

Delivering Growth and Investing in Excellence

2018 Element Materials Group Limited

Consolidated Financial States and Annual Report

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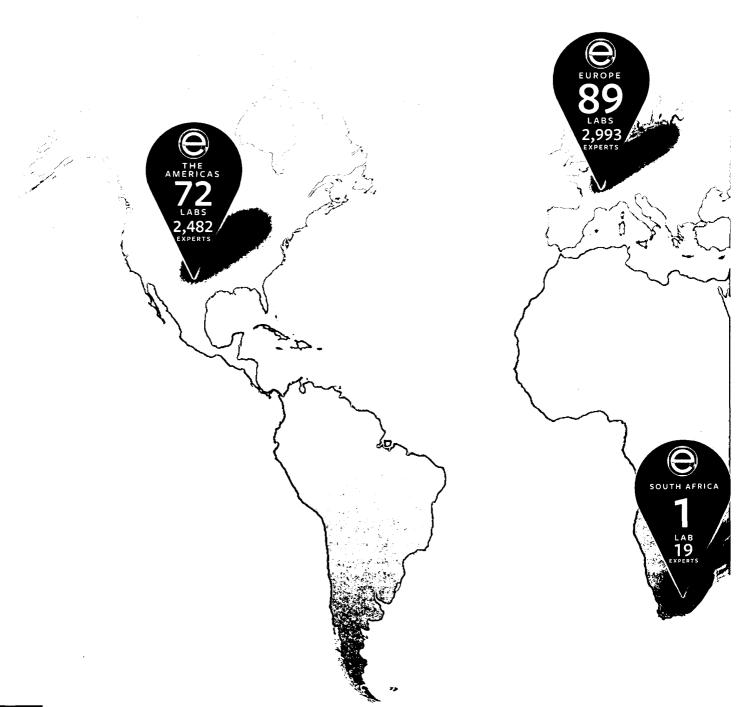
OF DELIVERY

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EMG Companies House Registration Number: 09915743 Vikram Nanda, Principal Metallurgical Engineer, Abu Dhabi @ diemen



Eight years of unbroken growt





2018 highlights

30%

GROUP REVENUE

CAGR
(2010-2018)



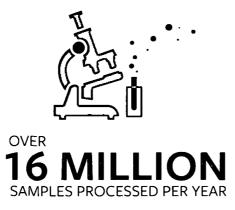




Contents

About Element	
Strategic Report	
- Chairman's Report	20
- CEO Review	24
- CFO Review	28
- Corporate Responsibility	3:
Our Sectors	30
- Aerospace	40
- Transportation & Industrials	4
- Fire & Building Products	4
Oil & Gas and Infrastructure	40
Excellence in Action	48
- Operational Excellence	50
Commercial Excellence	5
- Solving customer challenges	54
Our People	5
Acquisitions & Integrations	6:
- Exova Integration	64
- Global Acquisitions	6
Board of Directors	68
Executive Team	7
Director's Report	80
Principal Risks and Uncertainties	8:
Independent Auditor's Report	84
Consolidated Financial Satements	8
Notes to the Consolidated Financial Statements	9
Company Financial Statements	15
Notes to the Company Financial Statements	16
Director's and Advisors	16

Element in numbers





186 LABORATORIES WORLDWIDE

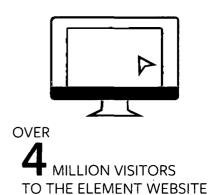






23 ACQUISITIONS







+5.2%

ORGANIC GROWTH (2018)



+45.6

NPS SCORE



6,500 TESTING EXPERTS





SUNDAY TIMES TOP TRACK 250 (UP 69 PLACES)





SUNDAY TIMES INTERNATIONAL TRACK 200

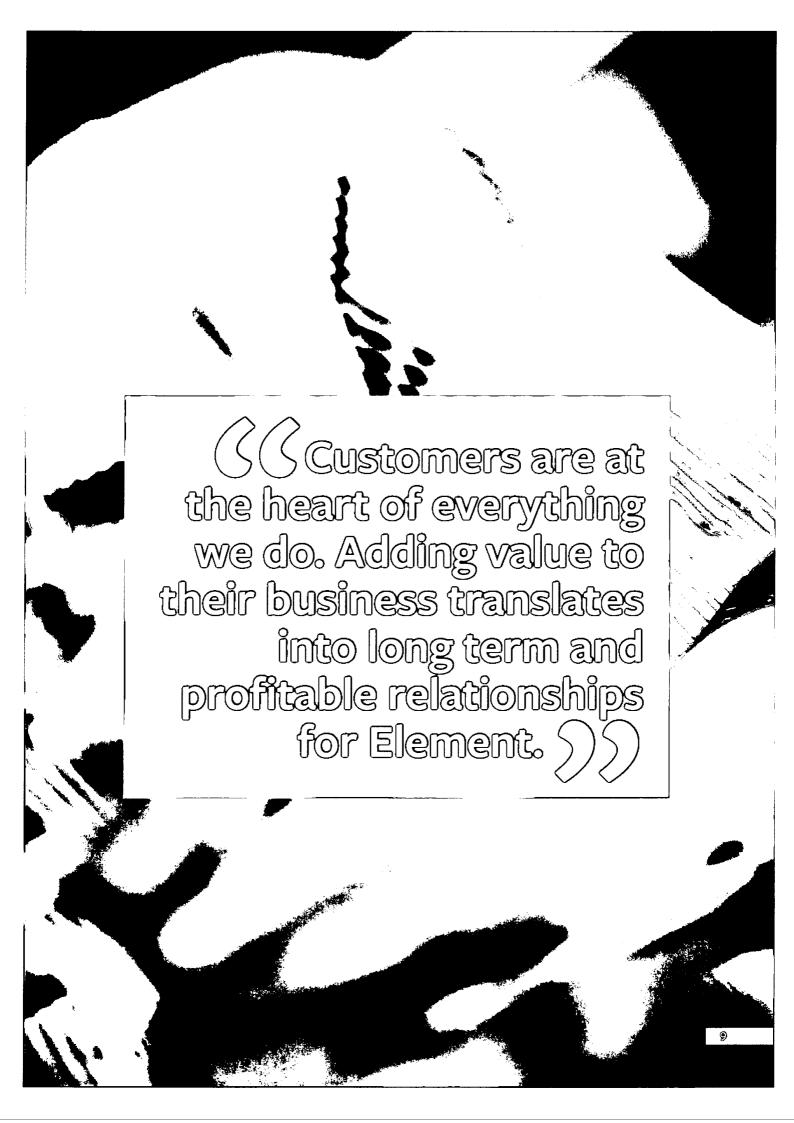


55% GROUP REVENUE GROWTH (2017-2018)



EXOVA LOCATION 4
REBRANDED EVERY DAYS

ABOUT ELEMENT World class testing pro



ABOUT ELEMENT World class Morddwide laboratories globally

4 sectors



AEROSPACE



TRANSPORTATION & INDUSTRIALS



FIRE & BUILDING PRODUCTS



OIL & GAS AND INFRASTRUCTURE

5 continents



THE AMERICAS



EUROPE



MIDDLE EAST & AFRICA



ASIA



AUSTRALASIA

5 services



MATERIALS TESTING



PRODUCT QUALIFICATION TESTING



CALIBRATION



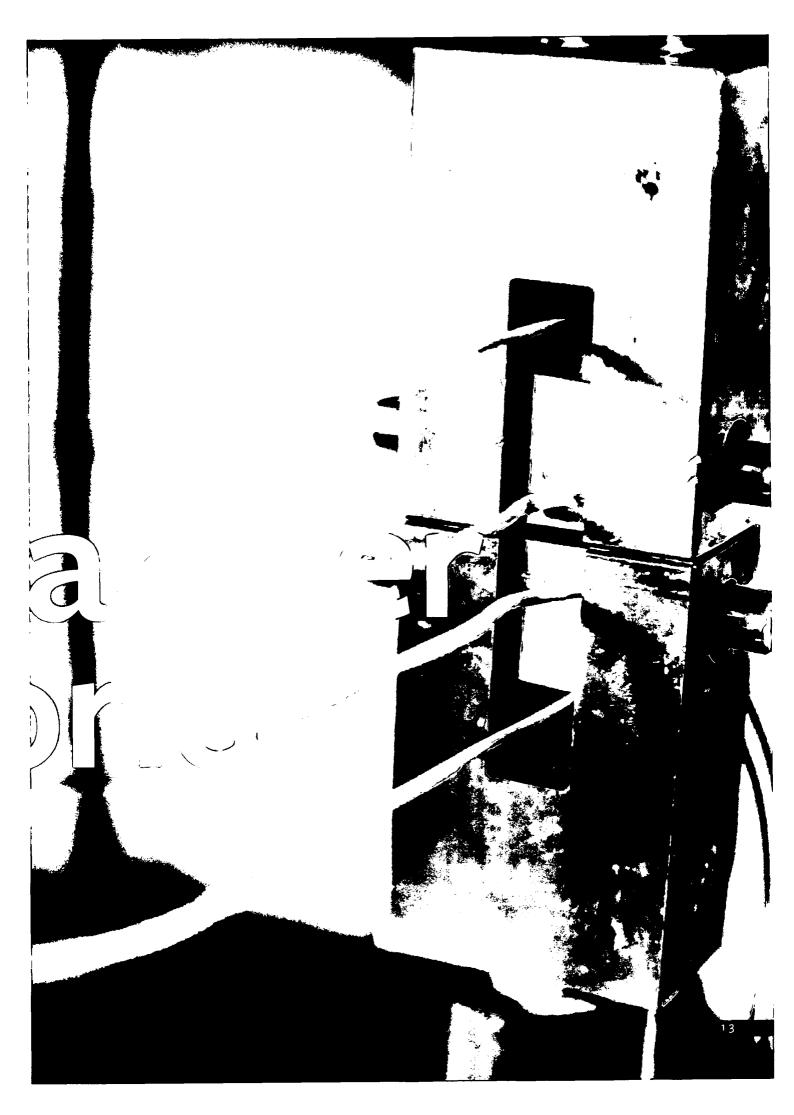
CERTIFICATION



ADVISORY

OUR MISSION:

The best testing p in the wo



OUR VISION

The world most true testing p

5120 artmer O U R PURPOSE:

to m e materia s ai iest, inspect and customers are st

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Certain

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a products we
certify for our
afe, quality,
t for purpose.



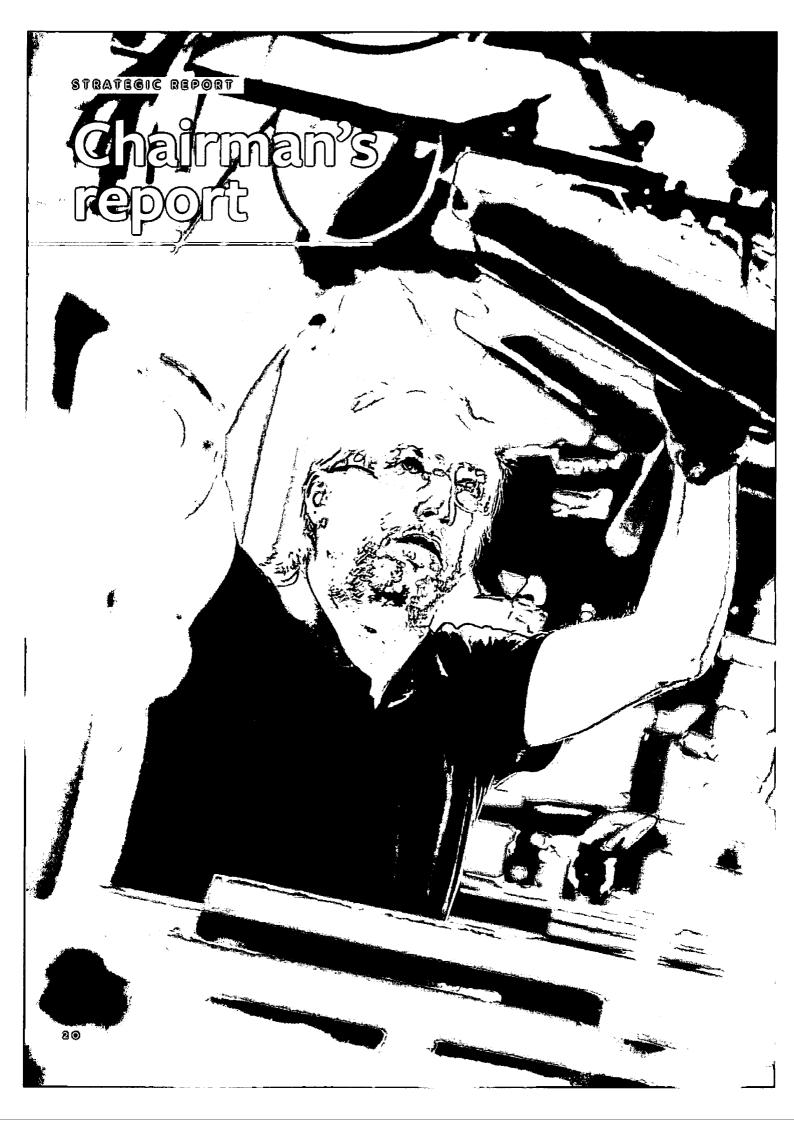


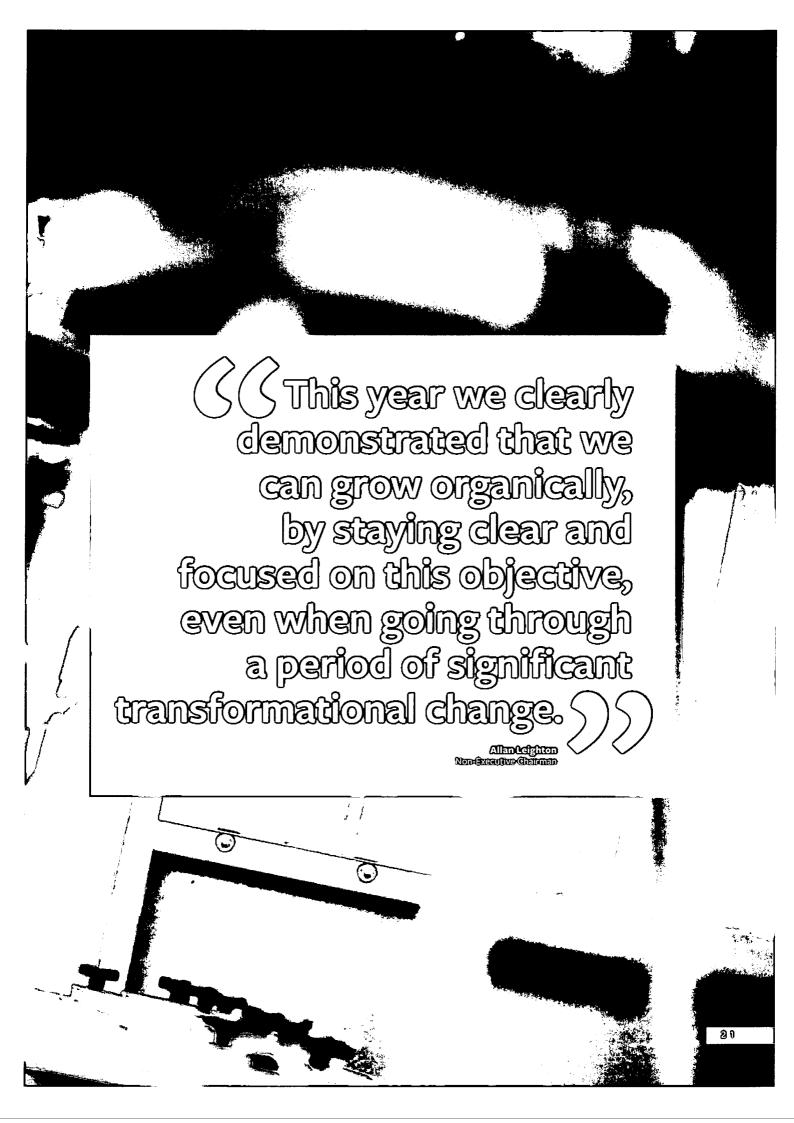
We set new standards of excellence in everything we do.

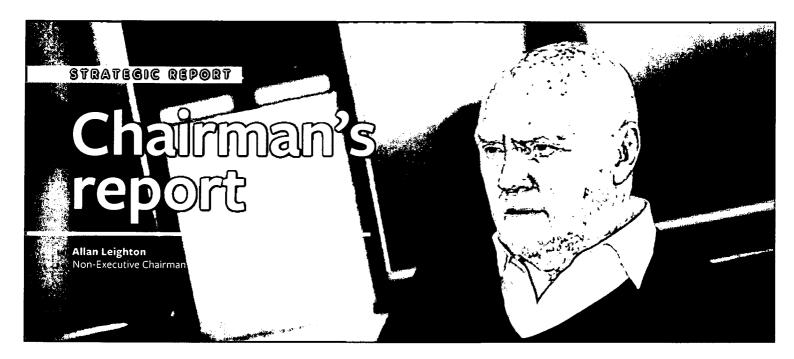




We work together for the benefit of our customers.







2018 has been a remarkable year for Element. At the start of the year, we set ourselves three clear objectives: to drive strong organic growth across the business; to attract, develop and retain our technical talent; and to make significant strides in delivering the integration and rebranding of the former Exova laboratories. I am pleased to say that we have made excellent progress on all fronts.

Growth

The focus of the entire organization in 2018 was to deliver strong organic growth; it is the single most important indicator of a company's performance and the real measure of how well we are delivering for our customers. This year we clearly demonstrated that we can grow organically, by staying clear and focused on this objective, even when going through a period of significant transformational change. This is a testament to the colleagues who deliver for our customers every day, but it also reflects the professionalism of our commercial organization and the actions that the team has put in place to generate new opportunities, harmonize sales processes and manage leads effectively.

As well as delivering strong organic growth, we continued to invest and grow through our M&A activities adding three best-in-class businesses to the Group in the US and Europe. Our acquisition program has enabled us to add significant scale and capability to better service our customers whilst integrating acquired businesses into Element remains a core strength.

People

We recognize that to be the best at what we do, we need to have the best people. Throughout the year, I have had the opportunity to join various meetings from budget planning sessions to leadership summits and have been impressed by the strong culture present across the organization.

Our management team has built a unique people-first, collaborative culture that always delivers on its commitments and where our passion for testing is demonstrated through our technical, commercial and operational excellence. I continue to be impressed by the technical expertise, professionalism and commitment shown by our colleagues when I visit our operations.

In 2018 we made significant progress with the Group's recruitment and retention strategies with plenty of work underway to improve the way that we develop, coach and interact with our teams. Our goal is to become the employer of choice in the TIC sector and make Element a company where colleagues can have long and rewarding careers.

I want to acknowledge the strong, decisive and capable leadership of our Executive team who have steered the Group through a period of rapid transformation and empowered our teams to deliver strong operational, commercial and financial performance throughout the year.

Integration

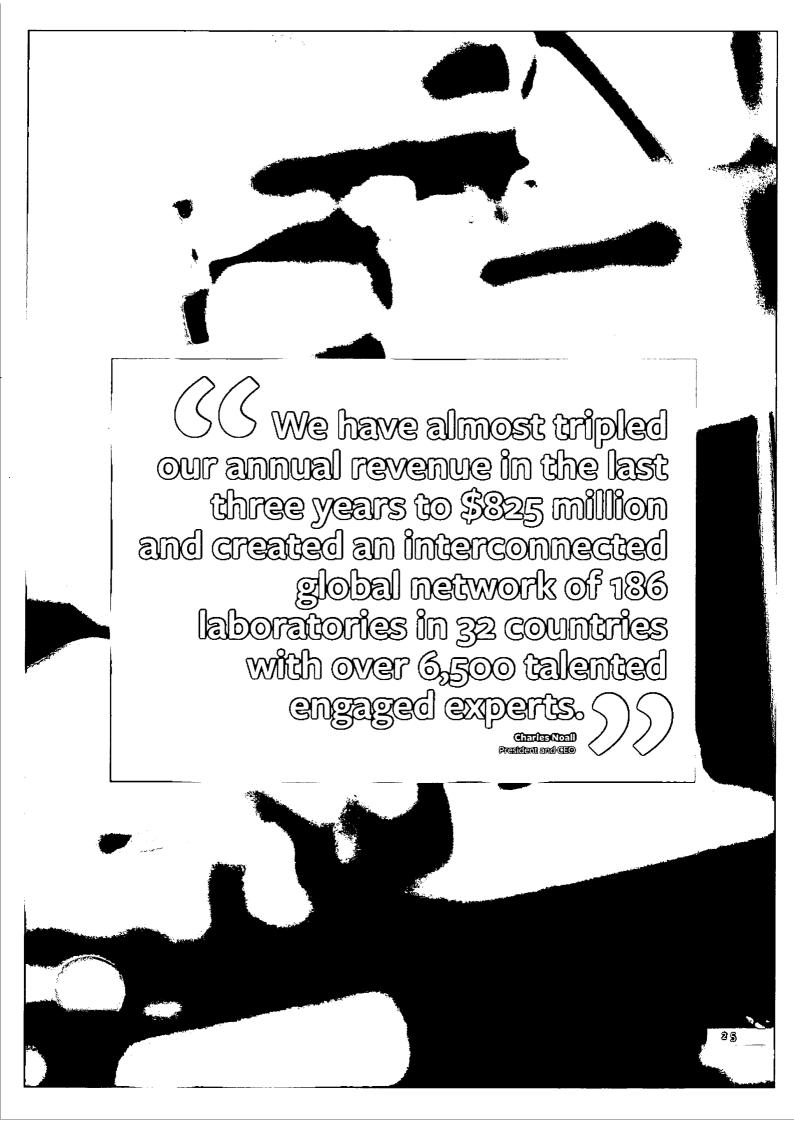
Our largest acquisition to date, Exova, has been a truly transformational transaction for the Group. Twice the size of Element and with a broader geographic spread, it has given us entry into new end markets and transformed our market positioning.

