1 April 2013	2,200.2	5,781.5	7,981.7	(4,400.1)	(12,192.7)	(4.5)	(8,615.6)
Cash flow	(1,701.7)	2,857.0	1,155.3	2,832.7	(3,130.7)	_	857.3
Other non-cash changes <sup>3</sup>	_	344.4	344.4	(2,942.3)	2,385.7	18.3	(193.9)
Foreign exchange differences	(129.1)	(414.4)	(543.5)	151.2	425.0	_	32.7
At 1 April 2014	369.4	8,568.5	8,937.9	(4,358.5)	(12,512.7)	13.8	(7,919.5)
Cash flow	(13.9)	(671.7)	(685.6)	818.8	(1,050.1)	_	(916.9)
Other non-cash changes <sup>3</sup>	_	250.8	250.8	294.8	(46.7)	(16.1)	482.8
Foreign exchange differences	(1.8)	(291.5)	(293.3)	65.7	120.9	_	(106.7)
At 31 March 2015	353.7	7,856.1	8,209.8	(3,179.2)	(13,488.6)	(2.3)	(8,460.3)

- Net (debt)/cash being total debt reduced by cash and cash equivalents and liquid investments, as carried at fair value under IAS 32 and 39.
   Debt related derivatives exclude derivative financial assets and liabilities relating to commodity contracts and forward foreign currency contracts.
- 3 Other non-eash changes comprises of mark to market of embedded derivatives, interest accretion on convertible bonds and amortisation of borrowing costs for which there is no cash movement. It also includes US\$250.8 million (2014: US\$344.4 million) of fair value movement in investments.

### 27. Trade and other payables

# (a) Current trade payables

	As at 31 March	As at 31 March
(US\$ million)	2015	2014
Trade payables	2,159.9	2,170.2
Bills of exchange payable	1,512.4	1,509.5
Accruals and deferred income	354.4	362.4
Other trade payables	703.3	647.9
	4,730.0	4,690.0

Non-interest bearing trade payables are normally settled on 60 to 90-day terms.

Interest bearing trade payables amount to US\$1,567.5 million (2014: US\$1,615.2 million). Bills of exchange are interest-bearing and are normally payable within 180 days. Bills of exchange payable comprise of credit availed from financial institutions for direct payment to suppliers for raw materials purchased. The fair values of the trade and other payables are not materially different from the carrying values presented.

### (b) Non-current trade payables

	As at 31 March	As at 31 March
(US\$ million)	2015	2014
Other trade payables	194.3	203.3
	194.3	203.3

Other trade payables primarily comprise amounts withheld as retentions, payable to suppliers of capital projects after satisfactory completion of contractual commissioning period, which are payable after the completion of commissioning. The fair value of the non-current trade payables are not materially different from the carrying values presented.

### 28. Convertible bonds

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
A. VRJL	1,096.4	1,177.1
B. VRJL-II	6.6	65.7
C. FCCB – Vedanta Limited	_	678.7
	1,103.0	1,921.5

A. Vedanta Resource Jersey Limited (VRJL) issued 5.5% US\$1,250 million guaranteed convertible bonds on 13 July 2009. The bonds are first convertible into exchangeable redeemable preference shares to be issued by VRJL, which will then be automatically exchanged for ordinary shares of Vedanta Resources plc. The bondholders have the option to convert at any time from 24 August 2009 to 6 July 2016. Conversion option exercised before 15 August 2012 were convertible at US\$36.48 per share. Conversion options exercised on or after 15 August 2012 were convertible at US\$35.58 per share.

If the notes have not been converted, they will be redeemed at the option of the Company at any time on or after 28 July 2012 subject to certain conditions, or be redeemed at the option of the bondholders on or after 13 July 2014.

If the notes have not been converted, they will be redeemed at the option of the issuer on or at any time after 28 July 2013, subject to the conditions as part of the issue. Bondholders had exercised put option on 14 July 2014, accordingly bonds with a face value of US\$113.8 million (9.1% of total face value) were redeemed during the year ending 31 March 2015.

The net proceeds of the convertible issue have been split between the liability element and equity component, representing the fair value of the embedded option to convert the liability into equity of the Company, as follows:

(US\$ million)	Year ended 31 March 2015	Year ended 31 March 2014
Opening liability	1,177.1	1,056.0
Effective interest cost	97.3	191.0
Conversion of Convertible bonds	_	(1.2)
Repayment of Convertible bonds	(113.8)	_
Coupon interest paid/accrued	(64.2)	(68.7)
Closing liability	1,096.4	1,177.1

The interest charged for the year is calculated by applying an effective interest rate of 8.7% (2014: 17.3%).

The fair value of the convertible bond as at 31 March 2015 is US\$1,056.9 million (31 March 2014: US\$1,241.7 million).

B. Vedanta Resource Jersey II Limited (VRJL-II) issued 4.0% US\$883 million guaranteed convertible bonds on 30 March 2010. The bonds are first convertible into exchangeable redeemable preference shares to be issued by VRJL-II, which will then be automatically exchanged for ordinary shares of Vedanta Resources plc. The bondholders have the option to convert at any time from 10 May 2010 to 23 March 2017. Conversion option exercised before 15 August 2012, were convertible at US\$51.9251 per share. Conversion Options exercised on or after 15 August 2012, are convertible at US\$50.6460, as per the terms of offering circular.

If the notes have not been converted, they will be redeemed at the option of the Company at any time on or after 14 April 2013 subject to certain conditions, or be redeemed at the option of the bondholders on or after 29 April 2013 to 30 March 2015.

Bondholders exercised the put option in March 2015, resulting in redemption of US\$65.1 million bonds during the year ending 31 March 2015. The maturity of remaining bonds is March 2017

At the inception the net proceeds of the convertible issue was split between the liability element and a derivative component, representing the fair value of the embedded option to convert the liability into equity of the Company. The latter was not been recorded within equity due to the existence of partial cash settlement terms within the bond which prevent the adoption of compound financial instrument accounting.

(US\$ million)	Year ended 31 March 2015	Year ended 31 March 2014
Opening liability	65.7	753.6
Effective interest cost	8.9	11.9
Repayment of Convertible Bonds	(65.1)	(694.3)
Coupon interest paid/accrued	(2.9)	(5.5)
Closing liability	6.6	65.7

The interest charged for the year is calculated by applying an effective interest rate of 15.0% (2014: 15.0%).

The fair value of the convertible bond as at 31 March 2015 was US\$7.8 million (31 March 2014: US\$72.5 million).

C. Vedanta Limited issued 4% US\$500 million convertible bonds (denominated in US dollars) on 29 October 2009 which were due on 30 October 2014. The bonds are convertible into American Depository Share (ADS) to be issued by Vedanta Limited. The bondholders have the option to convert at any time before 29 October 2014 at a conversion ratio of 42.8688 for every US\$1,000 of principal which is equal to a conversion price of US\$23.33 per ADS. Pursuant to the effectiveness of Group simplification scheme in August 2014 (refer Note 45) conversion rate has changed to 25.7213 ADSs every US\$1,000 principal amount of notes which is equal to a conversion price of approximately US\$38.88 per ADS. Vedanta has the option (subject to the terms of the bond) to redeem the convertible bond at any time after 4 November 2012.

Vedanta Limited had also issued 5% US\$500 million convertible bonds (denominated in US dollars) on 30 October 2009 and due 31 October 2014. The bonds are convertible into ordinary shares of Vedanta Limited. The bondholders have the option to convert at any time after 10 December 2009 and before 24 October 2014 at a conversion ratio of 13837.6384 for every US\$100,000 principal. Vedanta Limited has the option (subject to certain conditions) to redeem the convertible bond at any time after 30 October 2012. As the functional currency of Vedanta Limited is INR, the conversion of the convertible bonds (which are denominated in US dollars) would not result in the settlement and exchange of a fixed amount of cash in INR terms, for a fixed number of its shares respectively. Accordingly, the convertible bond must be separated into two component elements: a derivative component consisting of the conversion option (carried at fair value) and a liability component consisting of the debt element of the bonds. Further details of the accounting for such instruments are provided in the Group accounting policies (Note 2a).

The following table shows the movements in the Vedanta Limited bonds during the year on an aggregated basis:

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
Opening liability	678.7	624.9
Effective interest cost	57.2	92.9
Coupon interest paid	(19.8)	(34.4)
Decrease in fair value of derivative component	_	(4.7)
Repayment of FCCB's	(716.1)	
Closing liability	_	678.7

The interest charged for the year is calculated by applying an effective interest rate of 12.7% (2014: 12.7%) for 4% US\$500 million convertible notes and 19.1% (31 March 2014: 19.4%) for 5% US\$500 million convertible notes.

As at 31 March 2014, the outstanding closing balance was US\$716.8 million. These convertible bonds were repaid during the year ended 31 March 2015.

### Summary of convertible bond movements:

	Year ended	Year ended
	31 March 2015	31 March 2014
Opening liability	1,921.5	2,434.5
Effective interest cost	163.4	295.8
Coupon interest paid	(86.8)	(108.6)
Conversion of convertible bonds	_	(1.2)
Decrease in fair value of derivative component	_	(4.7)
Repayment of bonds	(895.1)	(694.3)
Closing liability	1,103.0	1,921.5

#### 29. Financial instruments

The accounting classification of each category of financial instruments, and their carrying amounts, are set out below:

(US\$ million)	As at 31 March 2015 <sup>1</sup>	As at 31 March 2014 <sup>1</sup>
Financial assets		
At fair value through profit or loss		
- Held for trading	7,856.1	8,568.5
- Financial instruments (derivatives)	16.8	70.2
Cash and cash equivalents	353.7	369.4
Loan and receivables		
- Trade and other receivables	1,132.6	1,278.1
- Other non-current assets	129.8	132.1
Available-for-sale investments		
– Financial asset investments held at fair value	4.2	1.7
<u>Total</u>	9,493.2	10,420.0
Financial liabilities		
At fair value through profit or loss		
- Financial instruments (derivatives)	(45.8)	(146.1)
Financial liabilities at amortised cost		
- Trade and other payables	(4,808.2)	(4,772.6)
- Borrowings <sup>2</sup>	(16,667.8)	(16,871.2)
<u>Total</u>	(21,521.8)	(21,789.9)

IFRS 13 requires additional information regarding the methodologies employed to measure the fair value of financial instruments which are recognised or disclosed in the accounts. These methodologies are categorised per the standard as:

Level 1 fair value measurements are those derived from quoted prices (unadjusted) in active markets for identical assets or liabilities.

Level 2 fair value measurements are those derived from inputs other than quoted prices that are observable for the asset or liability, either directly (i.e. as prices) or indirectly (i.e. derived from prices).

Level 3 fair value measurements are those derived from valuation techniques that include inputs for the asset or liability that are not based on observable market data (unobservable inputs).

The below table summarises the categories of financial assets and liabilities measured at fair value:

		h 2015
(USS million)	Level 1	Level 2
Financial assets		
At fair value through profit or loss		
- Held for trading	7,856.1	-
- Financial instruments (derivatives)	_	16.8
Available-for-sale investments		
- Financial asset investments held at fair value	4.2	-
Total	7,860.3	16.8
Financial liabilities		
At fair value through profit or loss		
- Financial instruments (derivatives)	_	(45.8)
Total	_	(45.8)
	As at 31 Marc	ch 2014
(US\$ million)	Level 1	Level 2
Financial assets		
At fair value through profit or loss		
- Held for trading	8,568.5	-
- Financial instruments (derivatives)	_	70.2
Available-for-sale investments		
- Financial asset investments held at fair value	1.7	-
Total	8,570.2	70.2
Financial liabilities		
At fair value through profit or loss		
– Financial instruments (derivatives)	_	(146.1)
		(146.1)

There were no transfers between Level 1 and Level 2 during the year. No financial assets or liabilities that are measured at fair value were Level 3 fair value measurements.

The fair value of borrowings is US\$16,790.9 million (2014: US\$16,973.8 million), classified under Level 2 of fair value hierarchy. For all other financial instruments, the carrying amount is either the fair value, or approximates to the fair value.

The fair value of financial asset investments represents the market value of the quoted investments and other traded instruments. For other financials assets the

Excluding non-financial assets and liabilities.

Includes amortised cost liability portion of convertible bonds US\$1,103.0 million (2014: US\$1,921.5 million).

carrying value is considered to approximate to fair value.

The fair value of financial liabilities is the market value of the traded instruments, where applicable. Otherwise fair value is calculated using a discounted cash flow model with market assumptions, unless the carrying value is considered to approximate to fair value.

The fair value of the embedded derivative liability of the convertible bond has been calculated using the Black-Scholes model with market assumptions.

#### Derivative instruments and risk management

The Group's businesses are subject to several risks and uncertainties including financial risks.

The Group's documented risk management policies act as an effective tool in mitigating the various financial risks to which the businesses are exposed in the course of their daily operations. The risk management policies cover areas such as liquidity risk, commodity price risk, foreign exchange risk, interest rate risk, credit risk and capital management (the latter covered in Note 34).

Risks are identified through a formal risk management programme with active involvement of senior management personnel and business managers at both the corporate and individual subsidiary level. Each operating subsidiary in the Group has in place risk management processes which are in line with the Group's policy. Each significant risk has a designated 'owner' within the Group at an appropriate senior level. The potential financial impact of the risk and its likelihood of a negative outcome are regularly updated. The risk management process is coordinated by the Management Assurance function and is regularly reviewed by the Group's Audit Committee. The Audit Committee is aided by the GRMC, which meets every quarter to review risks as well as the progress against the planned actions. Key business decisions are discussed at the monthly meetings of the Executive Committee. The overall internal control environment and risk management programme including financial risk management is reviewed by the Audit Committee on behalf of the Board.

### Treasury management

Treasury management focuses on capital protection, liquidity maintenance and yield maximisation. The treasury policies are approved by the Board and adherence to these policies is strictly monitored at the Executive Committee meetings. Day-to-day treasury operations of the subsidiary companies are managed by their respective finance teams within the framework of the overall Group treasury policies. Long-term fund raising including strategic treasury initiatives are handled by a central team while short-term funding for routine working capital requirements is delegated to subsidiary companies. A monthly reporting system exists to inform senior management of investments, debt, currency, commodity and interest rate derivatives. The Group has a strong system of internal control which enables effective monitoring of adherence to Group policies. The internal control measures are supplemented by regular internal audits.

The investment portfolio is independently reviewed by CRISIL Limited and our portfolio has been rated as 'Very Good' meaning highest safety.

The Group uses derivative instruments as part of its management of exposure to fluctuations in foreign currency exchange rates, interest rates and commodity prices. The Group does not acquire or issue derivative financial instruments for trading or speculative purposes. The Group does not enter into complex derivative transactions to manage the treasury and commodity risks. Both treasury and commodities derivative transactions are normally in the form of forward contracts and interest rate and currency swaps and these are subject to the Group guidelines and policies. Interest rate swaps are taken to achieve a balance between fixed and floating rates (as described below under 'Interest risk') and currency swaps are taken primarily to convert the Group's exposure to non-US dollar currencies to US dollar currencies.

### Commodity risk

The Group is exposed to the movement of base metal commodity prices on the London Metal Exchange. Any decline in the prices of the base metals that the Group produces and sells will have an immediate and direct impact on the profitability of the businesses. As a general policy, the Group aims to sell the products at prevailing market prices. As much as possible, the Group tries to mitigate price risk through favourable contractual terms. The Group undertakes hedging activity in commodities to a limited degree. Hedging is used primarily as a risk management tool and, in some cases, to secure future cash flows in cases of high volatility by entering into forward contracts or similar instruments. The hedging activities are subject to strict limits set out by the Board and to a strictly defined internal control and monitoring mechanism. Decisions relating to hedging of commodities are taken at the Executive Committee level and with clearly laid down guidelines for their implementation by the subsidiaries.

Whilst the Group aims to achieve average LME prices for a month or a year, average realised prices may not necessarily reflect the LME price movements because of a variety of reasons such as uneven sales during the year and timing of shipments.

The Group is also exposed to the movement of international crude oil price and the discount in the price of Rajasthan crude oil to Brent price.

### Copper

The Group's custom smelting copper operations at Tuticorin is benefited by a natural hedge except to the extent of a possible mismatch in quotational periods between the purchase of concentrate and the sale of finished copper. The Group's policy on custom smelting is to generate margins from TC/RCs, improving operational efficiencies, minimising conversion cost, generating a premium over LME on sale of finished copper, sale of by-products and from achieving import parity on domestic sales. Hence, mismatches in quotational periods are managed to ensure that the gains or losses are minimised. The Group hedges this variability of LME prices through forward contracts and tries to make the LME price a pass-through cost between purchases of copper concentrate and sales of finished products, both of which are linked to the LME price. The Group also benefits from the difference between the amounts paid for quantities of copper content received and recovered in the manufacturing process, also known as 'free copper'. The Group hedges on a selective basis the free copper by entering into future contracts.

TC/RCs are a major source of income for the Indian copper smelting operations. Fluctuations in TC/RCs are influenced by factors including demand and supply conditions prevailing in the market for mine output. The Group's copper business has a strategy of securing a majority of its concentrate feed requirement under long-term contracts with mines.

KCM is largely an integrated copper producer and whenever hedging is done it is with an intention to protect the Group from price fluctuations in copper. KCM also does hedging for its custom smelting operations, where back to back hedging is used to mitigate pricing risks.

For the mining assets in Australia and Zambia, part of the production may be hedged to secure cash flows on a selective basis.

### Aluminium

The requirement of the primary raw material, alumina, is partly met from own sources and the rest is purchased primarily on negotiated price terms. Sales prices are linked to the LME prices. At present the Group on selective basis hedges the aluminium content in outsourced alumina to protect its margins.

The Group also enters into hedging arrangements for its aluminium sales to realise month of sale LME prices.

#### Zinc and lead

The sales prices are linked to the LME prices. The Group has some long-term volume contracts with some customers where the prices are linked to prevailing LME prices at the time of shipment. The Group hedges custom production of Indian operations through forward contracts or other instruments.

#### Iron ore

The Group sells iron ore production through e-auction route as mandated by the State Government of Karnataka in India.

### Provisionally priced financial instruments

On 31 March 2015, the value of net financial liabilities linked to commodities (excluding derivatives) accounted for on provisional prices was a liability of US\$689.9 million (2014: liability of US\$454.1 million). These instruments are subject to price movements at the time of final settlement and the final price of these instruments will be determined in the financial year beginning 1 April 2015.

Set out below is the impact of a 10% increase in LME prices on profit/(loss) for the year and total equity as a result of changes in value of the Group's commodity financial instruments as at 31 March 2015:

(US\$ million except as stated) Commodity price sensitivity	Closing LME as at 31 March 2015 (USS)	Effect on profit/(loss) of a 10% increase in the LME 31 March 2015 (USS million)	Effect on total equity of a 10% increase in the LME 31 March 2015 (US\$ million)
Copper	6,050	(62.2)	(62.2)
Zinc	2,075	0.2	0.2
Lead	1 808	_	_

		Effect on profit/(loss)	Effect on total equity
	Closing LME as at	of a 10% increase in the	of a 10% increase in the
(US\$ million except as stated)	31 March 2014	LME 31 March 2014	LME 31 March 2014
Commodity price sensitivity	(US\$)	(US\$ million)	(US\$ million)
Copper	6,636	(49.6)	(49.6)
Zinc	1,981	1.2	1.2
Lead	2,041	0.5	0.5

The above sensitivities are based on volumes, costs, exchange rates and other variables and provide the estimated impact of a change in LME prices on profit and equity assuming that all other variables remain constant.

Further, the impact of a 10% increase in closing copper LME for provisionally priced copper concentrate purchased at Vedanta Limited Copper division custom smelting operations is US\$69.2 million (2014: US\$54.2 million), which is a pass through in nature and as such will not have any impact on the profitability.

# Financial risk and sensitivities

The Group's Board approved financial risk policies comprise liquidity, currency, interest rate and counterparty risk. The Group does not engage in speculative treasury activity but seeks to manage risk and optimise interest and commodity pricing through proven financial instruments.

### (a) Liquidity

The Group requires funds both for short-term operational needs as well as for long-term investment programmes mainly in growth projects. The Group generates sufficient cash flows from the current operations which together with the available cash and cash equivalents, and liquid financial asset investments provide liquidity both in the short-term as well as in the long-term. Anticipated future cash flows, together with undrawn fund based committed facilities of US\$1,208.2 million, and cash and liquid investments of US\$8,209.8 million as at 31 March 2015, are expected to be sufficient to meet the ongoing capital investment programme and liquidity requirement of the Group in the near future.

The Group has a strong balance sheet that gives sufficient headroom to raise further debt should the need arise. The Group's current ratings from Standard & Poor's and Moody's are BB- and Ba1 respectively (2014: BB and Ba1 respectively). These ratings support the necessary financial leverage and access to debt or equity markets at competitive terms. The Group generally maintains a healthy net gearing ratio and retains flexibility in the financing structure to alter the ratio when the need arises (see Note 34 for further details).

