3 March 2016

Results for the year ended 31 December 2015

Demonstrating our capabilities in challenging times

Vesuvius plc, a global leader in molten metal flow engineering, announces its preliminary audited results for the year ended 31 December 2015.

Financial Summary

	2015 (£m)	2014 (£m)	Year-on-year change	Underlying change[1]
Revenue	**1,322**	1,444	-8.5%	-7.7%
Trading Profit[2]	**124.0**	142.8	-13.1%	-14.0%
Return on Sales	**9.4%**	9.9%	-50bps	-70bps
Headline Earnings[3]	**75.7**	90.3	-16.2%	-18.1%
Headline EPS[3] (pence)	**28.1**	33.4	-16.0%	-17.9%
Dividend	**16.275**	16.125	+0.9%	
Net Debt	**291.6**	268.3	8.7%	

Key Points:

- Lower revenues and profits in line with previous guidance, reflecting weakness in global steel and foundry markets
- Margin improvement in Foundry from self-help measures undertaken by new management
- Continued outperformance in our strategic growth areas of India, China and South America
- Restructuring initiated in Q2 to address structural changes in end markets; further actions identified to respond to ongoing changes:
    - Total annual savings of £20.0m expected towards end of 2017, of which £8.8m delivered in 2015
- Cash conversion ratio of 100.3%; £23.3m increase in net debt primarily reflects £23.8m acquisition of Sidermes SpA in H1, further expanding our Technical Services offering, and £11.5m cash spend on first phase of restructuring
- Maintained final dividend of 11.125 pence per share to be paid on 20 May 2016

François Wanecq, Chief Executive of Vesuvius, commented:

"These results reflect the substantial headwinds that we have faced in our key end-markets of steel and foundry. We have been able to minimise the impact on our margins due to a continued focus on self-help measures and our substantial restructuring programme launched in response to the permanent structural changes in the end-markets. We expect the underlying trading environment in the current year to be broadly similar to that experienced in the second half of 2015 and have initiated a further cost reduction plan, which, together with the actions already taken will deliver full year savings of £20m towards the end of 2017, an increase of £10m over the savings already announced.

"Despite the current challenges, our strategy for longer-term profitable growth remains unchanged and, in this context, we have made encouraging progress in 2015, strengthening our competitive position in the strategically important markets of China, India and South America through increasing penetration of our value added products, and continuing to develop our Technical Services offering."

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[1] *Underlying basis is at constant currency and excludes separately reported items and the impact of acquisitions and disposals*
[2] *For definitions of non-GAAP measures, refer to the notes in the financial statements*
[3] *Headline results refer to continuing operations and exclude separately reported items*

Copies of Vesuvius' 2015 Annual Report are due to be posted to shareholders of the Company who have elected to receive a hard copy on 5 April 2016 and are also expected to be available on the Company's website and at the Registered Office of the Company on this date.

Vesuvius management will make a presentation to analysts and investors on 3 March 2016 at 10.00am (GMT). This will be broadcast live on Vesuvius' website, http://investors.vesuvius.com/investor-relations and an archive version of the presentation will be available on the website later that day.

About Vesuvius plc

Vesuvius is a global leader in molten metal flow engineering principally serving the steel and foundry industries.

We develop innovative and customised solutions to be used in extremely demanding industrial environments, which enable our customers to improve their manufacturing processes, enhance product quality and reduce energy consumption. These include flow control solutions, advanced refractories and other consumable products and increasingly, related technical services including data capture.

We have a worldwide presence. We serve our customers through a network of low-cost manufacturing plants located close to their own facilities, and embed our industry experts within their operations, who are all supported by our global technology centres.

Our core competitive strengths are our market and technology leadership, strong customer relationships, well established presence in developing markets and our global reach, all of which facilitate the expansion of our addressable markets.

Our ultimate goal is to create value for our customers, and to deliver sustainable, profitable growth for our shareholders giving a superior return on their investment, whilst providing each of our employees with a safe workplace where he or she is recognised, developed and properly rewarded.

Forward looking statements

This announcement contains certain forward looking statements which may include reference to one or more of the following: the Group's financial condition, results of operations, cash flows, dividends, financing plans, business strategies, operating efficiencies or synergies, budgets, capital and other expenditures, competitive positions, growth opportunities for existing products, plans and objectives of management, the overall trading environment and other matters.

Statements in this announcement that are not historical facts are hereby identified as "forward looking statements". Such forward looking statements, including, without limitation, those relating to the future business prospects, revenue, working capital, liquidity, capital needs, interest costs and income, in each case relating to Vesuvius, wherever they occur in this announcement, are necessarily based on assumptions reflecting the views of Vesuvius and involve a number of known and unknown risks, uncertainties and other factors that could cause actual results, performance or achievements to differ materially from those expressed or implied by the forward looking statements. Such forward looking statements should, therefore, be considered in light of various important factors that could cause actual results to differ materially from estimates or projections contained in the forward looking statements. These include without limitation: economic and business cycles; the terms and conditions of Vesuvius' financing arrangements; foreign currency rate fluctuations; competition in Vesuvius' principal markets; acquisitions or disposals of businesses or assets; and trends in Vesuvius' principal industries.

The foregoing list of important factors is not exhaustive. When considering forward-looking statements, careful consideration should be given to the foregoing factors and other uncertainties and events, as well as factors described in documents the Company files with the UK regulator from time to time including its annual reports and accounts.

You should not place undue reliance on such forward-looking statements which speak only as of the date on which they are made. Except as required by the Rules of the UK Listing Authority and the London Stock Exchange and applicable law, Vesuvius undertakes no obligation to update publicly or revise any forward looking statements, whether as a result of new information, future events or otherwise. In light of these risks, uncertainties and assumptions, the forward-looking events discussed in this announcement might not occur.

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Vesuvius plc

Results for the year ended 31 December 2015

Our results for 2015 reflect the substantial headwinds that we are facing in our key end-markets of steel and foundry. However, we have been able to limit the impact on our profitability through decisive management action, and we have continued to make encouraging progress in our strategic positioning.

Group trading performance

Underlying Group revenue from our continuing operations, adjusting for the effects of acquisitions and disposals and currency translation differences, was £1,322m, down 7.7% compared to 2014 driven by the continued decline in global steel and foundry production, contraction of inventory volumes and currency market volatility. On a reported basis, Group revenue was 8.5% lower compared to 2014 (2014: £1,444m). Trading profit for the year was £124.0m, down 14.0% on an underlying basis and down 13.1% on a reported basis (2014: £142.8m). Management's ongoing focus on self-help initiatives, tight cost control, early savings from restructuring activities and increasing penetration of higher margin value added solutions helped to offset more than half the estimated gross profit impact caused by the market decline.

Strategic progress

The Board has a clearly defined strategy for profitable growth, and our priority in 2015 has been to execute on our five stated strategic priorities:

- reinforcing our technology and innovation leadership positions;
- enlarging our addressable markets through the increasing penetration of existing and new value-creating solutions;
- leveraging our strong positions in developing markets to capture the growth opportunities that they represent;
- improving our cost leadership and our margins; and
- building organically, and through acquisition, an increasingly comprehensive technical services offering.

We have made encouraging progress on all five of these priorities. In particular, we have continued to strengthen our business and competitive positioning in China, India and South America, which remain strategically important growth markets for us in the medium-term, and were pleased in the first half of the year to complete another technical services acquisition, Sidermes SpA, in Italy.

Restructuring

In the second quarter, anticipating a more sustained weakness of our markets, we initiated a Group-wide restructuring plan to adapt our cost base, and reduced our overhead structure in the mature markets where we believe the production decline to be structural and permanent. By the end of 2015, we had incurred restructuring costs of £14.6m and recorded £8.8m of recurring savings with further actions identified and being implemented in 2016.

In the fourth quarter, we conducted a further detailed analysis of our European Flow Control business and identified a number of incremental restructuring opportunities for implementation in 2016.

Including the savings recorded in 2015, the restructuring opportunities identified to date will generate recurring full year cost savings of around £20m, which we expect to be fully delivered towards the end of 2017, an increase of £10m over the savings as announced in November. This will be at the cost of a total exceptional restructuring charge of around £30m over 2015 and 2016.

Board and senior management

On 1 November 2015, Guy Young joined the Board as Chief Financial Officer following Chris O'Shea's departure. Guy was previously Chief Financial Officer of Tarmac, the British building materials company. Prior to his role at Tarmac, he held a number of senior financial and business development positions at Anglo American plc.

Jeff Hewitt, Senior Independent Director and Audit Committee Chairman, retired as a Non-executive Director on 14 May 2015, having served nine years with Vesuvius and prior to that with Cookson Group.

Douglas Hurt and Hock Goh joined the Board as Non-executive Directors on 2 April 2015. Both also joined the Audit, Remuneration and Nomination Committees. Douglas succeeded Jeff Hewitt as Senior Independent Director and Audit Committee Chairman.

In the early part of the year, we further strengthened our senior management team through internal promotion. Alan Charnock, previously Vice President, Marketing & Technology Flow Control, was appointed Chief Technology Officer, responsible for worldwide Research & Development.