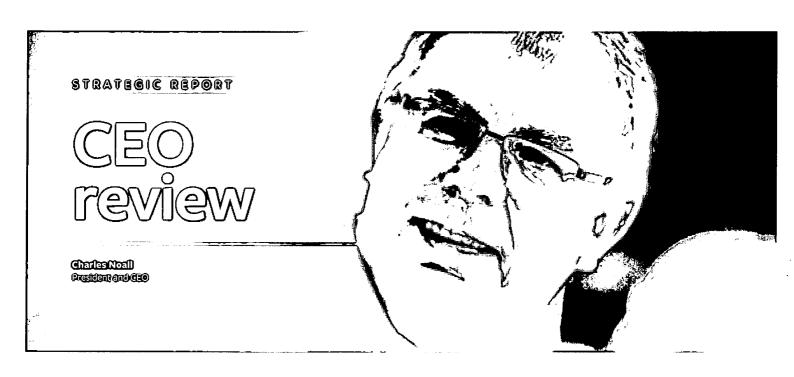
During the year, we successfully completed the integration of all of our Aerospace, Oil & Gas and Infrastructure, Fire & Building Products and Transportation locations. Including central function integration, 90% of our program milestones have been completed and even more impressively it means that, on average we have rebranded a location every four business days.

This outstanding achievement has been delivered with the upmost professionalism, utilizing our own colleagues whilst at the same time delivering significant synergy benefits. We have now laid the foundation to build a strong One Element culture as we start to think, act and behave as one company operating across nearly 200 laboratories.

With the Exova integration largely complete, an absolute focus on operational excellence will join growth and people as our core objectives for 2019. Maintaining our focus on these simple priorities will underpin another successful year and keep us on track to deliver on our vision and mission to be the best and most trusted testing partner in the world.







In 2018 the Group made significant strides towards achieving its mission and vision of being the best and most trusted testing partner in the world. We made progress on a number of fronts including an improved safety performance; posted significant growth both organic and through our strategic M&A program; made significant headway in becoming an employer of choice in the TIC sector; made excellent progress with the rebranding and integration of the former Exova laboratories; and further strengthened our financial position and investor base. The year also saw us further simplify our business model to focus on four core end markets by bringing together Oil & Gas and the Infrastructure division into one sector and merging our UK Environmental division with our existing environmental activities in North America, under the Transportation and Industrials sector.

Safety

Safety is our number one value and at the forefront of everything that we do. In 2018 the Group's safety performance continued to improve with recordable injury rates decreasing year-on-year by almost 25%, whilst working hours have steadily increased. We were delighted to see that 76% of our laboratories posted zero injuries or incidents during the whole of the year – a positive result as we strive to create an injury-free workplace. The year saw us deliver an improved incident management system, alongside record levels of participation in the annual Safety Climate Survey which showed steady improvement over prior years and the successful delivery of Safety Improvement Week at each of our locations.

Growth

Element delivered strong organic growth across the Group, with all four sectors growing year-on-year. The rise in organic growth can be contributed to the significant steps that have been taken to improve the Group's commercial processes. We have strengthened and invested in expanding our sales organization and significantly improved our sales data and analytics. The Group continued to strengthen its marketing activities with further investment in its inbound and outbound marketing teams and a renewed focus on search engine optimization.

Customer centricity is a key driver of strong and sustainable organic growth. By forging strong technical, operational and commercial relationships with our customers, we add value and efficiency to their businesses which translates into long-term and profitable relationships for Element. To this end, we expanded the remit of the Group's Global Strategic Accounts Program to encompass Strategic Accounts, Global

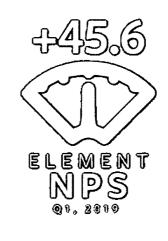
Key Accounts and Divisional Key Accounts across Element. We also launched an Integrated Testing Solutions program which will focus on delivering a range of more integrated testing services with some of our largest customers to further grow revenues, create value for our customers and develop true partnerships with them.

Towards the end of the year, the Group also restarted its Net Promoter Score (NPS) program to increase the voice of the customer in its decision making. We initially reached out to 5,000 customers who have given us an NPS score of +45.6 and we will continue to expand the program in 2019. With proactive communication often identified as an area for improvement from customers, we launched the Element Care Program to raise our standards of customer service and communication, with the goal that every customer facing colleague within the organization will complete the course.

We continued our strategic M&A activities with three further acquisitions: vohtec Quality Assurance GmbH (vohtec) in Germany, Orbit Industries, Inc. (Orbit) in the US and the direct lightning testing division of Cobham Technical Services Lightning Testing & Consultancy in the UK. The acquisition of vohtec and its four market-leading materials testing laboratories specializing in destructive and non-destructive testing, has given us a platform to expand our transportation capabilities in Europe. The acquisition of Orbit further expands our accredited NDT capabilities on the East Coast of the US to meet the significant demand for the inspection of parts from the latest generation of aero engines. In the UK, the acquisition of the direct lightning testing division of Cobham gives us the only commercial laboratory in the country with the capability to test aero-structures for the effects of direct lightning strikes (DO160/ED14 Section 23 testing).









People

The recruitment, retention and development of our technical experts was another top priority for the Group in 2018. Over the past 12 months we have implemented many of the building blocks that will help us achieve our ambition to become the employer of choice in the TIC sector. The year saw us launch a new best-in-class global recruitment solution, which helped us to add a staggering 774 new colleagues to Element in just six months. The Group launched its first global onboarding program, to provide all new members joining Element with a consistent and seamless on-boarding experience designed to support their success with the Group.

Providing career and development opportunities continued to be a priority and the year saw us refine our performance management processes and expand our career ladders program to include progression paths for every major role type. In 2018 we launched a number of global policies on matters such as diversity and inclusion, modern slavery and data protection amongst many others and expanded our training and development program to include more opportunities for leadership development alongside launching various operational and commercial excellence training courses.

We improved some aspects of our benefits programs and launched a comprehensive Group-wide program of recognition, under the name 'Element Excellence Awards', to recognize and reward those colleagues who go above and beyond in serving our customers, living our values or supporting other colleagues.

Integration

The acquisition of Exova in 2017, our largest acquisition to date, was a transformational transaction for the Group, adding over 4,000 engaged experts across 117 laboratories and expanding our geographic reach to 32 countries over five continents. A top priority for the Group in 2018 was to facilitate the integration of the two companies into one world class testing organization. The integration program has been delivered fully in-house and we successfully completed the integration of all central functions and our locations in Aerospace, Oil & Gas and Infrastructure, Fire and Building Products sectors and Transportation division–rebranding one location every four business days.

Alongside the rebranding of locations, the Group delivered a number of large and strongly synergistic integration projects to better organize the existing laboratory footprint or integrate overlapping operations in the same geographies to improve operational efficiency and customer service. We have now completed major projects in Aberdeen, Manchester and Daventry in the UK. In North America, we have consolidated the Daleville environmental activities into Fort Wayne, the Mississauga aerospace fatigue activities into Cincinnati and we are close to completing a large-scale project to combine the activities in our Houston laboratories. On the West Coast of the United States, we have integrated the Anaheim activities into Los Angeles and Santa Fe Springs into Huntington Beach creating two centers of excellence in destructive testing and composite testing respectively.

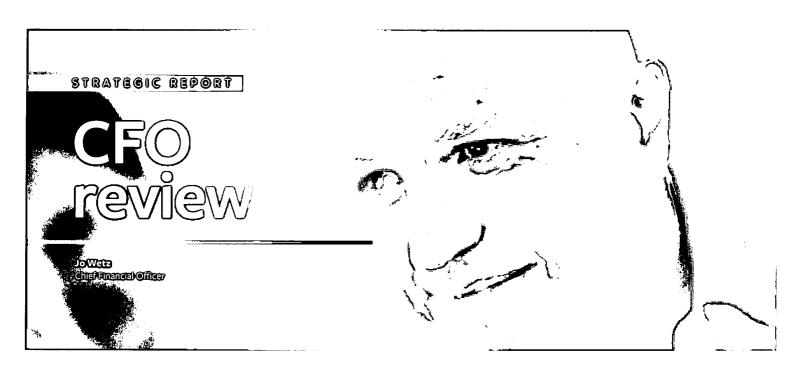
In the first quarter of 2019, we will complete the rebrand and integration of our remaining locations in the Industrials, Health Sciences and Environmental divisions and deliver the reorganization of our Sheffield aerospace laboratories.

In 2018 the success of our growth strategy and excellent operational and financial performance was recognized with a top 40 ranking in the Sunday Times Top Track 250 and a debut listing in the Sunday Times HSBC International Track 200. Towards the end of the year, the Group was able to secure a highly successful refinancing deal that was significantly oversubscribed, an example of our investor base continuing to support our strategy.

In 2019 we will continue to focus on three clear areas that will take us further towards becoming the world's most trusted testing partner. We will focus on attracting, retaining and developing our people, pursuing our growth strategy and driving operational excellence throughout the organization.







Group revenue for the year grew by 55%, to US \$825 million from US \$533 million in FY2017, reflecting both the full year impact of Exova revenue in 2018, as well as continued strong organic growth of +5.2% on a constant currency basis. Adjusted EBITDA increased by 51% to US \$236 million, benefitting from the full year contribution of Exova trading performance and the impact of further significant integration synergies realized in the year.

Our financial performance in 2018 reflects both the success of the operational integration of Exova, continual excellent organic growth and strong returns from three other acquisitions made during the year. Operational integrations and synergy included location consolidation as well as management delayering, both of which contributed to the improvement in EBITDA and we expect further positive benefits to be realized in synergy savings through 2019.

In line with the Group strategy, we continue to target acquisitions that add capacity, capability, and benefit for our customers and operations, resulting in continued sustainable growth. In the second half of 2018, we made three acquisitions, all with strong IP and market leading positions in the Aerospace and Transportation sectors. The two significant acquisitions, Orbit Industries and vohtec made strong significant post acquisition contributions to our trading performance.

In 2018 the Group completed a successful refinancing securing a further US \$500 million in a combined senior second lien and PIK refinancing package. The new refinancing was significantly oversubscribed reflecting confidence in the Group's performance and increased the Group's overall committed credit facility to US \$1,795 million. At the end of the year the group had over US \$375 million in committed and undrawn facilities and cash available on the balance sheet, providing stability and flexibility to reinvest for growth and pursue strategic acquisitions.

Net finance costs of US \$186 million, were down by US \$28 million compared with last year, reflecting favorable foreign exchange movements in the year.

We delivered a strong cash performance in the year, with our focus on working capital leading to an increase in operating cash flow to US \$176 million* and strong cash operating cash conversion* of 75% despite the cost of significant integration activities. The Group's ability to convert operating profits to cash allows us to invest in key capital projects that directly support our customer's growth through dedicated outsourcing facilites with leading technology and highly competent testing experts.

Measuring Group Performance

The Group continues to use adjusted EBITDA to assess its performance and this is referred to throughout this Annual Report in the discussion of the performance of the business. EBITDA is not defined in IFRS but is used by the Board to assess the underlying operational performance of the Group and as such, the Board believes this is an important performance measure and should be considered alongside the IFRS measures. EBITDA represents operating profit before, depreciation, amortization, transaction, acquisition and other non-recurring costs.

^{*} Operating cash flow excludes the impact of \$11.2 million pension deficit funding contributions in 2018.

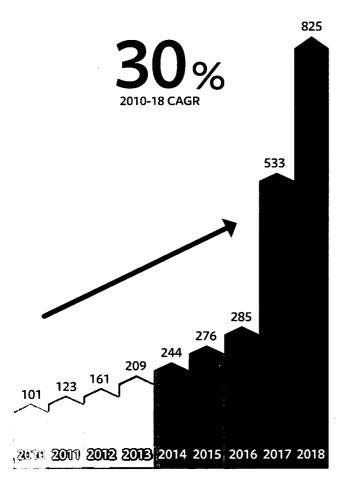
Eight years uninterrupted growth

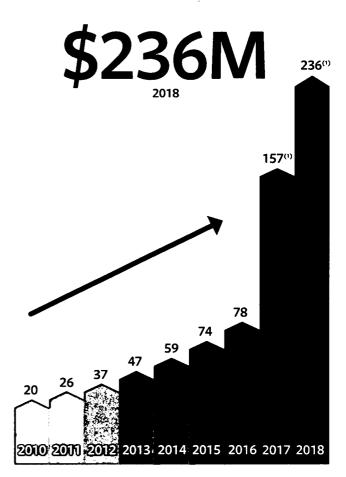
Revenue

(actual rates \$m)

Adjusted EBITDA⁽²⁾

(actual rates \$m)





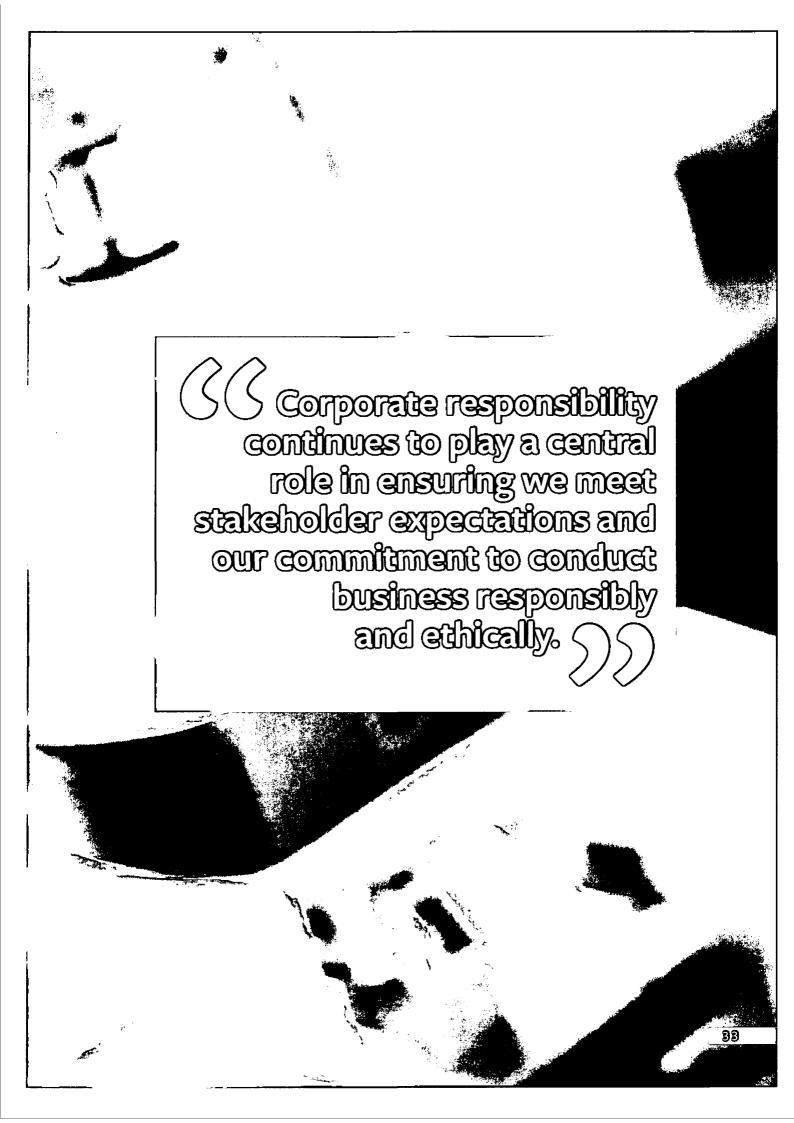
²⁹ The Directors' view of adjusted EBITDA is defined in note 2.27 of the accompanying accounts



⁽¹⁾ Restated for IFRS 16 transition impact

STRATEGIC REPORT

Corporate responsibility





Our approach to corporate responsibility is founded on Element's values; Safety, Integrity, Excellence and Partnership. 2018 has seen the business mature and grow exponentially, with Corporate responsibility continuing to play a central role in ensuring we meet stakeholder expectations and our commitment to conduct business responsibly and ethically.

Element's approach to corporate responsibility is incorporated into our business decision-making and is based on a framework that identifies and addresses Environmental, Social and Governance (ESG) matters. In 2018, we developed a Corporate Responsibility policy that confirms our commitment to integrate an ESG framework into our business practices and to demonstrate our application of regulatory best practice consistently across all the jurisdictions that we work in.

We also recognize the importance of continuously developing our ESG framework; we achieve this through established internal processes, oversight and reporting so that corporate responsibility is reviewed and discussed at Executive and Board level. Through this approach we seek to ensure that we conduct business in a way which is consistent with our values, whilst delivering sustainable growth and strong financial performance.

Environmental

We are committed to conducting our activities in an environmentally sustainable way and actively work to reduce any negative impacts of the Group's operations on the environment. Element has an established Safety, Health and Environmental (SHE) program, which supports the delivery of business objectives while ensuring the safety and well-being of all our people and locations. Through this program, we implement systems and processes that drive a strong SHE culture across the organization and help ensure compliance with relevant legal requirements.

Periodic environmental audits are conducted across Element locations through which we demonstrate compliance with local environmental regulations at site level. We have policies in place to ensure compliance with all applicable environmental laws and regulations, appropriate to the countries in which we work. Through this approach, we demonstrate that we are responsible local partners and that we actively manage any impact our operations have on local communities. Our ambition for 2019 is to start tracking some key metrics that will demonstrate our environmental commitments.

Social

Element is defined by its people and we are committed to supporting all colleagues across the Group through programs which keep them safe, healthy, engaged, recognized and rewarded.

Safety is our number one value and we are committed to conducting our work in a socially responsible and sustainable manner that protects the health and safety of all our team members, visitors and the communities in which we operate.

Element is committed to implementing effective systems and controls to protect our people and to create a safe and supportive working environment. We run global initiatives to ensure that everyone understands the desired SHE culture in the organization that helps us work towards having an injury and incident-free workplace. An important achievement in this area was having 76% of our locations being incident free in 2018.

We held our annual Safety Improvement week, a key initiative where the business dedicates time to improvement activities focused on safety. This year the event also saw the introduction of a new group-wide SHE system. We have also seen great collaboration with the operational excellence team around workplace safety, marked by the wider roll out of 5S (creating structured and well organized working environments) and the Group-wide introduction of accountability based on daily safety, quality, delivery and cost (SQDC) meetings.

We ensure colleagues are treated fairly and equally. Our Diversity and Inclusion policy, supported by a range of associated programs, enhances the work we already do to deliver a working environment that is respectful, engaging and creates opportunities for all. Established performance management processes and an colleague recognition program means that colleagues know what is expected and what is recognized for strong performance.

This is complemented by our Modern Slavery policy which defines our approach to the risks associated with slavery issues. Through our Supplier Code of Conduct, we make clear to our subcontractors, consultants and suppliers that they too must maintain effective systems.

Governance

As one of our core values, Integrity is reflected in the company's culture of ethical behavior. We conduct business activities in a large number of jurisdictions across the world and operate in a wide range of legal and business environments. Our commitment to integrity ensures that consistently high standards are maintained.

Element has in place the necessary governance and organizational structures to provide appropriate levels of oversight in audits, risk management and potential conflicts of interest. This is supported by the appointment this year of a Group Internal Audit Director to lead a dedicated internal audit function which has significantly enhanced the review and governance of our operations. We have established policies that underpin our values and reflect our commitment to conducting business with honesty and integrity wherever we operate. These policies range from anti-bribery and corruption to trade compliance and whistleblowing. Policies are widely communicated and reinforced through targeted programs and training, as required, to ensure they are understood and adopted.

We provide a confidential whistleblowing service across the Group which supports our Whistleblowing policy. This service is managed by a specialist third party provider, giving colleagues the opportunity to raise concerns relating to health and safety, labor practices, unethical conduct, environmental concerns and other matters. Reports are investigated and outcomes reviewed by senior management and the Audit Committee.

Communications

With the expansion of our global footprint as well as the maturing of the company, Element's communications program has grown in both its scope and ambition, speaking to much larger audiences, internally and externally. We continue to evolve the Element brand and implement it across our business, as well as communicating the value of working in partnership with Element to our clients. Our emphasis on delivering a regular stream of messages to the sectors we serve has helped us to drive more engagement with our clients and drive new inquiries into the business.

With a diverse team spread across 186 laboratories and offices worldwide, the effectiveness of our communications is key to ensuring that all our people are aligned with the business strategy and are fully aware of the role

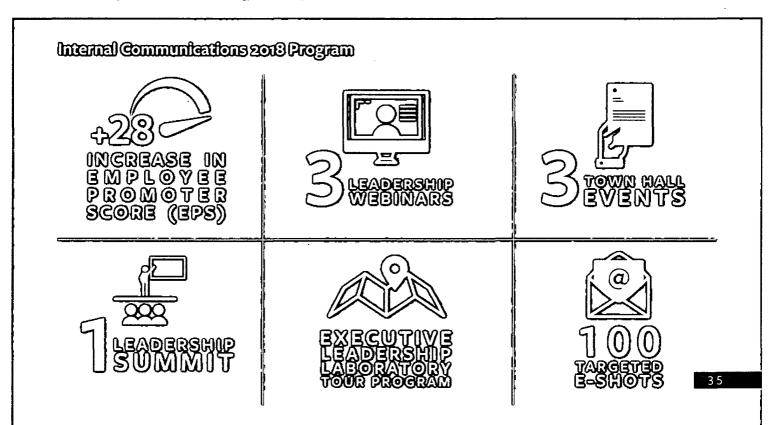
that they play in making Element successful. We continued to develop our internal communications program, with an increased focus on better targeted messaging for teams across the business. We recognize that colleagues who are aware and knowledgeable about the business and its progress are more likely to be better engaged. Colleagues have benefited from a regular stream of communications with a strong intent to keep our people informed, engaged and empowered.