The maturity profile of the Group's financial liabilities based on the remaining period from the balance sheet date to the contractual maturity date is given in the table below. The figures reflect the contractual undiscounted cash obligation of the Group:

#### At 31 March 2015

(US\$ million)					
Payment due by period	< 1 year	1-2 years	2–5 years	> 5 years	Total
Trade and other payables	4,509.0	229.3	63.0	6.9	4,808.2
Bank and other borrowings <sup>1</sup>	4,171.8	2,981.0	8,730.4	3,476.1	19,359.3
Convertible bonds <sup>1</sup>	65.8	1,161.5	_	_	1,227.3
Derivative liabilities	45.8	_	_	_	45.8
Total	8,792.4	4,371.8	8,793.4	3,483.0	25,440.6

<sup>1</sup> Includes contractual interest payment based on interest rate prevailing at the end of the reporting period.

### At 31 March 2014

(US\$ million)					
Payment due by period	< 1 year	1-2 years	2-5 years	> 5 years	Total
Trade and other payables	4,644.9	163.1	_	_	4,808.0
Bank and other borrowings <sup>1</sup>	3,521.0	2,292.6	10,113.1	2,972.5	18,899.2
Convertible bonds <sup>1</sup>	2,060.3	_	_	_	2,060.3
Derivative liabilities	118.7	_	27.3	_	146.1
Total	10,344.9	2,455.7	10,140.5	2,972.5	25,913.6

<sup>1</sup> Includes contractual interest payment based on interest rate prevailing at the end of the reporting period.

At 31 March 2015, the Group had access to funding facilities (both fund based and non-fund based) of US\$18,981.5 million of which US\$2,177.9 million was not yet drawn, as set out below.

(US\$ million)			
Funding facilities	Total facility	Drawn	Undrawn
Less than 1 year	5,270.9	3,189.5	2,081.4
1–2 years	3,265.4	3,265.4	_
2–5 years and above	10,445.2	10,348.7	96.5
Total	18,981.5	16,803.6	2,177.9

At 31 March 2014, the Group had access to funding facilities (both fund based and non-fund based) of US\$19,241.8 million of which US\$2,370.6 million was not yet drawn, as set out below.

(US\$ million)			
Funding facilities	Total facility	Drawn	Undrawn
Less than 1 year	6,640.7	4,358.5	2,282.2
1–2 years	1,487.7	1,487.7	_
2–5 years and above	11,113.4	11,025.0	88.4
Total	19,241.8	16,871.2	2,370.6

<sup>&#</sup>x27;Fund based' facilities represent contractual agreements for financial institutions to provide cash, such as cash credit limits and term loans, whereas 'non-fund based' facilities only give rise to an obligation to provide cash in certain circumstances, such as bank guarantees and letters of credit.

# (b) Foreign currency

The Group's presentation currency is the US dollar. The majority of the assets are located in India and the Indian rupee is the functional currency for the Indian operating subsidiaries. Exposures on foreign currency loans are managed through the Group-wide hedging policy, which is reviewed periodically to ensure that the risk from fluctuating currency exchange rates is appropriately managed. Natural hedges available in the business are identified at each entity level and hedges are placed only for the net exposure. Short-term net exposures are hedged progressively based on their maturity. Longer exposures beyond one year are normally unhedged. However all new long-term borrowing exposures are being hedged. Vedanta has hedged some of its non-US dollar borrowings into US dollar borrowings by entering into cross-currency swaps.

The carrying amount of the Group's financial assets and liabilities in different currencies are as follows:

	At 31 Marc	h 2015	At 31 March	2014
(US\$ million)	Financial assets	Financial liabilities	Financial assets	Financial liabilities
US\$	1,362.1	14,216.3	2,517.9	15,716.0
INR	8,019.4	7,151.8	7,697.2	5,597.3
Kwacha	1.3	38.9	_	128.1
JPY	_	_	_	0.2
AUD	0.7	9.7	5.3	13.2
CAD	_	0.3	0.1	_
EURO	75.6	59.0	105.6	56.4
ZAR	14.8	21.8	28.7	26.5
NAD	9.8	23.2	30.5	6.1
Others	9.5	0.8	34.7	246.1
Total	9,493.2	21,521.8	10,420.0	21,789.9

The Group's exposure to foreign currency arises where a Group company holds monetary assets and liabilities denominated in a currency different to the functional currency of that entity with INR (Indian rupee) being the major foreign currency exposure of the Group's main operating subsidiaries. Set out below is the impact of a 10% change in the US dollar on profit/(loss) and equity arising as a result of the revaluation of the Group's foreign currency financial instruments:

	31 Mar	rch 2015	
	Effe	ct of 10%	Effect of 10%
	strengther	ning of US	strengthening of
	Closing exchange dol	lar on net	US dollar on total
(US\$ million)	rate	earning	equity
INR	62.5908	(192.3)	(236.1)
Euro	0.9271	0.7	0.7

		31 March 2014		
		Effect of 10%		
		strengthening of US	Effect of 10%	
	Closing exchange	dollar on net s	strengthening of US	
(US\$ million)	rate	earnings d	ollar on total equity	
INR	60.0998	(406.5)	(367.0)	
Euro	0.7278	8.3	19.6	

The sensitivities are based on financial assets and liabilities held at 31 March 2015 where balances are not denominated in the functional currency of the respective subsidiaries. The sensitivities do not take into account the Group's sales and costs, and the results of the sensitivities could change due to other factors such as changes in the value of financial assets and liabilities as a result of non-foreign exchange influenced factors.

### (c) Interest rate risk

At 31 March 2015, the Group's net debt of US\$8,460.3 million (2014: US\$7,919.5 million net debt) comprised cash, cash equivalents and liquid investments of US\$8,209.8 million (2014: US\$8,937.9 million) offset by debt of US\$16,667.8 million (2014: US\$16,871.2 million) and debt derivative liability of US\$2.3 million (2014: asset of US\$13.8 million).

The Group is exposed to interest rate risk on short-term and long-term floating rate instruments and on the refinancing of fixed rate debt. The Group's policy is to maintain a balance of fixed and floating interest rate borrowings and the proportion of fixed and floating rate debt is determined by current market interest rates. As at 31 March 2015, 50.2% (2014: 48.7%) of the total debt was at a fixed rate and the balance was at a floating rate. The floating rate debt is largely linked to US dollar LIBOR. The Group also aims to minimise its average interest rates on borrowings by opting for a higher proportion of long-term debt to fund growth projects. The Group invests cash and liquid investments in short-term deposits and debt mutual funds, some of which generate a tax-free return, to achieve the Group's goal of maintaining liquidity, carrying manageable risk and achieving satisfactory returns.

Floating rate financial assets are largely mutual fund investments which have debt securities as underlying assets. The returns from these financial assets are linked to market interest rate movements; however the counterparty invests in the agreed securities with known maturity tenure and return and hence has manageable risk. Additionally, the investments portfolio is independently reviewed by CRISIL Limited, and our investment portfolio has been rated as 'Very Good' meaning highest safety.

The exposure of the Group's financial assets to interest rate risk is as follows:

		At 31 Marc	h 2015			At 31 Mar	ch 2014	
				Non-interest				Non-interest
	Floating rate	Fixed rate	Equity b	earing financial	Floating rate	Fixed rate	Equity	bearing financial
(US\$ million)	financial assets	financial assets	investments	assets	financial assets	financial assets	investments	assets
Financial assets	5,419.6	2,820.1	4.2	1,232.5	5,784.9	3,259.7	1.7	1,303.5
Derivative assets	_	_	_	16.8	_	_	_	70.2
Total financial assets	5,419.6	2,820.1	4.2	1,249.3	5,784.9	3,259.7	1.7	1,373.7

The exposure of the Group's financial liabilities to interest rate risk is as follows:

	At 31 March 2015		At 31 March 2014			
•	Floating	Fixed rate	Non-interest			Non-interest
	rate financial	financial be	earing financial	Floating rate		bearing financial
(US\$ million)	liabilities	liabilities	liabilities fin	ancial liabilities fina	ncial liabilities	liabilities
Financial liabilities	8,711.9	9,506.7	3,257.4	8,996.0	9,478.4	3,169.4
Derivative liabilities	2.3	_	43.5	_	_	146.1
Total financial liabilities	8,714.2	9,506.7	3,300.9	8,996.0	9,478.4	3,315.5

The weighted average interest rate on the fixed rate financial liabilities is 8.3% (2014: 8.0%) and the weighted average period for which the rate is fixed is 3.0 years (2014: 4.5 years).

Considering the net debt position as at 31 March 2015 and the investment in bank deposits, corporate bonds and debt mutual funds, any increase in interest rates would result in a net loss and any decrease in interest rates would result in a net gain. The sensitivity analyses below have been determined based on the exposure to interest rates for both derivative and non-derivative instruments at the balance sheet date.

The below table illustrates the impact of a 0.5% to 2.0% change in interest rate of borrowings on profit/(loss) and equity and represents management's assessment of the possible change in interest rates.

#### At 31 March 2015

(US\$ million) Change in interest rates	Effect on profit for the year	Effect on total equity
0.5%	41.5	41.5
1.0%	82.9	82.9
2.0%	165.9	165.9

### At 31 March 2014

(US\$ million)	Effect on profit	Effect on total
Change in interest rates	for the year	equity
0.5%	41.5	41.5
1.0%	83.1	83.1
2.0%	166.1	166.1

### (d) Credit risk

The Group is exposed to credit risk from trade receivables, cash and cash equivalents, liquid investments and other financial instruments.

The Group has clearly defined policies to mitigate counterparty risks. Cash and liquid investments are held primarily in debt schemes of mutual funds, bonds and bank deposits with good credit ratings. Defined limits are in place for exposure to individual counterparties in case of mutual fund houses and banks.

The large majority of receivables due from third parties are secured. Moreover, given the diverse nature of the Group's businesses trade receivables are spread over a number of customers with no significant concentration of credit risk. During the year ended 31 March 2015 and 31 March 2014 other than the exception of a single customer in our oil & gas business, no single customer accounted for 10% or more of the Group's net sales or for any of the Group's primary businesses. The history of trade receivables shows a negligible provision for bad and doubtful debts. Therefore, the Group does not expect any material risk on account of non-performance by any of our counterparties.

The Group's maximum gross exposure to credit risk at 31 March 2015 is US\$9,493.2 million (2014: US\$10,420.0 million).

Of the year end trade and other receivable balance the following, though overdue, are expected to be realised in the normal course of business and hence, are not considered impaired as at 31 March 2015:

(US\$ million)	2015	2014
Less than 1 month	39.1	44.7
Between 1–3 months	49.1	79.8
Between 3–12 months	40.3	23.0
Greater than 12 months	62.5	96.6
Total	191.0	244.1

Receivables amounting to US\$43.8 million (31 March 2014: US\$35.5 million), of the Power division of the Group have been impaired primarily as a result of an ongoing dispute in relation to a tariff agreement with a power supply company.

### Derivative financial instruments

The fair value of all derivatives is separately recorded on the balance sheet within other financial assets (derivatives) and other financial liabilities (derivatives), current and non-current. In addition, the derivative component of certain convertible bonds is shown as part of the overall convertible bond liability (Note 28). Derivatives that are designated as hedges are classified as current or non-current depending on the maturity of the derivative.

### Embedded derivatives

Derivatives embedded in other financial instruments or other contracts are treated as separate derivative contracts, when their risks and characteristics are not closely related to those of their host contracts.

# Cash flow hedges

The Group also enters into forward exchange and commodity price contracts for hedging highly probable forecast transactions and accounts for them as cash flow hedges and states them at fair value. Subsequent changes in fair value are recognised in equity until the hedged transactions occur, at which time the respective gains or losses are transferred to the income statement.

The fair value of the Group's open derivative positions at 31 March 2015, recorded within financial instruments (derivative) is as follows:

	As at 31 March	2015	As at 31 March 2014	
(US\$ million)	Liability	Asset	Liability	Asset
Current				
Cash flow hedges				
<ul> <li>Commodity contracts</li> </ul>	_	2.5	(0.3)	0.7
- Forward foreign currency contracts	(0.6)	_	(5.1)	0.1
Hedge of net investment in foreign operations	_	7.9	_	32.0
Fair value hedges				
- Commodity contracts	(1.7)	3.8	(0.1)	0.6
- Forward foreign currency contracts	(20.1)	1.6	(84.1)	14.5
- Other (foreign currency swap)	(2.2)		_	_
Non-qualifying hedges				
- Commodity contracts	(1.5)	0.8	(1.1)	5.5
- Forward foreign currency contracts	(11.2)	0.0	(26.6)	0.6
– Interest rate swap	(8.2)	_	(1.4)	_
- Other (foreign currency swap)	(0.2)	_	_	
Total	(45.7)	16.6	(118.7)	54.0
Non-current				
Cash flow hedges				
- Commodity contracts	_	-	_	2.0
Fair value hedges				
- Forward foreign currency contracts	(0.1)	0.2	(0.1)	_
- Cross currency swap	_	_	_	14.2
Non-qualifying hedges				
– Interest rate swap	_	-	(27.3)	_
Total	(0.1)	0.2	(27.4)	16.2
Grand total	(45.8)	16.8	(146.1)	70.2

The majority of cash flow hedges taken out by the Group during the year comprises commodity contracts and foreign currency forward contracts for firm future commitments.

The cash flows related to the majority of cash flow hedges above are expected to occur during the year ended 31 March 2016 and consequently may impact the income statements for that year depending upon the change in the commodity prices and foreign exchange rate movements.

# Non-qualifying hedges

The majority of these derivatives comprise interest rate swaps and foreign currency forward contracts which are economic hedges but which do not fulfil the requirements for hedge accounting of IAS 39 Financial Instruments: Recognition and Measurement.

### Fair value hedges

The fair value hedges relate to foreign currency forward contracts taken to hedge currency exposure on purchase of raw materials and capital imports.

# Hedging reserve reconciliation

	N	on-controlling	
(US\$ million)	Hedging reserves	interests	Total
At 1 April 2013	(22.2)	(17.4)	(39.6)
Amount recognised directly in equity	(30.3)	(20.9)	(51.2)
Amount transferred to income statement	(0.4)	(0.2)	(0.6)
Exchange difference	2.5	1.3	3.8
At 1 April 2014	(50.4)	(37.2)	(87.6)
Amount recognised directly in equity	(17.1)	(9.5)	(26.6)
Amount transferred to income statement	(7.4)	(4.4)	(11.8)
Changes in non-controlling interests	(3.9)	3.9	_
Exchange difference	4.1	2.5	6.6
At 31 March 2015	(74.7)	(44.7)	(119.4)

#### 30. Provisions

	Restoration,			
	rehabilitation and	KCM Copper		
(US\$ million)	environmental Pr	ice Participation	Other	Total
At 1 April 2013	303.6	100.1	27.3	431.0
(Released)/charged to income statement	(7.1)	(8.5)	6.2	(9.4)
Unwinding of discount	17.1	4.7	_	21.8
Cash paid	(3.6)	(6.9)	(3.3)	(13.8)
Exchange differences	(3.5)	(0.1)	(1.3)	(4.9)
At 1 April 2014	306.5	89.3	28.9	424.7
(Released)/charged to income statement	(26.9)	(1.4)	0.9	(27.4)
Unwinding of discount (Note 7)	31.8	5.0	_	36.8
Cash paid	(7.5)	(1.0)	(1.4)	(9.9)
Change in estimates	(66.1)	_	_	(66.1)
Exchange differences	(12.9)	_	(1.0)	(13.9)
At 31 March 2015	224.9	91.9	27.4	344.2
Current 2015	37.3	91.6	11.9	140.8
Non-current 2015	187.6	0.3	15.5	203.4
	224.9	91.9	27.4	344.2
Current 2014	5.7	70.0	13.0	88.7
Non-current 2014	300.8	19.3	15.9	336.0
	306.5	89.3	28.9	424.7

### Restoration, rehabilitation and environmental

The provisions for restoration, rehabilitation and environmental liabilities represent the Management's best estimate of the costs which will be incurred in the future to meet the Group's obligations under existing Indian, Australian, Zambian, Namibian, South African and Irish law and the terms of the Group's mining and other licences and contractual arrangements. These amounts, calculated by considering discount rates within the range of 2%–9%, become payable on closure of mines and are expected to be incurred over a period of one to 15 years. Within India, the principal restoration and rehabilitation provisions are recorded within Cairn India where a legal obligation exists relating to the oil & gas fields, where costs are expected to be incurred in restoring the site of production facilities at the end of the producing life of an oil field. The Group recognises the full cost of site restoration as a liability when the obligation to rectify environmental damage arises.

An obligation to incur restoration, rehabilitation and environmental costs arises when environmental disturbance is caused by the development or ongoing production from a producing field.

During the year ended 31 March 2015, based on the decommissioning studies the provision for restoration, rehabilitation and environment has been revised downwards by US\$66.1 million, mainly related to the Rajasthan block at Cairn India.

# KCM Copper Price Participation

KCM Copper Price Participation relates to a provision in respect of a price participation agreement in Zambia which requires KCM to pay ZCCM an agreed annual sum when copper price exceeds specified levels and specific triggers. In the previous years the timing of the outflow was dependent on future copper prices as well as dividends paid.

KCM and ZCCM agreed for final settlement of Copper Price Participation liability. The total amount that to be paid was US\$119.7 million to be settled in 16 instalments with the first instalment starting on 31 December 2012 and last instalment on 30 September 2016. The provision recognised has been discounted at 10.3% to take into account the expected timings of the various payments and recognised as a liability at US\$91.9 million as at 31 March 2015.

### Other

Other includes provision on post retirement medical benefits. The expected period of utilisation is 18 years.

### 31. Deferred tax

The Group has accrued significant amounts of deferred tax. The majority of the deferred tax liability represents accelerated tax relief for the depreciation of capital expenditure and the depreciation on fair value uplifts created on acquisitions, net of losses carried forward by Vedanta Limited (post the reorganisation) and MAT credits carried forward in Cairn India and Hindustan Zinc.

The amounts of deferred taxation on temporary differences, provided and not provided, in the accounts are as follows:

# Provided - deferred tax liabilities/(assets)

	As at 31 March	As at 31 March
(US\$ million)	2015	2014
Accelerated capital allowances	3,478.3	6,185.0
Unutilised tax losses	(445.1)	(901.7)
Other temporary differences	(1,697.0)	(1,546.9)
	1,336.2	3,736.4
Disclosed as:		
Deferred tax liability	2,588.7	4,960.1
Deferred tax asset	(1,252.6)	(1,223.7)
	1,336.2	3,736.4

### Unrecognised deferred tax assets

	As at 31 March	As at 31 March
(US\$ million)	2015	2014
Unutilised tax losses and unabsorbed depreciation	(471.6)	(372.7)

The above relates to the tax effect on US\$1,088.3 million (2014: US\$750.9 million) of unutilised tax losses of the Company, VRHL, VRJL and VRJ2 which have no expiry period; US\$827.2 million (2014: US\$642 million) unutilised tax losses of Twin Star Mauritius Holdings Limited which is subject to the Mauritius tax regime and can be carried forward for a period of five years; US\$39.4 million of unutilised tax losses and non-refundable R&D tax credits of CMT, which can be carried forward indefinitely under the Australian tax regime; and US\$344.3 million (2014: US\$371.1 million) of unutilised tax losses and capital allowances for Malco Energy Limited (MEL) and Talwandi Sabo Power Limited which are subject to the Indian tax regime. Pursuant to the Indian tax regime, unutilised business tax losses expire eight years from the period in which the losses arise and, unabsorbed depreciation can be carried forward indefinitely. No deferred tax asset has been recognised on these unutilised tax losses and tax credits as there is no evidence that sufficient taxable profit will be available in the future against which they can be utilised by the respective entities.

### Deferred tax asset

(US\$ million)	As at 31 March 2015	As at 31 March 2014
At 1 April	1,223.7	847.1
Credited to income statement	45.8	459.3
Charged directly to equity	(0.3)	(3.3)
Foreign exchange differences	(16.6)	(79.4)
At 31 March	1,252.6	1,223.7

The Group has US\$1,285.8 million of unutilised tax losses in Vedanta Limited and MAT credits of US\$1,898.1 million carried forward in Hindustan Zinc, Vedanta Limited and Cairn India which are subject to the Indian tax regime. Under the Indian tax regime, unutilised tax losses expire eight years from the period in which the losses arise and unabsorbed depreciation can be carried forward indefinitely. MAT credits expire 10 years from the period in which the credits arise.

Deferred tax assets in the Group have been recognised to the extent there are sufficient taxable temporary differences relating to the same taxation authority and the same taxable entity which are expected to reverse.

### Deferred tax liability

(US\$ million)	As at 31 March 2015	As at 31 March 2014
At 1 April	4,960.1	4,996.6
Charged/(credited) to income statement <sup>1</sup>	(2,377.5)	33.7
Charged/(credited) directly to equity	(6.5)	2.4
Foreign exchange differences	12.6	(72.6)
At 31 March	2,588.7	4,960.1

Including deferred tax credit of US\$2,138 million related to impairment of oil & gas assets at Cairn (Note 5).

# 32. Share-based payments

# Employee share schemes

The Group aims to provide superior rewards for outstanding performance and a high proportion of 'at risk' remuneration for Executive Directors. Three employee share schemes were approved by shareholders on Listing. In 2014, the Board introduced a Performance Share Plan (PSP) which is the primary arrangement under which share-based incentives are provided to the Executive Directors and the wider management group.