Today we announce that Patrick Andre will assume the role of President, Flow Control, following Chris Abbott's departure. Patrick was previously CEO of both the Nickel and Manganese divisions of Eramet Group, a global manufacturer of Nickel and special alloys. Most recently, Patrick held a number of senior leadership positions at Lhoist Company, a world leader in lime production.

In their new roles, Alan and Patrick join our Group Executive Committee.

Health and safety

Vesuvius places great emphasis on the importance of health and safety in the workplace and in the communities in which we operate. Safety is of paramount importance as our employees often operate in harsh environments. We continue to work hard at reducing incident severity and develop robust standards and practices aimed at improving the safety and health of our people in all that they do. We delivered an improvement in 2015 in our Lost Time Injury Frequency Rate of 1.5, compared to 1.8 for 2014.

Dividend

The Board has recommended a final dividend of 11.125 pence per share, which if approved at the Annual General Meeting on 12 May 2016, will be paid on 20 May 2016 to shareholders on the register at 8 April 2016. When added to the 2015 interim dividend of 5.15 pence per share paid on 25 September 2015 this represents an increase of 0.9% on the 2014 full year dividend of 16.125 pence per share. The Board intends to deliver long-term dividend growth provided that this is supported by underlying earnings, cash flows, capital expenditure requirements and the prevailing market outlook.

Any shareholder wishing to participate in the Vesuvius Dividend Reinvestment Plan ("DRIP") needs to have submitted their election to do so by 28 April 2016.

Outlook

Global economic prospects remain uncertain in our main markets, and we expect the underlying trading environment in 2016 to be broadly similar to that experienced in the second half of 2015. Given the current environment, a return to overall growth in steel production is not to be expected before 2017.

Our response to these challenging conditions has been to continue to adapt our cost structure to the new geographic realities of our markets and to reinforce our focus on quality.

We will also continue to focus on identifying acquisitions to reinforce our growth opportunities, whilst retaining a strong balance sheet in order to maintain financial flexibility. We remain confident in our ability to improve trading margins and working capital performance and to capitalise where there is further growth in our addressable markets in the medium-term.

Operating Review

Our business comprises two divisions, Steel and Foundry, with the Steel division operated as three business lines, Steel Flow Control, Advanced Refractories and Technical Services.

Steel Division

According to the World Steel Association, global steel production decreased by approximately 2.8% in 2015 compared with the previous year. The overall market decline was driven mainly by decreases in production in North America of 8.6%, China of 2.3%, and the European Union of 1.8%. These decreases were partially offset by an increase in production of 2.6% in India.

Revenue in Vesuvius' Steel division declined by 9.7% in 2015 on an underlying basis. This decline was higher than the worldwide contraction in Steel production due to several inter-linked issues. The market weakness mainly affected North America and Europe where we currently have higher penetration expressed in sales per ton of steel. This was accentuated by the strengthening of the US dollar and pound sterling against the currencies of most competing steel producing countries. In addition, and consistent with our business model, we decided to hold prices with some major customers despite strong downward pressure. Finally, the steep decline in oil and gas investment drastically reduced the market for high performance steel tubes and pipes, a traditionally important end-market for us.

In these challenging market conditions, China, India, North Asia and South America, all made a positive contribution to revenue growth whilst EMEA and NAFTA, which together account for 70% of underlying revenue, were adversely impacted. Trading profit of the Steel division decreased to £79.5m, 21.3% on an underlying basis. The underlying trading margin decreased by 130 basis points to 8.9%, reflecting lower activity in the key regions of NAFTA and EMEA.

Steel Division	**2015 (£m)**	**2014 (£m)**	**Year-on-year change (%)**	**Underlying change (%)**
Total Steel Revenue	**897.6**	981.4	*-8.5*	*-9.7*
Total Steel Trading Profit	**79.5**	96.4	*-17.5*	*-21.3*
Total Steel Return on Sales	**8.9%**	9.8%	*-100bps*	*-130bps*

Steel Flow Control

Steel Flow Control supplies products used to channel and control the flow of molten steel from ladle to tundish and from tundish to mould; slide gate refractories for furnaces, ladles and tundishes; slide gate systems; tundish and mould fluxes; and control devices to monitor and regulate steel flow into the mould.
These products have been designed to resist extreme thermomechanical stress and corrosive environments. The majority of these products are consumed during the process of making steel and, consequently, demand is primarily linked to steel production volumes. Continuing innovation allows us to offer enriched solutions that create additional value in our customers' processes.

Steel Flow Control Revenue	**2015 (£m)**	**2014 (£m)**	**Year-on-year change (%)**	**Underlying change (%)**
Americas	**169.9**	187.9	*-9.5*	*-10.7*
Europe, Middle East & Africa (EMEA)	**189.6**	230.6	*-17.8*	*-11.4*
Asia-Pacific	**133.0**	123.4	*+7.7*	*+4.3*
Total	**492.5**	541.9	*-9.1*	*-7.4*

Revenue in Steel Flow Control was down 7.4% on an underlying basis with revenue decline in the Americas and EMEA only partially offset by increased revenue in Asia-Pacific. This reduction exceeded the overall weakening in steel production caused by the factors highlighted above, which were coupled with a reduction in steel inventory, amplifying the effects of end market demand through the supply chain. The significant slowdown in China is a signal of the transformation of the Chinese economy from an investment-driven growth economy to one that is consumer-driven.

In the Americas, Flow Control underlying revenue declined by 10.7% against a 7.0% reduction in crude steel production volumes, reflecting a strong decline in pipe demand in the United States and increased imports of flat steel in the region.

In EMEA, underlying revenue decreased by 11.4%, whilst crude steel production volume declined by 2.8%, reflecting declining crude steel production volumes in the UK and Italy where Vesuvius has high penetration.

Underlying revenue rose by 4.3% in Asia-Pacific, compared to a 2.3% decline in crude steel production volume in the region. This outperformance reflects strong revenue growth in China, supported by the continuing shift from long to flat steel production, and the continued growing interest in our high performance solutions. Sales outperformance continued in Korea and India relative to underlying steel production both through production increases at existing customers and new business gains.

Advanced Refractories

Products of the Advanced Refractories business line include specialist refractory materials for lining steelmaking vessels such as blast furnaces, ladles and tundishes, which are subject to extreme temperatures, corrosion and abrasion. These materials are in the form of powder mixes, which are spray-applied or cast onto the vessel to be lined ("monolithics") and refractory shapes (e.g. bricks, pads and dams). Vesuvius is one of the world's largest manufacturers of monolithic refractory linings. Advanced Refractories delivers installation technologies, products adapted to fit customers' processes and effective and efficient logistics services. These factors are combined with significant R&D, a deep knowledge of customers' processes and project management capability to deliver market-leading solutions for customers.

Advanced Refractories Revenue	**2015 (£m)**	**2014 (£m)**	**Year-on-year change (%)**	**Underlying change (%)**
Americas	**129.2**	159.8	*-19.1*	*-22.8*
Europe, Middle East & Africa (EMEA)	**164.9**	192.3	*-14.2*	*-9.7*
Asia-Pacific	**84.6**	83.8	*+0.9*	*+1.0*
Total	**378.7**	435.9	*-13.1*	*-12.7*

Revenue in Advanced Refractories decreased by 12.7% compared to 2014 on an underlying basis, due to extremely challenging global market conditions. In the mature markets of NAFTA and EMEA, this decline in revenue was driven by the reduction in crude steel production, reflecting increased steel imports in the region, the declining price of oil and strong downward price pressure in the more commoditised end of the market where, in line with our business model, we resolved not to participate. Underlying revenue in NAFTA and EMEA declined by 22.8% and 9.7% respectively, broadly in line with the decline in the market. In the expanding markets of North Asia and India, growth strengthened in line with expectations. Low cost steel imports also affected the progress of new steel capacity expansion in South East Asia, which also impacted our performance.

Technical Services

Technical Services is a new business line for the group which complements existing product lines with new services to our existing customers. Technical Services focuses on the capture of key manufacturing data, combining this with Vesuvius' strong presence and expertise in metal casting to create new technologies and integrate them into expert process management systems.

Technical Services Revenue	**2015 (£m)**	**2014 (£m)**	**Year-on-year change (%)**	**Underlying change (%)**
Americas	**19.5**	3.6	*441.7*	*n/a*
Europe, Middle East & Africa (EMEA)	**7.0**	-	*n/a*	*n/a*

Total	**26.5**	3.6	*636.1*	*n/a*

In 2015, Technical Services generated revenues of £26.5m. As a new business line, the key challenge was to establish its presence independently from our other businesses, and to integrate new acquisitions, while continuing to develop complementary solutions for our customers. This reflects our customers' demand for the delivery of solutions that will enable further integration and automation of their production processes.

Our technical services capabilities have been significantly enhanced by the acquisitions of Avemis, SERT, ECIL Met Tec, Process Metrix and in 2015, Sidermes SpA.

Foundry Division

Vesuvius' Foundry division, trading as Foseco, is a world leader in the supply of consumable products, solutions and associated services related to the foundry industry. The foundry process is highly sequential and is critically dependent on consistency of quality and productivity optimization. The Foundry division's products, solutions and use of advanced computer simulation techniques allow foundries to reduce defects and hence reduce labour-intensive fettling and machining, minimise metal usage requirements, influence the metal solidification process and automate moulding and casting, thus reducing cost, energy usage and mould size.