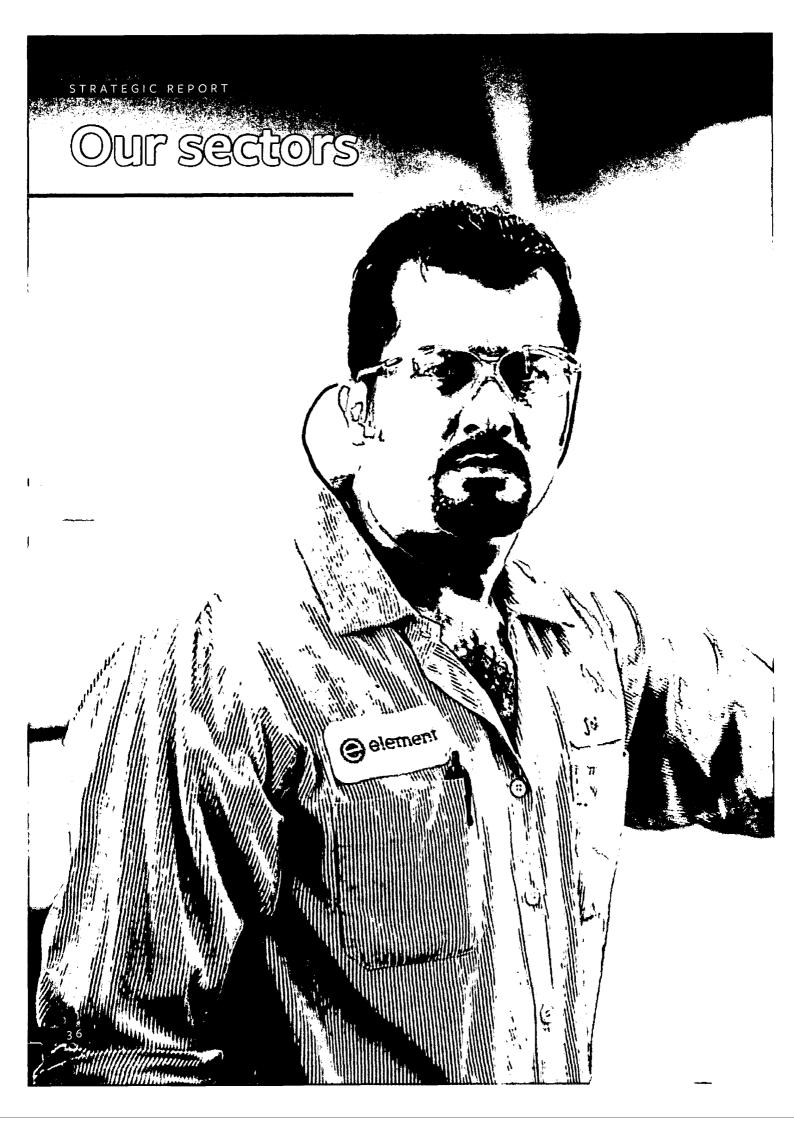
We have continued to measure our communications effectiveness and are adept at using this insight to improve what we do. We have made a conscious move towards more targeted communications to internal audiences and we are already seeing significantly higher open rates this year. We have used regular leadership sessions and town halls to embed revised brand positioning that reflected the combined business, as well as to confirm the organization's purpose and to update colleagues on progress in relation to growth, people and integration.

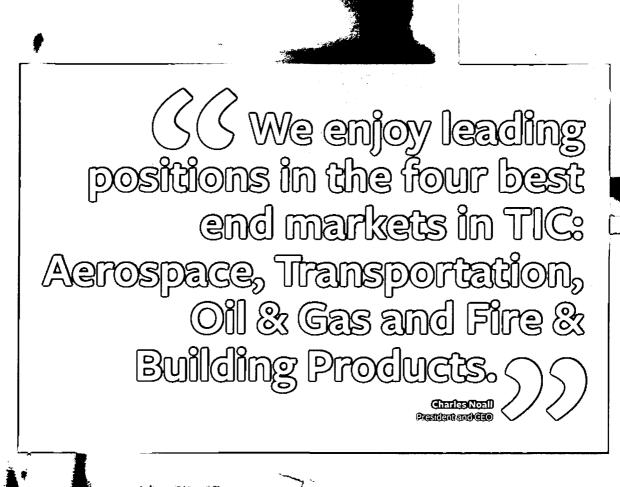
In June 2018 we also brought together almost 300 of our senior leaders from across Element and Exova to share our vision for the organization, stimulate collaboration and build networks. A range of sector/ divisional and functional leadership meetings were also held, all of which brought our internal community together. Communications counsel and support has also been provided for projects where we consolidated operations or moved people and equipment, a regular requirement in our continuously growing business.

Through the continuous development of our external communications and PR program, we have achieved an increase in the number of news releases distributed to trade publications and the international media. This has ensured that we continue to maintain and enhance our well-established profile as the acknowledged industry expert in the TIC market.

We consolidated and refreshed our social media platforms, doubling the number of followers on LinkedIn from 6,000 in January to 12,000 by the end of the same year, extending our reach to our stakeholders in the social business community. To support our colleagues with the management of their external stakeholders and enhance the value of their engagement with them, we created and distributed a number of tools including a Group media policy, refreshed social media guidance and a guide to explaining how Group Communications can help promote business successes.







Our sectors by revenue

26% TRANSPORTATION & INDUSTRIALS

We support our customers and their supply chain partners to get their products to market on time, every time. In transportation, we help our customers to make their vehicles lighter, faster, stronger and more efficient as well as navigating the needs of customers transitioning from combustion to EV and atonomous vehicles. In Industrials, we provide the testing that manufacturers need to meet regulatory, industry, or corporate quality goals, whether for an assembled product, a component, raw materials, or the finishing touches.



17% OIL & GAS AND INFRASTRUCTURE

In Oil & Gas, we test both metal and polymer based materials to ensure that the components, systems and products they are part of, can be trusted to function consistently and continuously for many years within the increasingly extreme and challenging environmental conditions they need to operate in. Our multi-disciplinary infrastructure testing laboratories and consultancy services support infrastructure and construction customers to build the most technically demanding and iconic projects across the Middle East and Asia.

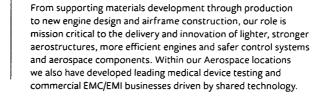


12% FIRE & BUILDING PRODUCTS

We provide fire and building products testing, inspection, assessment and advisory services, alongside product, supply chain and management systems certification. Our experts help our customers achieve regulatory compliance, market entry and competitive advantage.



45% AEROSPACE









The Aerospace sector delivered strong growth, both organic and inorganic, due to a continued program of strategic investments; the development of new technologies; the successful delivery of large synergy projects; and the continued rise in production of aircraft and aero engine components. The sector doubled its organic growth rate compared with 2017, as the rise in demand for non-destructive testing (NDT) services, especially for immersion ultrasonic (IUT) and digital radiography continued.

In 2018, we further strengthened the Group's leadership position in NDT with the acquisition of Orbit in Cleveland, OH, a testing specialist in ultrasonic, liquid penetrant, magnetic particle and chemical processing. In the UK, the acquisition of Cobham Technical Services Lightning Testing & Consultancy provided us with the only commercial laboratory in the country with the capability to test aero-structures for the effects of direct lightning strikes.

Investments in technology and capacity saw us open an IUT department, offering the full suite of NDT testing including etch and penetrant, in our Monterrey, Mexico facility to complement the full suite of destructive testing already available. We also invested in acquiring additional IUT and digital radiography capability in our Sheffield, UK and Houston, US laboratories.

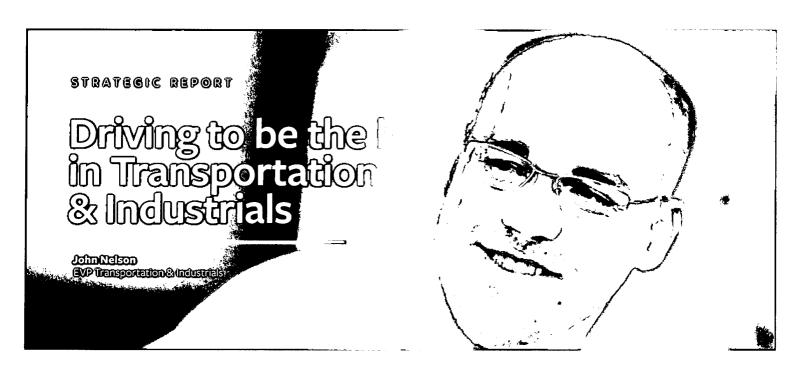
2018 saw the Group deliver a number of large integration projects as we pooled capacity, capability, approvals and technical knowledge to form several centers of excellence to provide our customers with a more efficient and higher quality service. In California, we integrated the Santa Fe Springs laboratory into Huntington Beach to form a centre of excellence in destructive testing; Anaheim into Los Angeles to form a centre of excellence in composite testing and we moved our Mississauga (Canada) fatigue department into Cincinnati to form a center of excellence for fatigue testing. We also integrated our three laboratories in Sheffield into one laboratory that specializes in both destructive and non-destructive testing services and we merged our two existing laboratories in Melbourne, Florida into a new 20,000 square feet, state-of-the-art facility specializing in environmental, dynamics and electromagnetic interference (EMI) testing.

We continued to significantly invest behind some of our largest customers. 2018 saw the first successful full year of operations of our Hillsboro NDT laboratory, a large digital radiography facility servicing PCC. We started building a new NDT facility in Piedmont, South Carolina, expected to be completed in 2019, that will specialize in IUT, etch and penetrant services for GE, Pratt-Whitney and Arconic. We added 50% capacity to our destructive testing services in Charlotte, North Carolina to service Arconic and Pratt-Whitney and we made great progress on the construction of a new destructive testing laboratory in Shanghai, China to better service our customers in the Asia-Pacific region.

2018 was also a successful year for the integration and rebranding of all of the former Exova aerospace laboratories globally. As the sector grew, our focus on the recruitment, retention and the further development of our engaged experts continued to yield positive results as we created new opportunities with the recruitment of leading technical experts and internal promotions.

Looking ahead to 2019, we expect to see the investments and progress that we made this past year yield positive results. We will continue to invest in upgrading our testing capabilities and increasing geographic reach with the launch of our laboratory in Shanghai and a new in-house laboratory in Suzhuo, China. We will also focus heavily on driving operational excellence across the sector to help us increase efficiency and deliver a world-class service to our customers.





The Transportation & Industrials sector posted strong growth, delivering high single and double digit organic growth across most of its divisions. Element's strategy is to simplify the business and make certain market opportunities are captured across the Group.

Transportation Division

The Transportation division delivered comparable revenues to prior year despite project delays and cancellations by OEMs and an overall uncertain industry, as it looks to counter the financial impacts and uncertainty of tariffs, increased regulations and Brexit. In addition, the automotive industry is in a transitional period as all OEMs and their suppliers look to align their strategies to the future focusing on electrification, autonomous vehicles and ride sharing.

The year saw us complete the acquisition and start the integration of vohtec, a leader in NDT and materials testing to the German automotive industry, a move that significantly strengthened our European transportation footprint. We are now partnering with European OEMs to not only support their current testing activities, but to also understand how we can invest behind them as we continue to build our European transportation testing platform.

We continued investing in the capabilities and technical expertise required to help OEMs and their suppliers to deliver lighter and increasingly autonomous vehicles to the market, whilst also meeting the regulatory standards to improve the average fuel economy of cars and light trucks, by delivering more electric and hybrid vehicles.

We invested in additional software and capacity to support our battery laboratory in Detroit, which had a strong year due to numerous launches from OEMs introducing electric vehicles to the market.

The Group also made several investments in its Detroit laboratories to support testing of the entire cab of the vehicle, including buzz squeak and rattle (BSR) and multiaxial simulation table testing (MAST). As OEMs move towards introducing more autonomous vehicles, the interior of the vehicle, including seating and safety around its seat positioning, is becoming more important and the Group continues to make investments to support this growing market.

We made further investments in mechanical and fatigue testing capacity at our Wixom location, as several large projects, focusing on the mechanical structure and new materials that are going into vehicles to make them lighter, came to fruition.

Industrials Division

The Industrials division had a very strong year of growth with revenue and EBITDA both significantly above budget and compared with the previous year. The strong showing was due to record performances at our New Berlin and St. Paul laboratories, with consistent performances across the rest of the Group. In New Berlin growth was driven by several large projects in polymer and metallurgical testing, whilst wind farm testing and NDT were the main contributors of growth in St. Paul.

Driving commercial excellence across the Industrials division was a key priority for the Group in 2018. We reorganized the commercial team, appointing a sales director, to bring focus, speed and standardization across the division and ensure a customer centric approach. We streamlined our engagement strategy with customers to provide timely support and follow-up, as well as to better understand their strategy and direction so we can better support them going forward. This commercial focus has yielded positive results, with an increase in market share with our existing customer base, as well as numerous new opportunities across most of the Industrials laboratories.

Environmental Division

The Environmental division delivered strong growth with revenue and EBITDA outperforming last year's figures.

In Europe, divisional performance was exceptional with stack emissions, asbestos and occupational hygiene all performing strongly. The Group was successful in the rebid of its contract with Magnox to deliver asbestos monitoring and consultancy services across 12 nuclear power stations for a further three years. The contract, alongside the successful integration of the air quality testing business of Northumbrian Water, were two of the main drivers of growth for the stack emissions and asbestos businesses, whilst a focus on commercial excellence drove growth in the occupational hygiene business.

In North America, the Environmental division also grew when compared with the previous year, with particularly strong performances in our Western Canadian laboratories due to a significant number of new contracts won and growth with existing customers.

A clear go to market strategy focused on service and value proposition enabled Environmental North America to acquire market share from competitors and further increase share of wallet with strategic environmental customers across Canada and the US.

Health Sciences Division

The Health Sciences division had a notable year delivering revenue and EBITDA significantly above the previous year. A key contributor to growth was the division's renewed focus on commercial excellence which led to increased analysis work within the quality testing and pharma chemical groups in the Mississauga Health Science laboratory and an increase in metals testing, gas chromatography-mass spectrometry and wet chemistry work at the Santa Fe Springs Pharma facility—helping both locations deliver record performances.

Our recently launched extractables and leechables service line also yielded strong growth in its full year of operations. The year also saw us complete the integration of SL Pharma, an acquisition made the previous year, into the business.

Integration of the former Exova laboratories across the sector was a key focus for 2018. We completed the successful integration of all of our Transportation laboratories and began work on rebranding the Industrials, Environmental and Health Sciences laboratories in the first quarter of 2019.

Looking ahead to 2019, we will continue our focus on delivering commercial, operational and technical excellence for our customers and leveraging our cross-selling capabilities and expertise across the sector to increase organic growth.

Transportation
& Industrials
Highlights
2018

STRONG ORGANIC GROWTH

SUCCESSFUL SECTOR ACQUISITION

MAJOR
INVESTMENT
MADE IN
TECHNOLOGY
CAPACITY &
PEOPLE

COMPLETED
REBRAND FOR
ALL EXOVA
TRANSPORTATION
LABORATORIES





The Fire and Building Products sector delivered market-leading, double digit growth as a result of strong market demand; further strengthening of its technical leadership position; and continued investment in capability, capacity and further accreditations.

In 2018 we continued to strengthen our technical leadership position by successfully recruiting additional technical experts in all geographies. This has further strengthened our unique service proposition, providing highly complex technical consulting, certification, testing and inspection services within one company. As a result, we have seen our customers expand the number of services they utilize driven by greater awareness of the resulting landscape and also an increasingly complex compliance environment.

The recognition of our technical leadership position was evident with an unprecedented demand for our technical training programs and certification related services. There is a growing importance and requirement for quality assurance through the building life cycle and our services are focused clearly on providing this assurance.

Our technical competence was further strengthened with additional accreditation in the areas of management systems and fire consulting with accreditation achieved as a House of Expertise in Dubai.

Investment continued throughout 2018 adding capacity, scope and upgrading existing equipment, with record levels of utilization seen in

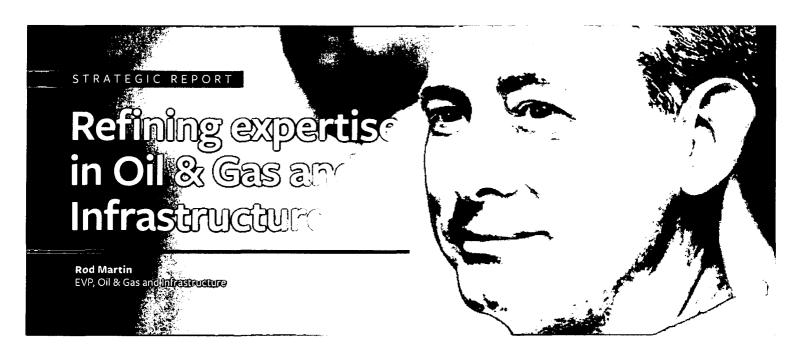
large scale fire and adjacent mechanical, security, acoustic, weathering and thermal testing for a wide range of products and materials. This has enabled us to meet increasing demand, expand our reach and provide the platform to continue the above market growth we have seen in the last seven years.

2018 was also a successful year for the rebranding and integration of the sector. The brand names of Warringtonfire, BM TRADA and FIRA International have international recognition from the broad customer base comprising of manufacturers, specifiers, designers, regulators, local and national government departments and therefore rebranding has focused on refreshing the brand appearance and reinforcing the connection to the Group, whilst maintaining the individual brand strength of each business.

Looking to the future, the pace of change in regulation is likely to accelerate as evidenced by revised building regulations in our core geographies of Europe, Middle East and Australia. The sector will continue its focus on increasing our technically complex capacity and scope, as well as driving operational excellence to provide best-in-class service for our customers.







The Oil & Gas and Infrastructure sector delivered a strong year of growth with revenue and EBITDA performing ahead of budget. The year saw us align and simplify our structure by incorporating the Infrastructure division with the Oil & Gas sector. The multi-disciplinary nature of the infrastructure laboratories in the Middle East and Asia, alongside their focus on oil and gas related infrastructure projects, provided us with an opportunity to improve the focus on our core end markets, further refine the proposition to our customers and bring all oil and gas operations under one sector.

2018 saw the successful rebranding and integration of all former Exova laboratories across the sector. The enthusiasm of new colleagues who joined via the integration was a particular source of pride as the sector is now the most demographically and culturally diverse in the Group.

Oil & Gas Division

The Oil & Gas division returned to growth for the first time in three years, delivering revenues ahead of budget and posting very strong EBITDA margins. The positive performance was due to the beginnings of a recovery, in the second half of the year, of the oil and gas market and strong operational performance across the division as the synergies created from integration projects began to take effect.

2018 saw us create scale and efficiencies in capability closer to the world's major oil and gas operations to better serve our clients across the globe. We successfully implemented the division's strategy of developing capabilities around four technology themes: coatings, corrosion, fracture mechanics & ECA and non-metallics by creating full service offerings in Scotland, Europe and the Americas. In addition, we were able to strengthen the oil and gas operations in our multidisciplinary laboratories in the Middle East, India and South East Asia.

In Scotland, our newly created center of excellence in fatigue and fracture testing delivered significant growth reflecting a recovery in our customers end markets. Integration projects, to create scale and efficiency, saw us move the fatigue and fracture department from Daventry into Aberdeen and the coatings department from Manchester to Edinburgh to create a full service offering for our customers in Scotland. The integration of our two laboratories in Houston has also created a full service offering, with increased scale, to our North American clients.

As well as investing in creating Centres of Excellence across Europe and the Americas, 2018 saw the opening of a new oil & gas laboratory in Singapore, which offers specialized metallurgical and fracture toughness testing for our customers in the Asia Pacific region. In 2019 we will continue to invest and establish further Centres of Excellence in the Middle East to better service our customers in the region.

In 2018 the Group won several large projects as we continued to gain market share from the competition. We started work for the Mad Dog Phase 2 project, the second stage of development of the Mad Dog offshore field operated by BP, which will continue well into 2019. We also won a contract to provide testing for the Trans Mountain Expansion Project in Canada and secured a contract with ENGIE Fabricom to undertake pipe induction bend testing for a heavy oil development program in Kuwait.

Our strategy to provide integrated testing solutions to our customers, supporting them with both on-site and off-site testing, continued to yield results. We won a three year contract with TechnipFMC, to provide on-site NDT services alongside off-site testing and research and development, for its umbilical manufacturing site in the UK. We also won a five year contract with Qatargas to provide both on-site and off-site materials testing and failure analysis services from our laboratory in Qatar with further support from our laboratories in Italy, The Netherlands, UK, and Singapore.

The division's diversification strategy continued to yield strong results too. Notable successes included an increase in testing for nuclear-related industries in the UK and strong growth in the provision of NDT services to aerospace customers from our Houston laboratory.



Oil & Gas and Infrastructure Highlights 2018

STRONG REVENUE GROWTH

INTEGRATED
INFRASTRUCTURE
DIVISION WITH
THE OIL & GAS
SECTOR

COMPLETED
REBRAND FOR
ALL EXOVA
LABORATORIES

EXPANDED OUR GLOBAL FOOTPRINT

Infrastructure Division

The Infrastructure division experienced another year of growth mainly due to the ongoing delivery of a number of large infrastructure projects in the Middle East and a very strong performance by our laboratory in Singapore. The division posted year-on-year growth and performed ahead of budget in both revenue and EBITDA, despite a slowdown in the construction market in the Middle East in the second part of the year.