# The Vedanta Resources Long-Term Incentive Plan (the LTIP) and Employee Share Ownership Plan (the ESOP) and Performance Share Plan (the PSP)

The maximum value of shares that can be conditionally awarded to an Executive Director in a year is 150% of annual salary. In respect of Mr Navin Agarwal and Mr Tom Albanese, salary means the aggregate of their salary payable by the Company and their CTC payable by Vedanta Limited. The maximum value of shares that can be awarded to members of the wider management group is calculated by reference to the grade average CTC and individual grade of the employee. The performance conditions attaching to outstanding awards are as follows:

- PSP measured in terms of Total Shareholder Return (TSR) (being the movement in a company's share price plus reinvested dividends), is compared over the performance period with the performance of the companies as defined in the scheme from the grant date. The extent to which an award vests will depend on the Company's TSR rank against a group of peer companies at the end of the performance period and as moderated by the Remuneration Committee. Furthermore, a certain percentage of the vesting is based on continued employment with the Group until the end of the third year.
- The vesting schedule is shown in the table below, with adjusted straight-line vesting in between the points shown and rounding down to the nearest whole share:

#### Vedanta's TSR performance against comparator group

	(% of award vesting)
Below median	
At median	30
At or above upper quartile	100

The performance condition is measured by taking the Company's TSR over the three months immediately preceding the date of grant and over the three months immediately preceding the end of the performance period, and comparing its performance with that of the comparator group. The information to enable this calculation to be carried out on behalf of the Remuneration Committee (the Committee) is provided by the Company's advisers. The Committee considers that this performance condition, which requires that the Company's total return has out-performed a group of companies chosen to represent the mining sector, provides a reasonable alignment of the interests of the Executive Directors and the wider management group with those of the shareholders.

Initial awards under the PSP were granted on 17 November 2014. The exercise price of the awards is 10 US cents per share and the performance period is three years, with no retesting being allowed.

• ESOP – measured in terms of business performance set against business plan for the financial year comprising operational deliverables, enabler parameters and sustainability performance specific to each company. The vesting schedule is graded over three years and varies from company to company with a minimum vesting of 30% triggering at either 80% or 85% business score. In another tranche, the vesting schedule is staggered over a period of three years from the date of grant, with 70% vesting based on the achievement of business performance and the remaining 30% based on continued employment with the Group until the end of the third year.

Initial awards under ESOP were granted on 24 September 2012 with further awards being made on 16 May 2013. The exercise price of the awards is 10 US cents per share and the performance period is one year.

The exercise period is six months from the date of vesting.

• LTIP – measured in terms of Total Shareholder Return (TSR) (being the movement in a company's share price plus reinvested dividends), is compared over the performance period with the performance of the companies as defined in the scheme from the grant date. The extent to which an award vests will depend on the Company's TSR rank against a group of peer companies (Adapted Comparator Group) at the end of the performance period and as moderated by the Remuneration Committee. The vesting schedule is shown in the table below, with adjusted straight-line vesting in between the points shown and rounded down to the nearest whole share.

#### Vedanta's TSR performance against Adapted Comparator Group

	(% of award vesting)
Below median	-
At median	40
At or above upper quartile	100

The performance condition is measured by taking the Company's TSR over the four weeks immediately preceding the date of grant and over the four weeks immediately preceding the end of the performance period, and comparing its performance with that of the comparator group described above. The information to enable this calculation to be carried out on behalf of the Remuneration Committee (the Committee) is provided by the Company's advisers. The Committee considers that this performance condition, which requires that the Company's total return has out-performed a group of companies chosen to represent the mining sector, provides a reasonable alignment of the interests of the Executive Directors and the wider management group with those of the shareholders.

Initial awards under the LTIP were granted on 26 February 2004. As on 31 March 2015 the awards outstanding are the awards issued on 1 August 2011, 1 October 2011, 1 January 2012 and 1 April 2012. The exercise price of the awards is 10 US cents per share and the performance period is three years, with no retesting being allowed.

Further details on the LTIP are available in the Remuneration Report of the annual report.

The details of share options for the year ended 31 March 2015 and 31 March 2014 are presented below:

						Options lapsed		
			Options			during the year owing to		Options
		Exercise price US		Options granted	Options lapsed		Options exercised or	
Year of grant	Exercise date	cents per share	1 April 2014	during the year	during the year	conditions	during the year	March 2015
2011	1 January 2014–1 July 2014	10	2,700	_	_	(1,620)	(1,080)	_
2011	1 April 2014–1 October 2014	10	67,500	_	_	(41,380)	(26,120)	_
2011	1 July 2014–1 January 2015	10	16,500	_	(5,000)	(6,900)	(4,000)	600
2011	1 August 2014–1 February 2015	10	2,185,550	_	(77,550)	(1,365,934)	(623,539)	118,527
2011	1 October 2014–1 April 2015	10	5,000	_	_	_	_	5,000
2012	1 January 2015–1 July 2015	10	7,000	_	_	_	_	7,000
2012	1 April 2015–1 September 2015	10	97,800	_	_	_	_	97,800
2012	24 September 2013-24 March 2016	10	2,380,748	_	(41,238)	(1,586,513)	(384,045)	368,952
2013	16 May 2014–16 October 2016	10	3,754,550	_	(188,047)	(1,899,849)	(363,869)	1,302,785
2014	17 November 2017-17 May 2018	10	_	5,485,000	(149,500)	_	_	5,335,500
			8,517,348	5,485,000	(461,335)	(4,902,196)	(1,402,653)	7,236,164

						during the year		
			Options			owing to		Options
X7 . C .	F : 1.	Exercise price US	outstanding 1	Options granted	Options lapsed	performance		outstanding at 31
Year of grant	Exercise date	cents per share	April 2013	during the year	during the year	conditions	during the year	March 2014
2010	1 January 2013–1 July 2013	10	2,000	_	_	_	(2,000)	_
2010	1 October 2013–1 April 2014	10	6,700	_	_	(4,020)	(2,680)	_
2011	1 January 2014–1 July 2014	10	2,700	_	_	_	_	2,700
2011	1 April 2014–1 October 2014	10	72,950	_	(5,450)	_	_	67,500
2011	1 July 2014–1 January 2015	10	19,000	_	(2,500)	_	_	16,500
2011	1 August 2014–1 February 2015	10	2,394,350	_	(208,800)	_	_	2,185,550
2011	1 October 2014–1 April 2015	10	5,000	_	_	_	_	5,000
2012	1 January 2015–1 July 2015	10	7,000	_	_	_	_	7,000
2012	1 April 2015–1 October 2015	10	101,750	_	(3,400)	(550)	_	97,800
2012	24 September 2013-24 March 2016	10	4,538,650	_	(393,350)	(1,398,186)	(366,366)	2,380,748
2012	1 October 2012-1 April 2016	10	3,500	_	(3,500)	_	_	_
2013	16 May 2014-16 October 2016	10	_	3,963,750	(209,200)	_	_	3,754,550
			7,153,600	3,963,750	(826,200)	(1,402,756)	(371,046)	8,517,348

Options lapsed

In the year ended 31 March 2015, 5,363,531 options lapsed in total and 1,402,653 options exercised. As at 31 March 2015, 7,236,164 options remained outstanding and 269,282 options were exercisable at the year end. The weighted average share price for the share options exercised during the year ended 31 March 2015 was GBP8.9 (year ended 31 March 2014: GBP8.5). The weighted average maturity period for the options outstanding as on 31 March 2015 is 33 months (31 March 2014: 17 months).

All share-based awards of the Group are equity-settled as defined by IFRS 2 'Share-based Payment'. The fair value of these awards has been determined at the date of grant of the award allowing for the effect of any market-based performance conditions. This fair value, adjusted by the Group's estimate of the number of awards that will eventually vest as a result of non-market conditions, is expensed uniformly over the vesting period.

The fair values were calculated using the Stochastic valuation model with suitable modifications to allow for the specific performance conditions of the respective schemes. The inputs to the model include the share price at date of grant, exercise price, expected volatility, expected dividends, expected term and the risk free rate of interest. A progressive dividend growth policy is assumed in all fair value calculations. Expected volatility has been calculated using historical return indices over the period to date of grant that is commensurate with the performance period of the award. The return indices of the mining companies in the Adapted Comparator Group have been modelled based on historical movements over the period to date of grant which is also commensurate with the performance period for the option. The history of return indices is used to determine the volatility and correlation of share prices for the companies in the Adapted Comparator Group and is needed for the Stochastic valuation model of their future TSR performance relative to the Company's TSR performance. All options are assumed to be exercised immediately after vesting.

The assumptions used in the calculations of the charge in respect of the PSP/ESOP awards granted during the year ended 31 March 2015 and 31 March 2014 are set out below:

	Year ended 31 March 2015 PSP November 2014	Year ended 31 March 2014 ESOP May 2013
Number of instruments	5,485,000	3,824,050
Exercise price	US\$0.10	US\$0.10
Share price at the date of grant	GBP8.09	GBP12.72
Contractual life	3 years	1 year/2 years/3 years
Expected volatility	35.5%	36.6%/51.0%/48.0%
Expected option life	3 years	1.5 years/2.5 years/3.5 years
Expected dividends	4.62%	2.98%
Risk free interest rate	0.90%	0.31%
Expected annual forfeitures	10% p.a	10% p.a
Fair value per option granted	GBP6.98/GBP3.00	GBP8.2/GBP7.9/GBP7.6/GBP12.2/GBP11.9/GBP11.6

The Group recognised total expenses of US\$28.6 million and US\$32.8 million related to equity-settled share-based payment transactions in the year ended 31 March 2015 and 31 March 2014 respectively.

#### 33. Retirement benefits

The Group operates pension schemes for the majority of its employees in India, Australia, Africa and Ireland.

## (a) Defined contribution schemes

Indian pension schemes

Central Recognised Provident Fund

The Central Recognised Provident Fund relates to all full-time Indian employees of the Group. The amount contributed by the Group is a designated percentage of 12% of basic salary less contributions made as part of the Pension Fund (see below), together with an additional contribution of 12% (limited to a maximum contribution of 30% in case of Iron Ore Segment) of the salary of the employee.

The benefit is paid to the employee on their retirement or resignation from the Group.

#### Superannuation

Superannuation, another pension scheme applicable in India, is applicable only to executives in grade M4 and above. However, in case of the Cairn India Group and Iron Ore Segment, the benefit is applicable to all executives. In Cairn India, it is applicable from the second year of employment. Certain companies hold policies with the Life Insurance Corporation of India (LIC), to which they contribute a fixed amount relating to superannuation, and the pension annuity is met by the LIC as required, taking into consideration the contributions made. Accordingly, this scheme has been accounted for on a defined contribution basis and contributions are charged directly to the income statement.

#### Pension Fund

The Pension Fund was established in 1995 and is managed by the Government of India. The employee makes no contribution to this fund but the employer makes a contribution of 8.33% of salary each month subject to a specified ceiling per employee. This must be provided for every permanent employee on the payroll.

At the age of superannuation, contributions cease and the individual receives a monthly payment based on the level of contributions through the years, and on their salary scale at the time they retire, subject to a maximum ceiling of salary level. The Government funds these payments, thus the Group has no additional liability beyond the contributions that it makes, regardless of whether the central fund is in surplus or deficit.

#### Australian pension scheme

The Group also operates defined contribution pension schemes in Australia. The contribution of a proportion of an employee's salary into a superannuation fund is a compulsory legal requirement in Australia. The employer contributes 9.5% of the employee's gross remuneration where the employee is covered by the industrial agreement and 12.5% of the basic remuneration for all other employees, into the employee's fund of choice. All employees have the option to make additional voluntary contributions.

# Zambian pension scheme

The KCM Pension Scheme is applicable to full-time permanent employees of KCM (subject to the fulfilment of certain eligibility criteria). The management of the scheme is vested in the trustees consisting of representatives of the employer and the members. The employer makes a monthly contribution to the KCM Pension Scheme and the member makes monthly contributions.

All contributions to the KCM Pension Scheme in respect of a member cease to be payable when the member attains normal retirement age of 55 years, or upon leaving the service of the employer, or when the member is permanently medically incapable of performing duties in the service of the employer. Upon such cessation of contribution on the grounds of normal retirement, or being rendered medically incapable of performing duties, or early voluntary retirement, the member is entitled to receive his accrued pension. The member is allowed to commute his/her accrued pension subject to certain rules and regulations.

The Group has no additional liability beyond the contributions that it makes. Accordingly, this scheme has been accounted for on a defined contribution basis and contributions are charged directly to the income statement.

#### Skorpion Zinc Provident Fund, Namibia

The Skorpion Zinc Provident Fund is a defined contribution fund and is compulsory to all full time employees under the age of 60. Company contribution to the fund is a fixed percentage of 9% per month of pensionable salary, whilst the employee contributes 7% with the option of making additional contributions, over and above the normal contribution, up to a maximum of 12%.

Normal retirement age is 60 years and benefit payable is the member's fund credit which is equal to all employer and employee contributions plus interest. The same applies when an employee resigns from Skorpion Zinc. The Fund provides disability cover which is equal to the member's fund credit and a death cover of two times annual salary in the event of death before retirement. Current membership total is 810.

The Group has no additional liability beyond the contributions that it makes. Accordingly, this scheme has been accounted for on a defined contribution basis and contributions are charged directly to the income statement.

## Black Mountain Mining (Pty) Limited, South Africa pension and provident funds

Black Mountain Mining (Pty) Ltd has two retirement funds, both administered by Alexander Forbes, a registered financial service provider. Both funds form part of the Alexander Forbes umbrella fund and are defined contribution funds.

Membership of both funds is compulsory for all permanent employees under the age of 60.

# Lisheen Mine, Ireland pension funds

Lisheen Pension Plan is for all employees. Lisheen pays 5% and employees pay 5% with the option to make Additional Voluntary Contributions (AVCs) if desired. Executive contributions are 15% by Lisheen and a minimum of 5% by the employee with the option to make AVCs if desired. Death benefit is three times salary for employees and four times salary for executives. Pension and life cover ceases at 65. On wind up of the pension schemes, the benefits will be paid out to the remaining members in accordance with the scheme rules and Irish Revenue tax regulations.

The Group has no additional liability beyond the contributions that it makes. Accordingly, this scheme has been accounted for on a defined contribution basis and contributions are charged directly to the income statement.

## (b) Defined benefit schemes

#### India

The Gratuity schemes are defined benefit schemes which are open to all Group employees in India who have a minimum of five years of service with their employing company. These schemes are funded in some subsidiaries. Based on actuarial valuation, a provision is recognised in full for the projected obligation over and above the funds held in scheme. In case where there is no funding held by the scheme, full provision is recognised in the balance sheet. Under these schemes, benefits are provided based on final pensionable pay.

The assets of the schemes are held in separate funds and a full actuarial valuation of the schemes is carried out on an annual basis.

#### Vedanta I imited

The Iron Ore, Aluminium and Copper divisions of Vedanta Limited contributed to the LIC Fund based on an actuarial valuation every year. Vedanta Limited's Gratuity scheme is accounted for on a defined benefit basis. The latest actuarial valuation was performed as at 31 March 2015 using the projected unit credit actuarial method. At that date the fund was in deficit.

#### **BALCO**

All employees who are scheduled to retire on or before 31 March 2015 are being paid by BALCO. The Gratuity scheme is accounted for as a defined benefit scheme for all employees scheduled to retire after 31 March 2015. A provision is recognised based on the latest actuarial valuation which was performed as at 31 March 2015 using the projected unit actuarial method. At that date the fund was in deficit.

#### H7I

HZL contributes to the LIC fund based on an actuarial valuation every year. HZL's Gratuity scheme is accounted for on a defined benefit basis. The latest actuarial valuation was performed as at 31 March 2015 using the projected unit actuarial method. At that date the fund was in deficit.

#### MEL

MEL contributed to the LIC fund based on an actuarial valuation every year. The MEL Gratuity scheme is accounted for on a defined benefit basis. The latest actuarial valuation was performed as at 31 March 2015 using the projected unit credit actuarial method. At that date the fund was in surplus.

#### TSPI

TSPL contributes to the LIC based on an actuarial valuation. Liabilities with regard to the Gratuity scheme are fully provided in the balance sheet and are determined by actuarial valuation as at the balance sheet date and as per gratuity regulations for TSPL. The latest actuarial valuation was performed as at 31 March 2015 using the projected unit actuarial method.

#### Cairn

Cairn contributes to the LIC fund based on an actuarial valuation every year. Cairn India Group's Gratuity scheme is accounted for on a defined benefit basis. The latest actuarial valuation was performed as at 31 March 2015 using the projected unit actuarial method. At that date the fund was in deficit.

#### Zambia

Specified permanent employees of KCM are entitled to receive medical and retirement severance benefits. This comprises two months' basic pay for every completed year of service with an earliest service start date of 1 July 2004. Under this scheme, benefits are provided based on final pensionable pay and a full actuarial valuation of the scheme is carried out on an annual basis. The accruals are not contributed to any fund and are in the form of provisions in KCM's accounts

On the death of an employee during service, a lump sum amount is paid to his or her dependants. This amount is equal to 60 months' basic pay for employees who joined before 1 April 2000 and 30 months' basic pay for employees who joined on or after 1 April 2000. For fixed term contract employees, the benefit payable on death is 30 months' basic pay.

As at 31 March 2015, membership of pension schemes across Vedanta Limited, BALCO, HZL, MEL, TSPL, KCM and Cairn stood at 24,456 employees (31 March 2014: 25,286). The deficits, principal actuarial assumptions and other aspects of these schemes are disclosed in further detail in notes (d) and (e) below.

#### (c) Pension scheme costs

Contributions of US\$74.6 million and US\$nil in respect of defined benefit schemes were outstanding and prepaid respectively as at 31 March 2015 (2014: US\$62.9 million and US\$nil respectively).

Contributions to all pension schemes in the year ending 31 March 2016 are expected to be around US\$5.6 million.

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
Defined contribution pension schemes	30.7	25.7
Defined benefit pension schemes	19.7	16.7
Total expense	50.4	42.4

## (d) Principal actuarial assumptions.

Principal actuarial assumptions used to calculate the defined benefit schemes' liabilities are:

	MEL		BALC	O	Sterlite Co	ppper1	HZL		KCM	JI	harsuguda A	uminium <sup>1</sup>	Iron Ore	Sesa <sup>1</sup>	Cairn		TSPL	
Particulars	Mar 15	Mar 14	Mar 15	Mar 14	Mar 15	Mar 14	Mar 15	Mar 14	Mar 15	Mar 14	Mar 15	Mar 14	Mar 15	Mar 14	Mar 15	Mar 14	Mar 15	Mar 14
Discount rate	7.8%	9.0%	9.0%	9.0%	7.8%	9.0%	7.8%	9.0%	22.5%	17.9%	7.8%	9.0%	7.8%	9.0%	7.8%	9.0%	7.8%	9.0%
				3.0%-														
Salary increases	5.0%	5.0%	5.0%	5.0%	5.3%	6.0%	5.5%	5.5%	5.0%	5.0%	6.0%	6.0%	7.0%	7.0%	10.0%	12.0%	5.5%	5.5%
Number of																		
employees	76	76	3,059	3,578	1,078	1,131	5,286	5,532	7,281	7,230	2,738	2,765	2,372	3,119	1,569	1,614	211	131

<sup>1</sup> Jharsuguda Aluminium earlier 'VAL', Iron ore Sesa earlier 'Sesa Goa' and Sterlite Copper earlier 'Sterlite' became divisions of Vedanta Limited post merger (refer Note 45).

In India, the mortality tables used, assume that a person aged 60 at the end of the balance sheet date has a future life expectancy of 19 years.

Assumptions regarding mortality for Indian entities are based on mortality table of 'Indian Assured Lives Mortality (2006-2008)' published by the Institute of Actuaries of India.

Assumptions regarding mortality for KCM are based on World Health Organisation Life Tables for 1999 applicable to Zambia which has been taken as a reference point. Based on this a mortality table which is appropriate for the workers of Konkola Copper Mines plc has been derived.