The conditioning of molten metal, the nature of the mould used and, especially, the design of the way metal flows into the mould are key parameters in a foundry, determining both the quality of the finished castings and the labour, energy and metal usage efficiency of the foundry.

Vesuvius provides products and associated services to foundries that improve these parameters.

Foundry Division	2015 (£m)	2014 (£m)	Year-on-year change (%)	Underlying change (%)
Foundry Revenue	**424.4**	463.0	*-8.4*	*-3.3*
Foundry Trading Profit	**44.5**	46.4	*-4.2*	*+2.7*
Foundry Return on Sales	**10.5%**	10.0%	*+50bps*	*+60bps*

The Foundry division continues to suffer from the decline in our traditional end-markets. The worldwide foundry market continued to be affected by difficulties within the agriculture, construction and mining industries, which resulted from the general decline in commodity and precious metal prices reducing investment and activity worldwide, including a reduction in demand in the valuable steel casting market for the extractive industries. Whilst light vehicle production was up year-on-year 1.5% globally in 2015, worldwide heavy truck output declined 6.2%. Some jurisdictions have also faced challenges from political and economic instability. Underlying revenue in the Foundry Division decreased by 3.3% year-on-year. However, underlying trading profit improved by 2.7% and return on sales increased by 60 basis points as a result of a series of self-help measures implemented by new management.

Foundry Revenue	2015 (£m)	2014 (£m)	Year-on-Year change (%)	Underlying change (%)
Americas	**89.7**	102.8	*-12.7*	*-10.1*
Europe, Middle East & Africa (EMEA)	**194.2**	215.9	*-10.0*	*-0.3*
Asia-Pacific	**140.4**	144.4	*-2.8*	*-2.7*
Total	**424.4**	463.0	*-8.4*	*-3.3*

Underlying revenue in NAFTA decreased 9.2% due to weakness in the agriculture, construction and mining industries. Several foundries announced closures of US operations, moving production overseas. Partially offsetting this was good growth in our Mexico operations. In South America, underlying revenue dropped 13.1%, with Brazil experiencing a 18.5% drop in light vehicle production, a 40.1% reduction in heavy vehicle output and considerably reduced mining activity.

Revenue in Europe was flat, as increases in light vehicle production of 4.3% and heavy truck production of 7.6% were offset by reductions in mining, construction, railroad and windmill castings. Central Europe and Middle East were most impacted by the reduced activity levels. In addition, Russia's weak rouble made foundry consumable imports cost-prohibitive.

In Asia-Pacific, Chinese underlying revenue dropped 7.4% due to reduced heavy truck and mining activity. Sales in Thailand were impacted by reduced light vehicle production and mining activity. In Australia and Indonesia, continued deterioration of castings demand from the mining industry resulted in lower sales in both countries. A solid performance was seen in India with underlying revenue up 13.4% year-on-year, benefitting from increased light vehicle and truck production, up 5% and 28% respectively.

Our new manufacturing plant in Changshu, China (opened at the end of 2014) is now fully operational and serving the Chinese market, which represents more than 40% of global foundry castings. In addition, product innovation and further growth is expected to be driven by the new R&D facility located in Enschede, Netherlands, which was opened in late 2014.

FINANCIAL REVIEW

The following review considers a number of our financial KPIs and sets out other relevant financial information

Basis of Preparation

We have continued to adopt a columnar presentation format for our accounts to identify separately headline performance results, as we considered that this gives a better view of the underlying results of the ongoing business.

Headline profit before tax (PBT) and earnings per share (EPS)

Details relating to our decline in revenue, trading profit and return on sales are provided in the Financial Summary and Operating Review in this release. The main difference between trading profit and PBT is net finance costs. Net finance costs of £15.4m in 2015 were £1.0m below 2014. Net finance costs include interest payable on our borrowings, part of which were renegotiated this year at more favourable rates, as well as interest on pension obligations and unwinding of provisions. The key changes in 2015 were lower arrangement fees and lower interest on pension obligations.

Headline PBT, including our share of the profits from joint ventures of nil (2014: £1.4m) is £108.6m (2014: £127.8m), 15% behind last year. Including amortisation and the exceptional restructuring charge of £14.6m our PBT falls to £77.4m (2014: £111.2m).

Headline EPS at 28.1 pence per share is 16.0% lower than 2014.

Return on Net Operating Assets

RONA is our principal measure of capital efficiency. We do not exclude the results of businesses acquired and disposed from this calculation as capital efficiency is an important consideration in our portfolio decisions. It is calculated by dividing trading profit plus our share of profits from joint ventures by our average operating assets (property, plant and equipment, and trade working capital).

As with most of our KPIs, we measure this on a 12-month moving average basis at constant currency to ensure we focus on sustainable underlying improvements. Our RONA for 2015 was 21.1% (2014: 25.5%), driven by a greater decline in profits than the decrease in asset base.

Free Cash Flow and Working Capital

Trade working capital as a percentage of sales in 2015 was 26.3% (2014: 24.8%), measured on a 12-month moving average basis. The higher proportion of sales into emerging markets has contributed to this increased working capital requirement.

Operating cash flow was £124.4m, up £21.0m from £103.4m in 2014. This represented a cash conversion ratio of 100.3%. This improvement in operating cash flow was primarily driven by:

- a decrease in cash capital expenditure of £15.0m to £38.1m in 2015 from £53.1m in 2014; and
- a reduction in working capital requirements of £27.1m reflecting then lower level of trading activities.

Free cash flow of £59.1m (2014: £58.7m) includes £11.5m of cash costs related to restructuring activities and the net outflow for settlement of pre-demerger litigation claims of £6.2m. Excluding these one off items, the free cash flow from continuing operations was £65.3m, which continues to be over 60% of operating cash flow generation.

Interest Cover and Net Debt

Net debt as at 31 December 2015 was £291.6m, a £23.3m increase over 2014. The main driver of the increase was the acquisition of Sidermes during the year.

The Group has committed borrowing facilities of £532.4m (2014: £647.4m), of which £181.1m were undrawn (2014: £343.5m). The changes reflect a successful replacement of the previous £425m multi-currency revolving credit facility, which was due to expire in April 2016, with a new multi-currency credit facility of £300m repayable in June 2020. Under the arrangements of the new revolving credit facility (taken out in June 2015) the Group has the option until the end of 2016 to increase the amount of committed funds by up to £200m either from the existing bank group or by introducing additional banks on the same lending terms. This provides us with sufficient debt capacity for the short term.

The Group's debt facilities have two financial covenants: the ratios of net debt to EBITDA (maximum three times limit) and EBITDA to interest (minimum four times limit). These ratios are monitored regularly to ensure the Group has sufficient financing available to run the business and fund future growth. At the end of 2015, the net debt to EBITDA ratio was 1.8x, an increase on the prior year's 1.5x and EBITDA to interest was 11.7x, versus the 13.1x last year. Although more geared than 2014, the Group remains well within its covenants.

Restructuring
As noted previously, the Group undertook a broad range of restructuring programmes during the year in response to the significant declines in the majority of our end-markets. Unlike last year, where the amount and extent of restructuring charges were immaterial, this year's programmes covered all Business Units and involved a material number of redundancies across the Group. Costs incurred during the year of £14.6m were predominantly on redundancy and outplacement and £11.5m of which had been paid by December. A combined restructuring provision is being carried forward into 2016 of £6.5m along with a historic onerous lease provision of £3.3m.

Capital Expenditure
Capital expenditure in 2015 of £35.0m (2014: £53.5m) comprised £24.4m in the Steel division (2014: £28.6m) and £10.6m in the Foundry division (2014: £24.9m). The reduction in 2015 was in recognition of weaker end-markets and in order to preserve cash as profits reduced. Capital expenditure on revenue generating customer installation assets has been maintained at £6.2m (2014: £6.2m).

Corporate Activity
In the first half of the year we acquired Sidermes SpA in Italy for £23.8m, as a continuation of our strategy to build our technical services business. We continue to focus on acquisitions to reinforce our growth opportunities whilst maintaining a balance in the portfolio of the Group.

Pensions
The Group has a limited number of historical defined benefit plans mainly in UK, USA, Germany and Belgium. The main plans in UK and US are largely closed to further benefit accruals and 57% of the liabilities in UK have already been insured. The total net deficit attributed to these defined benefit obligations at the end of December 2015 was £35.3m (2014: £51.1m), representing an improvement of £15.8m. This is mainly due to:

- an increase of £9m in the surplus of the UK defined benefit plan due to decreasing long-term inflation expectations and more deferred pensioners transferring out of the defined benefit scheme;
- the additional voluntary contributions of £3.7m into the UK and US plan; and
- the completion of a triennial valuation of the defined benefit obligations in Belgium confirmed £3.0m of experience gains attributed to benefits paid out over the last three years.

The higher discount rates assumed for all the plans led to a lower defined benefit liability valuation of £25.0m but this was offset by a £25.2m reduction in the value of the pension plans' assets, mainly in the UK and USA.

The majority of the ongoing pension schemes are defined contribution plans, where our only obligation is to make contributions with no further commitments on the level of post-retirement benefits. During 2015, £10.7m (2014: £9.2m) of pension contributions were made into the plans and charged to trading profit.