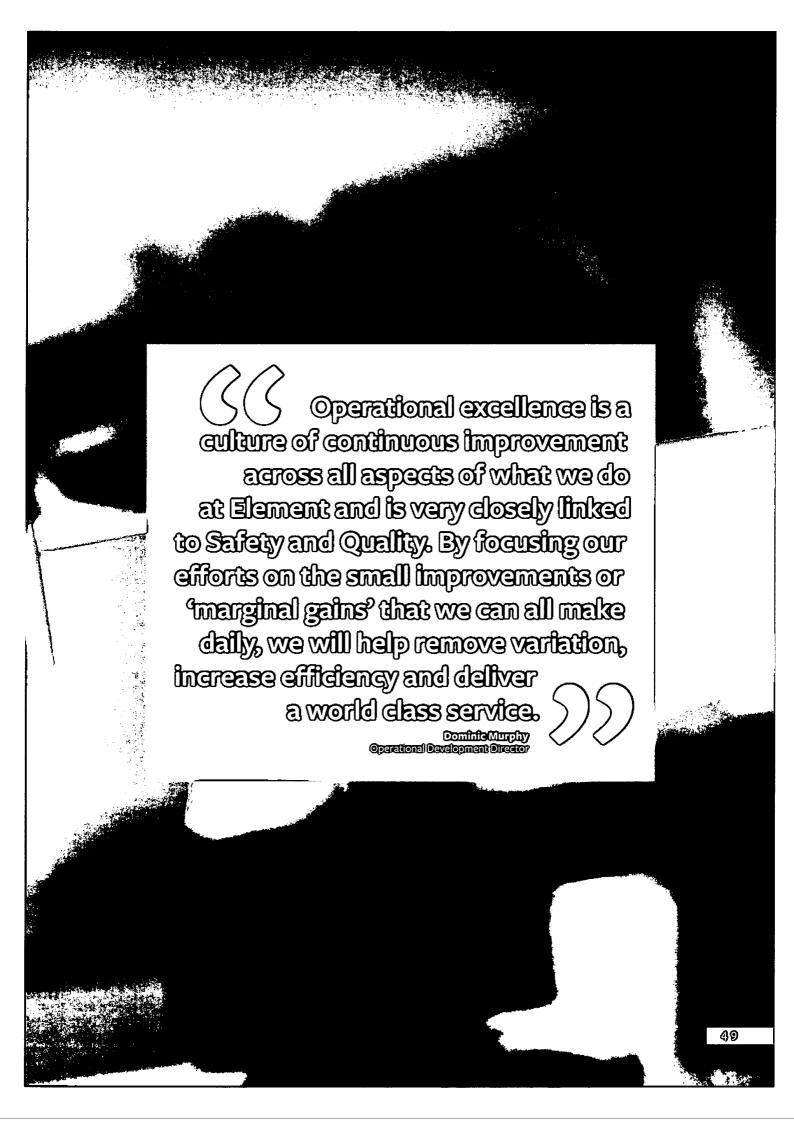
Our Dubai business delivered strong growth due to ongoing construction projects ahead of the Global Expo in 2020 and the related Dubai Metro extension. We also saw strong growth in Saudi Arabia due to our continuing work on the Doha Metro and Rhiyad Metro projects, where we are performing bespoke laboratory-based and on-site materials testing. The Group also started work on building two new facilities in Jeddah and Riyadh to extend our geographic reach within Saudi Arabia and to better support future construction projects. We also opened a new civils facility in Qatar this year to grow our capabilities and better service our customers in the region.

Our laboratory in Singapore delivered another year of exceptional growth due to a number of new contracts won, including a large contract to perform testing on the Circle Line 6 project from the Land Transport Authority in Singapore. We also won a contract with Shimiziu Corporation to provide concrete testing for the new National Cancer Centre Singapore.

In 2019, we expect to see further growth across the sector in scale and capacity as the synergies of this year's integration projects take full effect. We will continue our focus on delivering commercial, operational and technical excellence as we build market leadership across the sector.

As ever, the retention and development of our team remains a priority. We have broadened the senior leadership team with the appointment of Matt Hopkinson, formerly with Bureau Veritas as the new Executive Vice President of the sector. Dr. Rod Martin has moved to Vice President of Technology for the sector, with a remit to support organic growth by developing the sector's technical strategy and deepening the relationship between customers, technology and operations.





Striving to deliver a wood class servico



One of the biggest focus areas for the business in 2018 has been ensuring that together we strive to set new standards of excellence in everything we do in order to add certainty to our customers' business.

Safety, Health And Environment (SHE)

In 2018, 76% of Element facilities reported zero recordable injuries, demonstrating that with the correct planning and safe execution of work it is possible to complete our work with zero injuries. This effort resulted in a reduction of our recordable injury rate to 1.37 in 2018 (2017: 1.77). This is a significant reduction, achieved against the backdrop of great change, transition and an increase in the overall number of hours worked across the Group.

2018 was a transformational year with a total refresh of the SHE program, leading the Exova and Element programs to redefine objectives, group wide procedures and training programs. We now have consistent group wide SHE business practices that define the topics of focus to meet company and legislative requirements.

The company internal SHE auditing program was reorganized to align with the updated business practises and rolled out to effectively measure our performance against the program, with a particular focus on local regulatory compliance, safety culture and system processes to manage SHE.

The SHE team was fully restructured to include new positions overseeing three distinct geographic regions along with operational execution via SHE Managers across all divisions. Additionally, all locations have identified local safety coordinators to support the implementation of the updated program.

Great strides have been made in allowing for the improved tracking of incident investigations and providing operational oversight across the business. This was achieved through the deployment of the SHE Incident Management System where all injury, property damage, automobile accidents, environmental excursions, near misses, proactive hazard identification reporting and associated improvement actions are brought together in one system. These activities and improvement actions are then documented and tracked to closure, resulting in greater efficiency, transparency and tracking, as well as enabling any lessons learned to be shared across the organization.

We have also reinvigorated sharing of lessons through SHE bulletins to address identified trends and aid in continuous improvement and understanding of events across the business. SHE bulletins are made available to all sites and local management are required to take their teams through all SHE updates at their regular operational meetings.

Colleagues across the Grouptook partinthe annual Safety Improvement Week where each location conducted safety improvement activities in collaboration with operational excellence colleagues tying in the 5S structured workplace and SQDC daily accountability approach to delivering tangible improvements. Participation rates were high at our locations, with colleagues taking time for safety and considering how business improvement initiatives can aid in delivering a zero injury environment.

Following Safety Improvement Week, the annual Safety Climate Survey was conducted to measure safety culture within the business. This year, the sixth year that the survey was conducted, we saw an increase in the participation rate with almost 5,375 colleagues completing the survey (86%). The results were converted into a Safety Perception Score which has a minimum score of -50 and a maximum score of +50, with a Group SPI of 31.1 for 2018 (2017: 29.5) – a very encouraging improvement. Survey feedback highlighted remarks from colleagues about feeling personally responsible for their safety, that a zero injury workplace is achievable and that the tools and training are appropriate to perform their work activities safely.

Quality

Ensuring the validity and integrity of test results provided to our customers remains core to what we do at Element. Our quality professionals work in partnership with their operational colleagues to ensure that the materials and products manufactured by our customers are safe, quality, compliant and ultimately fit for purpose.

In order to unify our approach across the Group, a single Quality policy was introduced in 2018. The policy integrates quality, technical and commercial excellence into all aspects of our operations and this will

be achieved through the implementation of our business management system. This Group wide system optimizes the processes to identify and reduce risk, achieve competitive advantage and ensure compliance in all quality, operational and functional aspects.

In our commitment to continuous improvement in quality and service delivery, we have successfully integrated a broad range of accreditations and approvals from acquisitions, supporting our focus on growth and opportunity for our colleagues and customers.

As a leading provider of testing, calibration, inspection and certification services across the world, we recognized the importance of having visibility of quality performance across the Group. This has been achieved through the implementation of an electronic quality management system which all users can access, irrespective of their location. This powerful platform is already delivering efficiencies in the management of quality as result of this level of accessibility. It is a validated, secure system with electronic signatures facilitating ease of access for Element's global community.

Operational Excellence

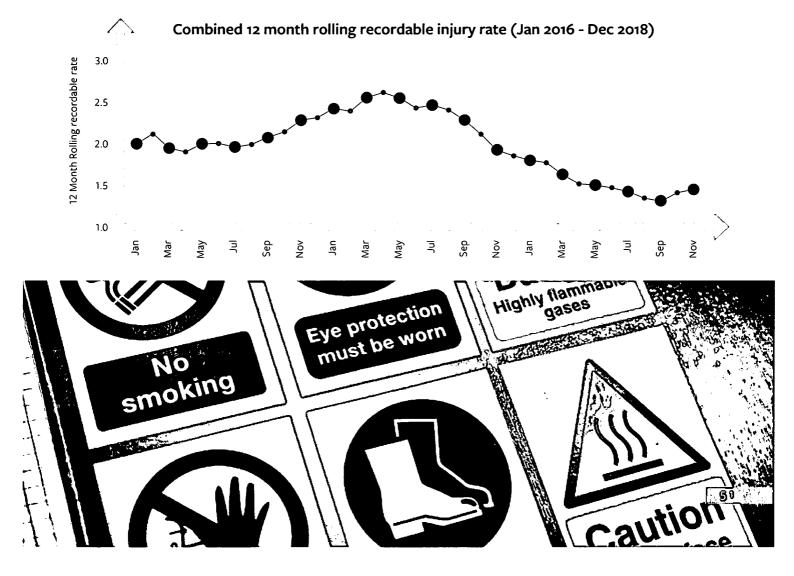
2018 marked the start of an increased focus on operational excellence and the reinvigoration of existing continuous improvement models into the business. To help harmonize their efforts and signal the clear pursuit of excellence across all parts of the Group, we rebranded the business improvement function and all associated activities accordingly. After significant investment in engaging with senior leadership on the value of operational excellence, the concept of marginal gains was introduced to the wider business and became a target for each location to identify opportunities for improvement and to implement them.

An important pillar of the operational excellence strategy has been to put the basics in place. For 2018 this was marked by a wider roll out of 5S (creating structured and well organized laboratory work area and the office work places); wide introduction of daily accountability based on daily safety, delivery, quality and cost (SQDC) meetings; the introduction of total productive maintenance (TPM) to improve uptime of equipment; two courses of Element Lean Six Sigma Green Belt Training, and the introduction of online training for both 5S and SODC.

The second pillar consists of "focus sites", where a program has been established to run long time improvement projects at a number of selected sites. Dedicated resources are made available and goals are set based on customer requirements. In 2018 we saw a number of laboratories start on this journey, including Huntington Beach, Charlotte and Portland NDT. Initial results include a substantial improvement in on-time delivery, substantial reduction in lead time and increase in throughput. Positive customer feedback has clearly demonstrated the impact that these improvements have made.

We are already seeing some strong examples of the impact of operational excellence in action across the Group. In our Charlotte, US aerospace testing laboratory, we have seen improved safety performance and a 50% reduction in the average cycle time, improved visual management and increased productivity. In our Portland, US NDT laboratory, we have seen equally impressive results with a number of improvements including an increase in on time delivery, profitability and throughput as well as an overall decrease in waste.

Operational excellence will become a key priority for the Group as we continue to focus on delivering a world class service to our customers.



EXCELLENCE IN ACTION

Pursuing ou commercial ambition

Fridolengedijs SVP, Sales & Commercial Development



We have continued to pursue our ambition to be the best performing commercial organization in the global TIC sector.

In 2018 we built on our foundation of a clear commercial strategy, a dedicated team and a wide ranging commercial excellence program. Together, the various components of this programme make up the One Element Way of Selling.

We now have a strong sales leadership team of experienced and focused Sales Directors who together with the Sales & Commercial Development team, are driving a culture of excellence throughout Element's commercial community.

Recognizing the strategic value of a strong commercial function, we now have a focused, proactive, centrally driven team. We have made excellent progress on our commercial excellence journey and will continue to make headway as we grow the business.

ELEMENT'S ONE WAY OF SELLING supports our sales strategy through a series of consistent approaches, best practices and tools. These are structured around our people, processes and systems and are centred around our customers.

OUR PEOPLE: We now have a structured, aligned, dedicated commercial team. In 2018, we integrated 215 commercial colleagues from Exova, moving from 34 commercial roles to 11 clearly defined, customer focused roles. With a career framework that supports personal development and growth, we have been pleased to recognize our home grown talent with key promotions across all our sectors.

OUR PROCESSES: We have continued to develop our program of best practice processes, drawing on the expertise from both the Element and Exova sides of the business, as well as industry leading standards. Further 'playbooks' were developed to support our sales teams, capturing best practice and processes and tools, to enable further success. The playbooks also accelerate the on-boarding of new hires and successful integration of acquired companies.

In terms of lead management, we have made considerable improvements to and investment in our marketing effort. An increase in the amount of search engine optimization work has been driving up web leads and we also now have one global inbound handling team, able to direct leads to the most appropriate laboratory, allowing us to respond faster to inquiries.

Customer centricity is at the core of our commercial excellence and account management programs and we are moving closer to a fundamentally more strategic relationship with our largest clients.

In 2018 we continued to see above market growth for our account management program and building on a strong foundation in Aerospace, which saw it grow by 7%, we committed to rolling this successful program out to our three other sectors in 2019.

Our sales strategy consists of three main focus areas:



JAVDREMMOD EDMARKE STANEDROME

් අතර අතුය අතුය වෙන්නෙකුවේ අපදුරුණු පැවැත් විශාල එම මෙට "ම මන්ණ තියෙනුම් මෙන්නේ එම ගමණ අවත්වණ පරමුණ මහ ඒ ශ්රීත් පෙත් පේම මෙන්ම මෙන්මේ එම ගමණ අවත්වණ පරමුණ මහ අතුල්වේ ම අතුර මෙන්න මෙනුමේ එම ආකාල මුණුණෙනුව මහ අතුල්වේ ම අතුර මෙනුමේ මෙනුමේ ආකාල මුණුණෙනුව



DRIVE THE FULL BENEAT OF OUR ENTIRE SERVICE OFFERING

Changing a maindeon from sing a least stony thinking, to emission a fin utilized, any isoli enterprise musics. Offering the full breadth of our coar's hales and support, to become a true continer and so still a provider



DRIVE THE MATURITY OF OUR COMMERCIAL ORGANIZATION:

নিধারকাল্ড যে ব'ল্ডার 'পান্ড ব'ল চার্ডার চিন্ত স্থা, এটো শ্বিক বিস্তুর্গত্ব চ্যাক্স ও লা চার্ডার বিস্তৃত্ব স্থান বি ভার বার্ডার এএবলোড বিশ্ব ভোগা-এরর বিশ্বত প্রকৃত্ব শ্বরার 'লাভার্ডির এক বিশ্বত শ্বরার

Our System:

We made progress in bringing together a number of customer relationship management (CRM) systems and a multitude of home grown systems, into one single, world class system. Working collaboratively with our IT team, a number of additional improvements have been made to the new system to improve efficiency for our sales teams, aligning CRM with the One Element Way of Selling and facilitating those activities that draw from CRM.

We made great progress towards automated, centralized commercial reporting by developing a data warehouse and using a business analytics solution that gives improved visibility of performance enabling proactive management on a customer, laboratory and sales resource level.

Element's Customer Experience Program

Delivering an excellent customer service experience and delighting our customers time and time again is crucial. In 2018 we launched a group-wide customer experience survey which incorporated the well-established Net Promotor Score methodology. The survey, translated into nine languages and adapted for certain services/divisions, is an efficient and consistent method that captures our customers' experience with us and identifies areas where we excel and where we need to improve. This informs our Commercial and Operational Excellence programs and focuses our teams' efforts.

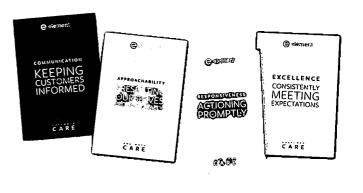
Our customers are at the heart of everything we do and we have introduced two further programs to improve their experience when doing business with Element.

The Customer CARE Program

Our customers' experience does not just fall to our commercial team, colleagues across the whole business are involved increasing an exceptional service for our customers.

We have designed and launched a training program which focuses on four key areas of providing great customer service. Communication, Approachability, Responsiveness and Excellence. With a fully interactive approach, using workshops, exercises and discussions, the program shares best practice-methods and these to enable our team members to excel·inall of their interactions withour customers and with each other.

The CARE program was successfully launched in the UK and the collout across Europe and the Americas will begin in early 2019, before being extended to our other regions.







Case Study - ATI Cast Products

Element provided film and computed radiography (CR) on aerospace castings for ATI Cast Products to support the significant rise in demand from its end customers. The work was in support of ATI's strategic conversion from film to CR on key castings which has helped to strengthen their position as an industry leading aerospace component supplier. The business unit is part of Allegheny Technologies, a global manufacturer of technically advanced specialty materials and complex components.

The radiography work was carried out at Element's Houston and Rancho Dominguez laboratories, which are both Nadcap accredited, multi-disciplinary testing laboratories specializing in non-destructive and materials testing for metals and polymers, dedicated to servicing the global Aerospace and Oil & Gas sectors.

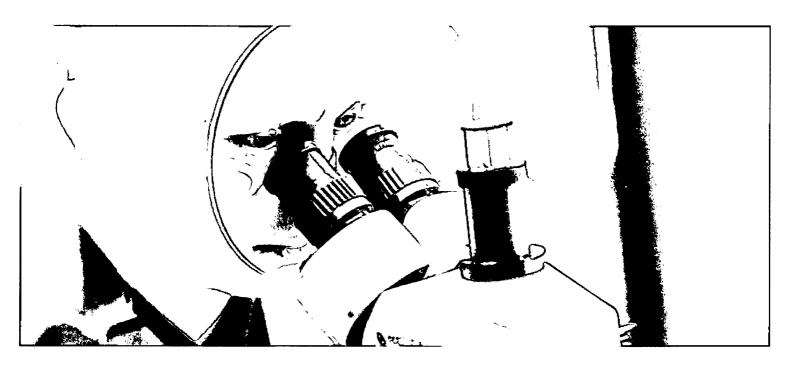
As one of the Group's strategic partnerships, we invested in technical resource and new equipment which helped ensure that our customer had the capacity to meet their customer's increasing requirements. Our market-leading expertise and available CR capacity was incredibly valuable to ATI Cast Products and they will continue to perform a critical



role in helping them to meet the quality levels and production rates needed to satisfy the ongoing commercial aerospace demand.

By aligning strategically with the needs of our clients and investing behind them in terms of technical resource, equipment and capacity, we ensured that ATI was able to support a growing relationship with a key customer on a very significant engine program. Element's ability to quickly and effectively ramp up capacity has allowed ATI to support its end customer and secure future business. The aerospace industry is demanding a shift toward CR and this relationship supports ATI's ability to continue providing market leading manufacturing services, at the same time further developing Element's position as a market leader in this emerging technology.





Case Study - Frisa FRISA

Element has been conducting a range of aerospace testing services, including mechanical, metallurgical, chemical analysis and non-destructive testing (NDT) for Frisa since 2006. Frisa is a key client and a global leader in the manufacture of rolled rings supplying the aerospace, power generation, industrial machinery, construction & mining, wind power and oil & gas markets.

The long-standing relationship between both companies was strengthened by the renewal of a ten-year framework agreement worth \$36m in 2016. In 2018, we supported Frisa with testing services to review material compliance as well as to verify properties for new product introduction. This testing program includes stress and creep rupture, metallurgical evaluations and fatigue and fracture mechanics.

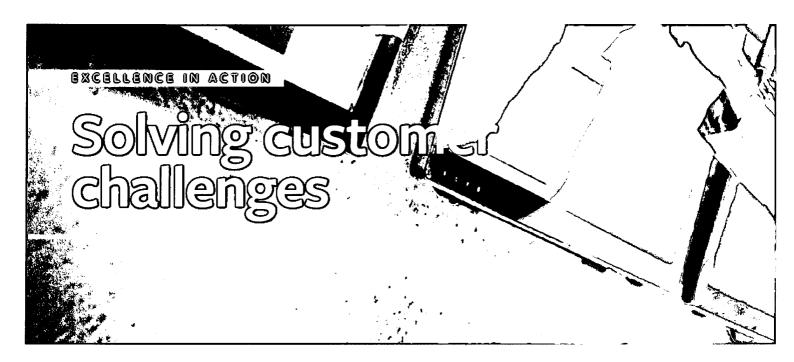
Throughout the testing program, we have made significant investments to ensure that our competence and capacity continues to match Frisa's ambitious growth plans. This investment includes the addition of more capacity for stress rupture testing and the introduction of immersion

ultrasonic testing (IUT) where we invested over \$1.5m to acquire the equipment with the latest technology available in the market for this type of testing.

Local support and expertise is being offered under one roof at our Monterrey, Mexico laboratory. Over time, Element has built deep knowledge and understanding of Frisa's specific needs. In parallel, Frisa has been able to partner with a world class supplier with leading edge expertise in testing and product qualification along with the accreditations and approvals required from the main OEMs in the industries that Frisa participates.

Element has consistently delivered on time for the customer, adding real value to their business, while at the same time demonstrating our ability to successfully nurture, develop and manage key client accounts.





Integrated Testing Solutions

In response to shifting and increased market demand for testing expertise, Element has launched a new service offering under the umbrella of Integrated Testing Solutions. This service model enables a customer to design a custom testing solution that fulfils the unique requirements for its business. By partnering with Element, clients gain the advantage of working with a world leader, with a technical team of highly competent engaged experts. Element can be viewed as an extension of the client's organization bringing value through leadership in testing technology and strategic technical expertise. This allows clients to optimize their resource utilization by focusing on what drives their business forward, while leveraging Element's testing expertise and global footprint for optimal benefit.

Under an Integrated Testing Solution, Element brings strategic value to our clients through dedicated customer on-site, or customized off-site operations within Element laboratories. Standing behind each solution is a global network of over 6,500 engaged experts that are accessible to support the unique and complex testing challenges that every client

faces. Knowing that no two businesses are alike in their demands for testing services, every Integrated Testing Solution is engineered to meet the specific requirements and environment of each customer by leveraging our depth of functional testing expertise.

Recognizing the need for more integrated partnerships with our customers, we have placed a strong emphasis on our provision of Integrated Testing Solutions to support customer development. This approach is a clear signal that we want to act as long-term partners who are valued for our functional expertise, and not simply as providers of test services. Through our focus on being the best and most trusted testing company, our clients gain the advantage of a partner with well-developed best practices which can be rapidly deployed, but who still maintain an insatiable appetite for operational excellence. Our inherent DNA continuously drives value to our customers, while generating maximum organic growth for Element.

Case Study - TechnipFMC

Over the years, Element has built a strong and successful relationship with TechnipFMC, a global leader in oil and gas subsea, onshore/offshore and surface projects, having supported its umbilical manufacturing site in the US. Building on this relationship, TechnipFMC awarded Element a three-year outsourcing contract to provide non-destructive testing (NDT) services to its umbilical manufacturing site in Newcastle upon Tyne, UK.