# (e) Balance sheet recognition

				3	31 March 20	015				31 March 2014								
	MEL &		Sterlite			Jharsuguda	Iron Ore			MEL &		Sterlite			Jharsuguda	Iron Ore		
(US\$ million)	TSPL	BALCO	Copper <sup>1</sup>	HZL	KCM	Aluminium <sup>1</sup>	Sesa <sup>1</sup>	Cairn	Total	TSPL	BALCO	Copper <sup>1</sup>	HZL	KCM	Aluminium'	Sesa <sup>1</sup>	Cairn	Total
Fair value of pension scheme																		
assets	0.3	_	2.5	26.8	_	1.5	9.0	4.9	45.0	0.2	_	3.2	27.9	_	1.4	8.2	4.9	45.8
Present value of pension	0.5		2.3	20.6		1.5	9.0	4.9	43.0	0.2		3.2	21.9		1.4	0.2	4.9	43.0
scheme liabilities	(0.3)	(20.8)	(3.5)	(35.8)	(39.8)	(2.4)	(9.3)	(7.7)	(119.6)	(0.2)	(21.2)	(3.4)	(29.4)	(35.5)	(1.7)	(9.8)	(7.5)	(108.7)
Deficit in pension scheme recognised in balance																		
sheet	_	(20.8)	(1.0)	(9.0)	(39.8)	(0.9)	(0.3)	(2.8)	(74.6)	_	(21.2)	(0.2)	(1.5)	(35.5)	(0.3)	(1.6)	(2.6)	(62.9)
Deferred tax	_	7.1	0.3	3.1	13.5	0.3	0.1	1.0	25.4	_	7.2	0.1	0.5	10.6	0.1	0.6	0.9	20.0
Net pension liability	_	(13.7)	(0.7)	(5.9)	(26.3)	(0.6)	(0.2)	(1.8)	(49.2)	_	(14.0)	(0.1)	(1.0)	(24.9)	(0.2)	(1.0)	(1.7)	(42.9)

# (f) Amounts recognised in income statement in respect of defined benefit pension schemes

				31	March 20	015			31 March 2014									
-	MEL &		Sterlite			Jharsuguda	Iron Ore			MEL &		Sterlite			Jharsuguda	Iron Ore		
(US\$ million)	TSPL	BALCO	Copper <sup>1</sup>	HZL	KCM	Aluminium <sup>1</sup>	Sesa <sup>1</sup>	Cairn	Total	TSPL	BALCO	Copper <sup>1</sup>	HZL	KCM	Aluminium <sup>1</sup>	Sesa <sup>1</sup>	Cairn	Total
Current																		
service cost	0.1	0.5	0.2	2.0	6.2	0.3	0.6	0.6	10.5	_	0.7	0.3	1.3	5.6	0.2	0.6	1.2	9.9
Net Interest																		
cost	0.0	1.6	0.2	0.5	6.4	0.0	0.2	0.3	9.2	_	1.5	0.1	0.3	4.5	0.1	0.1	0.2	6.8
Total charge to income statement	0.1	2.1	0.4	2.5	12.6	0.3	0.8	0.9	19.7	-	2.2	0.4	1.6	10.1	0.3	0.7	1.4	16.7

# (g) Amounts recognised in the Statement of Comprehensive Income

		31 March 2015										31 March 2014								
_	MEL & TSPL	BALCO	Sterlite Copper <sup>1</sup>	HZL	ксм	Jharsuguda Aluminium <sup>1</sup>	Iron Ore Sesa <sup>1</sup>	Cairn	Total	MEL & TSPL	BALCO	Sterlite Copper <sup>1</sup>	HZL	KCM	Jharsuguda Aluminium <sup>1</sup>	Iron Ore Sesa <sup>1</sup>	Cairn	Total		
Actuarial (gains)/losses on defined benefit obligation Actuarial (gains)/losses on	0.1	3.7	0.5	6.2	2.8	0.6	0.4	(0.1)	14.2	(0.1)	1.0	(0.6)	0.5	2.4	0.4	1.3	0.1	5.0		
plan asset	(0.1)	_	-	_	_	_	(0.1)	_	(0.2)	_	_	-	(0.6)	-	_	(0.1)	(0.1)	(0.8)		
Remeasurement of the net defined benefit liability (asset)	-	3.7	0.5	6.2	2.8	0.6	0.3	(0.1)	14.0	(0.1)	1.0	(0.6)	(0.1)	2.4	0.4	1.2	_	4.2		

<sup>1</sup> Jharsuguda Aluminium earlier 'VAL', Iron ore Sesa earlier 'Sesa Goa' and Sterlite Copper earlier 'Sterlite' became divisions of Vedanta Limited post merger (refer Note 45).

## (h) Movements in the present value of defined benefit obligations

The movement during the year ended 31 March 2015 of the present value of the defined benefit obligation was as follows:

	31 March 2015										31 March 2014							
_	MEL &		Sterlite			Jharsuguda	Iron Ore			MEL &		Sterlite			Jharsuguda	Iron Ore		
(US\$ million)	TSPL	BALCO	Copper <sup>1</sup>	HZL	KCM	Aluminium <sup>1</sup>	Sesa <sup>1</sup>	Cairn	Total	TSPL	BALCO	Copper <sup>1</sup>	HZL	KCM	Aluminium <sup>1</sup>	Sesa <sup>1</sup>	Cairn	Total
At 1 April	(0.1)	(21.2)	(3.5)	(29.4)	(35.5)	(1.7)	(9.8)	(7.5)	(108.7)	(0.2)	(23.2)	(4.0)	(35.3)	(32.4)	(1.4)	(9.6)	(6.8)	(112.9)
Current service cost	(0.1)	(0.5)	(0.2)	(2.0)	(6.2)	(0.3)	(0.6)	(0.6)	(10.5)	_	(0.7)	(0.3)	(1.3)	(5.6)	(0.2)	(0.6)	(1.2)	(9.9)
Gratuity benefits																		
paid	_	5.7	0.9	4.4	4.3	0.2	1.0	0.6	17.1	_	3.1	0.1	6.2	9.5	0.3	1.5	0.3	21.0
Interest cost of																		
scheme liabilities	(0.1)	(1.6)	(0.3)	(2.6)	(6.6)	(0.1)	(0.9)	(0.3)	(12.5)	_	(1.5)	(0.3)	(2.5)	(4.6)	(0.1)	(0.8)	(0.5)	(10.3)
Remeasurement																		
gains/(losses)	0.1	(3.7)	(0.5)	(6.2)	(2.8)	(0.6)	(0.5)	(0.0)	(14.2)	0.1	(1.0)	0.6	(0.5)	(2.4)	(0.4)	(1.3)	(0.1)	(5.0)
Exchange																		
difference		0.5	0.2	_	7.0	0.1	1.3	0.1	9.2	_	2.1	0.4	4.0	_	0.1	1.0	0.8	8.4
At 31 March	(0.2)	(20.8)	(3.4)	(35.8)	(39.8)	(2.4)	(9.5)	(7.7)	(119.6)	(0.1)	(21.2)	(3.5)	(29.4)	(35.5)	(1.7)	(9.8)	(7.5)	(108.7)

<sup>1</sup> Jharsuguda Aluminium earlier 'VAL', Iron Ore Sesa earlier 'Sesa Goa' and Sterlite Copper earlier 'Sterlite' became divisions of Vedanta Limited post merger (refer Note 45).

#### (i) Movements in the fair value of plan assets

(US\$ million)	As at 31 March 2015	As at 31 March 2014
At 1 April	45.8	46.2
Contributions received	4.0	18.5
Benefits paid	(6.6)	(18.0)
Remeasurements	0.2	0.8
Interest income	3.3	3.5
Foreign exchange differences	(1.7)	(5.2)
At 31 March	45.0	45.8

# (j) Five year history

Defined benefit pension plan

	As at				
(US\$ million)	31 March 2015	31 March 2014	31 March 2013	31 March 2012	31 March 2011
Experience losses arising on scheme liabilities	(14.2)	(5.0)	(6.9)	(7.0)	(20.4)
Difference between expected and actual return on plan assets	0.2	0.8	0.6	_	_
Fair value of pension scheme assets	45.0	45.8	46.2	47.8	39.3
Present value of pension scheme liabilities	(119.6)	(108.7)	(112.9)	(106.9)	(96.1)
Deficits in the schemes	(74.6)	(62.9)	(66.7)	(59.1)	(56.8)

# (k) Sensitivity analysis

Below is the sensitivity analysis determined for significant actuarial assumptions for the determination of defined benefit obligations and based on reasonably possible changes of the respective assumptions occurring at the end of the reporting period while holding all other assumptions constant.

	Increase/(decrease ) in defined
(US\$ million)	benefit obligation
Discount rate	
Increase by 0.50%	(2.6)
Decrease by 0.50%	2.7
Salary increase	
Increase by 0.50%	2.3
Decrease by 0.50%	(2.2)

The above sensitivity analysis may not be representative of the actual benefit obligation as it is unlikely that the change in assumptions would occur in isolation of one another as some of the assumptions may be correlated.

## (I) Risk analysis

Group is exposed to a number of risks in the defined benefit plans. Most significant risks pertaining to defined benefits plans and management estimation of the impact of these risks are as follows:

## Investment risk

Most of the Indian defined benefit plans are funded with Life Insurance Corporation of India. The Group does not have any liberty to manage the funds provided to Life Insurance Corporation of India.

The present value of the defined benefit plan liability is calculated using a discount rate determined by reference to the Government of India bonds for Group's Indian operations. If the return on plan asset is below this rate, it will create a plan deficit.

#### Interest risk

A decrease in the interest rate on plan assets will increase the plan liability.

#### Longevity risk/life expectancy

The present value of the defined benefit plan liability is calculated by reference to the best estimate of the mortality of plan participants both during and at the end of the employment. An increase in the life expectancy of the plan participants will increase the plan liability.

#### Salary growth risk

The present value of the defined benefit plan liability is calculated by reference to the future salaries of plan participants. An increase in the salary of the plan participants will increase the plan liability.

#### 34. Capital management

The Group's objectives when managing capital are to safeguard continuity, maintain a strong credit rating and healthy capital ratios in order to support its business and provide adequate return to shareholders through continuing growth.

The Group sets the amount of capital required on the basis of annual business and long-term operating plans which include capital and other strategic investments. The funding requirement is met through a mixture of equity, internal accruals, convertible bonds and other long-term and short-term borrowings.

The Group monitors capital using a gearing ratio, being the ratio of net debt as a percentage of total capital.

(US\$ million)	As at 31 March 2015	As at 31 March 2014
Total equity	12,257.4	17,974.8
Net debt	8,458.0	7,919.5
Total capital	20,715.4	25,894.3
Gearing	40.8%	30.6%

The increase in the gearing ratio compared to 2014 ratio is primarily due to decrease in total equity pursuant to one-time impairment charge on oil & gas assets of US\$4,504.1 (net of deferred tax of US\$2,138 million) (Note 5).

#### 35. Share capital

	At 31 March 2015			2014
Authorised	Number	US\$ million	Number	US\$ million
Ordinary shares of 10 US cents each	400,000,000	40.0	400,000,000	40.0
Deferred shares of £1 each	50,000	_	50,000	_
	400,050,000	40.0	400,050,000	40.0

	At 31 March 2	2015	At 31 March 2014		
Ordinary shares issued and fully paid	Number	US\$ million	Number	US\$ million	
Ordinary shares of 10 US cents each	299,868,180	30.0	298,182,135	29.8	
Deferred shares of £1 each	50,000	_	50,000	_	
	299,918,180	30.0	298,232,135	29.8	

During the year ended 31 March 2015, the Company issued 1,686,045 shares at face value of 10 US cents per share to the employees pursuant to the Vedanta LTIP and ESOP schemes (2014: 550,275 shares).

The holders of deferred shares do not have the right to receive notice of any general meeting of the Company nor the right to attend, speak or vote at any such general meeting. The deferred shares have no rights to dividends and, on a winding-up or other return of capital, entitle the holder only to the payment of the amounts paid on such shares after repayment to the holders of ordinary shares of the nominal amount paid up on the ordinary shares plus the payment of £100,000 per ordinary share. Of the 50,000 deferred shares, one deferred share was issued at par and has been fully paid, and 49,999 deferred shares were each paid up as to one-quarter of their nominal value.

As on 31 March 2015, 6,904,995 ordinary shares which were issued on the conversion of certain convertible bonds issued by one of the Group's subsidiaries are held through a Global Depositary Receipts and carry no voting rights.

At 31 March 2015, the total number of treasury shares held was 24,206,816 (2014: 24,206,816).

#### 36. Non-controlling interests (NCI)

The Group consists of a parent Company, Vedanta Resources plc, incorporated in the UK and a number of subsidiaries held directly and indirectly by the Group which operate and are incorporated around the world. Note 44 to the financial statements lists details of the interests in the subsidiaries.

Non-controlling interests that are material to the Group relate to Hindustan Zinc Limited (HZL), Cairn India Limited (Cairn) and Vedanta Limited.

As at 31 March 2015, NCIs hold an economic interest of 59.20%, 62.36% and 37.15% respectively in HZL, Cairn and Vedanta Limited. The respective NCI holdings in 2014 were 62.15%, 65.74% and 41.70% respectively. The changes in NCI during the current year were pursuant to the additional investment in shares of Vedanta Limited and buyback of ordinary shares by Cairn India details of which are set out in Note 41.

Principal place of business of HZL, Cairn and Vedanta Limited is in India (refer to Note 44).

The table below shows details of non-wholly owned subsidiaries of the Group that have material non-controlling interests:

	Year ended 31 March 2015				Year ended 31 March 2014					
(US\$ million) Particulars	HZL	Cairn Ve	danta Limited	Others <sup>1</sup>	Total	HZL	Cairn	Vedanta Limited <sup>2</sup>	Others <sup>1</sup>	Total
Profit/(loss)										_
attributable to NCI	813.8	(2,608.9)	74.7	(268.7)	(1,989.1)	713.1	553.4	117.1	(198.2)	1,185.4
Equity attributable to										
NCI	4,310.9	6,903.6	2,199.9	(2,760.1)	10,654.3	3,997.5	10,520.1	777.2	(1,330.4)	13,964.4
Dividends paid										
to NCI	(107.8)	(165.4)	(67.2)	_	(340.4)	(88.9)	(190.4)	$(59.3)^3$	(7.3)	(345.9)

- Others consist of investment subsidiaries of Vedanta Limited and other individual non-material subsidiaries.

- Including the impact of merger during the year ended 31 March 2014. Refer to Note 45.

  Including dividends paid by SIIL during year ended 31 March 2014, before merger.

  For principal activities, country of incorporation and immediate holding company of the above subsidiaries refer to Note 44.

Summarised financial information in respect of Group's subsidiaries that have material non-controlling interests is set out below. The summarised financial information below is on a 100% basis and before inter-company eliminations:

	As a	As at 31 March 2015			As at 31 March 2014		
(US\$ million) Particulars	HZL	Cairn	Vedanta Limited <sup>2</sup>	HZL	Cairn	Vedanta Limited <sup>2</sup>	
Non-current assets	2,193.2	10,407.1	11,502.0	2,011.7	16,208.4	9,844.0	
Current assets	5,305.9	3,794.8	1,614.8	4,666.5	4,908.3	2,236.8	
Current liabilities	(267.9)	(957.4)	(3,576.3)	(235.7)	(718.5)	(5,952.1)	
Non-current liabilities	(22.1)	(2,148.3)	(3,732.2)	(10.6)	(4,395.6)	(4,264.8)	
Net assets	7,209.1	11,096.2	5,808.3	6,431.9	16,002.6	1,863.9	

	Year er	Year ended 31 March 2015			Year ended 31 March 2014		
Particulars	HZL	Cairn	Vedanta Limited <sup>2</sup>	HZL	Cairn	Vedanta Limited <sup>2</sup>	
Revenue	2,385.8	2,397.5	5,290.4	2,224.8	3,092.8	4,682.7	
Profit/(loss) for the year	1,360.8	(4,193.4)	199.1	1,146.3	905.8	(402.8)	
Other comprehensive income/(loss)	(5.7)	_	(37.2)	(3.5)	_	4.9	

The effect of changes in ownership interests in subsidiaries that did not result in a loss of control is as follows:

	Year ended 31 March 2015					
(US\$ million)	_	HZL Cairn Vedanta Limited Othe			Others	Total
Changes in NCI due to buyback and investment		(197.2)	(531.5)	(83.3)	167.9	(644.1)

		Year ended 31 March 2014				
	•	HZL	Cairn	Vedanta Limited <sup>2</sup>	Others	Total
Changes in NCI due to reorganisation scheme		(9.7)	2,372.5	$(342.7)^5$	(2,646.9)	(626.8)

5 Including changes in merged entities (refer to Note 45).

#### 37. Joint arrangements

#### Joint operations

The Group's principal licence interests in the Oil & Gas business are joint operations. The principal licence interests are as follows:

	Working interest %
India	·
Block PKGM-1 (Ravva)	22.50
Block KG-ONN-2003/1	49.00
Block CB-OS/2-Exploration	60.00
Block CB/OS-2 Development and production areas	40.00
Block RJ-ON-90/1 Development and production areas	70.00
Block RJ-ON-90/1-Exploration	100.00
Block PR-OSN-2004/1	35.00
Block KG-OSN-2009/3	100.00
Block MB-DWN-2009/1	100.00
South Africa	
South Africa Block 1	60.00
Sri Lanka	
SL-2007-01-001	100.00

## 38. Commitments, guarantees and contingencies

#### Commitments

The Group has a number of continuing operational and financial commitments in the normal course of business including:

- · exploratory mining commitments;
- oil & gas commitments;
- · mining commitments arising under production sharing agreements; and
- completion of the construction of certain assets.

	As at 31 March	As at 31 March
(US\$ million)	2015	2014
Capital commitments contracted but not provided	1,973.7	2,702.7

Commitments primarily related to the expansion projects:

	As at 31 March	
	2015	2014
HZL	274.4	446.7
KCM	_	6.6
Jharsuguda Aluminium	508.6	621.0
Jharsuguda 2,400MW power plant	33.7	31.5
BALCO	69.5	73.2
Talwandi Sabo	96.1	141.9
Sterlite Copper	220.8	236.6
Cairn	700.2	1,052.3
Total	1,903.3	2,609.8

# Guarantees

Companies within the Group provide guarantees within the normal course of business. Guarantees have also been provided in respect of certain short-term and long-term borrowings.

A summary of the most significant guarantees is set out below:

As at 31 March 2015, US\$365.4 million of guarantees were advanced to banks, suppliers etc. in the normal course of business (2014: US\$234.9 million). The Group has also entered into guarantees and bonds advanced to the customs authorities in India of US\$228.9 million relating to the export and payment of import duties on purchases of raw material and capital goods including export obligations (2014: US\$727.2 million).

## Cairn PSC guarantee to Government

The Group has provided a parent Company guarantee for the Cairn India Group's obligation under the Production Sharing Contract (PSC).

Cairn India have provided various other guarantees under the Cairn India Group's bank facilities for the Cairn India Group's share of minimum work programme commitments of US\$15.6 million outstanding as of 31 March 2015 (2014: US\$18.9 million).

#### Export obligations

The Indian entities of the Group have export obligations of US\$2,688.0 million (2014: US\$3,789.9 million) on account of concessional rates of import duty paid on capital goods under the Export Promotion Capital Goods Scheme and under the Advance Licence Scheme for import of raw material laid down by the Government of India.

In the event of the Group's inability to meet its obligations, the Group's liability would be US\$429.1 million (2014: US\$478.4 million), reduced in proportion to actual exports, plus applicable interest.

#### Contingencies

## MEL claims with Tamil Nadu Electricity Board (TNEB)

TNEB is claiming US\$16.3 million from MEL for an electricity self-generation levy for the period from May 1999 to June 2003. This claim has arisen since the commissioning of MEL's captive power plant in 1999. The Company has sought an exemption from the application of this levy from the Government of Tamil Nadu. The application is under consideration. Meanwhile, the Madras High Court has in its recent order, remitted back the case to the State of Tamil Nadu, to take a decision afresh on the representation for grant of tax exemption on consumption of electricity and directed to pass a detailed speaking order. MEL has accordingly represented before the Government of Tamil Nadu Energy Secretary, Government of Tamil Nadu avide of his letter dated 20 March 2013 denied the exemption citing various reasons and asked MEL to remit US\$15.7 million. MEL moved to the High Court of Madras and a stay was granted on the same.

## HZL: Department of Mines and Geology

The Department of Mines and Geology of the State of Rajasthan issued several show cause notices in August, September and October 2006 to HZL, totalling US\$53.3 million. These notices alleged unlawful occupation and unauthorised mining of associated minerals other than zinc and lead at HZL's Rampura Agucha, Rajpura Dariba and Zawar mines in Rajasthan during the period from July 1968 to March 2006. HZL believes that the claim becoming an obligation of the Company is unlikely and thus no provision has been made in the financial statements. HZL has filed writ petitions in the High Court of Rajasthan in Jodhpur and has obtained a stay in respect of these demands.

## Richter and Westglobe: income tax

The Group through its subsidiaries Richter Holdings Limited (Richter) and Westglobe Limited (Westglobe) in 2007 acquired the entire stake in Finsider International Company Limited based in the United Kingdom. Finsider at that point in time held 51% stake in Vedanta Limited (formerly Sesa Sterlite Limited). In October 2013, the Indian Tax Authorities (Tax Authorities) have served an order on Richter and Westglobe for alleged failure to deduct withholding tax on capital gain on the indirect acquisition of shares in April 2007. The Tax Authorities held that Richter and Westglobe were assessed in default for non-deduction of tax while making payment for acquiring the shares in 2007. The Tax Authorities determined the liability for such non-deduction of tax as US\$140.0 million in the case of Richter and US\$93.2 million in the case of Westglobe, comprising tax and interest. Being aggrieved, Richter and Westglobe filed appeals before the first appellate authority. Writ petitions were filed in the High Court of Karnataka challenging the constitutional validity of retrospective amendments made by the Finance Act 2012 and in particular the imposition of obligations to deduct tax on payments made against an already concluded transaction. These Writs are pending for disposal. In the interim, the Tax Authorities disposed of the petition filed for stay for demand arising out of impugned orders. Consequent to an order received from the Tax Authorities in March 2015, any amounts payable from Vedanta Limited to Westglobe, including dividends as and when declared, must instead be paid to the Tax Authorities (up to the amount of tax assessment). Richter and Westglobe sought intervention by the High Court by filing an application. The aforementioned Writ as well as connected application are due to be heard during June 2015. Richter and Westglobe believe that they are not liable for such withholding tax and intend to defend the proceedings.