Taxation
The Group's effective tax rate, based on the income tax costs associated with headline performance of £27.7m (2014: £32.9m), was 25.5% in 2015 (2014: 26.0%).

The income tax credit on separately reported items of £2.9m (2014: £25.8m) comprises non-cash deferred tax movements relating to the amortisation of a deferred tax liability arising from the 2008 acquisition of Foseco plc (£4.7m; 2014: £4.0m) and tax credits relating to restructuring charges (£1.5m; 2014: £nil), and a reduction in the deferred tax asset previously recognised in respect of US tax losses and certain other temporary differences (£3.3m; 2014: £21.8m credit).

The net income tax credit recognised directly in the Group statement of comprehensive income of £1.6 m (2014: £0.5m) comprises £0.9m (2014: £0.5m) in respect of deferred tax on pension obligations and £0.7m (2014: £nil) in respect of exchange differences.

Going concern

The Directors have prepared cash flow forecasts for the Group for a period in excess of 12 months from the date of approval of the 2015 financial statements. These forecasts reflect an assessment of current and future end-market conditions and their impact on the Group's future trading performance. The forecasts show that the Group will be able to operate within the current committed debt facilities and show continued compliance with the Company's financial covenants. On the basis of the exercise described above and the Group's available committed debt facilities, the Directors consider that the Group and Company have adequate resources to continue in operational existence for a period of 12 months from the date of approval of the 2015 financial statements. Accordingly, they continue to adopt a going concern basis in preparing the financial statements of the Group and the Company.

Principal Risks and Uncertainties

Principal Risks

The risks identified are those the Board considers to be the most relevant to the Group in relation to their potential impact on achievement of its strategic objectives. All of the risks set out could materially affect the Group, its businesses, future operations and financial condition and could cause actual results to differ materially from expected or historical results. These risks are not the only ones that the Group will face. Some risks are not yet known and some currently not deemed to be material could become so.

Risk Management

Risks are actively managed in order to mitigate exposure and, where cost effective, the risk is transferred to insurers. The process for risk identification includes both 'top down' and 'bottom up' processes, which allow operational, functional, senior executive and Board members' views on risk to be independently gathered to identify principal risks. Once identified, the senior management 'owners' for each principal risk update the mitigations of that specific risk and contribute to the analysis of likelihood and materiality. This is reported to the Board. We have also built a business structure that gives protection against the principal risks we face with diversified currencies, a widespread customer base, local production matching the diversity of our markets and intensive training of our employees. During the year, the Group further developed its processes for business continuity planning, conducting workshops across the Group's major sites and across all business lines. The Group's risks were also analysed in the context of viability, examining both financial and economic trend risks and significant event risks.

Board Monitoring

Vesuvius operates a continuous process for identifying and evaluating significant risks, with regular reports made to the Board on the processes by which these are managed and mitigated. Thus, the Board exercises its ultimate responsibility for the Group's risk management, by analysing major issues that have arisen during the year, considering how risks have changed over time, and assessing whether they are being effectively managed.

Changes to Risk in 2015

In 2015, the principal risks identified by the Group remained similar to those identified in 2014, though our ongoing review enabled us to refine some concerns, and recognise that two risks previously identified as being separate should be amalgamated. Thus in 2015, as part of our review we combined product liability and loss of business reputation (a risk added in 2014) into one risk area. In addition, in 2015 we identified more clearly the challenges posed by our Technical Services strategy and, as a consequence, successful delivery of this medium-term strategic aim is now characterised as one of our principal risks and uncertainties. Having identified cyber security as a key risk in 2013, our ongoing assessment of Vesuvius' exposure in this area led us to remove this from our principal risks in 2014 – whilst noting that it remains, as for all companies, an area for our ongoing attention.

Risk	Potential Impact	Mitigation
Demand volatility	• Unplanned drop in demand and revenue • Failure of one or more customers leading to debtor bankruptcy	• Prudent balance sheet management to maintain robust financial position • Strong internal reporting and monitoring of external data to identify economic trends • Flexible cost base to react quickly to end-market conditions • No one customer exceeds 10% of Vesuvius revenue • Robust credit control processes
Protectionism	• Loss of business from enforced preference of local suppliers • Imposition of increased import duties • Increased tax burden or changes to rules and enforcement • Local competitors promoted overseas by government to government action	• Local manufacturing operations in 26 countries • Robust internal tax policies and strict transfer pricing rules • Strong internal control of inter-Company trading • Maintenance of quality and innovation leadership differentiating Vesuvius and mitigating government intervention in supplier selection
Product liability and loss of business reputation	• Claims from third parties resulting from use of potentially hazardous materials • Customer claims and loss of business from product quality issues • Product or application failures not promptly addressed may create an adverse financial impact and damage our reputation as a technology leader • Incident at customer plant resulting in significant health and safety breach and/or customer downtime	• Active monitoring of HSE issues • Stringent quality control standards systematically implemented in manufacturing • Experienced legal team used to negotiating appropriate contractual protections • Active quality management programme in place with full root cause analysis for customer complaints and follow up • Robust product qualification process in place for raw materials • Active monitoring of customers' improvement requests • Appropriate insurance cover obtained
Regulatory compliance	• Financial loss through failure to comply with appropriate regulations • Business disruption from investigations • Reputational damage	• Widely disseminated Code of Conduct and supporting policies which highlight the Group's ethical approach to business • Speak-up procedure implemented across the Group • Ongoing training and review of policy effectiveness
Protection of leading technologies	• Loss of business through new technology developed by others • Failure to adapt solutions to meet changing customer needs • Revenue lost through ineffective protection of intellectual property	• Market-leading research and development team with significant investment in R&D, and use of structured development methodologies • Patent protection sought when new developments are made • Stringent defence of patents and other intellectual property • Control of access to intellectual property through IT controls and physical security
Financial uncertainty	• Inability to raise sufficient capital to fund growth of business • Reduction in earnings from increased interest charges • Weakness in foreign currencies leading to reduced profitability	• Long-term capital structure planning to secure availability of capital at acceptable costs • Substantial proportion of debt capital secured at fixed rates of interest • International presence reduces the Group's reliance on any one currency • Hedging of transactional foreign exchange exposure when necessary

		• Alignment of cost structure with revenue where possible • The Group adopts appropriate functional currencies for its operations in some countries to reduce further FX translational risk
Loss of a major site	• Loss of revenue resulting from inability to supply customers on loss of production facilities	• Geographically diversified manufacturing footprint • Maintenance of excess capacity to allow plants to meet peak demands • Enhanced Business Continuity planning undertaken • Appropriate business interruption insurance cover maintained
Ability to source critical raw materials	• Manufacturing interruption from failure of a key supplier, or the loss of availability of a source of critical raw materials	• Strategic stocks of certain materials are retained • Number of single-sourced materials reduced through expanding supplier base • Development of new products and research on substitution of raw materials
Retention of staff	• Insufficient high-quality staff to run base business and generate growth through innovation • Availability of suitable talent in the pipeline to offer internal succession options for senior positions including the Group Executive Committee and Executive Directors	• Contacts with universities to identify and develop talent • Internal programme to attract and develop high potential staff from emerging markets through cross border exchange programmes • Extensive internal courses run by experienced staff to transfer knowledge in a structured manner • Building career trajectories for technical staff to show potential and reduce attrition • Group Talent Management Director driving assessment of internal talent at the middle and senior management levels, identifying gaps and implementing development programmes to provide suitable succession options
Technical Services	• Inability to leverage the benefits of newly acquired entities • Financial control and reporting risk of newly acquired entities	• Proactive approach to identify targets in line with the business strategy • Central structure in place to support the integration and active collaboration between the business units

Group Income Statement
For the year ended 31 December 2015

		2015			2014		
		Headline performance	**Separately reported items**	**Total**	Headline performance	Separately reported items	Total
	Notes	**£m**	**£m**	**£m**	£m	£m	£m
Continuing operations							
Revenue	2	**1,322.0**	-	**1,322.0**	1,444.4	-	1,444.4
Manufacturing costs		**(968.9)**	-	**(968.9)**	(1,048.3)	-	(1,048.3)
Administration, selling and distribution costs		**(229.1)**	-	**(229.1)**	(253.3)	-	(253.3)
Trading profit	2	**124.0**	-	**124.0**	142.8	-	142.8
Amortisation of acquired intangible assets		-	**(16.6)**	**(16.6)**	-	(17.0)	(17.0)
Restructuring charges	4	-	**(14.6)**	**(14.6)**	-	-	-
Operating profit/(loss)		**124.0**	**(31.2)**	**92.8**	142.8	(17.0)	125.8
Net finance costs	5	**(15.4)**	-	**(15.4)**	(16.4)	-	(16.4)
Share of post-tax profit of joint ventures		-	-	-	1.4	-	1.4
Profit on disposal of continuing operations	6	-	-	-	-	0.4	0.4
Profit/(loss) before tax		**108.6**	**(31.2)**	**77.4**	127.8	(16.6)	111.2
Income tax (charge)/credits	7	**(27.7)**	**2.9**	**(24.8)**	(32.9)	25.8	(7.1)
Profit/(loss) from:							
Continuing operations		**80.9**	**(28.3)**	**52.6**	94.9	9.2	104.1
Discontinued operations	16	-	**1.4**	**1.4**	-	(3.6)	(3.6)
Profit/(loss)		**80.9**	**(26.9)**	**54.0**	94.9	5.6	100.5
Profit attributable to:							
Owners of the parent		**75.7**	**(26.9)**	**48.8**	90.3	5.6	95.9
Non-controlling interests		**5.2**	-	**5.2**	4.6	-	4.6
Profit/(loss)		**80.9**	**(26.9)**	**54.0**	94.9	5.6	100.5