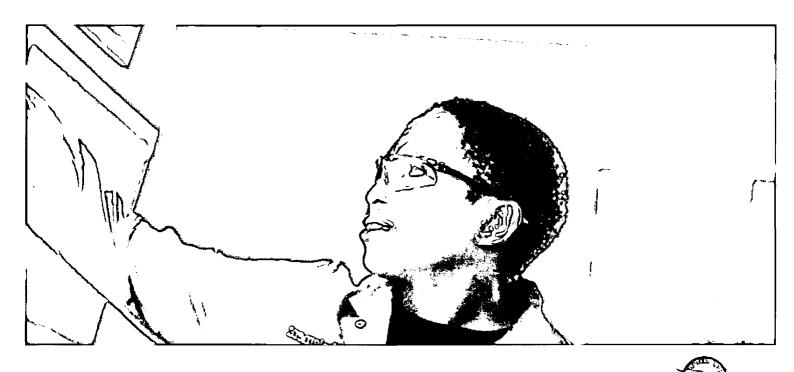
As part of the agreement, Element is providing on-site coverage to TechnipFMC facilities for computed radiography, including: alternating current field measurement; dye penetrant testing; Level III NDT services; magnetic particle inspection; ultrasonic testing; and visual inspection. Eight engaged experts are providing 24/7 on-site testing services, alongside off-site testing and research and development support from the Element Sheffield – Maltravers laboratory.



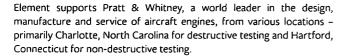
Through a combination of the latest technology and best-in-class experts, we are already seeing a significant reduction in the time for radiographic weld inspections, saving TechnipFMC time and money in the process.

This partnership has enabled our customer to implement a number of operational improvements, including, 24hr support, increased standardization between TechnipFMC plants and one Element experts, a reduction in management time and procedure and development support.

The service that Element provides TechnipFMC with is not only continually improving efficiency but it is of the highest quality which is critical in a sector where failure is not an option.



Case Study - Pratt & Whitney



Our solution took into account the fact that the client is in a unique position of being an aerospace prime that also forges its own engine parts, whereas the majority of engine primes contract out the forging process. Due to the rapid growth of the aircraft market and entering the rapidly expanding production cycle for the newly developed Geared Turbo Fan, Pratt & Whitney is faced with tripling output over the 2017 to 2023 timeframe. Element has driven this strategic relationship by partnering with the client to help with production support testing of their engine forgings in the midst of a planned \$390m expansion.

Element has invested in our Charlotte laboratory to support a large portion of Pratt & Whitney's destructive testing needs. Charlotte's

support for the client's testing needs grew from 6% in 2017 to 34% by the end of 2018. Our investments included new technologies to rapidly and more efficiently extract samples from forgings, creating dedicated streamlined operating cells for preparing samples, adding the latest technology in test equipment and creating best in class processes to support demanding turn times.

At the same time, all Pratt & Whitney production forgings require NDT to assure adherence to strict manufacturing specifications. Element Hartford now performs Etch and Flourescent Penetrant Inspection production support testing on the majority of the client's forging production. Faced with rapid growth, Hartford has streamlined the process and added around the clock testing to support the client's production schedule. Test demand has doubled in the last three years and will double again in the coming three years and Element plans to grow and invest with Pratt & Whitney by adding testing capabilities in our newly expanded Greenville, South Carolina location.





C Our ambition is to be the employer of choice in the TIC sector.

Allan Leighton Non-Executive Chairman



At the heart of Element are our people. The collective knowledge, skills and expertise of our diverse global community of best-in-class experts are critical to fulfilling our mission and vision to become the best and most trusted testing partner in the world.

In 2018, the Group continued pursuing its ambition to become the employer of choice in the TIC sector by focusing on a range of programs to attract, retain and develop its team of over 6,500 experts. The year saw us successfully integrate more than 4,000 new colleagues across the Americas, Europe, the Middle East and Australasia into Element by delivering a range of business integration activities to create a culture of oneness and belonging across the global organization.

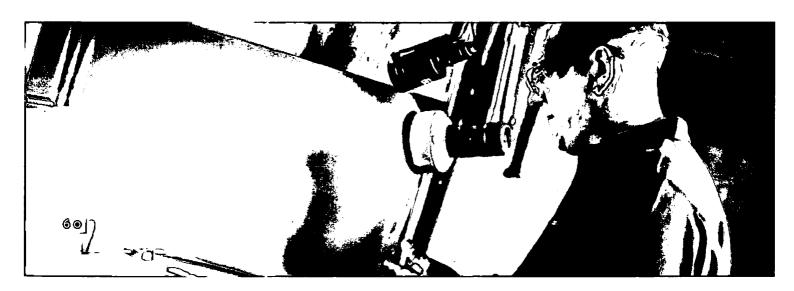
Early in the year, we launched, a best-in-class recruitment system strengthening our ability to attract and recruit the right talent faster and more efficiently than ever before. The tool also provides our existing colleagues with visibility and access to career openings across the Group which, with support from our global recruitment team, helps them explore opportunities to further their careers with Element.

In 2018, the Group also rolled out a global on-boarding program to provide new colleagues joining Element with a consistent and seamless experience when joining the company. An effective on-boarding experience is crucial for new colleagues to feel comfortable and understand the expectations of their new role, as well as understand the mission, vision, values and purpose of Element. Not only does this help in building a One Element culture, it also builds engagement of new colleagues and aids their retention. This in turn has a meaningful impact on Group performance.

Career progression and the skill development of our experts continued to be a focus in 2018 and the year saw the promotion of more than 200 colleagues across the Group. We expanded our existing career ladder program, providing more of our people with an easy framework to develop and progress within Element. With consistent job titles and detailed job descriptions, alongside a list of the knowledge and skills needed for each position, colleagues can now identify and address development areas in in order to progress and build a long and successful career with the Group.

The year saw us launch a new performance management process, designed to support all colleague appraisals. The new approach takes on board colleague feedback and is designed to support important conversations throughout the year; including objective setting, mid-year reviews and end of year assessments, for every individual who works for Element.

As part of a wider Element Recognition Program, we launched the Element Excellence Awards, a bonus recognition program designed to reward excellence, of individual colleagues or teams, at a local, sector, functional and global level. With growth and people as the two principal themes for the year, the awards program is a recognition that our colleagues are key to our success and that high performing individuals and teams within our laboratories and central functions are critical to meeting our growth ambitions. The year saw us also reestablish the CEO Awards, a program originally launched in 2013, to all colleagues across the organization. These biannual awards value collaborative ways of working and recognize colleagues who share knowledge, experience and opportunities with other colleagues across locations, sectors and functions.



We continued to offer a range of development and training opportunities to upskill our colleagues and promote internal growth within the organization. The year saw us launch the Element CARE course, a customer centric program, which provides essential skills and behavior training to all team members who interact with customers across all parts of the organization. We also launched a program of operational excellence training programs including the Element Green Belt program and 5S, Safety, Quality, Delivery and Cost (SQDC) and Root Cause Corrective Action (RCCA). Throughout the year, we also introduced further classroom based and online Leadership Training courses to provide existing leaders and potential new leaders with professional training and support.

Over the course of the year, we also continued to develop and refresh global policies on matters such as data protection; diversity and

inclusion; modern slavery; and whistleblowing. These policies ensure compliance with laws and regulations, give colleagues guidance for decision-making and streamline internal processes.

In 2019 we will continue to focus on the recruitment of the best technical talent, while offering robust succession planning and career development opportunities for colleagues across the Group. Retention of our valued colleagues will continue to feature prominently as will developing our managers in order to ensure they are well equipped to lead and motivate their teams. We will also be deploying an enhanced online learning system across Element – ensuring core compliance training is delivered to all colleagues in addition to offering training in an array of subjects including communication skills, presentation skills and project management.

On-boarding Program





Excellence Awards Program



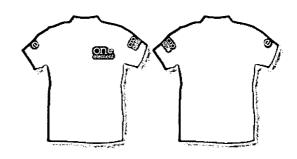






CEO Awards Program

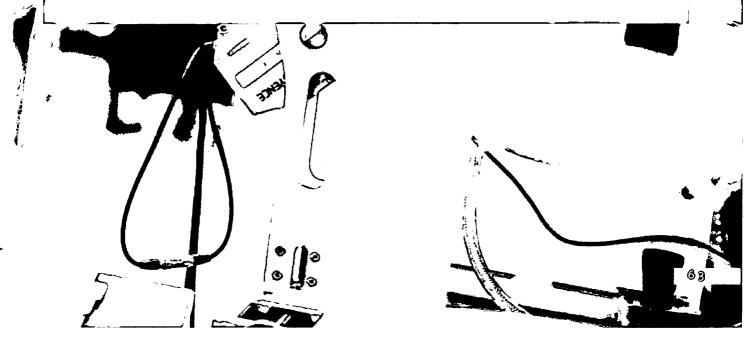




ACQUISITIONS AND INTEGRATIONS Growth through ambition

62

From small beginnings, Element has transformed itself in just eight years to become a full TIC player, with world class expertise, operating across five continents and a proven ability to successfully integrate acquisitions.



Stronger together

We made excellent progress in the integration of Exova Group plc in 2018. Building on the firm foundations that we had laid in the second half of 2017, the Program Management Office drove the delivery of four major phases of rebranding, as well as a range of consolidation projects and functional integrations, that saw an Exova Group plc laboratory rebranded, on average, every four working days and significant synergy benefits delivered.

Following completion of the acquisition of Exova Group plc on 29 June 2017, Element quickly established a central Program Management Office (PMO) and network of Project Managers from across its operating divisions and functions to drive the integration program. While Element is highly experienced at integrating acquired businesses, the scale of the Exova organization demanded a different approach.

Detailed plans were created, alongside appropriate governance and controls, including a Steering Committee and monthly Board reports. This framework helped to ensure that informed decisions were taken; issues could be rapidly raised and considered; and that progress and outcomes could be measured. We also considered culture and communications carefully, building capability to keep colleagues informed and engaged about progress and regularly measuring how they felt. All communications were shared through our 'One Alliance' branding, created as a unifying identity to help bring the two organizations together.

A number of core activities underpinned the program: -

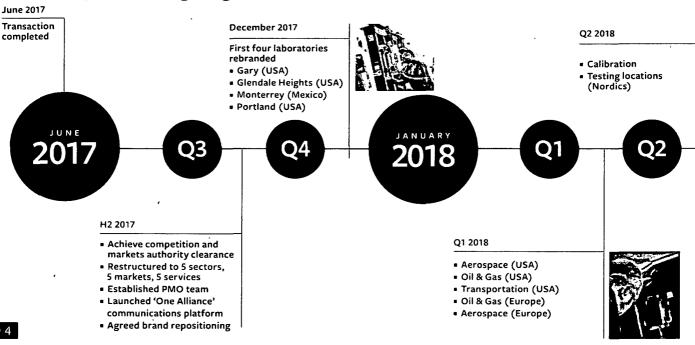
- laboratory rebrands;
- integration of all central functions; and
- laboratory integration projects.

Laboratory Rebrands

The rebrand process covers all aspects of a laboratory's operation, from internal and external signage, to test reports and certificates, customer communications, systems changes, invoicing, email addresses and uniforms. Led locally by an ambassador, who is supported by their general manager and the Project Manager assigned to that part of the business, the process involves every colleague at a site and includes a symbolic clear out of all existing branding, as well as a whole team celebration at the end of the project.

A small group of laboratories had been rebranded at the end of 2017, to allow us to confirm our approach and take some early learnings. Using the insight that we gained from this exercise, we rebranded all the laboratories in overlapping sectors at the end of Q1. This saw 34 facilities in Aerospace, Oil & Gas and Transportation, across both the USA and Europe, becoming fully a part of the Element family. These locations were rebranded early so as to minimize any potential for customer confusion, and a program of communication with customers ran in parallel, to ensure that clients were aware of the transition and assured minimum disruption to the service they would receive from us: This program was repeated for all subsequent phases.

Laboratory Rebranding Program



In Q2, we completed the rebranding of the Calibration business and all testing services across the Nordic region, 32 locations in total. For the calibration business, we retained the 'Metech' name as a sub-identifier alongside the Element one, to support its position as the market leader in Scandinavia and to allow the Element name time to become established. This phase included the rebranding of operations at multiple client sites, where our calibration teams are often embedded.

In the second half of the year, our attention turned to the Middle East Infrastructure business, as well as the Fire and Building Products sector. Each of these two phases brought additional complexities – rebranding a range of temporary site laboratories in the Middle East, as well as working with local joint venture partners, and for Fire and Building Products, our first rebrands in Australia. More than 50 sites were rebranded in the Middle East, across four countries and a further 24 sites in Fire & Building Products.

For the latter, we also implemented revised branding, including three new websites, for the principal businesses in the sector – Warringtonfire; BM Trada and FIRA International. We recognized their market leadership and existing brand equity, as well as the fact that the names act as a 'passport to trade' in their respective end markets. While distinct, the new branding is strongly aligned with the Element master brand identity to ensure a strong connection is maintained.

Integration of Central Functions

During 2018 each of Element's central functions went through its own integration process. Teams were brought together; systems and processes evaluated; group-wide policies created; and single integrated functions created. This has allowed us to manage critical functions such as Safety, Quality, IT and HR in a joined-up way, providing the support that operational teams require. For example, in Safety we delivered a single online SHE incident management system, a group-wide policy supported by common procedures and clear roles and responsibilities for all safety managers.

In Finance, we have harmonized budgeting and reporting and in our Commercial function we now have a focused sales engine and reporting, as well as a single strategic and key accounts program. We also made significant progress in the journey towards a single CRM system for managing our customers.

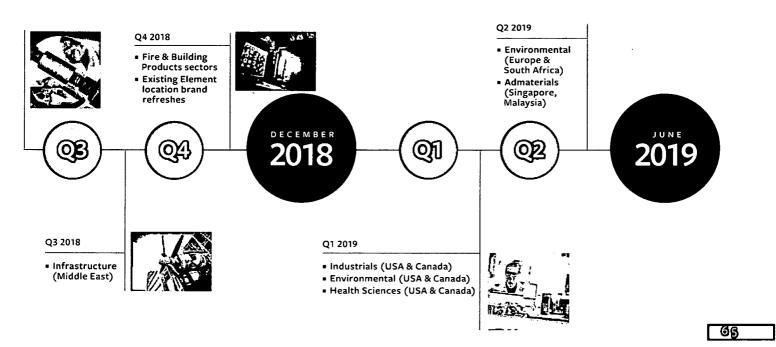
Laboratory Integrations

In a number of cases across our global network, Element and Exova Group plc have co-located laboratories. We have taken the opportunity to review these and where clear efficiencies have been identified, we instigated projects to consolidate operations so that teams could work more effectively together and better serve customers. In doing so, we have created several centers of excellence.

As a result of this work, in 2018, we have exited 15 locations and driven significant synergies, with minimum disruption to service and delivery to customers, as well as mitigating job losses. In a great example of cross-laboratory co-operation, we have moved 600 pieces of equipment, sometimes across sectors and/or international boundaries, creating capacity or additional capability across our network. In the year projects were completed in Aberdeen, Bridgwater (both UK); Daleville Environmental (USA); Emmen (Netherlands) and Mississauga (Canada). Major projects in Southern California, Detroit, Houston (all USA), Daventry, Manchester, Sheffield (all UK) and Herne/Mulheim (Germany) were all initiated and will be completed in 2019.

As one of Element's three objectives for 2018, progress on the Exova Group plc integration program was a key deliverable for the Group. The significant progress that we have made is testament to the hard work, commitment and focus of hundreds of colleagues across the company. In itself, the integration program is a prime example of working as One Element and testament to the type of organization that we have become. Element has undertaken this process principally via in-house teams, which has allowed costs to be managed effectively, learnings to be rapidly applied and supported the personal development and growth of many colleagues. We have proven that we have the skills and expertise to integrate large-scale acquisitions, as well as bolt-on pieces of M&A.

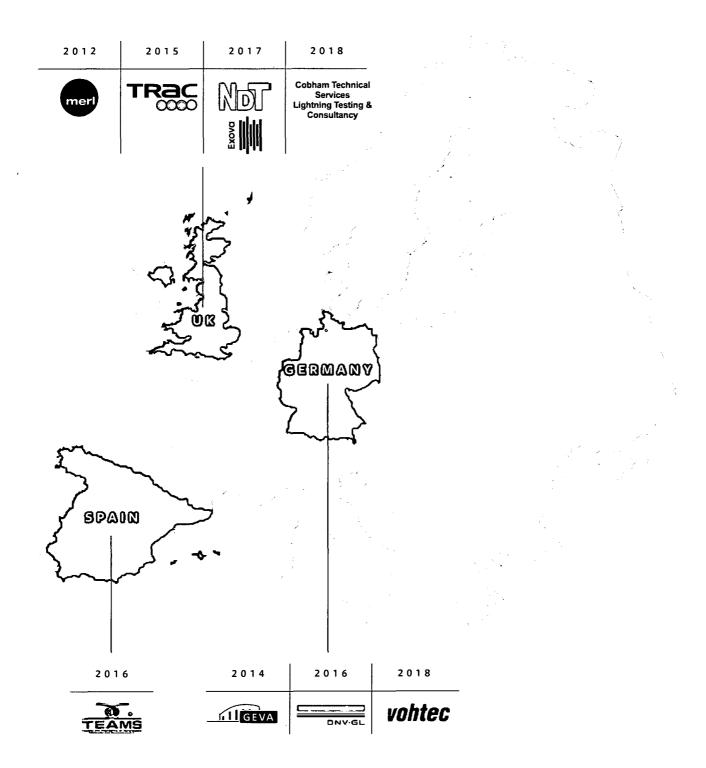
The final stages of the integration program will be completed in Q2 2019, with the rest of the Transportation and Industrials sector going through its rebrand – two environmental testing divisions; health sciences and our industrials laboratories in North America. We will also complete the remainder of our laboratory integration projects and the finance operational integration project during 2019.



Global Acquisitions



2011	2012	2013	2014	2015	2016	2017	2018
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				·		(1)	
						Metals Testing Company	



Leading the way





Charles Noall

Gravies has been the President and GEO of Element since 2003. Under his leadership, Element has become the fastest growing independent materials and product qualification testing company to the world.

Gharles enccessfully led the original management buy out of Element from Stork BV in 2010.

Indiasixyears that followed, the Group's revenues tripled and Gharles than led the transfer of the company's ownership from its original private equity sporsors, it to its current financial sporsor Endgepoint Gapital.

In 2017/Gharles/Editheacquisition of Excusive eating a single global desting organization with over \$350 million in revenues and dearling over 40,000 quistomers world wide.

Incidition to his role as President and GEO of the company, Charles also leads the Executive Team.

To Matz

Lojoined Elementes (EFO during zone buithes been edirector of the Group since the original buyout from Stork in 2010.

Johaskilliefinancetransformation chilement following the carveour in corocard is responsible for all financial, legal, leav, procurement and If a carving within the Group.

Alongside Charles (Noally he led the given different buyouts and the take private of Excicators on a

Inaddition to his role as GFO, Lots emember of the Group's Executive teamend is heavily involved in setting the overall strategy and supporting its strategic MEA program.

Prior to his role at General Jowo sted in private equity and invested in a number of global resting businesses both in Europe and the US





Chris Busby

Ginistica Partner of Bridgepoint with responsibility for Bridgepoint's investment activities in Northern Europe and formerly the UK. He sits on the Bridgepoint's Group Board. Operating Committee and Investment Advisory Committee.

Christomed Bridgepointain reprepending his first six years restablishing the Nordis office and is now based in London, He has worked on a number of transactions including LGG, JERM, GEG, Molton Brown and Pret AManger.

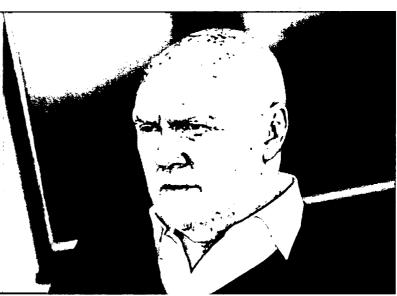
GhrisholdseiBScfromExererUniversityend/isAGA qualifiedfromhistime-spentworkingetiPWC-priorto joining Bridgepoint.

Allan Leighton

Allantse Non-Executive member of the Element Materials fed in old by Group Board. He has had an extensive and varied business career holding a series of high profile roles for major corporations in the Good retail, FMES and communications seators including that of Gnief Executive of Asda and Non-Executive Grainman of the Royal-Mail.

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Allanholdsenhonorapydegreefrom Geanfield University, anhonorapyfellowship from the University of Lancaster and a Octorate in Business Administration from York Stubing University





Record Hughes

Racylisa Partner of Bridgepoint with group-wide responsibilities. He joined Bridgepoint in the Bland is based in kondon and New York. He is vice-chair of Bridgepoint and currently heads its operations in North America where is the president of Bridgepoint Group. EDC and Bridgepoint Group. E

Raoulalsosis on the boards of Care UKin the UKand STH in the US.

Raculhaselsoworked extensively on investments across Europe and has a degree in Business Administration from the University of Eath where he also supports a number of PhD programmes

executive team Our strong leadership team





Rick Stylicas

Rickjoined Elementin 2004 originally as a Business
Development Manager responsible for integrating
newly acquired laboratories (into the organization.
Het has held General Manager positions for Element's
laboratories in Los Angeles, Detroit and Amsterdam
and led several US laboratories through a lean
process transformation.

Inconfliction the position of Vice President of European Operations and formally joined the Element Executive Team Rick became the Executive Vice President of Aerospace in 2014. Under his leadership the aerospace sector has quadrupled in size and successfully integrated over 15 acquisitions, adding capabilities, capacity and footprint to become the number one provider of aerospace testing services in the world.

John Malson

John joined Elementine orgheving held sentor leadership positions in several leading organizations within the global TIC sector including Interestand most recently Bureau Veritas.

Johnpossesses a foundation of technical experience with a strong background in operational leadership, commercial focus and continuous improvement, bringing over 20 years of experience insuccessfully implementing strategievision, financial performance and technical growth and innovation.