#### Cairn India: income tax

In March 2014, Cairn India received a show cause notice from the Indian Tax Authorities (Tax Authorities) for not deducting withholding tax on the payments made to Cairn UK Holdings Limited (CUHL) UK, for acquiring shares of Cairn India Holdings Limited (CIHL), as part of their internal reorganisation. Tax Authorities have stated in the said notice that a short-term capital gain has accrued to CUHL on transfer of the shares of CIHL to Cairn India, in financial year 2006–2007, on which tax should have been withheld by the Company. Pursuant to this various replies were filed with the Tax Authorities. After hearings, the Income Tax Authority, during March 2015, have issued an order by holding Cairn India as 'assessee in default' and asked to pay such demand totalling US\$3,274.4 million (US\$1,637.1 million being the tax element and US\$1,637.1 million on account of interest). The Company has filed a Notice of Claim by invoking the Bilateral Investment Promotion Treaty between the UK and India. Cairn India has filed its appeal before the CIT (A) and filed a fresh Writ petition before Delhi High Court wherein it raised several points for assailing the aforementioned order. The hearing of the said Writ is due on 18 May 2015.

### Vedanta Limited: contractor claim

Shenzhen Shandong Nuclear Power Construction Co. Limited (SSNP) subsequent to terminating the EPC contract invoked arbitration as per the contract alleging non-payment of their dues towards construction of a 210MW co-generation power plant for 6MTPA expansion project, and filed a claim of US\$248.1 million. SSNP also filed a petition under Section 9 of the Arbitration and Conciliation Act, 1996 before the Bombay High Court praying for interim relief. The Bombay High Court initially dismissed their petition, but on a further appeal by SSNP, the Division Bench of the Bombay High Court directed Jharsuguda Aluminium to deposit a bank guarantee for an amount of US\$27.8 million as a security, being a prima facie representation of the claim, until arbitration proceedings are completed. Jharsuguda Aluminium has deposited a bank guarantee of an equivalent amount. Management is of the opinion that this claim is not valid under the terms of the contract with SSNP and it is unlikely that SSNP can legally sustain the claim and accordingly, no provision is considered necessary.

# Miscellaneous disputes - Vedanta Limited, HZL, MEL, BALCO, Cairn, Lisheen, VRJL and VRJL-II

The Group is subject to various claims and exposures which arise in the ordinary course of conducting and financing its business from the income tax, excise, indirect tax authorities and others. These claims and exposures mostly relate to the assessable values of sales and purchases or to incomplete documentation supporting the companies' returns or other claims.

The approximate value of claims against the Group companies total US\$1,370.7 million (2014: US\$1,150.1 million), of which US\$29.3 million (2014: US\$30.2 million) is included as a provision in the balance sheet as at 31 March 2015 (including claims of US\$583.1 million in respect of income tax assessments out of which US\$2.3 million is included as a provision in the balance sheet as at 31 March 2015).

The Group considers that it can take steps such that the risks can be mitigated and that there are no significant unprovided liabilities arising.

#### Operating lease commitments: as lessee

Operating leases are in relation to the office premises, office equipment and other assets, some of which are cancellable and some are non-cancellable. There is an escalation clause in the lease agreements during the primary lease period. There are no restrictions imposed by lease arrangements and there are no sub leases. There are no contingent rents. The total of the future minimum lease payments under non-cancellable leases are as follows:

(US\$ million)	As at 31 March	As at 31 March
Particulars	2015	2014
Within one year of the balance sheet date	4.9	5.1
Within two to five years from the balance sheet date	5.6	16.9
Total	10.5	22.0

Lease payments recognised as expenses during the year ended 31 March 2015, on non-cancellable leases, is US\$3.9 million (31 March 2014: US\$0.6 million).

#### 39. Related party transactions

The information below sets out transactions and balances between the Group and various related parties in the normal course of business for the year ended 31 March 2015.

#### Sterlite Technologies Limited (STL)

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
Sales to STL	126.0	102.3
Reimbursement of expenses	0.0	0.3
Purchases	2.9	0.0
Net interest received	0.6	0.2
Net amounts receivable at year end	3.7	5.4

Sterlite Technologies Limited is related by virtue of having the same controlling party as the Group, namely Volcan. Pursuant to the terms of the Shared Services Agreement dated 5 December 2003 entered into by the Company and STL, the Company provides various commercial services in relation to STL's businesses on an arm's length basis and at normal commercial terms. For the year ended 31 March 2015, the commercial services provided to STL were performed by certain senior employees of the Group on terms set out in the Shared Services Agreement. The services provided to STL in this year amounted to US\$0.02 million (2014: US\$0.03 million).

#### Vedanta Foundation

During the year US\$0.7 million was paid to the Vedanta Foundation (2014: US\$0.7 million).

The Vedanta Foundation is a registered not-for-profit entity engaged in computer education and other related social and charitable activities. The major activity of the Vedanta Foundation is providing computer education for disadvantaged students. The Vedanta Foundation is a related party as it is controlled by members of the Agarwal family who control Volcan. Volcan is also the majority shareholder of Vedanta Resources plc.

# Sesa Goa Community Foundation Limited

Following the acquisition of erstwhile Sesa Goa Limited, the Sesa Goa Community Foundation Limited, a charitable institution, became a related party of the Group on the basis that key management personnel of the Group have significant influence on the Sesa Goa Community Foundation Limited. During the year ended 31 March 2015, US\$0.4 million (2014: US\$0.8 million) was paid to the Sesa Goa Community Foundation Limited.

# Sterlite Iron and Steel Limited

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
Loan balance receivable	0.5	2.7
Receivable at year end	0.4	0.4
Net interest received	0.2	0.4

Sterlite Iron and Steel Limited is a related party by virtue of having the same controlling party as the Group, namely Volcan.

## Vedanta Medical Research Foundation

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
Donation	0.7	0.9

Vedanta Medical Research Foundation is a related party of the Group on the basis that key management personnel of the Group exercise significant influence.

#### Volcan Investments Limited

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
Net amount receivable at the year end	0.4	0.2
Recovery of expenses	0.3	_
Dividend paid	115.6	102.1

Volcan Investments Limited is a related party of the Group by virtue of being an ultimate controlling party of the Group.

#### **Public and Political Awareness Trust**

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
Donation	-	0.02

The Public and Political Awareness Trust is a related party by virtue of being controlled by members of the Agarwal family.

#### Ashurst LLP

	Year ended	Year ended
(US\$ million)	31 March 2015	31 March 2014
Services received during the year	0.4	0.3

Ashurst LLP is a related party of the Group on the basis that an Independent Director of the Group was a partner in the legal firm Ashurst LLP during the year ended 31 March 2015.

Key management personnel are those persons having authority and responsibility for planning, directing and controlling the activities of the Group, directly or indirectly, including any Director (whether executive or otherwise).

#### Remuneration of key management personnel

(US\$ million)	Year ended 31 March 2015	Year ended 31 March 2014
Short-term employee benefits	15.9	13.6
Post-employment benefits	0.8	0.9
Share-based payments	2.5	3.1
Termination Benefits	_	0.3
	19.2	17.9

# Other related party<sup>2</sup>

(US\$ million)	Year ended 31 March 2015	Year ended 31 March 2014
Salary paid	1.0	0.4
Interest bearing salary advance <sup>1</sup>	1.5	_

<sup>1</sup> Since repaid. 2 Close relative of the Executive Chairman

## 40. Share transactions

## (a) Call option - HZL

In pursuance to the Government of India's policy of disinvestment and the Share Purchase Agreement and a Shareholder's Agreement (SHA) both dated 4 April 2002 entered into with the Government of India, the Company acquired 26% equity interest in HZL. Under the terms of the SHA, the Group had two call options to purchase all of the Government of India's shares in HZL at fair market value. The Group exercised the first call option on 29 August 2003 and acquired an additional 18.9% of HZL's issued share capital. The Company also acquired an additional 20% of the equity capital in HZL through an open offer, increasing its shareholding to 64.9%. The second call option provides the Group the right to acquire the Government of India's remaining 29.5% share in HZL. This call option is subject to the right of the Government of India to sell 3.5% of HZL shares to HZL employees. The Group exercised the second call option via its letter dated 21 July 2009. The Government of India disputed the validity of call option and has refused to act upon the second call option. Consequently the Company invoked arbitration and filed a statement of claim. The arbitration proceedings are under progress in early stages. The next date of hearing is fixed for 8 August 2015.

#### (b) Call option - BALCO

The Group purchased a 51.0% holding in BALCO from the Government of India on 2 March 2001. Under the terms of the shareholder's agreement (SHA) for BALCO, the Group has a call option that allows it to purchase the Government of India's remaining ownership interest in BALCO at any point from 2 March 2004. The Group exercised this option on 19 March 2004. However, the Government of India has contested the valuation and validity of the option and contended that the clauses of the SHA violate the provision of Section 111A of the (Indian) Companies Act, 1956 by restricting the rights of the Government of India to transfer its shares and that as a result such provisions of the SHA were null and void. Subsequently the Group referred the matter to arbitration as provided in the SHA and the majority award of the arbitral tribunal rejected the claims of the Group on the grounds that the clauses relating to the call option, the right of first refusal, the 'tag-along' rights and the restriction on the transfer of shares violate the (Indian) Companies Act, 1956 and are not enforceable.

The Group challenged the validity of the majority award under section 34 of the Arbitration and Conciliation Act, 1996 in the High Court of Delhi and sought for setting aside the arbitration award to the extent that it holds these clauses ineffective and inoperative. The Government of India also filed an application before the High Court of Delhi to partially set aside the arbitral award in respect of certain matters involving valuation. The High Court of Delhi passed an order dated 10 August 2011 directing our application and the application by the Government of India to be heard together as they arise from a common arbitral award. The matter is currently pending before the High Court of Delhi and scheduled for final hearing on 3 August 2015.

On 9 January 2012, the Group offered to acquire the Government of India's interests in HZL and BALCO for US\$2,577.7 million and US\$296.5 million, respectively. The Group has, by way of letters dated 10 April 2012 and 6 July 2012, sought to engage with the Government of India on the same terms as the offer. This offer was separate from the contested exercise of the call options, and the Group proposed to withdraw the ongoing litigations in relation to the contested exercise of the options should the offer be accepted. To date, the offer has not been accepted by the Government of India and therefore there is no certainty that the acquisition will proceed.

The Group continues to include the shareholding in the two companies HZL and BALCO, in respect of which the Group has a call option as non-controlling interest

#### 41. Share purchases

During the year ended 31 March 2015, the Group increased its holding in one of its subsidiaries Vedanta Limited through open market purchases. The Group purchased 135,373,715 shares of Vedanta Limited for US\$629.4 million accounting for 4.55% of its equity share capital.

Also during the year ended 31 March 2015, Cairn India bought back and cancelled its 33,433,290 shares through open market purchases for US\$189.7 million accounting for 1.75% of its equity share capital. The total outflow of US\$819.1 on account of investment and share buy-back have been reflected as a reduction to total equity in the Statement of Changes in Equity for the year ended 31 March 2015.

#### 42. Konkola Copper Mines: value added tax

An assessment of output tax amounting to US\$600 million has been raised by the Zambia Revenue Authority (ZRA) covering the years 2011, 2012 and the first quarter of 2013. The basis of assessment is that KCM has not provided all the documentary evidence that is required under Rule 18 of the Value Added Tax Rules to prove an export and as a consequence, all sales of product that were zero rated in the returns have been standard rated by assessment. KCM has filed for judicial review of the ZRA's decision to standard rate the export products. After legally analysing the interpretation of Rule 18, management believes that KCM has got a reasonably strong arguable defense in the case.

Additionally KCM has US\$169 million receivable on account of value added tax on Inputs that are yet to be recovered from the Zambian Government. KCM has submitted the complete documentation and got it reviewed by ZRA as per the previous Rule 18 for the period between August 2013 and December 2013. There are precedents where other companies have received refunds of such amounts from the Government on submission of documents. KCM is in the process of submitting the required documentation for the remaining months. Further, effective February 2015, Rule 18 has been amended by allowing exporters to submit transit documents issued by the customs authority in the country of transit of the goods instead of import certificates from the country of destination, as proof of export for purposes of VAT zero rating. This will make it easier to collect the refunds. The Group believes that it will receive a refund of the entire amount and there is no objective evidence of uncertainty around collectability.

### 43. Subsequent events

There are no subsequent events that were identified which may have a bearing on the understanding of the financial statements.

# 44. List of subsidiaries

The financial statements comprise the financial statements of the following subsidiaries:

		The Company's e percentage hol				Immediate percenta	ige holding
Subsidiaries	Principal activities	31 March 2015	31 March 2014	Country of incorporation	Immediate holding company	31 March 2015	31 March 2014
Direct subsidiaries of the parent Company							
Vedanta Resources Holding Limited (VRHL)	Holding company	100.00%	100.00% U	nited Kingdom	VR plc	100.00%	100.00%
Vedanta Resources Jersey Limited (VRJL)	Financing company	100.00%	100.00%	Jersey (CI)	VR plc	100.00%	100.00%
Vedanta Resources Jersey II Limited (VRJL-II)	Financing company	100.00%	100.00%	Jersey (CI)	VR plc	100.00%	100.00%
Vedanta Finance (Jersey) Limited (VFJL)  Vedanta Jersey Investments Limited (VJIL)	Financing company Financing company	100.00% 100.00%	100.00%	Jersey (CI) Jersey (CI)	VR plc VR plc	100.00%	100.00% 100.00%
Indirect subsidiaries of the parent Company		100.0076	100.0076	Jersey (C1)	VK pic	100.0076	100.0076
Vedanta Limited (formerly Sesa Sterlite Limited)	Copper smelting, iron ore mining, aluminium mining, refining and smelting, power generation	62.85%	58.29%	India	Twin Star	46.53%	46.20%
Bharat Aluminium Company Limited (BALCO)	Aluminium mining and smelting	32.05%	29.73%	India	Vedanta Limited	51.00%	51.00%
Copper Mines of Tasmania Pty Limited (CMT)	Copper mining	62.85%	58.29%	Australia	MCBV	100.00%	100.00%
Fujairah Gold FZE	Gold and silver processing	62.85%	58.29%	UAE	CMT	98.00%	98.00%
Hindustan Zinc Limited (HZL)	Zinc and mining and smelting	40.80%	37.85%	India	Vedanta Limited	64.92%	64.92%
Monte Cello BV (MCBV)	Holding company	62.85%	58.29%	Netherlands	Vedanta Limited	100.00%	100.00%
Monte Cello Corporation NV (MCNV)	Holding company	100.00%	100.00%	Netherlands	Twin Star	100.00%	100.00%
Konkola Copper Mines PLC (KCM)	Copper mining and smelting	79.42%	79.42%	Zambia	VRHL	79.42%	79.42%
Sesa Resources Limited (SRL)	Iron ore	62.85%	58.29%	India	Vedanta Limited	100.00%	100.00%
Sesa Mining Corporation Limited	Iron ore	62.85%	58.29%	India	SRL	100.00%	100.00%
Sterlite Infra Limited (SIL) <sup>2</sup> Thalanga Copper Mines Pty Limited (TCM)	Non-trading Copper mining	62.85%	58.29% 58.29%	India Australia	Vedanta Limited MCBV	100.00%	100.00% 100.00%
Thalanga Copper Mines Pty Limited (TCM) Twin Star Holdings Limited (Twin Star)	Holding company	100.00%	100.00%	Mauritius	VRHL	100.00%	100.00%
MALCO Energy Limited (MEL)	Power generation	62.85%	58.29%	India	Vedanta Limited	100.00%	100.00%
Richter Holding Limited (Richter)	Financing company	100.00%	100.00%	Cyprus	VRCL	100.00%	100.00%
Westglobe Limited	Financing company	100.00%	100.00%	Mauritius	Richter	100.00%	100.00%
Finsider International Company Limited	Financing company	100.00%	100.00% U	nited Kingdom	Richter	60.00%	60.00%
Vedanta Resources Finance Limited (VRFL)	Financing company	100.00%		nited Kingdom	VRHL	100.00%	100.00%
Vedanta Resources Cyprus Limited (VRCL)	Financing company	100.00%	100.00%	Cyprus	VRFL	100.00%	100.00%
Welter Trading Limited (Welter)	Financing company	100.00%	100.00%	Cyprus	VRCL	100.00%	100.00%
Lakomasko B.V.	Financing company	62.85%	58.29%		HL Zinc Holding B.V.	100.00%	100.00%
THL Zinc Ventures Limited Twin Star Energy Holdings Limited (TEHL)	Financing company Holding company	62.85% 100.00%	58.29% 100.00%	Mauritius Mauritius	Vedanta Limited <sup>4</sup> BFM	100.00% 100.00%	100.00% 100.00%
THL Zinc Limited	Financing company	62.85%	58.29%		THL Zinc Ventures Ltd	100.00%	100.00%
Sterlite (USA) Inc.	Financing company	62.85%	58.29%	USA	Vedanta Limited	100.00%	100.00%
Talwandi Sabo Power Limited	Energy generation	62.85%	58.29%	India	Vedanta Limited	100.00%	100.00%
Konkola Resources plc	Holding company	100.00%		nited Kingdom	VRHL	100.00%	100.00%
Twin Star Mauritius Holdings Limited (TMHL)	Holding company	62.85%	58.29%	Mauritius	TEHL	100.00%	100.00%
THL Zinc Namibia Holdings (Pty) Limited (VNHL Skorpion Zinc (Pty) Limited (SZPL)	Acquisition of immovable and movable properties	62.85% 62.85%	58.29% 58.29%	Namibia Namibia	THL Zinc Ltd VNHL	100.00% 100.00%	100.00% 100.00%
Namzinc (Pty) Limited (SZ)	Mining	62.85%	58.29%	Namibia	SZPL	100.00%	100.00%
Skorpion Mining Company (Pty) Limited (NZ)	Mining	62.85%	58.29%	Namibia	SZPL	100.00%	100.00%
Amica Guesthouse (Pty) Ltd	Accommodation and catering services	62.85%	58.29%	Namibia	SZPL	100.00%	100.00%
Rosh Pinah Healthcare (Pty) Ltd	Leasing out of medical equipment and building and conducting services related thereto	43.37%	40.22%	Namibia	SZPL	69.00%	69.00%
Black Mountain Mining (Pty) Ltd	Mining	43.13%	43.13%	South Africa	THL Zinc Ltd	74.00%	74.00%
THL Zinc Holding BV Lisheen Mine Partnership	Financing company Mining partnership firm	62.85% 62.85%	58.29% 58.29%	Netherlands Ireland	Vedanta Limited <sup>4</sup> VLML	100.00% 50.00%	100.00% 50.00%
Pecvest 17 Proprietary Ltd.	Investment company	62.85%	58.29%	South Africa	THL Zinc Ltd	100.00%	100.00%
Vedanta Lisheen Holdings Limited (VLHL)	Investment company	62.85%	58.29%		THL Zinc Holding BV	100.00%	100.00%
Vedanta Exploration Ireland Limited	Exploration company	62.85%	58.29%	Ireland	VLHL	100.00%	100.00%
Vedanta Lisheen Mining Limited (VLML)	Mining	62.85%	58.29%	Ireland	VLHL	100.00%	100.00%
KilloranLisheen Mining Limited	Mining	62.85%	58.29%	Ireland	VLHL	100.00%	100.00%
Killoran Lisheen Finance Limited	Investment company	62.85%	58.29%	Ireland	VLHL	100.00%	100.00%
Lisheen Milling Limited	Manufacturing	62.85%	58.29%	Ireland	VLHL	100.00%	100.00%
Vizag General Cargo Berth Private Limited Paradip Multi Cargo Berth Private Limited	Infrastructure Infrastructure	62.85% 46.51%	43.63% 43.13%	India India	Vedanta Limited Vedanta Limited	99.99% 74.00%	74.00% 74.00%
Sterlite Ports Limited (SPL)	Investment company	62.85%	58.29%	India	Vedanta Limited  Vedanta Limited	100.00%	100.00%
Maritime Ventures Private Limited	Infrastructure	62.85%	58.29%	India	SPL	100.00%	100.00%
Sterlite Infraventures Limited	Investment Company	62.85%	58.29%	India	Vedanta Limited	100.00%	100.00%
Bloom Fountain Limited (BFM)	Investment company	62.85%	58.29%	Mauritius	Vedanta Limited	100.00%	100.00%
Western Cluster Limited	Mining company	62.85%	58.29%	Liberia	BFM	100.00%	100.00%
Goa Energy Limited <sup>3</sup>	Energy generation	-	58.29%	India	Vedanta Limited	-	100.00%
Sesa Sterlite Mauritius Holdings Limited	Financing company	100.00%	100.00%	Mauritius nited Vinadam	VRHL	100.00%	100.00%
Vedanta Finance UK Limited Valliant (Jersey) Limited	Financing company Financing company	100.00%	100.00% U	Jersey (CI)	Welter VRJL–II	100.00%	100.00% 100.00%
Cairn India Limited	Oil & gas Exploration,	37.64%	34.30%	India	TMHL	39.41%	38.73%
Cairn India Holdings Limited	and production Investment company	37.64%	34.30%	Jersey	Cairn India Limited	100.00%	100.00%
Cairn Energy Holdings Limited	Investment company	37.64%	34.30%	Scotland	Cairn India Holdings	100.00%	100.00%

	_	The Company's economic percentage holding		Country of		Immediate percent	age holding
Subsidiaries	Principal activities	31 March 2015	31 March 2014	incorporation	Immediate holding company	31 March 2015	31 March 2014
Cairn Energy Hydrocarbons Ltd	Exploration and production	37.64%	34.30%	Scotland	Limited Cairn India Holdings Limited	100.00%	100.00%
Cairn Exploration (No. 7) Limited	Exploration and production	37.64%	34.30%	Scotland	Cairn India Holdings Limited	100.00%	100.00%
Cairn Exploration (No.6) Limited	Exploration and production	37.64%	34.30%	Scotland	Cairn India Holdings Limited	100.00%	100.00%
Cairn Exploration (No. 2) Limited	Exploration and production	37.64%	34.30%	Scotland	Cairn India Holdings Limited	100.00%	100.00%
Cairn Energy Gujarat Block 1 Limited	Exploration and production	37.64%	34.30%	Scotland	Cairn India Holdings Limited	100.00%	100.00%
Cairn Energy Discovery Limited	Exploration and production	37.64%	34.30%	Scotland	Cairn India Holdings Limited	100.00%	100.00%
Cairn Energy Cambay B.V. <sup>1</sup>	Exploration and production	-	34.30%	Netherlands	Cairn Energy Netherlands Holding B.V.	=	100.00%
Cairn Energy India West B.V. <sup>1</sup>	Exploration and production	=	34.30%	Netherlands	Cairn Energy Netherlands Holding B.V.	=	100.00%
Cairn Energy Gujarat B.V. <sup>1</sup>	Exploration and production	-	34.30%	Netherlands	Cairn Energy Netherlands Holding B.V	=	100.00%
Cairn Energy Netherlands Holdings B.V. <sup>1</sup>	Holding company	-	34.30%	Netherlands	Cairn Energy Holdings Limited	-	100.00%
Cairn Energy Australia Pty Limited	Investment company	37.64%	34.30%	Australia	Cairn India Holdings Limited	100.00%	100.00%
Cairn Energy India Pty Limited	Exploration and production	37.64%	34.30%	Australia	Cairn Energy Australia Pty Limited	100.00%	100.00%
CEH Australia Limited <sup>1</sup>	Investment company	37.64%	34.30%	Australia	Cairn Energy Australia Pty Limited	100.00%	100.00%
CIG Mauritius Holdings Private Limited	Investment company	37.64%	34.30%	Mauritius	Cairn India Limited	100.00%	100.00%
CIG Mauritius Private Limited	Investment company	37.64%	34.30%	Mauritius	CIG Mauritius Holding Private Limited	100.00%	100.00%
Cairn Lanka Private Limited	Exploration and	37.64%	34.30%	Sri Lanka	CIG Mauritius Pvt Ltd	100.00%	100.00%

- Dissolved during the year ended 31 March 2015.
- Sterlite Infra Limited merged with Vedanta Limited during the year ended 31 March 2015.
- GEL merged with Vedanta Limited during the year ended 31 March 2015.