			2015 Total	2014 Total
Earnings per share	**- pence**	8		
Continuing operations	**- basic**		**17.6**	36.8
	- diluted		**17.5**	36.7
Total operations	**- basic**		**18.1**	35.5
	- diluted		**18.1**	35.4

Group Statement of Comprehensive Income

For the year ended 31 December 2015

	2015 £m	2014 £m
Profit	**54.0**	100.5
Other comprehensive income/(loss), net of income tax		
Items that will not be subsequently reclassified to income statement:		
Remeasurement of defined benefit liabilities/assets	**13.0**	(9.9)
Income tax relating to items not reclassified	**1.6**	0.5
Items that may be subsequently reclassified to income statement:		
Exchange differences on translation of the net assets of foreign operations	**(29.3)**	(9.6)
Exchange translation differences arising on net investment hedges	**(6.1)**	(0.3)
Change in fair value of cash flow hedges	-	(0.2)
Change in fair value of available-for-sale investments	-	(0.2)
Other comprehensive loss, net of income tax	**(20.8)**	(19.7)
Total comprehensive income	**33.2**	80.8
Total comprehensive income attributable to:		
Owners of the parent	**28.2**	75.7
Non-controlling interests	**5.0**	5.1
Total comprehensive income	**33.2**	80.8

Group Statement of Cash Flows
For the year ended 31 December 2015

	Note	2015 £m	2014 £m
Cash flows from operating activities			
Cash generated from operations		**140.0**	145.0
Net interest paid		**(13.6)**	(12.0)
Income taxes paid		**(31.8)**	(24.4)
Net cash inflow from operating activities		**94.6**	108.6
Cash flows from investing activities			
Capital expenditure		**(38.1)**	(53.1)
Proceeds from the sale of property, plant and equipment		**1.1**	2.0
Proceeds from the sale of investments		**0.3**	0.6
Acquisition of subsidiaries and joint ventures, net of cash acquired	15	**(25.1)**	(23.4)
Dividends received from joint ventures		**-**	0.6
Other investing outflows		**(1.6)**	(2.3)
Net cash outflow from investing activities		**(63.4)**	(75.6)
Net cash inflow before financing activities		**31.2**	33.0
Cash flows from financing activities			
Proceeds from/(repayment of) borrowings	10	**44.7**	(9.8)
Settlement of forward foreign exchange contracts		**3.9**	4.8
Purchase of own shares		**(5.2)**	(0.5)
Borrowing facility arrangement costs		**(1.4)**	-
Dividends paid to equity shareholders	9	**(43.9)**	(41.2)
Dividends paid to non-controlling shareholders		**(2.2)**	(2.6)
Net cash outflow from financing activities		**(4.1)**	(49.3)
Net increase/(decrease) in cash and cash equivalents	10	**27.1**	(16.3)
Cash and cash equivalents at 1 January		**38.5**	52.8
Effect of exchange rate fluctuations on cash and cash equivalents		**1.4**	2.0
Cash and cash equivalents at 31 December		**67.0**	38.5

	Continuing operations £m	**Discontinued operations £m**	**2015 Total £m**	Continuing operations £m	Discontinued operations £m	2014 Total £m
Free cash flow						
Net cash inflow/(outflow) from operating activities	**100.8**	**(6.2)**	**94.6**	109.1	(0.5)	108.6
Additional funding contributions into Group pension plans	**3.7**	-	**3.7**	3.2	-	3.2
Capital expenditure	**(38.1)**	-	**(38.1)**	(53.1)	-	(53.1)
Proceeds from the sale of property, plant and equipment	**1.1**	-	**1.1**	2.0	-	2.0
Dividends received from joint ventures	-	-	-	0.6	-	0.6
Dividends paid to non-controlling shareholders	**(2.2)**	-	**(2.2)**	(2.6)	-	(2.6)
Free cash flow	**65.3**	**(6.2)**	**59.1**	59.2	(0.5)	58.7

Group Balance Sheet

As at 31 December 2015

	Note	**2015 £m**	2014 £m
Assets			
Property, plant and equipment		**285.3**	291.8
Intangible assets		**683.7**	703.9
Employee benefits – net surpluses	12	**59.9**	49.8
Interests in joint ventures		**16.1**	16.9
Investments		**3.0**	3.3
Income tax recoverable		**1.3**	2.9
Deferred tax assets		**70.7**	71.4
Other receivables		**19.0**	16.5
Total non-current assets		**1,139.0**	1,156.5
Cash and short-term deposits		**101.5**	76.9
Inventories		**168.0**	191.9
Trade and other receivables		**316.6**	334.1
Income tax recoverable		**2.8**	4.0
Derivative financial instruments		**0.5**	-
Total current assets		**589.4**	606.9
Total assets		**1,728.4**	1,763.4
Equity			
Issued share capital		**27.8**	27.8
Retained earnings		**2,346.5**	2,332.1
Other reserves		**(1,501.9)**	(1,466.7)
Equity attributable to the owners of the parent		**872.4**	893.2
Non-controlling interests		**32.7**	29.9
Total equity		**905.1**	923.1
Liabilities			
Interest-bearing borrowings		**351.7**	304.9
Employee benefits – net liabilities	12	**95.2**	100.9
Other payables		**17.0**	18.2
Provisions		**29.5**	31.9
Deferred tax liabilities		**44.6**	50.3
Total non-current liabilities		**538.0**	506.2
Interest-bearing borrowings		**41.4**	40.3
Trade and other payables		**178.0**	221.0
Income tax payable		**48.3**	51.8
Provisions	17	**17.6**	20.8
Derivative financial instruments		**-**	0.2
Total current liabilities		**285.3**	334.1
Total liabilities		**823.3**	840.3
Total equity and liabilities		**1,728.4**	1,763.4
Net debt			
Interest-bearing borrowings - non-current		**351.7**	304.9
- current		**41.4**	40.3
Cash and short-term deposits		**(101.5)**	(76.9)
Net debt	10	**291.6**	268.3

Group Statement of Changes in Equity

For the year ended 31 December 2015

	Issued share capital £m	Other reserves £m	Retained earnings £m	Owners of the parent £m	Non-controlling interests £m	Total equity £m
As at 1 January 2014	27.8	(1,455.8)	2,284.6	856.6	27.3	883.9
Profit	-	-	95.9	95.9	4.6	100.5
Other comprehensive income/(loss), net of income taxes:						
Remeasurement of defined benefit liabilities/assets	-	-	(9.9)	(9.9)	-	(9.9)
Income tax relating to items not reclassified	-	-	0.5	0.5	-	0.5
Exchange differences on translation of the net assets of foreign operations	-	(10.2)	-	(10.2)	0.6	(9.6)
Exchange differences on translation of net investment hedges	-	(0.3)	-	(0.3)	-	(0.3)
Change in fair value of cash flow hedges	-	(0.2)	-	(0.2)	-	(0.2)
Change in fair value of available-for-sale investments	-	(0.2)	-	(0.2)	-	(0.2)
Other comprehensive (loss)/income, net of income tax	-	(10.9)	(9.4)	(20.3)	0.6	(19.7)
Total comprehensive (loss)/income	-	(10.9)	86.5	75.6	5.2	80.8
Purchase of own shares	-	-	(0.5)	(0.5)	-	(0.5)
Recognition of share-based payments	-	-	2.7	2.7	-	2.7
Dividends paid (note 9)	-	-	(41.2)	(41.2)	(2.6)	(43.8)
Total transactions with owners	-	-	(39.0)	(39.0)	(2.6)	(41.6)
As at 1 January 2015	**27.8**	**(1,466.7)**	**2,332.1**	**893.2**	**29.9**	**923.1**
Profit	-	-	**48.8**	**48.8**	**5.2**	**54.0**
Other comprehensive income/(loss), net of income taxes:						
Remeasurement of defined benefit liabilities/assets	-	-	**13.0**	**13.0**	**-**	**13.0**
Income tax relating to items not reclassified	-	-	**1.6**	**1.6**	**-**	**1.6**
Exchange differences on translation of the net assets of foreign operations	-	**(29.1)**	**-**	**(29.1)**	**(0.2)**	**(29.3)**
Exchange differences on translation of net investment hedges	-	**(6.1)**	**-**	**(6.1)**	**-**	**(6.1)**
Other comprehensive (loss)/income, net of income tax		**(35.2)**	**14.6**	**(20.6)**	**(0.2)**	**(20.8)**
Total comprehensive (loss)/income		**(35.2)**	**63.4**	**28.2**	**5.0**	**33.2**
Purchase of own shares	-	**-**	**(5.2)**	**(5.2)**	-	**(5.2)**
Recognition of share-based payments	-	**-**	**0.1**	**0.1**	-	**0.1**
Dividends paid (note 9)	-	**-**	**(43.9)**	**(43.9)**	**(2.2)**	**(46.1)**
Total transactions with owners	-	-	**(49.0)**	**(49.0)**	**(2.2)**	**(51.2)**
As at 31 December 2015	**27.8**	**(1,501.9)**	**2,346.5**	**872.4**	**32.7**	**905.1**

1 **Basis of preparation**

1.1 Basis of accounting

The financial information set out in this annual results announcement does not constitute the Company's statutory accounts for the years ended 31 December 2015 or 2014, but is derived from those accounts. Statutory accounts for 2014 have been delivered to the registrar of companies and those for 2015 will be delivered in due course. The auditor has reported on those accounts; their reports were (i) unqualified (ii) did not include a reference to any matters to which the auditor drew attention by way of emphasis without qualifying their report and (iii) did not contain a statement under section 498 (2) or (3) of the Companies Act 2006.