Inhibroleas EVP for Transportation & Industrials, John has organised the sector into four focused divisions transportation, Industrials, Health Sciences and Environmental operating 50 laboratories globally in 6 countries. He has aligned the sector operationally commercially and technically with a clear focus on delivery of service and customer centricity, promoting the willingness to innovate, investigand provides obtains to inclusing challenges, while also focus ingon capturing growth as new market opportunities present themselves.





Rod Martin

Rod joined Element through its acquisition of Materials Engineering Research Laboratory (MERL) in 2012, now Element Hitchin, where he served as CEO.

As well as an MA in Management, Rod has a PhD in Aerospace engineering and his career includes eight years working at NASA Langley Research Centre before joining MERL.

In mid-2018, all the Middle East and Asian infrastructure operations were moved into the Oil & Gas sector under Rod's leadership. In his role as EVP for Oil & Gas and Infrastructure, Rod has implemented a strategy that has developed the capability of the sector into world class centers of excellence in four technology themes: coatings, fracture mechanics, polymers and composites and corrosion. In addition, the sector has become a market leader in other sector relevant services including routine materials testing, failure analysis and NDT and broadened its scope to include infrastructure testing. The sector now has global presence with facilities in the North America, Europe, The Middle East, India and South East Asia.

Rob Veitch

Rob joined Element through its acquisition of Exova, where he served in a number of leadership roles including Sector Director for Europe and most recently as Managing Director of F&BP. Through a focused organic and inorganic growth strategy, the sector has more than trebled in size during the five years Rob has been with the business.

Prior to joining Exova, Rob spent over 20 years working with two large, privately owned international businesses operating at director level in sales, marketing and human resources roles. These two businesses serviced a wide variety of sectors including construction, defense, facilities management, building services, automotive, marine and industrial manufacturing.





Frido Langedijk

Frido joined Element in January 2017 and is responsible for ensuring that Element consistently operates with best in class commercial processes. Together with his team and working as business partners to support the wider commercial organization, Frido is responsible for driving growth through development and implementation of a commercial excellence program, tactical marketing initiatives and establishing a high performing, proactive commercial team & culture.

He is a strong international leader with more than 25 years' commercial, operational and change management experience who has a consistent track record of delivering business improvement through sales growth, innovation, cost management, best practice sharing and high performance leadership.

Prior to joining Element, Frido held a number of international commercial and operational positions and was most recently a Vice President of Sales for Pentair Valves and Controls.

Neil MacLennan

Neil is responsible for legal, compliance and company secretarial related matters. He joined Element via its acquisition of Exova, where he served as Group General Counsel and Company Secretary.

Neil joined Exova in 2013 where he was responsible for advising on corporate and commercial matters, legal risk management and corporate governance issues. This included managing the legal aspects of the IPO of Exova in April 2014 and assisting in relation to a significant number of M&A transactions and the sale of Exova to Element in 2017.

Neil's experience includes a wide range of corporate and capital markets transactions for public and private companies including advising on M&A transactions, takeovers, private equity transactions, joint ventures, compliance with company and securities laws and general corporate governance matters.

Prior to joining Exova, Neil held positions with corporate law firm Dickson Minto in Edinburgh and Allen & Overy in London. He is a qualified solicitor in Scotland, England and Wales.





Arnout Lijesen

Arnout joined Element in early 2004 and has been a driving force behind the Group's successful organic and acquisitive growth strategy.

Arnout has been instrumental in the definition and execution of the Group's overall growth strategy. He has initiated and supported various operational and commercial initiatives including the original rebranding from Stork to Element and executed a multitude of bolt-on acquisitions in the USA and Europe.

Since the carve-out in 2010, he has been focused on leading Element's highly successful mergers and acquisition program. Under his leadership the Group has acquired and successfully integrated over 25 market leading businesses.

Arnout is also leading Element's entry into the China aerospace testing market, where the Group is opening multiple testing laboratories.

Arnout holds a Master's degree in Mechanical Engineering and previously worked for Unilever Group Unichema and the management consultant firm Arthur D. Little.

Dominic Murphy

Dominic is responsible for leading Safety,
Health & Environment, Quality and Operational
Excellence across the Group. This includes
organization-wide programs such as major capital
projects and strategy execution. Dominic is also
leading the Program Management Office of the
Exova integration into the Element Group.

Dominic joined Element in 2015 having previously held positions across multiple geographies covering the oil and gas, energy, industrials, finance and consumer sectors. Dominic's experience spans leadership of multiple programs on corporate strategy, operational and business improvement, process optimization, commercial analysis, business development, project management, business case development, due diligence and risk analysis.





James Fleming

James joined the team in 2014 and is responsible for defining and delivering Element's global IT strategy.

James has over 20 years of IT management and senior leadership experience gained while working for a number of companies operating in a diverse range of industry sectors, including serving as CIO at two FTSE 250 businesses, both with a global footprint.

In addition, James chairs the UK Chapter of the Microsoft Dynamics AX user community, is a global MVP for Microsoft Dynamics AX and is also a fellow of the British Computer Society.

Andrew Pickup

Andrew joined Element via its acquisition of Exova where he served as Corporate Affairs

Andrew is responsible for defining and delivering the Group's brand and communications programs for colleagues, the media and customers. This includes public relations, issues management, internal communications and brand development, as well as Element's digital communications platforms.

Before Exova, Andrew worked for Compass Group for nine years. He held senior positions in operations management and business improvement in the healthcare division, before becoming Corporate Affairs Director for the UK & Ireland, responsible for corporate and internal communications, corporate responsibility and public affairs in a £2bn turnover operation with 60,000 colleagues. Andrew spent his early career in the energy and telecoms sectors in a variety of roles covering pricing and market analysis; policy development; regulatory and public affairs; and strategy.





Matthew White

Matthew joined Element in 2012 and helped restructure and establish a new Group finance team following the MBO from Stork. He has 12 years of testing sector experience and has worked within private and listed businesses in operational finance, corporate finance and tax and treasury roles.

Responsible for the Group's central reporting, shared service centres and tax function, he is involved in a broad range of Group wide finance, tax and treasury initiatives and led the upgrade and standardization of the Group's consolidation and management reporting systems.

Prior to joining Element, he was Group Financial Controller of Inspicio, a rapidly growing and acquisitive international testing business backed by 3i. Inspicio was active in over 100 countries and expanded rapidly, ranking in the Sunday Times top 20 fastest growing companies by EBITDA growth between 2006 and 2008.

Niall McCallum

Niall is responsible for the finance operations of the business and for finance transformation across the group. Niall has a close proximity to the business being responsible for the four sector finance teams globally, ensuring optimum financial performance, controlled investments in capex and management of working capital. In addition, Niall is focused on ensuring the financial integration of Element and Exova results in best-in-class finance organization, processes and systems to support our growth traiectory.

Niall joined Element in 2017, prior to which he was a Divisional Finance Director at Capita plc. Prior to this, he was an Investment Director at a mid-market UK private equity fund. Niall started his career at KPMG, where he qualified as a Chartered Accountant and worked in corporate finance, completing a number of acquisitions and disposals.



Directors' report

The Directors present their report and the financial statements for the year ended 31 December 2018. The principal activities of the Group are Materials and Product Qualification Testing. A description and review of the Group during the financial year and indications of future development is set out in pages 20 to 47 within the Strategic Report that also incorporates the requirements of the Companies Act 2006.

Statement of directors' responsibilities for preparing the financial statements

The Directors are responsible for preparing the Annual Report and the financial statements in accordance with applicable law and regulations. Company law requires the Directors to prepare financial statements for each financial year. Under that law the Directors have elected to prepare the Group financial statements in accordance with International Financial Reporting Standards (IFRSs) as adopted by the European Union and the Parent Company financial statements in accordance with United Kingdom Generally Accepted Accounting Practice (United Kingdom Accounting Standards and applicable law), including FRS 101 "Reduced Disclosure Framework". Under company law the Directors must not approve the financial statements unless they are satisfied that they give a true and fair view of the state of affairs of the Company and of the profit or loss of the Company for that year.

In preparing the Parent Company financial statements, the Directors are required to:

- select suitable accounting policies and then apply them consistently;
- make judgments and accounting estimates that are reasonable and prudent;
- state whether applicable UK Accounting Standards have been followed, subject to any material departures disclosed and explained in the financial statements; and
- prepare the financial statements on the going concern basis unless it is inappropriate to presume that the Company will continue in business.

In preparing the Group financial statements, International Accounting Standard 1 requires that Directors:

- · properly select and apply accounting policies;
- present information, including accounting policies, in a manner that provides relevant, reliable, comparable and understandable information;
- provide additional disclosures when compliance with the specific requirements in IFRSs are insufficient to enable users to understand the impact of particular transactions, other events and conditions on the entity's financial position and performance; and
- make an assessment of the Company's ability to continue as a going concern.

The Directors are responsible for keeping adequate accounting records that are sufficient to show and explain the Company's transactions and disclose with reasonable accuracy at any time the financial position of the Company and enable them to ensure that the financial statements comply with the Companies Act 2006. They are also responsible

for safeguarding the assets of the Company and hence for taking reasonable steps for the prevention and detection of fraud and other irregularities.

The Directors are responsible for the maintenance and integrity of the corporate and financial information included on the Company's website. Legislation in the United Kingdom governing the preparation and dissemination of financial statements may differ from legislation in other jurisdictions.

Directors

The Directors, who served throughout the year and subsequently were Charles Noall and Jo Wetz.

Organizational structure

Element Materials Technology Group is led by a dynamic group of individuals with years of experience in their respective leadership and management fields. The Board meets every month to review the overall performance of the business and also to determine group-wide strategies and priorities. Details of the Board members are set out on pages 70 to 71.

The Board is responsible for the proper management of Group strategy and direction. It oversees the activities and direction of the Group

The Board's responsibilities

The Board is responsible to shareholders for providing leadership and setting the values and standards of the Company and the Group. The Board has adopted a schedule of matters reserved for its attention. The Board approves the Group's business strategy and objectives, budget and forecasts and any material changes to them. It reviews significant investment proposals and the performance of past investments and maintains an overview and control of the Group's operating and financial performance.

The Board sets policies for monitoring the Group's overall system of internal controls, governance and compliance and ensures that the necessary financial and human resources are in place for the Company to meet its objectives.

Chief Executive Officer

Charles Noall is the Chief Executive Officer. He reports to the Chairman and to the Board directly. The Chief Executive Officer is responsible for leadership of the Group's business and managing it within the authorities delegated by the Board.

The Chief Executive Officer's key responsibilities include:

- managing the Group on a day-to-day basis within the authority delegated by the Board;
- developing and proposing the Group strategy, annual plans and commercial objectives to the Board
- · leading the executive team in the day-to-day management of the Group;
- · identifying and executing strategic opportunities for the Group;
- ensuring that the development needs of the Executive Directors and senior management are met;
- making plans for the succession and replacement of key personnel;
 and
- · recommending budgets and forecasts for Board approval.

Board reserved matters

The Board reserved matters are set out in the Investment Agreement. Decisions on operational matters are delegated to the Executive Directors under documented policies and procedures. In advance of scheduled Board meetings, each Director receives documentation providing updates on the Group's strategy, finances, operations and development. A formal schedule of matters reserved for Board approval is in place which includes matters relating to:

- the Group's business strategy and objectives, budget and forecast and any material changes to them;
- · changes in capital structure;
- approving the Annual Report & Accounts including the Corporate Governance Report;
- ensuring the Group has effective systems of internal control and risk management in place, including approving the Group's risk appetite and procedures for the detection of fraud and the prevention of bribery;
- · approving major capital projects, corporate actions and transactions;
- reviewing the performance of the Board and its committees and the Group's overall Corporate Governance framework; and
- approving other matters reserved for decision by the Board by law or where likely to have a material impact on the Group's finances, operation, strategy or reputation.

Executive team

Element Materials Technology is led by an Executive Team with many years of experience in their respective leadership and management fields. The Executive Team meets regularly to review the overall performance of the business and also to determine group-wide strategies and priorities. Details of the Executive Team members are set out on pages 74 to 79.

Disabled employees

Applications for employment by disabled persons are always fully considered, bearing in mind the abilities of the applicant concerned. In the event of members of staff becoming disabled every effort is made to ensure that their employment with the Group continues and that appropriate training is arranged. It is the policy of the Group and the Company that the training, career development and promotion of disabled persons should, as far as possible, be identical to that of other employees.

Employee consultation

The Group places considerable value on the involvement of its employees and has continued to keep them informed on matters affecting them as employees and on the various factors affecting the performance of the Group and the Company. This is achieved through formal and informal meetings, the Company newsletter, the Company's internet site, Element Connect and presentations for employees of the financial performance of the Group. Employee representatives are consulted regularly on a wide range of matters affecting their current and future interests.

Proposed dividend

The Directors do not recommend the payment of a dividend. No dividend was paid in the prior year.

Political contributions and research & development

The Group made no political donations or incurred any political expenditure during the year. The Group carried out research and development activities during the year which the Director's do not consider to be material.

Principal risks and uncertainties

The Group is exposed to a variety of risks and actively manages them through risk management procedures. Whilst risk cannot be eliminated altogether, actions are taken to mitigate risk wherever possible.

The risks that the Group is exposed to are presented in the Directors' Report on page 82.

In accordance with its risk management guidelines, the Group raises awareness of business risks at all operational management levels, and encourages all management teams to assess and minimize risk. The Group ensures the appropriate cover of all essential liability and claims risks.

Details of the Group's financial risk management objectives and policies of the Group and exposure to foreign exchange risk, interest rate risk, credit risk and liquidity risk are given in note 22 to the consolidated financial statements.

Going concern

The Directors have a reasonable expectation that the Group as a whole has adequate resources to continue in operational existence for the foreseeable future. For this reason, they continue to adopt the going concern basis in the accounts. Further details regarding the adoption of the going concern basis can be found in note 2.3 to the consolidated financial statements.

Future developments and events after the balance sheet date

Details of future developments, are discussed in the Chairman's CEO and CFO Reports; and events that have occurred after the balance sheet date can be found in note 29 of the accompanying notes.

Directors' insurance and indemnities

As permitted by the Companies Act 2006, the Company purchases and maintains Directors' and Officers' insurance cover against certain legal liabilities and costs incurred by the Directors and Officers of the Group companies in the performance of their duties. In addition, the articles of association include an indemnity in favour of the Director's of the company in relation to the Director's exercise of their powers, duties and responsibilities as directors of the company, the terms of which are in accordance with the Companies Act 2006.

Disclosure of information to auditor

Each of the persons who are Directors at the time when this Directors' Report was approved has confirmed that:

- so far as that Director is aware, there is no relevant audit information of which the Company and the Group's auditor is unaware, and
- that Director has taken all the steps that ought to have been taken as a director in order to be aware of any relevant audit information and to establish that the Company and the Group's auditor is aware of that information. The auditor, Ernst and Young LLP, will be proposed for reappointment in accordance with section 487 of the Companies Act 2006.

This report was approved by the Board on 9 May 2019 and signed on its behalf.







Element is exposed to a variety of risks and actively manages those risks through its risk management procedures.

While risk cannot be eliminated altogether, actions are taken to mitigate risk wherever possible. As a matter of policy, the Group does not enter into speculative activities. The material business and operational risks that the Directors consider the Group to be exposed to include, but are not limited to, the following:

- The Group's reputation risk as a leader in testing services: The Group has quality control procedures and operational KPIs in place to mitigate this risk which are under constant review and subject to regular external audit by accreditation bodies and customers.
- Consolidation of customer base, competition and pricing pressure:
 The Group is improving customer service, creating and expanding focused Strategic Accounts Management and Key Accounts Management programs and improving operational delivery and regularly monitoring performance against expectations.
- Dependence on key personnel: The Group intends to continue investing in recruiting and retaining the best technical experts and ensuring that the management team and other highly skilled personnel are invested in the business alongside the Group's shareholders.
- Global economic and market conditions: The strength of our market is an important driver for our growth. Our business is well diversified both geographically and by end user. Our business activities expose us to a wide range of business practices. We have a strong Group culture of integrity and ethical behavior to ensure a consistent approach regardless of local custom.
- IT systems: The business depends on the effective operation of global IT systems. Regular system maintenance and backups are taken. Disaster recovery plans are in place across the network which are tested and improved regularly.

- Liquidity risks: In order to ensure that sufficient funds are available to fund ongoing operations and future developments, management regularly reviews cash flow forecasts and financing arrangements of the business to ensure that there is sufficient funding in place.
- Exchange and interest rate risks: The Group continues to monitor
 the exchange rate risks associated with both servicing its debt and
 the revaluation of income statement and balance sheet. The Group
 uses cross currency swaps and interest rate caps to mitigate these
 risks.

In accordance with its risk management guidelines, the Group raises awareness of business risks at all operational management levels, and encourages all management teams to assess and minimize risk. The Group ensures the appropriate cover of all essential liability and claims risks.

Further details can be found in our critical accounting judgements section on pages 110 to 111.

In preparing the Strategic Report, the Directors have complied with section 414c of the Companies Act 2006.

By order of the Board

Jo Wetz CFO

9 May 2019



INDEPENDENT AUDITOR'S REPORT TO THE MEMBERS OF ELEMENT MATERIALS TECHNOLOGY GROUP LIMITED

Report on the audit of the financial statements

Opinion

We have audited the financial statements Element Materials Technology Group Limited (the "Company") and its subsidiaries (together referred to as the "Group") for the year ended 31 December 2018 which comprise consolidated statement of profit or loss, consolidated statement of comprehensive income, consolidated statement of changes in equity, consolidated statement of financial position, consolidated statement of cash flows and the related notes 1 to 32, including a summary of significant accounting policies. The financial reporting framework that has been applied in their preparation is applicable law and International Financial Reporting Standards (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, including FRS 101 "Reduced Disclosure Framework" (United Kingdom Generally Accepted Accounting Practice).

In our opinion:

- the financial statements give a true and fair view of the Group's and of the Company's affairs as at 31 December
 2018 and of the Group's loss for the year then ended;
- the Group financial statements have been properly prepared in accordance with IFRSs as adopted by the European Union;
- the parent company financial statements have been properly prepared in accordance with IFRSs as adopted by the European Union in accordance with the provisions of the Companies Act 2006; and
- the financial statements have been prepared in accordance with the requirements of the Companies Act 2006.

Basis for opinion

We conducted our audit in accordance with International Standards on Auditing (UK) (ISAs (UK)) and applicable law. Our responsibilities under those standards are further described in the Auditor's responsibilities for the audit of the financial statements section of our report below. We are independent of the group and parent company in accordance with the ethical requirements that are relevant to our audit of the financial statements in the UK, including the FRC's Ethical Standard and we have fulfilled our other ethical responsibilities in accordance with these requirements.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinion.

Conclusions relating to going concern

We have nothing to report in respect of the following matters in relation to which the ISAs (UK) require us to report to you where:

- the directors' use of the going concern basis of accounting in the preparation of the financial statements is not appropriate; or
- the directors have not disclosed in the financial statements any identified material uncertainties that may cast
 significant doubt about the group's or the parent company's ability to continue to adopt the going concern basis
 of accounting for a period of at least twelve months from the date when the financial statements are authorised
 for issue.

INDEPENDENT AUDITOR'S REPORT TO THE MEMBERS OF ELEMENT MATERIALS TECHNOLOGY GROUP LIMITED (continued)

Other information

The other information comprises the information included in the annual report, other than the financial statements and our auditor's report thereon. The directors are responsible for the other information.

Our opinion on the financial statements does not cover the other information and, except to the extent otherwise explicitly stated in this report, we do not express any form of assurance conclusion thereon.

In connection with our audit of the financial statements, our responsibility is to read the other information and, in doing so, consider whether the other information is materially inconsistent with the financial statements or our knowledge obtained in the audit or otherwise appears to be materially misstated. If we identify such material inconsistencies or apparent material misstatements, we are required to determine whether there is a material misstatement in the financial statements or a material misstatement of the other information. If, based on the work we have performed, we conclude that there is a material misstatement of the other information, we are required to report that fact.

We have nothing to report in this regard.

Opinions on other matters prescribed by the Companies Act 2006

In our opinion, based on the work undertaken in the course of the audit:

- 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; and
- the strategic report and directors' report have been prepared in accordance with applicable legal requirements.

Matters on which we are required to report by exception

In the light of the knowledge and understanding of the group and the parent company and its environment obtained in the course of the audit, we have not identified material misstatements in the strategic report or directors' report.

We have nothing to report in respect of the following matters in relation to which the Companies Act 2006 requires us to report to you if, in our opinion:

- 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; or
- · certain disclosures of directors' remuneration specified by law are not made; or
- we have not received all the information and explanations we require for our audit.

Responsibilities of directors

As explained more fully in the directors' responsibilities statement set out on page [TBC], the directors are responsible for the preparation of the financial statements and for being satisfied that they give a true and fair view and for such internal control as the directors determine is necessary to enable the preparation of financial statements that are free from material misstatement, whether due to fraud or error.

In preparing the financial statements, the directors are responsible for assessing the group's and the parent company's ability to continue as a going concern, disclosing, as applicable, matters related to going concern and using the going concern basis of accounting unless the directors either intend to liquidate the group or the parent company or to cease operations, or have no realistic alternative but to do so.

INDEPENDENT AUDITOR'S REPORT TO THE MEMBERS OF ELEMENT MATERIALS TECHNOLOGY GROUP LIMITED (continued)

Auditor's responsibilities for the audit of the financial statements

Our objectives are to obtain reasonable assurance about whether the financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditor's report that includes our opinion. Reasonable assurance is a high level of assurance, but is not a guarantee that an audit conducted in accordance with ISAs (UK) will always detect a material misstatement when it exists. Misstatements can arise from fraud or error and are considered material if, individually or in the aggregate, they could reasonably be expected to influence the economic decisions of users taken on the basis of these financial statements.

A further description of our responsibilities for the audit of the financial statements is located on the Financial Reporting Council's website at https://www.frc.org.uk/auditorsresponsibilities. This description forms part of our auditor's report.

Use of our report

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.