  Post merger of Sterlite Infra Limited with Vedanta Limited, Vedanta Limited became immediate parent as of 31 March 2015 (31 March 2014: Sterlite Infra Limited).

production

Exploration and

production

The Group owns directly or indirectly through subsidiaries, more than half of the voting power of all of its subsidiaries as mentioned in the list above, and has power over the subsidiaries, is exposed or has rights, to variable returns from its involvement with the subsidiaries and has the ability to affect those returns through its power over the subsidiaries.

37.64%

34.30%

South Africa

100.00%

Cairn Energy Hydrocarbons Limited 100.00%

## 45. Group restructuring

Cairn South Africa Pty Limited

During the year ended 31 March 2014, pursuant to the Scheme of Amalgamation (the Scheme) sanctioned by the Indian and Mauritius Courts, the Group's subsidiary companies viz. Sterlite Energy Limited, Sterlite Industries (India) Limited (SIIL), Aluminium Business of Vedanta Aluminium Limited, Ekaterina Limited and the Residual business of Madras Aluminium Company Limited merged with Sesa Goa Limited (SGL) (A subsidiary of the Group). Bloom Fountain Limited, a subsidiary of Sesa Goa Limited acquired a 38.7% stake in Cairn India Limited (Cairn). Consequent to this, Cairn became a subsidiary of SGL. By way of a slump sale agreement dated 19 August 2013 between Vedanta Aluminium Limited (VAL) and Vedanta Limited, the power business consisting of 1,215MW thermal power facility situated at Jharsuguda and 300MW co-generation facility (90MW operational and 210MW under development) at Lanjigarh, was transferred on a going concern basis at its carrying value to Vedanta Limited.

Subsequently, the name of SGL was changed to Sesa Sterlite Limited during the year ended 31 March 2014. The name of Sesa Sterlite Limited was further changed to Vedanta Limited during the year ended 31 March 2015.

These transactions are within subsidiaries of the Company and will not have any acquisition accounting impact other than a change in the economic shareholding percentage. The simplification exercise has resulted in simplifying the structure, cross holding and aligning the debt with cash flow and change in economic holding percentage mainly in VAL and Cairn. VAL's effective holding has changed from 87.6% to 58.3% whereas Cairn's reduced from 49.8% to 34.3%.

## 46. Ultimate controlling party

At 31 March 2015, the ultimate controlling party of the Group was Volcan, which is controlled by persons related to the Executive Chairman, Mr Anil Agarwal. Volcan is incorporated in the Bahamas, and does not produce Group accounts.

#### 47. Company balance sheet

(US\$ million)	Note	31 March 2015	31 March 2014
Non-current assets			
Tangible fixed assets	49	0.3	0.7
Investments in subsidiaries	50	1,226.3	1,061.8
Investment in preference shares of subsidiaries	51	1.7	1.7
Financial asset investment	52	0.1	0.1
Derivative asset		_	14.1
		1,228.4	1,078.4
Current assets			
Debtors due within one year	53	422.7	1,225.7
Debtors due after one year	53	5,066.8	5,405.2
Current asset investments	54	33.2	14.8
Cash at bank and in hand		0.1	0.5
		5,522.8	6,646.2
Creditors: amounts falling due within one year			
Trade and other creditors	55	(97.2)	(98.5)
External borrowings	55	(270.4)	(89.7)
Loan from subsidiary	55	_	(1,249.5)
Derivative liability	55	(2.0)	_
		(369.6)	(1,437.7)
Net current assets		5,153.2	5,208.5
Total assets less current liabilities		6,381.6	6,286.9
Creditors: amounts falling due after one year			
Loan from subsidiary	56	(1,430.2)	(339.8)
External borrowings	56	(4,345.7)	(5,483.6)
		(5,775.9)	(5,823.4)
Net assets		605.7	463.5
Capital and reserves			
Called up share capital	57	30.0	29.8
Share premium	57	198.5	198.5
Share-based payment reserve	57	27.4	46.9
Convertible bond reserve	57	38.4	80.1
Other reserves	57	(2.2)	(2.2)
Treasury shares	57	(490.6)	(490.6)
Retained earnings	57	804.2	601.0
Equity shareholders' funds	57	605.7	463.5

The financial statements of Vedanta Resources plc, registration number 4740415 were approved by the Board of Directors on 13 May 2015 and signed on their behalf by:

# Tom Albanese

Chief Executive Officer

## 48. Company accounting policies

The Vedanta Resources plc (the Company) balance sheet and related notes have been prepared in accordance with United Kingdom Generally Accepted Accounting Principles and UK company law (UK GAAP). The financial information has been prepared on an historical cost basis except preference shares, financial asset investments and derivative financial instruments which are stated at fair value.

As permitted by section 408 of the Companies Act 2006, the profit and loss account of the Company is not presented as part of these financial statements. The profit after tax for the year of the Company amounted to US\$284.7 million (2014: loss of US\$128.3 million).

These financial statements are presented in US dollars being the functional currency of the Company.

#### Significant accounting policies

#### Investments in subsidiaries

Investments in subsidiaries represent equity holdings in subsidiaries except preference shares, valued at cost less any provision for impairment. Investments are reviewed for impairment if events or changes in circumstances indicate that the carrying amount may not be recoverable.

## Investment in preference shares of subsidiaries

Investments in preference shares of subsidiaries are stated at fair value. The fair value is represented by the face value of the preference shares as the investments are redeemable at any time for their face value at the option of the Company.

# Cash and cash equivalents

Cash and cash equivalents in the balance sheet comprise cash at bank and in hand, short-term deposits with banks and short-term highly liquid investments that are readily convertible into cash which are subject to insignificant risk of changes in value and are held for the purpose of meeting short-term cash commitments.

#### Financial asset investments

Financial asset investments are classified as available for sale under FRS 26 and are initially recorded at cost and then remeasured at subsequent reporting dates to fair value. Unrealised gains and losses on financial asset investments are recognised directly in equity. On disposal or impairment of the investments, the gains and losses in equity are recycled to the income statement.

#### Currency translation

Transactions in currencies other than the functional currency of the Company, being US dollars, are translated into US dollars at the spot exchange rates ruling at

the date of transaction. Monetary assets and liabilities denominated in other currencies at the balance sheet date are translated into US dollars at year end exchange rates, or at a contractual rate if applicable.

#### Tangible fixed assets

Tangible fixed assets are stated at cost less accumulated depreciation and provision for impairment.

#### Deferred taxation

Deferred taxation is provided in full on all timing differences that result in an obligation at the balance sheet date to pay more tax, or a right to pay less tax, at a future date, subject to the recoverability of deferred tax assets. Deferred tax assets and liabilities are not discounted.

#### Share-based payments

The cost of equity-settled transactions with employees is measured at fair value at the date at which they are granted. The fair value of share awards with market-related vesting conditions are determined by an external valuer and the fair value at the grant date is expensed on a straight-line basis over the vesting period based on the Company's estimate of shares that will eventually vest. The estimate of the number of awards likely to vest is reviewed at each balance sheet date up to the vesting date at which point the estimate is adjusted to reflect the current expectations. No adjustment is made to the fair value after the vesting date even if the awards are forfeited or not exercised. Amounts recharged to subsidiaries in respect of awards granted to employees of subsidiaries are recognised as intercompany debtors until repaid.

#### Borrowings

Interest bearing loans are recorded at the net proceeds received i.e. net of direct transaction costs. Finance charges, including premiums payable on settlement or redemption and direct issue costs, are accounted for on accruals basis and charged to the profit and loss account using the effective interest method and are added to the carrying amount of the instrument to the extent that they are not settled in the period in which they arise.

#### Convertible bonds

The convertible bond issued by VRJL and VRJL-II (Note 55) are accounted for as a compound instrument. The gross proceeds (net of issue costs) were lent to the Company by VRJL and VRJL-II. The equity component has been recognised in a separate reserve of the Company and is not subsequently remeasured. The recognition of the equity component by the Company acts to reduce the payable to VRJL and VRJL-II which arises once the gross proceeds are borrowed. The liability component is held at amortised cost. The interest expensed on the liability component is calculated by applying an effective interest rate. The difference between interest expensed and interest paid is added to the carrying amount of the liability component.

The bonds are first convertible into preference shares of the issuer having a principal value of US\$100,000 per Preference share, which are exchanged immediately for ordinary shares of the Company.

#### Financial instruments

The Company has elected to take the exemption provided in paragraph 2D of FRS 29 in respect of these parent Company financial statements. Full disclosures are provided in Note 29 to the financial statements of the Group for the period ended 31 March 2015.

#### Derivative financial instruments

Derivative financial instruments are initially recorded at their fair value on the date of the derivative transaction and are remeasured at their fair value at subsequent balance sheet dates.

Changes in the fair value of derivatives that are designated and qualify as fair value hedges are recorded in the profit and loss account. The hedged item is recorded at fair value and any gain or loss is recorded in the profit and loss account and is offset by the gain or loss from the change in the fair value of the derivative.

Derivative financial instruments that do not qualify for hedge accounting are marked to market at the balance sheet date and gains or losses are recognised in the profit and loss account immediately.

Hedge accounting is discontinued when the hedging instrument expires or is sold, terminated or exercised, or no longer qualifies for hedge accounting. Any cumulative gain or loss on the hedging instrument recognised in equity is kept in equity until the forecast transaction occurs. If a hedged transaction is no longer expected to occur, the net cumulative gain or loss recognised in equity is transferred to net profit or loss for the year.

# Cash flow statement

The Company's individual financial statements are outside the scope of FRS 1 Cash Flow Statements because the Company prepares publicly available Group financial statements, which include a Consolidated Cash Flow Statement. Accordingly, the Company does not present an individual Company Cash Flow Statement.

## Related party disclosures

The Company's individual financial statements are exempt from the requirements of FRS 8 Related Party Disclosures because its individual financial statements are presented together with its Group financial statements. Accordingly, the individual financial statements do not include related party disclosures.

#### Financial guarantees

Guarantees issued by the Company on behalf of other Group companies are designated as 'Insurance Contracts'. Accordingly these are shown as contingent liabilities (Note 58).

#### Debtors

Debtors are stated at their nominal value as reduced by appropriate allowance for estimated irrecoverable amounts. An allowance for impairment for debtors is made where there is an indication of a reduction in the recoverability of the carrying value of the debtor.

#### Creditors

Creditors are stated at their nominal value.

## 49. Company tangible fixed assets

(US\$ million)

1.9
0.4
2.3
0.0
2.3
_
1.3
0.3
1.6
0.4
2.0
0.6
0.7
0.3

#### 50. Investments in subsidiaries

(US\$ million)	
Cost	
At 1 April 2013	1,061.8
At 1 April 2014	1,061.8
At 31 March 2015	1,226.3

At 31 March 2015, the Company held 157,538,524 shares in Vedanta Resources Holdings Limited (VRHL) (March 2014: 144,538,524 shares), being 100% of VRHL's issued equity share capital. During the year the Company had subscribed to 13,000,000 shares of VRHL under 'rights issue' at face value of US\$1 with a premium of US\$11.65 per share. The Company also held one deferred share in VRHL (March 2014: one). At 31 March 2015, the Company held two shares in Vedanta Finance Jersey Limited (VFJL) (March 2014: two), two shares in Vedanta Resources Jersey II Limited (VRJL-II) (March 2014: two), two shares in Vedanta Jersey Investment Limited (VJIL) (March 2014: two), being 100% of its issued equity share capital.

VRHL is an intermediary holding company incorporated in the United Kingdom (Note 44) and registered in England and Wales. VFJL, VRJL, VJIL and VRJL-II are companies, registered and incorporated in Jersey, established to raise funds for the Vedanta Group.

## 51. Investment in preference shares of subsidiaries

(US\$ million)	
Fair value	
At 1 April 2014	1.7
Additions	_
Disposal	
At 31 March 2015	1.7
At 1 April 2013	178.9
Additions	1.7
Disposal	(178.9)
At 31 March 2014	1.7

As at 31 March 2015, the Company held 1,700,000 preference shares in VRJL (31 March 2014: 1,700,000 preference shares in VRJL).

#### 52. Financial asset investment

(US\$ million)	
Fair value	
At 1 April 2014	0.1
Fair value movement	_
At 31 March 2015	0.1
At 1 April 2013	0.1
Fair value movement	_
At 31 March 2014	0.1

The investment relates to an equity investment in the shares of Victoria Gold Corporation. At 31 March 2015, the investment in Victoria Gold Corporation was revalued and no gain or loss (2014: no gain or loss) was recognised in equity.

#### 53. Company debtors

(US\$ million)	31 March 2015	31 March 2014
Amounts due from subsidiary undertakings	5,485.6	6,626.3
Prepayments and accrued income	3.5	4.4
Other taxes	0.4	0.2
Total	5,489.5	6,630.9
Debtors due within one year	422.7	1,225.7
Debtors due after one year	5,066.8	5,405.2
Total	5,489.5	6,630.9

#### Amounts due from subsidiary undertakings

At 31 March 2015, the Company had loans due from VRHL of US\$1,507.5 million (2014: US\$1,214.6 million) which represented the funds being loaned to other Group companies for funding the subsidiaries. Out of the total loan, US\$579.3 million bears interest at six month US\$LIBOR plus 350 basis points, US\$500 million at 5.8%, US\$31.2 million at 5.9%, US\$47 million at 9.7%, and US\$350 million at US\$LIBOR plus 367 basis points.

At 31 March 2015, the Company had loans of US\$3,590.5 million (2014: US\$4,732.7 million) from Vedanta Resources Jersey II Limited. Out of the total loan US\$119.2 million bears interest at US\$LIBOR plus 357 basis points, US\$1,413.0 million at 7.45%, US\$1,200 million at 6.50%, US\$48.3 million at LIBOR plus 300 basis points US\$60 million at 3.15% and US\$750 million at 7.25%.

In addition to the loans, the Company was owed US\$323.3 million of accrued interest from VRHL and Vedanta Resources Jersey II Limited (March 2014: US\$634.7 million) and US\$64.3 million (2014: US\$44.2 million) other receivables from Group companies.

#### 54. Company current asset investments

(US\$ million)	31 March 2015	31 March 2014
Bank term deposits	33.2	14.8
Total	33.2	14.8

## 55. Company creditors: amounts falling due within one year

(US\$ million)	31 March 2015	31 March 2014
Accruals	(97.2)	(98.5)
External borrowings	(270.4)	(89.7)
Loan from subsidiary	_	(1,249.5)
Derivative liability .	(2.0)	_
Total	(369.6)	(1,437.7)

The external borrowings as at 31 March 2015 represent a loan from ICICI of US\$90 million (2014: US\$90 million), repayable in December 2015 and a loan from Deutsche Bank of US\$185 million repayable in March 2016. As at 31 March 2014, loans from subsidiaries included a loan of US\$1,192.8 million from VRJL relating to its issue of US\$1,250 million convertible bonds (bond issued in July 2009). In March 2014, VRJL believed that bondholders would exercise the put option in July 2014 and accordingly the above loan was classified as amounts falling due within one year. However, bonds worth US\$113.8 million were exercised by bondholders in July 2014 and since now the final maturity is in July 2016 the above loan has been classified from amounts falling due within one year to amounts falling due after one year (US\$1,110.5 million). During the year ended 31 March 2015, interest was charged at the effective interest rate of 8.27% (March 2014: 17.3%).

#### 56. Company creditors: amounts falling due after one year

(US\$ million)	31 March 2015	31 March 2014
Loan from subsidiary	(1,430.2)	(339.8)
External borrowings	(4,345.7)	(5,483.6)
Total	(5,775.9)	(5,823.4)

Loans from subsidiaries include a loan of US\$39.7 million due to Richter Holdings Limited, US\$280.0 million to Vedanta Finance UK Limited and US\$1,110.5 million to VRJL (as discussed in Note 55).

Of the US\$1,250 million non-convertible bond issued during 2008, US\$500 million was repaid in January 2014 and the remaining US\$750 million, 9.5% bonds are due for repayment in July 2018.

In July 2011, the Company issued US\$750 million, 6.75% bonds due June 2016, and US\$900 million, 8.25% bonds due June 2021. As at 31 March 2015, the outstanding amount under this facility is US\$1,650.0 million.

In March 2012, the Company availed a facility of US\$300.0 million with Standard Chartered Bank bearing an interest rate of LIBOR plus 415 basis points. The same was due for repayment in June 2015. This loan was fully prepaid in the month of May 2014.

In December 2012, the Company obtained a syndicated loan with State Bank of India as an agent for US\$595.0 million repayable in four equal instalments in February 2017, August 2017, July 2018 and January 2019. The loan bears an interest rate of three month US\$LIBOR plus 440 basis points. The Company has prepaid this loan of US\$595.0 million in September 2014.

In April 2013, the Company entered into a Standby Letter of Credit agreement arranged by Axis Bank for an amount of US\$150 million at a commission of 1% per annum payable quarterly. The facility is funded by Bank of India to the extent of US\$148.5 million and bears an interest rate three month US\$LIBOR plus 290 basis points. The facility is repayable in two equal annual instalments starting April 2017. As at 31 March 2015, the outstanding amount under this facility is US\$148.5 million.

In June 2013, the Company issued US\$1,200 million, 6.00% bonds due January 2019, and US\$500 million, 7.125% bonds due May 2023. In December 2013, the Company entered into a facility agreement with Bank of India for borrowing up to US\$100 million at an interest rate of US\$LIBOR plus 357 basis points repayable to the extent of 50% in October 2017 and the balance in January 2018. As at 31 March 2015, the outstanding amount under this facility is US\$100 million

In March 2015, the Company entered into a facility agreement with State Bank of India for borrowing up to US\$350 million. US\$100 million is repayable in March 2020 and bears an interest rate of US\$LIBOR plus 370 basis points. US\$250 million bears an interest rate of US\$LIBOR plus 403 basis points repayable in two instalments being US\$100 million and US\$150 million at the end of 72 and 84 months respectively after initial utilisation. US\$325 million still remains undrawn in this facility.