1.2 Basis of consolidation

The Consolidated Financial Statements of the Group incorporate the financial statements of the Company and entities controlled by the Company (its 'subsidiaries'). Control exists when the Company has the power to direct the relevant activities of an entity that significantly affect the entity's return so as to have rights to the variable return from its activities. In assessing whether control exists, potential voting rights that are currently exercisable are taken into account. The results of subsidiaries acquired or disposed of during the year are included in the Group income statement from the effective date of acquisition or up to the effective date of disposal, as appropriate.

Where necessary, adjustments are made to the financial statements of subsidiaries to bring their accounting policies into line with those detailed herein to ensure that the Group financial statements are prepared on a consistent basis. All intra-Group transactions, balances, income and expenses are eliminated on consolidation.

Non-controlling interests in the net assets of consolidated subsidiaries are identified separately from the Group's interest therein. Non-controlling interests consist of the amount of those interests at the date of the original business combination together with the non-controlling interests' share of profit or loss, each component of other comprehensive income and dividends paid since the date of the combination. Total comprehensive income is attributed to the non-controlling interests even if this results in the non-controlling interests having a deficit balance.

1.3 Going concern

The Directors have prepared cash flow forecasts for the Group for a period in excess of 12 months from the date of approval of the 2015 financial statements. These forecasts reflect an assessment of current and future end-market conditions and their impact on the Group's future trading performance. The forecasts show that the Group will be able to operate within the current committed debt facilities and show continued compliance with the Company's financial covenants. On the basis of the exercise described above and the Group's available committed debt facilities, the Directors consider that the Group and Company have adequate resources to continue in operational existence for 12 months from the date of signing the 2015 financial statements. Accordingly, they continue to adopt a going concern basis in preparing the financial statements of the Group and the Company.

1.4 Functional and presentation currency

The financial statements are presented in millions of pounds sterling, which is the functional currency of the Company, and rounded to one decimal place.

1.5 Disclosure of 'separately reported items'

IAS 1 Presentation of Financial Statements, provides no definitive guidance as to the format of the income statement, but states key lines which should be disclosed. It also encourages the disclosure of additional line items and the reordering of items presented on the face of the income statement when appropriate for a proper understanding of the entity's financial performance. In accordance with IAS 1, the Company has adopted a columnar presentation for its Group income statement, to separately identify Headline Performance results, as the Directors consider that this gives a better view of the underlying results of the ongoing business. As part of this presentation format, the Company has adopted a policy of disclosing separately on the face of its Group income statement, within the column entitled 'Separately reported items', the effect of any components of financial performance for which the Directors consider separate disclosure would assist both in a better understanding of the financial performance achieved and in making projections of future results. In its adoption of this policy, the Company applies an even-handed approach to both gains and losses and aims to be both consistent and clear in its accounting and disclosure of such items.

Both materiality and the nature and function of the components of income and expense are considered in deciding upon such presentation. Such items may include, inter alia, the financial effect of exceptional items which occur infrequently, such as major restructuring activity, initial recognition and subsequent increase, decrease and amortisation of US deferred tax assets, together with items always reported separately, such as amortisation charges relating to acquired intangible assets, profits or losses arising on the disposal of continuing or discontinued operations and the taxation impact of the aforementioned exceptional items and items reported separately.

1.6 New and revised IFRS

IFRS 9 Financial Instruments (effective after 1 January 2018, for the year-end 2018), replaces the existing guidance in IAS 39 Financial Instruments Recognition and Measurement. IFRS 9 includes revised guidance on the classification and measurement of financial instruments, including a new expected credit loss model for calculating impairment on financial assets, and new general hedge accounting requirements. It also carries forward the guidance on recognition and derecognition of financial instruments from IAS 39. The Group is currently assessing the potential impact on its Consolidated Financial Statements resulting from the application of IFRS 9.

IFRS 15 Revenue from Contracts with Customers (effective after 1 January 2018, for the year-end 2018), establishes a comprehensive framework for determining whether, how much and when revenue is recognised. It replaces existing revenue recognition guidance, including IAS 18 Revenue, IAS 11 Construction Contracts and IFRIC 13 Customer Loyalty Programmes. Based on a preliminary assessment of the adoption of IFRS 15, the Group currently does not believe there will be a significant impact on its Consolidated Financial Statements.

IFRS 16 Leases (effective after 1 January 2019, for the year- end 2019), replaces the existing guidance in IAS 17 Leases. IFRS 16 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. The Group is currently assessing the potential impact on its Consolidated Financial Statements resulting from the application of IFRS 16.

Other new or amended standards are not expected to have a significant impact on the Group's financial statements.

2. Segment information

Operating segments for continuing operations

Operating segments are reported in a manner consistent with the internal reporting provided to the Executive Directors of the Board, who make the key operating decisions and are responsible for allocating resources and assessing performance of the operating segments. Reflecting the Group's management and internal reporting structure, segmental information is presented in respect of the two main business segments: Steel and Foundry.

Segment revenue represents revenue from external customers (inter-segment revenue is not material). Trading profit includes items directly attributable to a segment as well as those items that can be allocated on a reasonable basis.

2.1 Income Statement

The operating segment results from continuing operations for 2015 and 2014 are presented below.

			2015
	Steel	**Foundry**	**Continuing operations**
	£m	**£m**	**£m**
Segment revenue	**897.6**	**424.4**	**1,322.0**
Segment EBITDA	**103.8**	**57.3**	**161.1**
Segment depreciation	**(24.3)**	**(12.8)**	**(37.1)**
Segment trading profit	**79.5**	**44.5**	**124.0**
Amortisation of acquired intangible assets			**(16.6)**
Restructuring charges			**(14.6)**
Operating profit			**92.8**
Net finance costs			**(15.4)**
Profit before tax			**77.4**

			2014
	Steel	Foundry	Continuing operations
	£m	£m	£m
Segment revenue	981.4	463.0	1,444.4
Segment EBITDA	121.9	59.4	181.3
Segment depreciation	(25.5)	(13.0)	(38.5)
Segment trading profit	96.4	46.4	142.8
Amortisation of acquired intangible assets			(17.0)
Operating profit			125.8
Net finance costs			(16.4)
Share of post-tax profit of joint ventures			1.4
Profit on disposal of continuing operations			0.4
Profit before tax			111.2

3. Amortisation of intangible assets

Other intangible assets arose in 2008 on the acquisition of Foseco plc and are being amortised on a straight-line basis over their estimated useful lives. The assets acquired and their remaining useful lives are shown below.

	Remaining useful life years	Net value 2015 £m
Customer relationships (useful life: 20 years)	12.3	**60.1**
Trade name (useful life: 20 years)	12.3	**44.3**
Intellectual property rights (useful life: ten years)	2.3	**18.1**
		122.5

4. Restructuring charges from continuing operations

The 2015 restructuring charges were £14.6m (2014: nil). During the year a Group-wide restructuring programme was initiated resulting in charges of £15.5m (2014: nil) reflecting redundancy costs of £13.6m, plant closure costs of £1.3m, and consultancy fees of £0.6m. This was partially offset by a release of onerous lease provisions of £0.5m (2014: nil) and a £0.4m (2014: nil) release of provisions for potential claims that have now expired relating to the termination of agents.

The net tax credit attributable to the total restructuring charges was £1.5m (2014: nil).

Cash costs of £11.5m (2014: £5.8m) were incurred in the year in respect of the restructuring programme leaving provisions made but unspent of £9.8m as at 31 December 2015 (2014: £8.0m), of which £3.3m relates to future costs in respect of leases expiring between one and seven years.

5. Finance costs

Total net finance costs for the year of £15.4m is analysed in the table below.

	2015 £m	2014 £m
Interest payable on borrowings		
Loans, overdrafts and factoring arrangements	**14.9**	14.2
Obligations under finance leases	**0.1**	0.1
Amortisation of capitalised arrangement fees	**0.4**	1.8
Total interest payable on borrowings	**15.4**	16.1
Interest on net retirement benefits obligations	**0.9**	1.8
Unwinding of discounted provisions	**1.0**	1.1
Finance income	**(1.9)**	(2.6)
Total net finance costs	**15.4**	16.4

6. Profit on disposal of continuing operations

The profit on disposal of continuing operations in 2015 is £nil (2014: £0.4m). In 2014, profit on disposal of continuing operations comprised £0.8m profit on the sale of non-current assets in the USA and Czech Republic, and a £0.4m loss on the dilution of interests in an investment holding in Italy.