Mark Harvey (Senior statutory auditor)

for and on behalf of Ernst & Young LLP, Statutory Auditor

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Glasgow

9 May 2019

CONSOLIDATED STATEMENT OF PROFIT OR LOSS

			Restated
•		2018	(note 2.27) 2017
Continuing Operations	Note	US \$million	US \$million
Revenue	4	825.4	533.0
Operating expenses		(777.4)	(518.7)
Operating Profit	5	48.0	14.3
Finance income	7	26.2	1.4
Finance costs	8	(212.3)	(215.7)
Loss before tax		(138.1)	(200.0)
Taxation	10	(12.7)	65.5
Loss for the year		(150.8)	(134.5)
Attributable to:			
Equity holders of the Parent		(155.8)	(136.3)
Non-controlling interest		5.0	1.8
Loss for the year		(150.8)	(134.5)

Reconciliation of consolidated statement of profit or loss to non- statutory measures		2018 US \$million	Restated (note 2.27) 2017 US \$million
Operating Profit		48.0	14.3
Add: Transaction, acquisition and other non-recurring costs	11	62.2	59.5
Add: Depreciation of property, plant and equipment	14	41.0	29.5
Add: Depreciation of right of use assets	. 25	15.8	8.8
Add: Amortisation of intangible assets	13	68.7	44.5
Add: Loss on disposal of property, plant and equipment		0.2	0.4
Adjusted EBITDA (Alternative Performance Measure as defined in note 2.26)		235.9	157.0
Adjusted EBITDA margin		28.6%	29.5%

CONSOLIDATED STATEMENT OF COMPREHENSIVE INCOME

		2018	Restated (note 2.27) 2017
	Note	US \$million	US \$million
Loss for the year		(150.8)	(134.5)
Items that will not be reclassified to profit or loss:			
Actuarial losses on defined benefit pension schemes	24	0.1	(0.6)
Deferred tax on items recognised in other comprehensive income	10	-	(0.1)
Total items that will not be reclassified to profit or loss		0.1	(0.7)
Items that may be reclassified subsequently to profit or loss:			
Current taxation items recognised in other comprehensive income	10	3.8	(8.8)
Foreign exchange translation difference of foreign operations		(57.5)	47.1
Foreign exchange translation difference of non-controlling interests		(0.3)	0.2
Total items that may be reclassified subsequently to profit or loss		(54.0)	38.5
Total comprehensive loss for the year		(204.7)	(96.7)
Attributable to:			
Equity holders of the Parent		(209.4)	(98.7)
Non-controlling interest		4.7	2.0
Total comprehensive loss for the year		(204.7)	(96.7)

CONSOLIDATED STATEMENT OF CHANGES IN EQUITY

					Share based		Non-	
	Share	Share	Treasury	Translation	payment	Accumulated	controlling	Total
	Capital	Premium	Shares	Reserve	reserve	losses	interests	US \$million
As at 31 December 2016	-	0.9	-	25.0	-	(77.0)	-	(51.1)
Restatement (note 2.27)	-	-	-	0.3	•	(10.5)	-	(10.2)
As at 1 January 2017	-	0.9	-	25.3	-	(87.5)	-	(61.3)
Acquisition of Exova Group plc	-	-	-	· -	-	-	13.2	13.2
(Loss) / profit for the year	-	-	-	-	_	(136.6)	1.8	(134.8)
Other comprehensive loss	-	-	-	47.1	-	(9.5)	0.2	37.8
Dividends	-	-	-			•	(0.4)	(0.4)
Issue of shares	-	0.3	-	-	-	-	-	0.3
At 31 December 2017	-	1.2	-	72.4	-	(233.6)	14.8	(145.2)
Restatement (note 2.27)	-	-	-	(0.9)		(10.2)	0.7	(10.4)
As at 1 January 2018	-	1.2	-	71.5	-	(243.8)	15.5	(155.6)
(Loss) / profit for the year			-	-	-	(155.8)	5.0	(150.8)
Other comprehensive loss	_	-	-	(57.5)	-	3.9	(0.3)	(53.9)
Share based payment reserve	-	-	-	-	3.8	-	` -	3.8
Dividends		-	-	-	-	-	(2.8)	(2.8)
Issue of shares	-	-	-	-	-	-	-	-
Disposal of non-controlling interest	-	-	-	-	-	-	(0.7)	(0.7)
As at 31 December 2018	-	1.2	-	14.0	3.8	(395.7)	16.7	(360.0)

CONSOLIDATED STATEMENT OF FINANCIAL POSITION

As at 31 December 2018

	Note	2018 US \$million	Restated (note 2.27) 2017 US \$million
Non-current assets			
Goodwill	• 12	1,264.3	1,256.6
Right of use asset	25	73.3	71.8
Other intangible assets	13	815.6	874.2
Investments		0.3	0.4
Property, plant and equipment	14	274.4	262.9
Derivative financial instruments	22	8.6	3.1
Government grants	15	2.9	6.8
		2,439.4	2,475.8
Current assets			
Trade and other receivables	16	176.1	166.2
Accrued Income		24.1	16.0
Income tax receivable	10	4.2	5.6
Government grants	15	1.0	-
Cash and cash equivalents	17	87.7	84.2
		293.1	272.0
Common National			
Current liabilities	•	(20.2)	(34.4)
Trade payables	10	(30.2)	, ,
Other payables	18	(102.4)	(79.7)
Current lease liabilities	25	(17.4)	(15.1)
Current tax liabilities	10	(12.0)	(4.2)
Provisions	19	(4.7)	(10.9)
Deferred and contingent consideration	21	(14.2)	(6.1)
Interest bearing loans and borrowings	20	(3.3)· (184.2)	(3.7) (154.1)
Net current assets		108.9	117.9
Net current assets		108.9	117.9
Non-current liabilities			
Interest bearing loans and borrowings	20	(1,865.9)	(1,749.3)
Priority shares	20	(723.1)	(650.6)
Derivative financial instruments	22	(0.3)	(0.3)
Retirement benefit obligation	24	(14.1)	(25.2)
Provisions	19	(23.4)	(19.7)
Non-current lease liabilities	25	(81.9)	(84.1)
Deferred and contingent consideration	21	(0.8)	(15.7)
Deferred tax liabilities	10	(187.4)	(192.9)
Corporation tax	10	(3.1)	(4.8)
Other payables	18	(8.3)	(6.7)
		(2,908.3)	(2,749.3)
Net liabilities		(360.0)	(155.6)

CONSOLIDATED STATEMENT OF FINANCIAL POSITION

As at 31 December 2018

			Restated (note 2.27) 2017	
		2018		
	Note	US \$million	US \$million	
Equity ,				
Share capital	27	•	-	
Share premium	27	· 1.2	1.2	
Treasury shares		-	-	
Translation reserve		14.0	71.5	
Share based payment reserve	27	3.8	-	
Accumulated losses		(395.7)	(243.8)	
Equity attributable to equity holders of the Parent		(376.7)	(171.1)	
Non-controlling interests	28	16.7	15.5	
Total shareholders' equity		(360.0)	(155.6)	

The financial statements of Element Materials Technology Group Limited (Company registration number 09915743) were approved by the Board of Directors and authorised for issue on 9 May 2019. They were signed on its behalf by:

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Jo Wetz Director 9 May 2019

CONSOLIDATED STATEMENT OF CASH FLOWS

		2018	Restated (note 2.27) 2017
	Note	US \$million	US \$million
Cash flows from operating activities		,	
Net loss for the year		(150.8)	(134.5)
Adjustments for:		(,	(202)
Income tax charge/(credit) recognised in profit and loss	10	12.7	(65.5)
Finance income	7	(26.2)	(1.4)
Finance costs	8	212.3	215.7
Loss on disposal of property, plant and equipment	5	0.2	0.4
Depreciation of property, plant and equipment	14	41.0	29.5
Depreciation of right of use assets	25	15.8	8.8
Amortisation of other intangible assets	13	68.7	44.5
Government grants		-	(0.1)
Share based payment charge	27	3.8	-
Non-cash movement in defined benefit pension obligations	24	0.8	0.2
· · · · · ·		178.3	97.6
Movements in working capital:			
Increase in trade and other receivables		(19.1)	(0.5)
Increase in trade and other receivables Increase/(decrease) in trade and other payables		5.9	(0.5) (14.4)
Cash generated from operations		165.1	82.7
cash generated from operations		100.1	<u> </u>
Income taxes paid		(9.4)	(5.3)
Net cash generated by operating activities		155.7	77.4
Cash flows from investing activities			
Purchase of property, plant and equipment	14	(50.9)	(31.6)
Proceeds from disposal of property, plant and equipment		2.6	0.5
Purchase of intangible assets	13	(2.6)	(2.9)
Net cash outflow on acquisition of Exova Group plc		-	(705.2)
Net cash outflow on business acquisitions	23	(74.6)	(77.2)
Cash outflow on deferred and contingent consideration	21	(6.5)	-
Net cash used in investing activities		(132.0)	(816.4)
Cook flows from financian behinder			
Cash flows from financing activities	20	40E 9	1 447 2
Borrowings	20	495.8	1,447.3
Repayment of borrowings	20	(316.3)	(806.4)
Interest paid Panayment of finance losse liabilities	8	(156.3)	(53.7) (0.1)
Repayment of finance lease liabilities Payment of lease liabilities	25	(25.8)	(15.7)
Payment for debt issue costs	20	(13.1)	(28.1)
Settlement of derivative financial instrument	20	(13.1)	(17.1)
Issue of shares		-	0.3
Issue of priority shares	27	0.9	196.4
Issue of loan notes	21	-	54.0
Dividends paid to non-controlling interests	28	(2.8)	(0.4)
Net cash (used in)/provided by financing activities		(17.6)	776.5
		(=:)	
Net increase in cash and cash equivalents		6.1	37.5
Cash and cash equivalents at the beginning of the year		84.2	44.9
Effects of exchange rates on cash and cash equivalents		(2.6)	1.8
Cash and cash equivalents at the end of the year	17	87.7	84.2

1. Statement of compliance and presentation of financial statements

The consolidated financial statements of Element Materials Technology Group Limited (the "Company") and its subsidiaries (together referred to as the "Group"), have been prepared in accordance with International Financial Reporting Standards as adopted in the European Union ("IFRS") and as issued by the International Accounting Standards Board (IASB). The accounting policies under IFRS are included in the relevant notes to the consolidated financial statements.

The Company and entities controlled by the Company (its subsidiaries, together the "Group") are disclosed in note 32.

The Company is a private company incorporated and domiciled in England and Wales. The Company's registered office is 5 Fleet Place, London, England, United Kingdom EC4M 7RD.

The financial statements were approved by the Board of Directors and authorised for issue on 9 May 2019.

2. Basis of preparation and significant accounting policies

The principal accounting policies applied in the preparation of the consolidated financial statements are described below.

These policies have been consistently applied to all periods presented, unless otherwise stated.

2.1 Basis of preparation

The consolidated financial statements have been prepared on the historical cost basis, except for the revaluation of certain financial instruments that are measured at fair value at the end of each reporting period. The financial statements are presented in United States Dollars (US\$) which is the Company's functional currency. Historical cost is generally based on the fair value of the consideration given in exchange for goods and services.

The principal accounting policies adopted are set out below.

2.2 Basis of consolidation

The consolidated financial statements incorporate the financial statements of the Company and entities controlled by the Company (its subsidiaries) made up to 31 December each year. Control is achieved when the Company:

- has the power over the investee;
- · is exposed, or has rights, to variable return from its involvement with the investee; and
- has the ability to use its power to affect its returns.

The Company reassesses whether or not it controls an investee if facts and circumstances indicate that there are changes to one or more of the three elements of control listed above.

Consolidation of a subsidiary begins when the Company obtains control over the subsidiary and ceases when the Company loses control of the subsidiary. Specifically, the results of subsidiaries acquired or disposed of during the year are included in the consolidated statement of profit or loss and other comprehensive income from the date the Company gains control until the date when the Company ceases to control the subsidiary.

Profit or loss and each component of other comprehensive income are attributed to the owners of the Company and to the non-controlling interests. Total comprehensive income of the subsidiaries is attributed to the owners of the Company and to the non-controlling interests even if this results in the non-controlling interests having a deficit balance.

Where necessary, adjustments are made to the financial statements of subsidiaries to bring the accounting policies used into line with the Group's accounting policies.

All intragroup assets and liabilities, equity, income, expenses and cash flows relating to transactions between the members of the Group are eliminated on consolidation.

Non-controlling interests in subsidiaries are identified separately from the Group's equity therein. The interests of non-controlling shareholders that represent ownership interests entitling their holders to a proportionate share of net assets upon liquidation may initially be measured at fair value or at the non-controlling interests' proportionate share of the fair value of the acquiree's identifiable net assets. The choice of measurement is made on an acquisition-by-acquisition basis. Other non-controlling interests are initially measured at fair value. Subsequent to acquisition, the carrying amount of non-controlling interests is the amount of those interests at initial recognition plus the non-controlling interests' share of subsequent changes in equity.

Changes in the Group's interests in subsidiaries that do not result in a loss of control are accounted for as equity transactions. The carrying amount of the Group's interests and the non-controlling interests are adjusted to reflect the changes in their relative interests in the subsidiaries. Any difference between the amount by which the non-controlling interests are adjusted and the fair value of the consideration paid or received is recognised directly in equity and attributed to the owners of the Company.

The Group has a number of joint arrangements where more than half of the voting power is not owned. As the Group is exposed, or has rights, to variable returns from its involvement with these companies and has the ability to use its power over these companies to affect the amount of the company returns, these investments are accounted for as subsidiaries.

2.3 Going concern

The Group's business activities, together with factors likely to affect its future development, performance and position are considered by the directors on an annual basis. In addition, notes 20 and 22 include details of the Group's treasury activities, long-term funding arrangements, financial instruments and financial risk management activities.

The Group has sufficient financial resources which, together with internally generated cash flows, will continue to provide sufficient sources of liquidity to fund its current operations, including its contractual and commercial commitments as set out in note 22. The directors assess forecasts and make financing and liquidity reviews on a regular basis.

The directors have, at the time of approving the financial statements, a reasonable expectation that the Company and the Group have adequate resources to continue in operational existence for the foreseeable future. Thus they continue to adopt the going concern basis of accounting in preparing the financial statements.

2.4 Adoption of new and revised accounting standards

Standards and amendments effective for the year

The Group has adopted all the new and revised Standards and interpretations issued by the International Accounting Standards Board ("IASB") and International Financial Reporting Interpretations Committee ("IFRIC") of the IASB that are relevant to its operations and effective for accounting periods covered by the financial statements. IFRS 9: Financial Instruments, IFRS 15: Revenue from contracts with customers and IFRS 16: Leases which have been adopted early on a fully retrospective basis covering the whole of the historical financial information period. The adoption of IFRS 16 has had a material effect on the amounts reported. The impact is analysed in note 2.27. Neither IFRS 9 or 15 have had a material impact on the consolidated and separate financial statements.

IFRS 9: Financial Instruments (as revised in July 2014)

A significant change introduced by IFRS 9 in the classification and measurement of financial liabilities relates to the accounting for changes in the fair value of a financial liability designated as Fair Value Through Profit and Loss ("FVTPL") attributable to changes in the credit risk of the issuer.

Specifically, IFRS 9 requires that the changes in the fair value of the financial liability that are attributable to changes in the credit risk of that liability be presented in other comprehensive income, unless the recognition of the effects of changes in the liability's credit risk in other comprehensive income would create or enlarge an accounting mismatch in profit or loss. Changes in fair value attributable to a financial liability's credit risk are not subsequently reclassified to profit or loss, but are instead transferred to retained earnings when the financial liability is derecognised. Previously, under IAS 39, the entire amount of the change in the fair value of the financial liability designated as at FVTPL was presented in profit or loss. There is no impact from this change on the Group consolidated financial statements.

There were no financial assets or financial liabilities which the Group had previously designated as at FVTPL under IAS 39 that were subject to reclassification or which the Group has elected to reclassify upon the application of IFRS 9. There were no additional financial assets or financial liabilities which the Group has elected to designate as FVTPL at the date of initial application of IFRS 9.

The transition provisions of IFRS 9 allow an entity not to restate comparatives. The impact on adoption of IFRS 9 on 1 January 2018 is to decrease the accumulated losses balance from US \$3.8 million as previously stated to US \$3.3 million. The US \$0.5 million decrease in accumulated losses resulted from US \$0.7 million reversal of expected credit loss net of US \$0.2 million written off during the year relating to trade receivables. The Group has applied IFRS 9 in accordance with the transition provisions set out in IFRS 9.

Details of these new requirements, as well as their impact on the Group's consolidated financial statements, are described below.

Classification and measurement of financial assets

The date of initial application (i.e. the date on which the Group has assessed its existing financial assets and financial liabilities in terms of the requirements of IFRS 9) is 1 January 2018. Accordingly, the Group has applied the requirements of IFRS 9 to instruments that continue to be recognised as at 1 January 2018 and has not applied the requirements to instruments that have already been derecognised as at 1 January 2018.

All recognised financial assets that are within the scope of IFRS 9 are required to be measured subsequently at amortised cost or fair value on the basis of the entity's business model for managing the financial assets and the contractual cash flow characteristics of the financial assets.

Specifically:

- debt instruments that are held within a business model whose objective is to collect the contractual cash flows and that
 have contractual cash flows that are solely payments of principal and interest on the principal amount outstanding, are
 measured subsequently at amortised cost; and
- all other debt investments and equity investments are measured subsequently at FVTPL.

The application of IFRS 9 has had US \$0.7 million impact on the Group's consolidated financial position as at 31 December 2018 and consolidated statement of profit or loss.

2.4 Adoption of new and revised accounting standards (continued)

IFRS 15: Revenue from Contracts with Customers

In the current year, the Group has applied IFRS 15 Revenue from Contracts with Customers (as amended in April 2016). IFRS 15 introduces a 5-step approach to revenue recognition. Far more prescriptive guidance has been added in IFRS 15 to deal with specific scenarios. Details of these new requirements as well as their impact on the Group's consolidated financial statements are described below.

The Group has applied IFRS 15 in accordance with the fully retrospective transitional approach without using the practical expedients for completed contracts in IFRS 15.C5(a) and (b), or for modified contracts in IFRS 15.C5(c), or using the expedient in IFRS 15.C3(d) allowing both non-disclosure of the amount of the transaction price allocated to the remaining performance obligations and an explanation of when it expects to recognise that amount as revenue for all reporting periods presented before the date of initial application.

IFRS 15 uses the terms 'contract asset' and 'contract liability' to describe what might more commonly be known as 'accrued income' and 'deferred income', however the Standard does not prohibit an entity from using alternative descriptions in the statement of financial position. The Group has not adopted the terminology used in IFRS 15 to describe such balances.

The Group's accounting policies for revenue are disclosed below. Apart from providing more extensive disclosures on the Group's revenue transactions, the application of IFRS 15 has not had a significant impact on the financial position and financial performance of the Group. This is principally because the service contracts were already well aligned with the performance obligation separation requirements of IFRS 15. As such no restatement of balances previously presented are required in respect of this standard.

The Group recognises revenue from the rendering of materials and product qualification testing, inspection, certification, calibration and services pursuant to written contracts with its customers. These services are recognised as the performance obligations are satisfied over time. Revenue is measured at the fair value of the consideration received or receivable and represents amounts receivable for services provided in the normal course of business, VAT and other sales-related taxes. Revenue is reduced for estimated and agreed liquidated damages resulting from failure to meet the agreed service performance levels set out in the contract.

For short term contracts with single performance obligations, customers are billed in accordance with the contractual terms and revenue is recognised as the performance obligations are satisfied.

For long term contracts with multiple performance obligations, the customers are billed when the performance obligations are completed. Though multiple performance obligations arise as a result of the provision of these services, the Group considers it reasonable to combine the provision of these testing services into a single performance obligation as this does not impact the ultimate pattern of revenue recognition as they are all recognised over time.

IFRS 16 - Leases (early adopted and therefore applicable to the 2018 financial year)

The Group has early adopted IFRS 16: Leases under the fully retrospective approach which has resulted in changes to the accounting policies. The adoption of IFRS 16 has resulted in restatement of balances previously presented, the impact of which is explained in note 2.27.

Where leases were previously recognised as finance leases under IAS 17: Leases there is a minimal impact from IFRS 16. Where the group is in a lessee position it is a requirement to capitalise leases previously not reflected within the statement of financial position.

The change in accounting standard results in both an asset and liability being brought onto the statement of financial position for the majority of leases where the Group is a lessee. The assets are then depreciated and interest expense recognised over the life of the lease. Sublease receivables are recognised on the balance sheet. As at 31 December 2017, the restated statement of financial position includes additional right-of-use assets of US \$71.8 million and additional lease liabilities of US \$99.2 million.

The impact on the statement of profit or loss for the 12 months to 31 December 2017 is an increase of US \$6.9 million to both reported and adjusted operating profit offset by a net increase to finance costs of US \$6.5 million.

2.4 Adoption of new and revised accounting standards (continued)

Opening balance sheet adjustment

An opening balance sheet adjustment has been made at 1 January 2017 to reflect the prior year impact of adopting IFRS 16 "Leases". The adjustment reduces opening retained earnings by US \$10.2 million (net of deferred tax impact of US \$3.0 million) and this relates mainly to the recognition of lease expense earlier on in the lease under IFRS 16.

The other interpretations and amendments to IFRS effective for 2018 have not had a material impact on the Group's accounting policies or reporting.

Standards, amendments and interpretations not yet effective

A number of amendments and interpretations have been issued that are not expected to have any material impact on the accounting policies and reporting.

2.5 Business combinations

The consideration transferred in a business combination is measured at fair value, which is calculated as the sum of the acquisition date fair values of assets transferred by the Group, liabilities incurred by the Group to the former owners of the acquiree and the equity interest issued by the Group in exchange for control of the acquiree. Acquisition related costs are recognised in the statement of profit or loss as incurred.

At the acquisition date, the identifiable assets acquired and the liabilities assumed are recognised at their fair value at the acquisition date, except that:

 deferred tax assets or liabilities and assets or liabilities related to employee benefit arrangements are recognised and measured in accordance with IAS 12 Income Taxes and IAS 19 Employee Benefits respectively.