## 57. Company reconciliation of movement in equity shareholders' funds

(US\$ million)	Share capital (Note 35)	Share premium	Share-based payment reserve	Convertible bond reserve	Treasury shares R	etained earnings	Other reserves	Total
Equity shareholders' funds at 1 April 2014	29.8	198.5	46.9	80.1	(490.6)	601.0	(2.2)	463.5
Profit for the year	_	_	_	_	_	284.7	_	284.7
Dividends paid (Note 14)	_	_	_	_	_	(171.3)	_	(171.3)
Exercise of LTIP awards (Note 32)	0.2	_	(48.1)	_	_	48.1	_	0.2
Recognition of share-based payments (Note 32)	_	_	28.6	_	_	_	_	28.6
Convertible bond transfer (Note 28)	_	_	_	(41.7)	_	41.7	_	_
Equity shareholders' funds at 31 March 2015	30.0	198.5	27.4	38.4	(490.6)	804.2	(2.2)	605.7

#### 58. Company contingent liabilities

- a) The Company has guaranteed US\$1,250 million convertible bonds issued by VRJL (2014: US\$1,250 million), of the above US\$1.7 million has been converted during the year ended 31 March 2014 and US\$113.8 million was repaid pursuant to exercise of put option during the year ended 31 March 2015. See Note 28 to the financial statements for further details on the convertible bonds.
- b) The Company has given a corporate guarantee to Jharsuguda Aluminium, for an amount of US\$12 million up to 31 March 2015.
- c) The Company has given a corporate guarantee to Konkola Copper Mines for an amount of US\$619.0 million up to 31 March 2015.
- d) The Company has guaranteed US\$883 million convertible bonds issued by VRJL-II (2014: US\$883 million). During the year ended 31 March 2014 and 31 March 2015, US\$809.8 million and US\$65.1 million respectively was repaid to the bondholders on exercise of put option. See Note 28 to the financial statements for further details on the convertible bonds.
- e) The Company has guaranteed US\$170 million for a loan facility entered by Valliant Jersey Limited with ICICI bank and US\$180 million for a loan facility entered by Vedanta Finance Jersey Limited with ICICI bank.
- f) The Company has guaranteed US\$500 million for a syndicated facility agreement entered by Welter Trading Limited with Standard Chartered Bank as facility agent.
- g) The Company has guaranteed US\$500 million for loan facility entered by Monte Cello NV with ICICI bank.
- h) The Company has guaranteed US\$150 million for loan facility entered by Twin Star Holdings Limited with ICICI bank.
- The Company has guaranteed US\$100 million for revolving credit facility entered by Twin Star Holdings Limited with Royal Bank of Scotland and Standard Chartered Bank.

- j) The Company has guaranteed US\$500 million for a syndicated facility entered by Twin Star Holdings Limited with Axis Bank as lead arranger and facility agent.
- k) The Company has guaranteed US\$1,200 million for a syndicated facility entered by Twin Star Mauritius Holdings Limited with Standard Chartered Bank as facility agent
- The Company has guaranteed US\$500 million for a loan facility entered by Twin Star Mauritius Holdings Limited with Standard Chartered Bank and First Gulf Bank PJSC of which US\$250 million is under a commodity murabaha structure (Islamic financing) and balance US\$250 million is under a conventional loan structure.
- m) The Company has guaranteed US\$1,250 million for a loan facility entered by its subsidiaries THL Zinc Limited with Cairn India Holdings Limited (Intercompany loan).
- n) The Company has provided a guarantee for the Cairn India Group's obligation under the Production Sharing Contract (PSC).

# 59. Company share-based payment

The Company had certain LTIP awards outstanding as at 31 March 2015. See Note 32 to the financial statements for further details on these share-based payments.

# ANNEX A — LIFE OF MINES

Company	Particulars	Reserves (Proved & Probable) Mt	Reserves & Resources Mt <sup>(1)</sup>	Fiscal year 2016 Production Mt	Mine Life — Reserves — Years as of 1 April 2016	Mine Life — Reserves & Resources — Years as of 1 April 2016
HZL	Rampura Agucha	51.1	103.8	4.7	10.9	22.1
HZL	Rajpura Dariba	9.3	58.9	0.6	13.9	87.8
HZL	Zawar Group	9.5	189.4	1.35	7	68
HZL	Kayad	3.9	6.0	.7	5.1	7.9
HZL	Sindesar Khurd	33.2	109.5	2.97	11.2	36.9
HZL	Bamnia Kalan	_	29.4	_	_	_
CMT	Mt. Lyell	_	51.6	_	_	_
KCM	Konkola	46.2	282.9	1.7	27.5	168.8
KCM	Nchanga (Underground)	_	63.7	1.4	_	46.5
KCM	Nchanga (Open-Pit)	11.32	55.1	1.7	6.7	32.6
KCM	Other Pits	30.5	154.7	7.2	4.2	21.4
Skorpion	Skorpion	5.2	8.7	1.2	4.2	7.0
Black MountainMining	Black Mountain — Deeps	6.9	18.1	1.2	5.7	14.8
Black MountainMining	Swartberg	2.6	31.8	.36	7.2	88.6
Black MountainMining	Gamsberg	53.2	215.5	7.4	7.2	29.1
Vedanta Limited	Codli	24.1	31.5	2.9	8.5	11.1
Vedanta Limited	Sonsi	37.7	61.3	0.2	188.5	306.5
Vedanta Limited	Mareta Sodo	10.8	16.5	0.1	83.1	126.9
Vedanta Limited	Vedanta Others	8.6	20.6	_	_	_
Vedanta Limited	A Narain	39.4	80.9	2.2	17.9	36.8
Vedanta Limited	Bicholim	38.8	92.2	0.4	97.0	230.3
Vedanta Limited	Surla	30.9	60.5	.21	147.14	288.6
Vedanta Limited	Curfm	2.1	7.2	_	_	_
Vedanta Limited	Colamba	0.5	3.9	_	_	_
SRL	SRL Others	.7	9	.6	1.1	14.8

See Annex B — "Mineral Resources". The reporting methodology for Mineral Resources differs from that of Ore Reserves under international reporting codes as certain factors (termed "Modifying Factors", such as mining losses and dilution) are included in the reporting of Ore Reserves, whereas Mineral Resources are reported on an in-situ basis. Accordingly, the two numbers are not added together under international reporting codes such as JORC (2012) and SAMREC (2009). Consequently, considerable caution should be exercised when considering life of mine estimates based on Mineral Resource plus Ore Reserves. Life of mine estimates which include Mineral Resources have been undertaken by the Company and have not been subject to review by the Independent Consultants named in the Offering Circular. See "Presentation of Information — Basis of Presentation of Reserves and Resources — Cautionary Note to United States Investors Concerning Estimates of Measured, Indicated and Inferred Resources for Mining Operations" and "Risk Factors - Industry Risks - There are uncertainties inherent in estimating Vedanta's Ore Reserves and Mineral Resources and oil, condensate and sales-gas reserves, and if the actual amounts of such reserves and resources are less than estimated, its results of operations and financial condition may be materially and adversely affected". The life of mine estimates presented in this table take into account the fiscal year 2016 production for all mines except for all SGL mines, Kayad mine and Gamsberg, which take into account the production capacity. Furthermore, it should be noted that the Ore Reserves are derived from Life-of-mine plans which in certain instances assume expanded production which is significantly increased when compared to historical production capacity. Accordingly, the mine lives for such instances will be significantly shorter than the theoretical values reported above. Furthermore, there are scenarios where the contribution of Inferred Mineral Resources is significant and as these are not separately identified this may constitute non-material disclosure.

ANNEX B — MINERAL RESOURCES (EXCLUSIVE REPORTING BASIS)

	Measured			Indicated			Inferred		
	Quantity	Grade	Grade	Quantity	Grade	Grade	Quantity	Grade	Grade
Zinc-Lead Mines	Mt.	Zinc %	Lead %	Mt.	Zinc %	Lead %	Mt.	Zinc %	Lead %
Rampura Agucha	0	0	0	14.8	15.2	2.0	37.9	9.4	2.3
Rajpura Dariba	7.2	7.5	2	15.6	6.6	2.5	26.6	6.7	1.9
Zawar Group	2.4	4.3	1.8	23.8	4.8	1.8	56.1	4.8	2.6
Kayad	0.4	17.6	2.3	1.3	10.8	1.7	0.4	7.6	1.3
Sindesar Khurd	5	5.4	2.8	18.6	4.5	2.8	52.7	3.9	2.1
Bamnia Kalan	_	_	_	5.4	4.5	1.6	14.7	3.7	1.8
BMM Deeps	4.2	3.09	3.36	6.9	2.46	2.78	_	_	_
Swartberg	_	_	_	25.9	0.5%	2.25	3.27	.4	2.28
Gamsberg North	43.34	6.6	0.5	54.6	5.9	0.52	32.09	5.8	0.5
Gamsberg East	_	_	_	_	_	_	32.3	9.8	0.6
Total — Gamsberg	43.34	6.6	0.6	54.6	5.9	0.52	64.80	7.1	0.5

	Mea	sured	Indi	cated	Infe	rred
Copper Mines	Tonnage (Mt)	Grade (%TCu)	Tonnage (Mt)	Grade (%TCu)	Tonnage (Mt)	Grade (%TCu)
Mt Lyell	3.5	1.22	26.4	1.06	21.7	1.06
Konkola	18.7	3.34	_	_	218.1	3.76
Nchanga (Underground)	0.7	4.54	16.1	2.46	46.8	2.28
Nchanga (Open-Pit)	_	_	43.8	1.24	_	_
Other Open Pits	0.2	2.46	80.7	1.93	43.4	1.61
Refractory Ore	_	_	_	_	6.7	0.85

	Measured		Indicated		Inferred		Total
	Quantity	Grade Fe	Quantity	Grade Fe	Quantity	Grade Fe	Quantity
Iron Ore	Mt.	<b>%</b>	Mt.	<b>%</b>	Mt.	<b>%</b>	Mt.
Codli Group	3.9	51.4	2.9	52.6	0.60	52.3	7.4
Sonshi Group	8.4	56.6	12.1	55.8	3.1	57.8	23.6
Mareta Group	2.6	48.8	2.2	52.4	.9	56.7	5.7
Other	2.4	51.7	4.1	53.6	5.5	55.2	12
A. Narrain	19.1	43.5	12.9	48.5	9.5	52.9	41.5
Bicholim	23.6	55	24.4	57	5.3	59.8	53.3
Surla	15.9	40.2	11.2	40.3	2.6	42.6	29.7
Curpem	3.6	57.2	1.2	57.1	.3	58	5.1
Colomba	1.8	55.7	1.3	57.7	.4	58.8	3.5
SRL	7.7	53.0	0.6	53.4	0	0	8,3

See "Presentation of Information — Basis of Presentation of Reserves and Resources — Cautionary Note to United States Investors Concerning Estimates of Measured, Indicated and Inferred Resources for Mining Operations" and "Risk Factors — Industry Risks — There are uncertainties inherent in estimating Vedanta's Ore Reserves and Mineral Resources and oil, condensate and sales-gas reserves, and if the actual amounts of such reserves and resources are less than estimated, its results of operations and financial condition may be materially and adversely affected".

# ANNEX C — MINERAL RESOURCE AND ORE RESERVE REPORTING

The JORC Code (2012) and the SAMREC Code (2016) require that for Reporting of Mineral Resources and Ore Reserves, the publication of additional supplemental information, specifically in respect of assumed modifying factors and economic assumptions as well as a detailed narrative in respect of certain elements as noted under the JORC Codes (2012) Table 1 declarations. Certain sections of this Offering Circular present historical production sections as well as technical descriptions of the Company's Mineral Assets and as such includes some of the supporting information incorporated into such declarations.

The detailed split for Proved and Probable Ore Reserves are included under the relevant business description sections for each of the Mineral Assets.

The Competent Persons' responsible for confirming that the Mineral Resources and Ore Reserves are reported in accordance with the terms and definitions of the reporting codes are:

For HZL where Mineral Resources and Ore Reserves are reported in accordance with the terms and definitions of the JORC Code (2012):

The Competent Person who is responsible for the Mineral Resources as reported in the 31 March 2016 Statements is Mr Mark Campodonic, FGS, MAusIMM, MSc who is an employee of SRK UK. He is a Fellow of the Geological Society ("FGS") which is a Recognised Overseas Professional Organisation ("ROPO") within the meaning of the JORC Code. Mr Mark Campodonic is a mining geologist with 18 years' experience in the mining industry which is relevant to the style of mineralization and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the JORC Code (2012).

The Competent Person who is responsible for the Ore Reserves as reported in the 31 March 2016 Statements is Mr John Miles, C Eng, MIMMM, MSc who is an associate of SRK UK. He is a Member of the Institute of Materials, Minerals and Mining ("MIMMM") which is a ROPO within the meaning of the JORC Code. Mr John Miles is a mining engineer with 32 years' experience in the mining industry which is relevant to the style of mineralization and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the JORC Code (2012).

For KCM where Mineral Resources and Ore Reserves are reported in accordance with the terms and definitions of the SAMREC Code (2009):

The Competent Person who is responsible for the Mineral Resources (Resource Estimation) for KCM is Mr Victor Simposya, Pr. Sci. Nat., SAIMM, MSc who is an employee of SRK SA. He is a Professional Natural Scientist with the South African Institute of Mining and Metallurgy ("SAIMM"). Mr Victor Simposya is a geologist with over 38 years' experience in the mining industry which is relevant to the style of mineralization and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the SAMREC Code (2009).

The Competent Person who is responsible for the Ore Reserves for KCM is Mr Boniface Mwila, Pr. Eng., ECSA (South Africa), MSAIMM, MSc who is an employee of SRK. Mr Boniface Mwila is a Mining Engineer with over 28 years' experience in the mining industry which is relevant to the style of mineralization and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the SAMREC Code (2009).

For CMT where Mineral Resources are reported in accordance with the terms and definitions of the JORC Code (2012):

The Competent Person who is responsible for the Mineral Resources of CMT is John Hooper BSc (Hons). He is a Member of the Australian Institutes of Mining and Metallurgy. Mr John Hooper has sufficient experience relevant to the style and type of mineral deposit under consideration and to the activity which is being undertaken to qualify as a Competent Person as defined in the JORC Code (2012).

For Black Mountain Mining where Mineral Resources and Ore Reserves are reported in accordance with the terms and definitions of the SAMREC Code (2009):

The Competent Person who is responsible for the Mineral Resources and Ore Reserves of Black Mountain Mining's mines is S Jenniker, Mining Resources Manager at Black Mountain Mining. He is a Member of the South African Council for Natural Scientific Professions and a Member of the Geological Society of South Africa. S Jenniker has sufficient experience relevant to the style and type of mineral deposit under consideration and to the activity which is being undertaken to qualify as a Competent Person as defined in the SAMREC Code (2009).

For Skorpion where Mineral Resources and Ore Reserves are reported in accordance with the terms and definitions of the JORC Code (2012):

The Competent Person who is responsible for the Mineral Resources and Ore Reserves for Skorpion, as reported by the Axe Valley Mining Consultants Ltd, is Matthew Randall, MIMM, C.Eng, PhD, BSc Mining. Dr Matthew Randall is a full time employee and Director of Axe Valley Mining Consultants Ltd, a mining consultant who has over 35 years' experience in the mining and metals industry, who has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the JORC Code (2012).

For BALCO where Mineral Resources and Ore Reserves are reported in accordance with the terms and definitions of the JORC Code (2012):

The Competent Person who is responsible for the Mineral Resources and Ore Reserves of BALCO is Shalabh Saha. He is M.Sc (Geology) from Rajasthan University, Raipur, India (Batch 1990) and M.Phil (Mineral Exploration) from Ravishankar University, Raipur, India (Batch 1991). Shalabh Saha is the Director of Geo Solutions Private Limited and has over 35 years' experience in the mining and metals industry. He has sufficient experience relevant to the style and type of mineral deposit under consideration and to the activity which is being undertaken to qualify as a Competent Person as defined in the JORC Code (2012).

For Vedanta Limited and SRL where Mineral Resources and Ore Reserves for Iron ore mines are reported in accordance with the terms and definitions of the JORC Code (2012):

The Competent Persons who are responsible for the Mineral Resources and Ore Reserves of the iron mines of Vedanta Limited and its subsidiary Sesa Resources Limited as of March 31, 2016 as reported by the Company are Wayne Valliant, P. Geo. and Glen Ehasoo, P. Eng. Wayne Valliant is a full time employee of RPA, a Principal Geologist and has over 35 years' experience in the mining and metals industry and Glen Ehasoo is a full time employee of RPA, a Principal Mining Engineer and has over 15 years' experience in the mining and metals industry. Wayne and Glen both have sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which each are undertaking to qualify as Competent Persons as defined in the JORC Code (2012).

# ANNEX D — PRODUCTION RELEASE FOR THE THIRD QUARTER AND NINE MONTHS ENDED 31 DECEMBER 2016

16 Jan 2017

Oil & Gas

		Q3		Q	2	Nine	months p	eriod
			%		%			%
			change		change			change
Particulars	FY2017	FY2016	Yo Y	FY2017	QoQ	FY2017	FY2016	Yo Y
OIL AND GAS								
Average Daily Total								
Gross Operated								
Production (boepd) 1	191,230	211,843	(10%)	206,230	(7%)	201,286	214,663	(6)%
Average Daily Gross								
Operated Production								
(boepd)	181,818	202,668	(10%)	196,399	(7%)	191,674	205,909	(7)%
Rajasthan	154,272	170,444	(9%)	167,699	(8%)	162,957	170,258	(4)%
Ravva	18,172	21,703	(16%)	18,823	(3%)	18,874	25,430	(26)%
Cambay	9,375	10,521	(11%)	9,877	(5%)	9,843	10,221	(4)%
Average Daily								
Working Interest								
Production (boepd)	115,829	128,402	(10%)	125,575	(8%)	122,254	128,991	(5)%
Rajasthan	107,990	119,311	(9%)	117,390	(8%)	114,070	119,180	(4)%
Ravva	4,089	4,883	(16%)	4,235	(3%)	4,247	5,722	(26)%
Cambay	3,750	4,208	(11%)	3,951	(5%)	3,937	4,089	(4)%
Total Oil and Gas								
(million boe)								
Oil & Gas - Gross	16.73	18.65	(10%)	18.07	(7%)	52.71	56.62	(7)%
Oil & Gas - Working								
Interest	10.66	11.81	(10%)	11.55	(8%)	33.62	35.47	(5)%

## Third quarter FY 2017 vs. previous quarters

For Q3 FY2017, average gross production across assets was resilient at 181,818 barrels of oil equivalent per day (boepd). Production was lower primarily due to planned maintenance shutdown in Rajasthan and natural decline in offshore assets.

Gross production from Rajasthan block averaged 154,272 boepd for the quarter, lower mainly due to the planned maintenance shutdown at the Mangala Processing Terminal which will help maintain asset integrity and improve the plant performance.

We had encouraging results from Mangala Enhanced Oil Recovery (EOR), driven by enhanced well productivity and production optimization activities. The production from EOR increased to an average of 55 kboepd in Q3 FY2017 from 52 kboepd in Q2 FY2017. Continued reservoir management including production optimization helped maintain steady production from Bhagyam and Aishwariya. Gross production from Development Area-1 (DA-1) and Development Area-2 (DA-2) averaged 141,177 boepd and 13,095 boepd, respectively.

Production from Ravva and Cambay was also firm at 18,172 and 9,375 boepd, respectively. Production optimization activities helped offset the natural decline in the blocks. Ravva and Cambay facilities recorded an excellent uptime of 99.9% and 99.8%, respectively.

Gas production from RDG was lower at an average of 21 mmscfd in Q3 FY2017 compared to 33 mmscfd in Q2 FY2017. Gas sales also declined quarter-on-quarter to 4 mmscfd from 17 mmscfd. The sales have been temporarily suspended due to a technical issue between the gas transporter and the buyers. Cairn is closely engaged with various stakeholders to address the issue and enable the resumption of the sales at the earliest.

# Nine months FY 2017 vs. nine months FY 2016

Gross production declined by 7% on year-on-year basis primarily due to lower volumes from offshore assets and planned maintenance shutdown in Rajasthan during the current year, partially offset by volume ramp up from the EOR project at Mangala and continued effective reservoir management across assets.

#### Zinc India

		Q3		Q	2	Nine	months e	nded
			% change		% change			% change
Particulars	FY2017	FY2016	Yo Y	FY2017	QoQ	FY2017	FY2016	Yo Y
Zinc India(kt)								
Mined metal								
content	276	228	21%	192	44%	595	700	(15)%
Refined Zinc —								
Total	205	206	0%	150	37%	457	605	(24)%
Refined Zinc -								
Integrated	205	206	0%	149	38%	456	605	(25)%
Refined Zinc -								
Custom	_	_	_	1	_	1	_	0%
Refined Lead —								
Total <sup>2</sup>	39	35	10%	31	26%	94	107	(12)%
Refined Lead -								
Integrated	39	35	10%	31	26%	94	102	(8)%
Refined Lead -								
Custom	_	_	_		_	_	5	_
Silver — Total								
(in mn								
ounces) 3	3.79	3.73	2%	3.45	10%	10.08	9.73	4%
Silver -								
Integrated (in								
mn ounces)	3.79	3.73	2%	3.45	10%	10.08	9.64	5%
Silver - Custom								
(in mn ounces)	_	_	_	_	_	_	0.09	_

# Third quarter FY 2017 vs. previous quarters

Mined metal production was 276,000 tonnes, higher by 21% compared with Q3 FY2016 and 44% sequentially. The sequential increase was on account of higher volumes from Rampura Agucha open cast mine in accordance with mine plan and the y-o-y increase was driven by higher volumes from Rampura Agucha underground and open cast mines. We are on track to achieve stated guidance of higher mined metal production in FY2017 compared to FY2016.