7. Income tax costs

The Group's effective tax rate, based on the income tax costs associated with headline performance of £27.7m (2014: £32.9m), was 25.5% in 2015 (2014: 26.0%)

The income tax credit on separately reported items of £2.9m (2014: £25.8m) comprises non-cash deferred tax movements relating to the amortisation of a deferred tax liability arising from the 2008 acquisition of Foseco plc (£4.7m; 2014: £4.0m) and tax credits relating to restructuring charges (£1.5m; 2014: £nil), net of movements in the deferred tax asset previously recognised in respect of US tax losses and certain other temporary differences (£3.3m; 2014: £21.8m credit).

The net income tax credit recognised directly in the Group statement of comprehensive income of £1.6m (2014: £0.5m) comprises £0.9m (2014: nil) in respect of deferred tax on pension obligations and £0.7m (2014: nil) in respect of exchange differences.

8. Earnings per share ('EPS')

8.1 Earnings for EPS

Basic and diluted EPS from continuing operations are based upon the profit attributable to owners of the parent, as reported in the Group income statement, of £47.4m (2014: £99.5m), being the profit for the year of £52.6m (2014: £104.1m) less non-controlling interests of £5.2m (2014: £4.6m); headline and diluted headline EPS are based upon headline profit from continuing operations attributable to owners of the parent of £75.7m (2014: £90.3m). The table below reconciles these different profit measures.

	Continuing operations 2015 £m	Continuing operations 2014 £m
Profit attributable to owners of the parent	**47.4**	99.5
Adjustments for separately reported items:		
Amortisation of acquired intangible assets	**16.6**	17.0
Restructuring charges	**14.6**	-
(Profit) on disposal of continuing operations	**-**	(0.4)
Income tax credit	**(2.9)**	(25.8)
Headline profit attributable to owners of the parent	**75.7**	90.3

8.2 Weighted average number of shares

	2015 £m	2014 £m
For calculating basic and headline EPS	**269.7**	270.3
Adjustment for potentially dilutive ordinary shares	**0.6**	0.8
For calculating diluted and diluted headline EPS	**270.3**	271.1

For the purposes of calculating diluted and diluted headline EPS, the weighted average number of ordinary shares is adjusted to include the weighted average number of ordinary shares that would be issued on the conversion of all potentially dilutive ordinary shares expected to vest, relating to the Company's share-based payment plans. Potential ordinary shares are only treated as dilutive when their conversion to ordinary shares would decrease EPS, or increase loss per share, from continuing operations.

8.3 Per share amounts

		Continuing operations pence	**Discontinued operations pence**	**2015 total pence**	Continuing operations pence	Discontinued operations pence	2014 total pence
Earnings/(loss) per share	- basic	**17.6**	**0.5**	**18.1**	36.8	(1.3)	35.5
	- **headline**	**28.1**	**0.5**	**28.6**	33.4	(1.3)	32.1
	- diluted	**17.5**	**0.6**	**18.1**	36.7	(1.3)	35.4
	- **diluted headline**	**28.0**	**0.5**	**28.5**	33.3	(1.3)	32.0

9. Dividends

	2015 £m	2014 £m
Amounts recognised as dividends		
Final dividend for the year ended 31 December 2013 of 10.25p per ordinary share	**-**	27.7
Interim dividend for the year ended 31 December 2014 of 5.00p per ordinary share	**-**	13.5
Final dividend for the year ended 31 December 2014 of 11.125p per ordinary share	**30.1**	-
Interim dividend for the year ended 31 December 2015 of 5.15p per ordinary share	**13.8**	-
	43.9	41.2

A final dividend for the year ended 31 December 2014 of £30.1m (2013: £27.7m) equivalent to 11.125 pence (2013: 10.25 pence) per ordinary share, was paid in May 2015 (May 2014) and an interim dividend for the year ended 31 December 2015 of £13.8m (2014: £13.5m) equivalent to 5.15 pence (2014: 5.00 pence) per ordinary share was paid in September 2015 (September 2014).

A proposed final dividend for the year ended 31 December 2015 of £30.0m, equivalent to 11.125 pence per ordinary share, is subject to approval by shareholders at the Company's Annual General Meeting and has not been included as a liability in these financial statements. If approved by shareholders, the dividend will be paid on 20 May 2016 to ordinary shareholders on the register at 8 April 2016.

10. Net debt

	Balance as at 1 January 2015	Foreign exchange adjustments	Non-cash movements	Cash flow	Balance as at 31 December 2015
	£m	£m	£m	£m	£m
Cash and cash equivalents					
Cash at bank and in hand	**76.9**	**(0.2)**	**-**	**24.8**	**101.5**
Bank overdrafts	**(38.4)**	**1.6**	**-**	**2.3**	**(34.5)**
	38.5	**1.4**	**-**	**27.1**	**67.0**
Borrowings, excluding bank overdrafts					
Current	**(2.2)**	**(0.1)**	**-**	**(5.2)**	**(7.5)**
Non-current	**(305.8)**	**(8.0)**	**-**	**(39.5)**	**(353.3)**
	(308.0)	**(8.1)**	**-**	**(44.7)**	**(360.8)**
Capitalised arrangement fees	**1.2**	**-**	**(0.4)**	**1.4**	**2.2**
Net debt	**(268.3)**	**(6.7)**	**(0.4)**	**(16.2)**	**(291.6)**

As at 31 December 2015, the Group had committed borrowing facilities of £532.4m (2014: £647.4m), of which £181.1m (2014: £343.5m) were undrawn. These undrawn facilities are due to expire in June 2020. The Group's borrowing requirements are met by US Private Placement Loan Notes ("USPP") and a multi-currency committed syndicated bank facility of £300m (2014: £425m). The USPP facility was fully drawn as at 31 December 2015 and amounted to £232.4m ($310m and €30m), of which $110m is repayable in 2017, $140m in 2020, €15m in 2021, $30m in 2023, €15m in 2025 and $30m in 2028. The syndicated bank facility is repayable in June 2020.

11. Cash generated from operations

	Continuing operations	**Discontinued operations**	**2015 total**	Continuing Operations	Discontinued Operations	2014 total
	£m	**£m**	**£m**	£m	£m	£m
Operating profit	**92.8**	**1.4**	**94.2**	125.8	(3.6)	122.2
Adjustments for:						
Amortisation of acquired intangible assets	**16.6**	**-**	**16.6**	17.0	-	17.0
Restructuring charges	**14.6**	**-**	**14.6**	-	-	-
Depreciation	**37.1**	**-**	**37.1**	38.5	-	38.5
EBITDA	**161.1**	**1.4**	**162.5**	181.3	(3.6)	177.7
Net (increase)/decrease in trade and other working capital	**0.3**	**(7.6)**	**(7.3)**	(26.8)	3.1	(23.7)
Outflow related to restructuring charges	**(11.5)**	**-**	**(11.5)**	(5.8)	-	(5.8)
Additional pension funding contributions	**(3.7)**	**-**	**(3.7)**	(3.2)	-	(3.2)
Cash generated from operations	**146.2**	**(6.2)**	**140.0**	145.5	(0.5)	145.0

12. Employee benefits

The net employee benefits balance as at 31 December 2015 of £35.3m (2014: £51.1m) in respect of the Group's defined benefit retirement plans and other post-retirement benefits plans, results from an actuarial valuation of the Group's defined benefit pension and other post-retirement obligations as at that date. As analysed in the following table, the net balance comprised net surpluses (assets) of £59.9m (2014: £49.8m), relating almost entirely to the Group's main defined benefit pension plan in the UK, together with net liabilities (deficits) of £95.2m (2014: £100.9m).

	2015 £m	2014 £m
Employee benefits - net surpluses		
UK defined benefit pension plan	**59.5**	49.8
ROW defined benefit pension plans	**0.4**	-
	59.9	49.8
Employee benefits - net liabilities		
UK (ex-gratia) defined benefit pension plan	**1.8**	1.0
US defined benefit pension plans	**37.7**	35.6
German defined benefit pension plans	**36.3**	39.9
ROW defined benefit pension plans	**13.7**	19.0
Other post-retirement benefit obligations	**5.7**	5.4
	95.2	100.9

The total net charge of £8.1m (2014: £4.1m) recognised in the Group income statement in respect of the Group's defined benefit retirement plans and other post-retirement benefits plans is recognised in the following lines.

		2015 £m	2014 £m
In arriving at trading profit:	-within other manufacturing costs	**2.1**	2.0
	-within administration, selling and distribution costs	**4.3**	0.3
In arriving at profit before tax:	-within restructuring charges	**0.8**	-
	-within net finance costs	**0.9**	1.8
Total net charge - continuing operations		**8.1**	4.1

As at 31 December 2014, the defined benefit pension plan in the Netherlands was converted to a defined contribution plan, eliminating the net obligation of the defined benefit plan, resulting in a settlement gain of £3.6m from the conversion of the plan, recognised within trading profit.

13. Contingent liabilities

Guarantees given by the Group under property leases of operations disposed of amounted to £1.7m (2014: £2.3m).

Vesuvius has extensive international operations and is subject to various legal and regulatory regimes, including those covering taxation and environmental matters. Several of Vesuvius' subsidiaries are parties to legal proceedings, certain of which are insured claims arising in the ordinary course of the operations of the company involved, and the Directors are aware of a number of issues which are, or may be, the subject of dispute with tax authorities. Reserves are made for the expected amounts payable in respect of known or probable costs resulting both from legal or other regulatory requirements, or from third-party claims. As the settlement of many of the obligations for which reserve is made is subject to legal or other regulatory process, the timing and amount of the associated outflows is subject to some uncertainty.

Certain of Vesuvius' subsidiaries are subject to lawsuits, predominantly in the US, relating to a small number of products containing asbestos manufactured prior to the acquisition of those subsidiaries by Vesuvius. These suits usually also name many other product manufacturers. To date, Vesuvius is not aware of there being any liability verdicts against any of these subsidiaries. A number of lawsuits have been withdrawn, dismissed or settled and the amount paid, including costs, in relation to this litigation has not had a material adverse effect on Vesuvius' financial position or results of operations.

14. Related parties

All transactions with related parties are conducted on an arm's length basis and in accordance with normal business terms. Transactions between related parties that are Group subsidiaries are eliminated on consolidation.

15. Acquisition of subsidiaries and joint ventures, net of cash acquired

On the 15 May, the Group acquired a 100% ownership interest in the Sidermes Group ('Sidermes'), a leading supplier of temperature and chemical measurement solutions.

	2015 £m
Consideration transferred	
Cash	24.4
Total consideration transferred	**24.4**
Identifiable assets acquired and liabilities assumed at fair value	
Inventories	6.7
Trade and other receivables	6.4
Property, plant and equipment	5.7
Cash	0.6
Trade and other payables	(3.7)
Deferred tax liability	(1.2)
Employee benefits net liabilities	(0.9)
Interest bearing borrowings	(0.8)
Provisions	(0.3)
Total identifiable net assets at fair value	**12.5**
Goodwill	**11.9**

Fair values are provisional and may be revised.

The £25.1m disclosed in the Group statement of cash flows in respect of the acquisition of subsidiaries, net of cash acquired, comprised £24.4m paid for current year acquisitions, less £0.6m of cash acquired with current year acquisitions and a release of contingent consideration payment for ECIL Met Tec and Process Metrix (£0.8m and £0.5m respectively).

These acquisitions contributed £7.5m of revenue, and a £0.6m trading loss to the Group's results. Had the acquisition occurred on 1 January 2015, the contribution would have been £12.9m of revenue, and a trading loss of £0.6m. The Group incurred acquisition related costs of £0.1m relating to external legal fees and due diligence costs which have been included within administration costs in the Group income statement.

The goodwill arising from the acquisition is attributable to the synergies which are expected from combining Sidermes, a complementary business, with the operations of the Group.

16. Discontinued operations

The net cash outflow from discontinued operations of £6.2m during 2015 represented the net payment of £5.5m to MacDermid following the settlement agreement in 2014, £0.4m VAT recovered, and £0.3m other payments. Discontinued operations income of £1.4m related to a partial reimbursement of costs charged in 2014 for the MacDermid claim.

Discontinued operations in 2014 comprise of a release of £1.1m of provision relating to a VAT case which was resolved in Vesuvius' favour and a charge of £4.7m in relation to settlement of actions brought by MacDermid (incorporated in the United States) against Vesuvius and Alent plc that arose out of corporate activity between the parties in 2006.

16.1 Results of discontinued operations

	2015 **£m**	2014 £m
Other income	**1.4**	-
Expenses	**-**	(3.6)
Profit/(loss) before tax	**1.4**	(3.6)
Income tax costs	**-**	-
Profit on disposal of discontinued operations	**-**	-
Profit/(loss) for the year attributable to owners of the parent	**1.4**	(3.6)
Earnings per share – pence		
Basic	**0.5**	(1.3)
Diluted	**0.5**	(1.3)

17. Provisions

During 2015 the Group recognised net charges of £9.2m (2014: net charges £5.8m) in the income statement to provide for various litigation settlements and other claims.

18. Non-GAAP financial measures

The Company uses a number of non-Generally Accepted Accounting Practice ("non-GAAP") financial measures in addition to those reported in accordance with IFRS. The Directors believe that these non-GAAP measures, listed below, are important when assessing the underlying financial and operating performance of the Group and its divisions.

18.1 Headline

Headline performance is from continuing operations and before items reported separately on the face of the income statement.

18.2 Underlying

Underlying performance is adjusted to exclude the effects of changes in exchange rates, business acquisitions and disposals.

18.3 Return on sales

Return on sales is calculated as trading profit divided by revenue.

18.4 Trading profit

Trading profit is defined as operating profit before separately reported items. The Directors believe that trading profit is an important measure of the underlying trading performance of the Group.

18.5 Headline profit before tax

Headline profit before tax is calculated as the net total of trading profit, plus the Group's share of post-tax profit of joint ventures and total net finance costs associated with headline performance.

18.6 Effective tax rate

The Group's effective tax rate is calculated on the income tax costs associated with headline performance, divided by headline profit before tax and before the Group's share of post-tax profit of joint ventures.

18.7 Headline earnings per share

Headline earnings per share is calculated by dividing headline profit before tax less associated income tax costs, attributable to owners of the parent by the weighted average number of ordinary shares in issue during the year.

18.8 Operating cash flow

Operating cash flow is cash generated from continuing operations before restructuring and additional pension funding contributions but after deducting capital expenditure net of asset disposals.

18.9 Free cash flow

Free cash flow is defined as net cash flow from operating activities after net outlays for the purchase and sale of property, plant and equipment, dividends from joint ventures and dividends paid to non-controlling shareholders, but before additional funding contributions to Group pension plans.

18.10 Average working capital to sales ratio

The average working capital to sales ratio is calculated as the percentage of average working capital balances to the total revenue for the year, using constant foreign exchange rates. Average trade working capital (comprising inventories, trade receivables and trade payables) is calculated as the average of the 12 previous month-end balances.

18.11 Earnings before interest tax depreciation and amortisation ('EBITDA')

EBITDA is calculated as the total of trading profit before depreciation charges and amortisation of non-acquired intangible charges.

18.12 Net interest

Net interest is calculated as interest payable on borrowings less interest receivable, excluding any item separately reported.

18.13 Interest cover

Interest cover is the ratio of EBITDA to net interest.

18.14 Net debt

Net debt comprises the net total of current and non-current interest-bearing borrowings and cash and short-term deposits.

18.15 Net debt to EBITDA

Net debt to EBITDA is the ratio of net debt at the year-end to EBITDA for that year.

18.16 Return on net assets ('RONA')

RONA is calculated as trading profit plus share of post-tax profit of joint ventures, divided by average net operating assets, at constant foreign exchange rates (being the average over the previous 12 months of property, plant and equipment, trade working capital and other operating receivables and payables).

18.17 Constant rates

Figures presented at constant rates represent December 2014 numbers re-translated to December 2015 exchange rates.

19. Exchange rates

The Group reports its results in pounds sterling. A substantial portion of the Group's revenue and profits are denominated in currencies other than pounds sterling. It is the Group's policy to translate the income statements and cash flow statements of its overseas operations into pounds sterling using average exchange rates for the year reported (except when the use of average rates does not approximate the exchange rate at the date of the transaction, in which case the transaction rate is used) and to translate balance sheets using year-end rates. The principal exchange rates used were as follows:

	Income and expense Average rates		**Change**	**Assets and liabilities Year End rates**		**Change**
	2015	2014		**2015**	2014	
US Dollar	**1.5288**	1.6485	7.3%	**1.4738**	1.5573	5.4%
Euro	**1.3776**	1.2406	-11.0%	**1.3571**	1.2873	-5.4%
Chinese Renminbi	**9.6034**	10.1570	5.5%	**9.5681**	9.6624	1.0%
Japanese Yen	**185.0659**	174.0868	-6.3%	**177.2981**	186.3777	4.9%
Brazilian Real	**5.0879**	3.8687	-31.5%	**5.8352**	4.1377	-41.0%
Indian Rupee	**97.9952**	100.4949	2.5%	**97.5631**	98.1566	0.6%
South African Rand	**19.4782**	17.8339	-9.2%	**22.7872**	18.0117	-26.5%

5 year history at constant currency

	2011	2012	2013	2014	2015
Revenue (£m)	**1,449.7**	**1,390.4**	**1,366.0**	**1,407.4**	**1,322.0**
Steel	946.8	932.8	935.4	968.5	897.6
Foundry	502.9	457.6	430.6	438.9	424.4
Trading Profit (£m)	**150.1**	**112.2**	**127.8**	**142.3**	**124.0**
Steel	91.7	76.0	84.9	99.0	79.5
Foundry	58.4	36.2	42.9	43.3	44.5
Return on Sales	**10.4%**	**8.1%**	**9.4%**	**10.1%**	**9.4%**
Steel	9.7%	8.1%	9.1%	10.2%	8.9%
Foundry	11.6%	7.9%	10.0%	9.9%	10.5%