Integrated zinc metal production during the quarter was at 205,000 tonnes, up 38% from previous quarter, and flat y-o-y on account of accretion of mined metal inventory. Integrated saleable lead metal production during the quarter was 39,000 tonnes, up 26% sequentially and 10% y-o-y. The y-o-y increase was in line with mined metal production, while the sequential increase was on account of enhanced smelter efficiencies. Integrated silver production during the quarter increased by 10% to 3.79 million ounces from previous quarter and 2% y-o-y.

In line with the on-going expansion to reach 1.2 mtpa mined metal production capacity, environmental clearances were received for Sindesar Khurd expansion of ore production capacity from 3.75 mtpa to 4.5 mtpa and for Zawar mine to 4 mtpa.

# Nine months FY 2017 vs. nine months FY 2016

Mined metal production during the nine month period was 15% lower y-o-y. This was in line with the earlier guidance of substantially higher mined metal production in H2, and Q4 production will be higher than Q3. Integrated silver production was higher by 5% y-o-y primarily due to higher volume from our silver-rich Sindesar mine. During this nine month period, underground mines ramped up significantly to achieve a substantial 60% y-o-y increase in ore production and 55% y-o-y increase in mined metal production.

Zinc — International

		Q3		Q	2	Nine	months o	ended
			%		%			%
Particulars (in'000			change		change			change
tonnes, or as stated)	FY2017	FY2016	Yo Y	FY2017	QoQ	FY2017	FY2016	Yo Y
Zinc International	33	51	(35)%	39	(17)%	115	184	(38)%
Zinc - refined								
- Skorpion	17	13	34%	23	(25)%	64	55	16%
Mined metal content								
- BMM	15	17	(11)%	16	(5)%	51	48	5%
Mined metal content								
- Lisheen	_	21	_	_	_	_	81	_

# Third quarter FY 2017 vs. previous quarters

Total production for Q3 FY2017 was 33,000 tonnes, 35% lower y-o-y primarily due to the closure of the Lisheen mine in November 2015, following 17 years of successful operations. Q3 FY2017 production excluding Lisheen was 9% higher y-o-y. Production was 17% lower q-o-q mainly due to technical issues at Skorpion and BMM which necessitated some production rescheduling.

Skorpion production during the quarter was 17,000 tonnes, 34% higher y-o-y but 25% lower q-o-q, due to increased upstream material handling challenges to treat wetter than anticipated ore through the refinery. BMM production for the quarter was 15,000 tonnes, 11% lower y-o-y and 5% lower q-o-q, primarily due to equipment unavailability.

At the Gamsberg Project, pre-start activities and waste-stripping is progressing well. To date, we have excavated over 13 million tonnes of waste rock. Project cost of c.75% is committed to date with major orders for the mining contract, the concentrator plant and power and water connections placed. The balance orders for equipment are planned to be placed in Q4 FY2017. The first production is on track for mid CY2018 followed by 9-12 months ramp up to full production of 250 ktpa. The expected COP at Gamsberg is \$1,000-\$1,150 per tonne.

## Nine months FY 2017 vs. nine months FY 2016

Total production was 115,000 tonnes, 38% lower compared to corresponding prior period mainly due to closure of the Lisheen mine. Production volume from Skorpion and BMM was up by 16% and 5%, respectively.

Iron Ore

		Q3		Q	2	Nine	months o	ended
Particulars (in million			%		%			%
dry metric tonnes, or			change		change			change
as stated)	FY2017	FY2016	Yo Y	FY2017	Q o Q	FY2017	FY2016	Yo Y
IRON ORE								
Sales	3.7	1.5	_	0.8	_	7.1	2.7	_
Goa	2.7	0.6	_	0.3	_	5.1	0.6	_
Karnataka	1.0	0.9	4%	0.5	_	2.0	2.1	(6)%
<b>Production of Saleable</b>								
Ore	2.6	1.4	_	1.5	_	7.3	2.4	_
Goa	2.3	0.3	_	0.5	_	5.2	0.3	_
Karnataka	0.4	1.1	(66)%	0.9	(60)%	2.1	2.1	3%
Production ('000								
tonnes)								
Pig Iron	154	146	5%	192	(20)%	526	466	13%

# Third quarter FY 2017 vs. previous quarters

At Goa, production was 2.3 million tonnes and sales were 2.7 million tonnes during the quarter. Mining activities resumed post the monsoon season, and hence production was significantly higher sequentially. At Karnataka, production was 0.4 million tonnes and sales were 1.0 million tonnes. Sales were higher than production at Goa and Karnataka due to sales from opening inventory.

During Q3 FY2017, production of pig iron was higher y-o-y at 154,000 tonnes due to higher plant availability post debottlenecking. Production was lower by 20% q-o-q primarily due to the maintenance shutdown for relining one of the furnaces for about 35 days in Q3 FY2017.

Our annual mining allocations of 5.5mt and 2.3mt for Goa and Karnataka, respectively, are expected to be achieved in the current month. We have been engaged with the respective state governments for an increase in the mining caps. The Goa government has granted additional mining allocation to us for the current fiscal year, and we expect to produce an additional 2 to 3mt this year.

# Nine months FY 2017 vs. nine months FY 2016

Production at Goa was 5.2 million tonnes and sales were 5.1 million tonnes. At Karnataka, production was 2.1 million tonnes and sales were 2.0 million tonnes. Production of pig iron ramped up to a record production of 526,000 tonnes due to higher plant availability post debottlenecking.

# Copper - India

		Q3		Q	2	Nine	months ended		
			%		%			%	
Particulars (in'000			change		change			change	
tonnes, or as stated)	FY2017	FY2016	Yo Y	FY2017	QoQ	FY2017	FY2016	Yo Y	
COPPER — INDIA									
Copper - Cathodes	102	89	15%	97	5%	300	282	6%	
Tuticorin Power Sales									
(MU)	46	40	15%	30	55%	136	334	(59)%	

# Third quarter FY 2017 vs. previous quarters

The Tuticorin smelter produced 102,000 tonnes of cathodes during Q3 FY2017, up 15% y-o-y. During Q3 FY2016, volumes were lower on account of flooding in the state and unplanned shutdowns.

The 160 MW power plant at Tuticorin operated at a lower plant load factor (PLF) of 56% during Q3 FY2017 (PLF of 52% in Q3 FY2016, 48% during Q2 FY2017). PLF was lower due to lower off-take by the Telangana State Electricity Board (TSEB). However, as per our offtake agreement with TSEB, we are entitled to compensation at the rate 20% of the contracted rate, for off-take below 85% of the contracted quantity.

# Nine months FY 2017 vs. nine months FY 2016

Production volume from the Tuticorin smelter was 300,000 tonnes of cathodes, higher by 6% compared to corresponding prior period. The 160MW power plant at Tuticorin operated at a PLF of 55% in the first nine months of FY2017 compared to 95% in corresponding prior period, primarily due to lower offtake restrictions from Tamil Nadu Electricity Board (TNEB) and TSEB. The power purchase agreement with TNEB ended on 31st May 2016 post which we entered into an agreement with TSEB.

Copper — Zambia

		Q3		Q	2	Nine	months o	ended
			%		%			%
Particulars (in'000			change		change			change
tonnes, or as stated)	FY2017	FY2016	Yo Y	FY2017	Q o Q	FY2017	FY2016	Yo Y
COPPER — ZAMBIA								
Mined metal	21	32	(33)%	29	(27)%	79	94	(16)%
Copper — Total	37	45	(18)%	47	(20)%	130	136	(5)%
Integrated	21	28	(25)%	28	(23)%	77	89	(14)%
Custom	16	17	(7)%	19	(16)%	53	47	11%

# Third quarter FY 2017 vs. previous quarters

During Q3, mined metal production was 21,000 tonnes, 33% lower y-o-y, mainly due to lower production from Nchanga underground which was placed on managed care and maintenance in Q3 FY2016, and had contributed c. 4,000 tonnes last year, and one-off equipment constraints at Konkola.

Production from the Konkola underground mine was impacted by lower trackless equipment availability. At the Tailings Leach Plant, production reduced by 25% y-o-y due to throughput constraints at the mill and lower feeds from current tails.

Custom volumes at 16,000 tonnes were 7% lower on a y-o-y basis and 16% lower compared to the prior quarter. Production was primarily impacted by a biennial shutdown for 40 days, which commenced on 26 September 2016. Operations have recommenced post the shutdown.

The elevated temperature leach project is under commissioning and the initial recovery results are encouraging.

## Nine months FY2017 vs nine months FY2016

Mined metal production was at 79,000 tonnes, 16% lower y-o-y and integrated volume was at 77,000 tonnes, lower compared to mine metal production due to an increase in the concentrate inventory. Custom volumes were at 53,000 tonnes, 11% higher compared to nine months ended 31 December 2015.

#### Aluminium

		Q3		Q	2	Nine	months e	ended
			%		%			%
Particulars (in'000			change		change			change
tonnes, or as stated)	FY2017	FY2016	Yo Y	FY2017	QoQ	FY2017	FY2016	Yo Y
Aluminium								
Alumina-Lanjigarh	328	218	50%	292	12%	895	760	18%
Total Aluminium								
Production	319	234	37%	296	8%	860	697	23%
Jharsuguda-I	132	131	1%	132	0%	393	392	0%
Jharsuguda-II <sup>4</sup>	84	19	_	48	75%	161	57	_
Korba-I	65	65	0%	63	3%	192	192	0%
Korba-II <sup>5</sup>	38	19	_	52	(27)%	115	56	_
Balco 270 MW * 6	_	_	_	_			_	_
Jharsuguda 1800 MW								
(Surplus Power Sales								
in Million Units) * 6	_	_	_	156	_	511	_	_

<sup>\*</sup> Jharsuguda 1,800MW and Balco 270 MW have been moved from the power to the Aluminum segment from 1st April 2016.

## Third quarter FY 2017 vs. previous quarters

The first line of the 1.25 mtpa Jharsuguda-II smelter was impacted by a transformer failure incident earlier this month. Rectification work is in process and 80 pots of the 336 pots are currently operational. The second line is nearing full ramp up with 329 pots of the 336 pots commissioned. The balance pots of the line will be commissioned shortly. The ramp up of the third line of the smelter has commenced in end December 2016.

The 325kt BALCO-II smelter had been impacted by a pot failure incident in Q2 FY2017. 200 pots of the 336 pots are currently operational and full ramp-up of the smelter is expected by the end of Q4 FY2017. The rolled product facility at BALCO, which was temporarily shut-down last year, successfully commenced its operations in Q2 FY2017 following optimisation of its cost structure, and produced 6,100 tonnes during the quarter.

The two streams of the Lanjigarh refinery operated during the quarter and produced 328,000 tonnes in Q3 FY2017, 12% higher than Q2 FY2017. The refinery currently has a debottlenecked capacity of 1.7 - 2.0 million tonnes per annum.

There were no sales from the 1,800 MW Jharsuguda power plant due to a weak power market. However, the PLF's will continue to increase as we ramp up the Jharsuguda-II smelter.

Coal linkages of 6mtpa were secured through auctions in Q2 FY2017 for captive power plants. Supply has commenced from these linkages in November 2016.

We expect to produce between 1 to 1.1 mtpa of Aluminium (excluding trial run production) in FY2017.

## Nine months FY2017 vs nine months FY2016

Aluminium production was a record at 860,000 tonnes, 23% higher y-o-y mainly on account of ramp up of additional pots at the BALCO-II and Jharsuguda-II smelters. Alumina production was 18% higher at 895,000 tonnes, due to the commencement of the second stream of the refinery from 1st April 2016.

#### **Power**

		Q3		Q	2	Nine	months e	ended
			%		%			%
Particulars (in million			change		change			change
units)	FY2017	FY2016	Yo Y	FY2017	Q o Q	FY2017	FY2016	Yo Y
Power								
<b>Total Power Sales</b>	3,413	2,934	16%	3,030	13%	9,453	8,728	8%
Jharsuguda								
600 MW * 6	879	1,593	(45)%	605	45%	2,376	5,413	(56)%
TSPL	1,792	839		1,679	7%	4,743	1,922	
Balco 600 MW	660	368	79%	549	20%	1,817	526	
Balco 270 MW * 6	_	41	_	_	_	_	169	_
MALCO	29	26	12%	25	16%	144	345	(58)%
HZL Wind Power	53	67	(22)%	172	(69)%	373	353	6%
TSPL — Availability	77%	85%	_	77%	_	76%	77%	_

<sup>\*</sup> Jharsuguda 1,800MW and Balco 270 MW have been moved from the power to the Aluminum segment from 1st April 2016.

# Third quarter FY 2017 vs. previous quarters

Total power sales were higher y-o-y due to the commissioning of additional power units at TSPL and BALCO over the last one year.

Power sales from TSPL increased with all three units being operational. In Q3 FY2017, the three units operated at an availability of 77%. The Power Purchase Agreement with the Punjab State Power Corporation Limited (PSPCL) compensates us based on the availability of the plant.

The Jharsuguda 600MW power plant operated at a plant load factor (PLF) of 72% in Q3 FY2017 (PLF 66% in Q3 FY2016, 50% in Q2 FY2017).

The 600 MW units (2x300MW) of BALCO IPP operated at a PLF of 55% in Q3 FY2017 due to a weaker power market.

PLF at the MALCO power plant was lower due to lower off-take by the Telangana State Electricity Board (TSEB). However, as per the contract entered into with TSEB, we are entitled to compensation at 20% of the contracted rate for off-take below 85% of the contractual quantity.

# Nine months FY2017 vs nine months FY2016

Power sales were higher by 8% compared with corresponding prior period due to commissioning of additional units at TSPL and BALCO power plants.

# **Production Summary (Unaudited)**

(In '000 tonnes, except as stated)

		Q3		Q	22	Nine	months p	eriod
			%		%			%
	FY	FY	Change	FY	Change	FY	FY	Change
Particulars	2017	2016	YoY	2016	QoQ	2017	2016	YoY
OIL AND GAS								
Average Daily Total								
Gross Operated								
Production (boepd) 1	191,230	211,843	(10%)	206,230	(7)%	201,286	214,663	(6)%
Average Daily Gross								
Operated Production	101 010	202 669	(1007)	106 200	(7)01	101 674	205 000	(7)0/
(boepd)	181,818		(10%)	196,399	(7)%	191,674		(7)%
Rajasthan	154,272	170,444	(9%)	167,699	(8)%	162,957	170,258	(4)%
Ravva	18,172	21,703	(16%)	18,823	(3)%	18,874	25,430	(26)%
Cambay	9,375	10,521	(11%)	9,877	(5)%	9,843	10,221	(4)%
Average Daily								
Working Interest Production (boepd)	115,829	128,402	(10%)	125,575	(8)%	122 254	128,991	(5)%
Rajasthan	107,990	119,311	(9%)	117,390	(8)%	114,070	119,180	(4)%
Ravva	4,089	4,883	(16%)	4,235	(3)%	4,247	5,722	(26)%
Cambay	3,750	4,208	(11%)	3,951	(5)%	3,937	4,089	(4)%
Total Oil and Gas	3,730	4,208	(11%)	3,931	(3)%	3,937	4,009	(4)%
(million boe)								
Oil & Gas - Gross	16.73	18.65	(10%)	18.07	(7)%	52.71	56.62	(7)%
Oil & Gas - Working	10.73	10.03	(1070)	10.07	(1)10	32.71	30.02	(1)10
Interest	10.66	11.81	(10%)	11.55	(8)%	33.62	35.47	(5)%
Zinc India	10.00	11.01	(10%)	11.33	(0)/0	55.02	33.17	(3)70
Mined metal content	276	228	21%	192	44%	595	700	(15)%
Refined Zinc — Total	205	206	0%	150	37%	457	605	(24)%
Refined Zinc -	200	200	0 70	130	3770	107	002	(21)/0
Integrated	205	206	0%	149	38%	456	605	(25)%
Refined Zinc -								
Custom	_	_	_	1	_	1	_	0%
Refined Lead —								
Total <sup>2</sup>	39	35	10%	31	26%	94	107	(12)%
Refined Lead -								
Integrated	39	35	10%	31	26%	94	102	(8)%
Refined Lead -								
Custom	_	_	_	_	_	_	5	_

		Q3		(	22	Nine	months	period
			%		%			%
	FY	FY	Change	FY	Change	FY	FY	Change
Particulars	2017	2016	YoY	2016	QoQ	2017	2016	YoY
Silver - Total								
(in mn ounces) <sup>3</sup>	3.79	3.73	2%	3.45	10%	10.08	9.73	4%
Silver - Integrated								
(in mn ounces)	3.79	3.73	2%	3.45	10%	10.08	9.64	5%
Silver - Custom								
(in mn ounces)	_	_	_	_	_	_	0.09	_
Zinc International	33	51	(35)%	39	(17)%	115	184	(38)%
Zinc - Refined - Skorpion	17	13	34%	23	(25)%	64	55	16%
Mined metal content								
- BMM	15	17	(11)%	16	(5)%	51	48	5%
Mined metal content								
- Lisheen	_	21	_		_		81	
IRON ORE								
(in million dry metric								
tonnes, or as stated)								
Sales	3.7	1.5		0.8	_	7.1	2.7	_
Goa	2.7	0.6	_	0.3	_	5.1	0.6	_
Karnataka	1.0	0.9	4%	0.5	_	2.0	2.1	(6)%
<b>Production of Saleable</b>								
Ore	2.6	1.4	_	1.5	_	7.3	2.4	_
Goa	2.3	0.3	_	0.5	_	5.2	0.3	_
Karnataka	0.4	1.1	(66)%	0.9	(60)%	2.1	2.1	3%
Pig Iron	154	146	5%	192	(20)%	526	466	13%
COPPER — INDIA								
Copper - Cathodes	102	89	15%	97	5%	300	282	6%
Tuticorin Power Plant								
Sales (MU)	46	40	15%	30	55%	136	334	(59)%
COPPER — ZAMBIA								
Mined metal	21	32	(33)%	29	(27)%	79	94	(16)%
Copper — Total	37	45	(18)%	47	(20)%	130	136	(5)%
Integrated	21	28	(25)%	28	(23)%	77	89	(14)%
Custom	16	17	(7)%	19	(16)%	53	47	11%
ALUMINUM			(1)/2	-/	(12)/0		.,	1 1 7 3
Alumina-Lanjigarh	328	218	50%	292	12%	895	760	18%
Total Aluminum	520	210	3070		12/0	070	, 50	1070
Production Production	319	234	37%	296	8%	860	697	23%
Jharsuguda - I	132	131	1%	132	0%	393	392	0%
Jharsuguda - II <sup>4</sup>	84	19		48	75%	161	57	
Korba - I	65	65	0%	63	3%	192	192	0%
Korba - II <sup>5</sup>	38	19	070	52		115	56	0 70
Balco 270 MW * 6	38		_		(27)%	115		_
	_	_			_	_	_	_
Jharsuguda 1800 MW (Surplus Power								
Sales in Million								
Units) * 6	_			156		511	_	

	Q3			Q2		Nine months period		
			%		%			%
	FY	FY	Change	$\mathbf{F}\mathbf{Y}$	Change	FY	FY	Change
Particulars	2017	2016	YoY	2016	QoQ	2017	2016	YoY
POWER (in million units)								
<b>Total Power Sales</b>	3,413	2,934	16%	3,030	13%	9,453	8,728	8%
Jharsuguda 600 MW <sup>* 6</sup>	879	1,593	(45)%	605	45%	2,376	5,413	(56)%
TSPL	1,792	839	_	1,679	7%	4,743	1,922	_
Balco 600 MW	660	368	79%	549	20%	1,817	526	_
Balco 270 MW * 6	_	41	_	_	_	_	169	_
MALCO	29	26	12%	25	16%	144	345	(58)%
HZL Wind Power	53	67	(22)%	172	(69)%	373	353	6%
TSPL - Availability	77%	85%	_	77%	_	76%	77%	_
Ports — VGCB (in								
million tonnes) <sup>7</sup>								
Cargo Discharge	0.6	1.8	(65)%	1.3	(49)%	3.5	5.5	(36)%
Cargo Dispatches	0.7	1.9	(65)%	1.5	(56)%	3.6	5.7	(36)%

<sup>1.</sup> Including Internal Gas consumption

- 2. Excluding Captive consumption of 1,731 tonnes in Q3 FY2017 vs 2,051 tonnes in Q3 FY2016, 837 tonnes in Q2 FY2017 and 3,652 tonnes in nine months period FY2017 vs. 5,749 tonnes in nine months period FY2016
- 3. Excluding captive consumption of 463,000 ounces in Q3 FY2017 vs. 344,000 ounces in Q3 FY2016, 139,000 ounces in Q2 FY2017 and 602,000 ounces in nine months period FY 2017 vs. 956,000 ounces in nine months period FY 2016
- 4. Including trial run production of 36 kt in Q3 FY2017, 12 kt in Q3 FY2016, 19 kt in Q2 FY2017, 67 kt in nine months ended FY2017 vs 51 kt in in nine months ended FY 2016
- 5. Including trial run production of 270t in Q3 FY2017, Nil in Q3 FY2016, 28 kt in nine months ended FY2017 vs Nil kt in in nine months ended FY2016
- 6. Jharsuguda 1,800MW and Balco 270 MW have been moved from the power to the Aluminum segment from 1st April 2016
- 7. Vizag General Cargo Berth

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