Goodwill is measured as the excess of the sum of the consideration transferred, the amount of any non-controlling interests in the acquiree and the fair value of the acquirer's previously held equity interest in the acquiree (if any) over the net of the acquisition date amounts of the identifiable assets acquired and the liabilities assumed. If, after reassessment, the net of the acquisition date amounts of the identifiable assets acquired and liabilities assumed exceeds the sum of the consideration transferred, the amount of any non-controlling interests in the acquiree and the fair value of the acquirer's previously held interest in the acquiree (if any), the excess is recognised immediately in the statement of profit or loss as a bargain purchase gain.

When the consideration transferred by the Group in a business combination includes an asset or liability resulting from a contingent consideration arrangement, the contingent consideration is measured at its acquisition date fair value and included as part of the consideration transferred in a business combination. Changes in fair value of a contingent consideration qualifying as measurement period adjustments are adjusted retrospectively, with corresponding adjustments against goodwill. Measurement period adjustments are adjustments that arise from additional information obtained during the 'measurement period' (which cannot exceed one year from the acquisition date) about facts and circumstances that existed at the acquisition date.

Subsequent accounting for changes in fair value of contingent consideration that do not qualify as measurement period adjustments depend on how the contingent consideration is classified. Contingent consideration that is classified as equity is not remeasured at subsequent reporting dates and its subsequent settlement is accounted for within equity. Contingent consideration that is classified as an asset or a liability is remeasured at subsequent reporting dates at fair value with the corresponding gain or loss being recognised in the statement of profit or loss.

When a business combination is achieved in stages, the Group's previously held interests in the acquired entity is remeasured to its acquisition date fair value and the resulting gain or loss, if any, is recognised in the statement of profit or loss. Amounts arising from interests in the acquiree prior to the acquisition date that have previously been recognised in other comprehensive income are reclassified to the statement of profit or loss, where such treatment would be appropriate if that interest were disposed of.

If the initial accounting for a business combination is incomplete by the end of the reporting period in which the combination occurs, the Group reports provisional amounts for the items for which the accounting is incomplete. Those provisional amounts are adjusted during the measurement period (see above), or additional assets or liabilities are recognised, to reflect new information obtained about facts and circumstances that existed as of the acquisition date that, if known, would have affected the amounts recognised at that date.

2.6 Goodwill and Intangibles

Goodwill

Goodwill arising on an acquisition of a business is carried at cost as established at the date of acquisition of the business less accumulated impairment losses, if any.

For the purposes of impairment testing, goodwill is allocated to the Group's cash-generating units (or groups of cash-generating units) that are expected to benefit from the synergies of the combination.

A cash-generating unit to which goodwill has been allocated is tested for impairment annually, or more frequently when there is an indication that the unit may be impaired. If the recoverable amount of the cash-generating unit is less than its carrying amount, the impairment loss is allocated first to reduce the carrying amount of any goodwill allocated to the unit and then to the other assets of the unit pro-rata based on the carrying amount of each asset in the unit. Any impairment loss for goodwill is recognised directly in the consolidated statement of profit or loss. An impairment loss recognised for goodwill is not reversed in subsequent periods.

On disposal of the relevant cash-generating unit, the attributable amount of goodwill is included in the determination of the profit or loss on disposal.

Intangible Assets

Intangible assets that are acquired separately are carried at cost less accumulated amortisation and accumulated impairment losses, if applicable. The estimated useful life and amortisation method are reviewed at the end of each reporting period, if necessary any changes in estimates are accounted for on a prospective basis.

Intangible assets acquired in a business combination and recognised separately from goodwill are initially recognised at their fair value at the acquisition date, together with any related deferred tax liability. Amortisation is charged on a straight line basis to the statement of profit or loss over the expected useful economic lives as follows:

Customer relationships	10 - 20 years
Customer contracts '	10 years
Technology know how & process	10 years
Trade names	10 years
Other intangible assets (includes backlog and covenant not to compete)	1 -5 years
Software & Computer licences	1 - 4 years

The internal costs directly attributable to the development of software and infrastructure projects are capitalised as "other intangible assets" if the future economic benefits to the Group are reasonably certain. The capitalised costs are amortised on a straight line basis over the expected useful economic life of the asset.

An intangible asset is derecognised on disposal, or when no further economic benefits are expected from use or disposal. Gains or losses arising from recognition of an intangible asset, measured as the difference between the net disposal proceeds and the net carrying amount of the asset, are recognised in the statement of profit or loss when the asset is derecognised.

2.7 Impairment of tangible and intangible assets other than goodwill

At the end of each reporting period, the Group reviews the carrying amounts of its tangible and intangible assets to determine whether there is any indication that those assets have suffered an impairment loss. If any such indication exists, the recoverable amount of the asset is estimated in order to determine the extent of the impairment loss, if any. When it is not possible to estimate the recoverable amount of an individual asset, the Group estimates the recoverable amount of the cash-generating unit to which the asset belongs.

When a reasonable and consistent basis of allocation can be identified, corporate assets are also allocated to individual cash-generating units, or otherwise they are allocated to the smallest group of cash-generating units for which a reasonable and consistent allocation basis can be identified.

Intangible assets with indefinite useful lives and intangible assets not yet available for use are tested for impairment at least annually and whenever there is an indication that the asset may be impaired.

Recoverable amount is the higher of fair value less costs to sell and value in use. In assessing value in use, the estimated future cash flows are discounted to their present value 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 the estimates of future cash flows have not been adjusted.

If the recoverable amount of an asset or cash-generating unit is estimated to be less than its carrying amount, the carrying amount of the asset or cash-generating unit is reduced to its recoverable amount. An impairment loss is recognised immediately in the statement of profit or loss.

When an impairment loss subsequently reverses, the carrying amount of the asset or a cash-generating unit is increased to the revised estimate of its recoverable amount, but so that the increased carrying amount does not exceed the carrying amount that would have been determined had no impairment loss been recognised for the asset or cash-generating unit in prior years. A reversal of an impairment loss is recognised immediately in the statement of profit or loss.

2.8 Foreign currency translation

In preparing the Group's financial statements, transactions in currencies other than the Group's presentational currency (foreign currencies) are recognised at the rates of exchange prevailing at the dates of the transactions. At the end of each reporting period, monetary items denominated in foreign currencies are retranslated at the rates prevailing at that date. Non-monetary items carried at fair value that are denominated in foreign currencies are retranslated at the rates prevailing at the date when the fair value was determined. Non-monetary items that are measured in terms of historical cost in a foreign currency are not retranslated.

Exchange differences on monetary items are recognised in the statement of profit or loss in the period in which they arise except for:

- exchange differences on foreign currency borrowings relating to assets under construction 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;
- exchange differences on transactions entered into in order to hedge certain foreign currency risks (see below for hedging accounting policies); and
- exchange differences on monetary items receivable from or payable to a foreign operation for which settlement is
 neither planned nor likely to occur (therefore forming part of the net investment in the foreign operation), which are
 recognised initially in other comprehensive income and reclassified from equity to the statement of profit or loss on
 repayment of the monetary items.

For the purposes of presenting consolidated financial statements, the assets and liabilities of the Group's foreign operations are translated using exchange rates prevailing at the end of each reporting period. Income and expense items are translated at the average exchange rates for the period, unless exchange rates fluctuate significantly during that period, in which case the exchange rates at the dates of the transactions are used. Exchange differences arising, if any, are recognised in other comprehensive income and accumulated in equity, attributed to non-controlling interests as appropriate.

On the disposal of a foreign operation (i.e. a disposal of the Group's entire interest in a foreign operation, or a disposal involving loss of control over a subsidiary that includes a foreign operation, a disposal involving loss of joint control over a jointly controlled entity that includes a foreign operation, or a disposal involving loss of significant influence over an associate that includes a foreign operation), all of the exchange differences accumulated in equity in respect of that operation attributable to the owners of the Group are reclassified to the statement of profit or loss.

Goodwill and fair value adjustments on identifiable assets and liabilities acquired arising on the acquisition of a foreign operation are treated as assets and liabilities of the foreign operation and translated at the rate of exchange prevailing at the end of each reporting period. Exchange differences arising are recognised in equity.

The consolidated financial statements are presented in United States Dollars (\$US). All information provided in United States Dollars (\$US) has been rounded to the nearest hundred thousand, unless otherwise stated.

2.9 Financial instruments - derivatives

The Group does not hold or issue derivative financial instruments for trading purposes.

Derivative financial instruments are recognised initially at fair value. Subsequent to initial recognition, derivative financial instruments are stated at fair value at each balance sheet date.

The gain or loss on re-measurement to fair value is recognised immediately in the statement of profit or loss.

2.10 Financial liabilities and equity instruments

Classification as debt or equity

Debt and equity instruments are classified as either financial liabilities or as equity in accordance with the substance of the contractual arrangements and the definitions of a financial liability and an equity instrument.

Equity instruments

An equity instrument is any contract that evidences a residual interest in the assets of an entity after deducting all of its liabilities. Equity instruments issued by the Group are recognised at the proceeds received, net of direct issue costs.

No gain or loss is recognised in the statement of profit or loss on the purchase, sale, issue or cancellation of the Group's own equity instruments.

Debt issuance costs

Finance costs of debt, including premiums payable on settlement and direct issue costs, are charged to the statement of profit or loss on an accruals basis over the term of the instrument, using the effective interest method, where it is materially different to the straight line method.

Derivative Financial Instruments

Short-term debtors and creditors are treated as financial assets or liabilities. The Group does not trade in financial instruments. The Group enters into derivative financial instruments to manage its exposure to interest rate risk.

Derivatives are initially recognised at fair value at the date a derivative contract is entered and are subsequently remeasured to their fair value at each reporting date. The resulting gain or loss is recognised in profit or loss immediately.

A derivative with a positive fair value is recognised as a financial asset whereas a derivative with a negative fair value is recognised as a financial liability. A derivative is presented as a non-current asset or a non-current liability if the remaining maturity of the instrument is more than 12 months and it is not expected to be realised or settled within 12 months. Other derivatives are presented as current assets or current liabilities.

Other financial liabilities

Other financial liabilities, including borrowings, are initially measured at fair value, net of transaction costs.

Other financial liabilities are subsequently measured at amortised cost using the effective interest method, with interest expense recognised on an effective yield basis.

Derecognition of financial liabilities

The Group and the Company derecognise financial liabilities when, and only when, the Group's and the Company's obligations are discharged, cancelled or have expired. The difference between the carrying amount of the financial liability derecognised and the consideration paid and payable is recognised in statement of profit or loss.

2.11 Property; plant and equipment

Property, plant and equipment are stated at historical cost less accumulated depreciation and accumulated impairment losses, if any.

The cost of property, plant and equipment is the purchase cost, together with any directly attributable costs. Costs include professional fees and for qualifying assets, borrowing costs capitalised in accordance with the Group's accounting policy.

Depreciation is provided on all tangible fixed assets other than land, at rates calculated to write off the cost or valuation, less estimated residual value, of each asset on a straight-line basis over its expected useful life, as follows:

2 - 5%

Buildings

Leasehold improvements

Lower of useful life or contractual lease term

Plant and equipment

Assets under the course of construction are classified to the appropriate categories of property, plant and equipment when completed and ready for intended use. Depreciation of these assets is determined on its asset category and commences when the assets are completed and ready for their intended use.

An item of property, plant and equipment is derecognised upon disposal or when no future economic benefits are expected to arise from the continued use of the asset. Any gain or loss arising on the disposal or retirement of an item of property, plant and equipment is determined as the difference between the sales proceeds and the carrying amount of the asset and is recognised in the statement of profit or loss.

2.12 Provisions

Provisions are recognised when the Group has a present obligation, legal or constructive, as a result of a past event, it is probable that the Group will be required to settle the obligation and a reliable estimate can be made of the amount of the obligation.

The best estimate of the consideration required to settle the present obligation at the end of the reporting period is measured by considering the risks and uncertainties surrounding the obligation. When a provision is measured using the cash flows estimated to settle the present obligation, it's carrying amount is the present value of those cash flows when the effect of the time value of money is material.

A restructuring provision is recognised when the Group has developed a detailed formal plan for restructuring and has raised a valid expectation in those affected that it will carry out the restructuring by starting to implement the plan or announcing its main features to those affected by it. The measurement of a restructuring provision includes only the direct expenditures arising from the restructuring which are those amounts that are both necessarily entailed by the restructuring and not associated with the on-going activities of the Group.

When some or all of the economic benefits required to settle a provision are expected to be recovered from a third party, a receivable is recognised as an asset if it is virtually certain that reimbursement will be received, and the amount of the receivable can be measured reliably.

2.13 Lease accounting

The Group holds leases primarily on land, buildings and motor vehicles used in the ordinary course of business. The Group recognises a right-of-use asset and a lease liability at the commencement date of the contract for all leases conveying the right to control the use of an identified asset for a period of time. The commencement date is the date on which a lessor makes an underlying asset available for use by a lessee.

All leases where the Group is the lessee (except for low-value lease arrangements) are recognised in the statement of financial position. A lease liability is recognised based on the present value of the future lease payments, and a corresponding right-of-use asset is recognised. The right-of-use asset is depreciated over the shorter of the lease term or the useful life of the asset is recognised. Lease payments are apportioned between finance charges and a reduction of the lease liability.

The right-of-use assets are initially measured at cost, which comprises:

- the amount of the initial measurement of the lease liability;
- any lease payments made at or before the commencement date, less any lease incentives received; and,
- any initial direct costs incurred by the lessee.

After the commencement date the right-of-use assets are measured at cost less any accumulated depreciation and any accumulated impairment losses and adjusted for any remeasurement of the lease liability.

The Group depreciates the right-of-use asset from the commencement date to the end of the lease term. The lease liability is initially measured at the present value of the lease payments that are not paid at that date. These include:

- fixed payments, less any lease incentives receivable; and
- variable lease payments that depend on a fixed rate, as at the commencement date.

The leases held by the Group are split into two categories: property and non-property. The Group leases various properties, principally offices and laboratories, which have varying terms and renewal rights that are typical to the territory in which they are located. Non-property includes all other leases, such as motor vehicles, printers and other small office equipment.

Variable lease payments not included in the initial measurement of the lease liability are recognised in the consolidated statement of profit or loss as they arise.

The lease payments are discounted using the incremental borrowing rate at the commencement of the lease contract or modification. Generally it is not possible to determine the interest rate implicit in the land and building leases. The incremental borrowing rate is estimated taking account of the economic environment of the lease, the currency of the lease term determined by the Group comprises:

- non-cancellable period of lease contracts;
- periods covered by an option to extend the lease if the Group is reasonably certain to exercise that option; and
- periods covered by an option to terminate the lease if the Group is reasonably certain not to exercise that option.

After the commencement date the Group measures the lease liability by:

- increasing the carrying amount to reflect interest on the lease liability;
- reducing the carrying amount to reflect lease payments made; and
- remeasuring the carrying amount to reflect any reassessment or lease modifications.

The right-of-use asset and lease liability balances are calculated with reference to the underlying functional currency and then translated to USD.

2.14 Employee Benefit Plans

Payments to defined contribution retirement benefit plans are recognised as an expense when employees have rendered service entitling them to the contributions. Payments made to state-managed retirement benefit schemes are dealt with as payments to defined contribution schemes where the Group's obligations under the schemes are equivalent to those arising in a defined contribution retirement benefit scheme.

The Group operates several defined benefit plans in the UK, Sweden, Germany, Netherlands and Norway all of which require contributions to be made to separately administered funds or insurance schemes. The cost of providing benefits under the defined benefit plans are determined using actuarial valuations that are carried out at the end of each reporting period. Remeasurement comprises of actuarial valuations being carried out at the end of each reporting period. Remeasurement of actuarial gains and losses, and the return on scheme assets (excluding interest) are recognised immediately in the balance sheet with a charge or credit to the statement of comprehensive income in the period which they occur. Re-measurement recorded in the statement of comprehensive income is not recycled. Past service costs are recognised in the statement of profit or loss in the period of scheme amendment. Net interest is calculated by applying a discount rate to the defined benefit liability or asset. Defined benefit costs are split into three categories:

- Current service cost, past service cost and gains and losses on curtailments and settlements;
- Net interest expense or income; and
- Re-measurement.

The first two components of defined benefit costs are presented within administrative expenses in its consolidated statement of profit or loss. Curtailment gains and losses are accounted for as past-service costs.

Net interest expense or income is recognised within finance costs.

The retirement benefit obligation recognised in the consolidated statement of financial position represents the deficit or surplus in the Group's defined benefit schemes. Any surplus resulting from this calculation is limited to the present value of economic benefits available in the form of refunds from the schemes or reductions in the future contributions to the schemes

A liability for a termination benefit is recognised at the earlier of when the entity can no longer withdraw the offer of the termination benefit and when the entity recognises any related restructuring costs.

The retirement benefit obligation for all defined benefit plans operated by the Group was US \$14.1 million as at 31 December 2018 (2017: US \$25.2 million).

2.14a Share Based Payments

As described in note 27, certain employees and directors of the Group are holders of certain ordinary shares that are considered equity-settled share based payment transactions. The Group recognises shared based payments expense based on the grant date fair value, spread over the period from grant date to the best estimate of the anticipated exit date. An option pricing model is used to determine the grant date fair value as explained further in note 27.

2.15 Short term employee benefits

The Group accrues for all short-term accumulating compensated balances such as holiday entitlement earned but not taken at the balance sheet date.

2.16 Cash and cash equivalents

Cash and cash equivalents are comprised of cash on hand and demand deposits and other short term highly liquid investments that are readily convertible to a known amount of cash and are subject to an insignificant risk of change in value less overdrafts held with banks.

2.17 Government grants

Government grants are recognised where there is reasonable assurance that the grant will be received, and all attached conditions will be complied with. When the grant relates to an expense item, it is recognised as income over the period necessary to match the grant on a systematic basis to the costs that it is intended to compensate.

2.18 Related parties

Parties are considered to be related to the Group if they have the ability, directly or indirectly to control the Group or exercise significant influence over the Group in making financial or operating decisions, or vice versa, or where the Group is subject to common control or common significant influence. Related parties may be individuals or other entities.

2.19 Trade receivables

Trade receivables are recognised by the Group and the Company carried at original invoice amount less an allowance for any non-collectable or impaired amounts. The Group uses the IFRS 9 ECL model to measure loss allowances at an amount equal to their lifetime expected credit loss (refer to note 2.4).

2.20 Trade payables

Trade payables are recognised initially at fair value and subsequently measured at amortised cost using the effective interest method.

2.21 Borrowings

Interest bearing loans and overdrafts are recorded at the proceeds received, net of direct issue costs. Finance charges, including premiums on settlement or redemption and direct issue costs, are accounted for on an accrual basis in the consolidated statement of profit or loss using the effective interest rate 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.

2.22 Taxation

Income tax expense represents the sum of the tax currently payable and deferred tax.

Current tax

The tax currently payable is based on taxable profit for the year. Taxable profit differs from profit as reported in the consolidated statement of comprehensive income because of items of income or expense that are taxable or deductible in other years and items that are never taxable or deductible. The Group's liability for current tax is measured at the effective tax rate.

Deferred tax

Deferred tax is recognised on temporary differences between the carrying amounts of assets and liabilities in the consolidated financial statements and the corresponding tax bases used in the computation of taxable profit. Deferred tax liabilities are generally recognised for all taxable temporary differences. Deferred tax assets are generally recognised for all deductible temporary differences to the extent that it is probable that taxable profits will be available against which those deductible temporary differences can be utilised. Such deferred tax assets and liabilities are not recognised if the temporary difference arises from goodwill or from the initial recognition (other than in a business combination) of other assets and liabilities in a transaction that affects neither the taxable profit nor the accounting profit.

Deferred tax liabilities are recognised for taxable temporary differences associated with investments in subsidiaries and associates, except where the Group is able to control the reversal of the temporary difference and it is probable that the temporary difference will not reverse in the foreseeable future. Deferred tax assets arising from deductible temporary differences associated with such investments are only recognised to the extent that it is probable that there will be sufficient taxable profits against which to utilise the benefits of the temporary differences and they are expected to reverse in the foreseeable future.

The carrying amount of deferred tax assets is reviewed at the end of each reporting period and reduced to the extent that it is no longer probable that sufficient taxable profits will be available to allow all or part of the asset to be recovered.

Deferred tax liabilities and assets are measured at the tax rates that are expected to apply in the year in which the liability is settled or the asset realised, based on tax rates and tax laws that have been enacted or substantively enacted by the end of the reporting period. The measurement of deferred tax liabilities and assets reflect the tax consequences that would follow from the manner in which the Group expects, at the end of the reporting period, to recover or settle the carrying amount of its assets and liabilities.

2.22 Taxation (continued)

Current and deferred tax for the year

Current and deferred tax are recognised in the statement of profit or loss, except when they relate to items that are recognised in other comprehensive income or directly in equity, in which case, the current and deferred tax are also recognised in other comprehensive income or directly in equity respectively. Where current tax or deferred tax arises from the initial accounting for a business combination, the tax effect is included in the accounting for the business combination.

2.23 Joint ventures

A joint venture is a type of joint arrangement whereby the parties have joint control of the arrangement and have rights to the net assets of the joint venture. Joint control is the contractually agreed sharing of control of an arrangement, which exists only when decisions about the relevant activities requires consent of the parties sharing control. The Group's investments in joint ventures are accounted for using the equity method.

Under the equity method, the investment in a joint venture is initially recognised at cost. The carrying amount of the investment is adjusted to recognise changes in the Group's share of net assets of the joint venture since the acquisition date. Goodwill relating to the joint venture is included in the carrying amount of the investment and is not tested for impairment individually. The statement of profit or loss reflects the Group's share of the results of operations of the joint venture. Any change in other comprehensive income of those investees is presented as part of the Group's other comprehensive income. In addition, when there has been a change recognised directly in the equity of the joint venture, the Group recognises its share of any changes, when applicable, in the statement of changes in equity.

Unrealised gains and losses resulting from transactions between the Group and the joint venture are eliminated to the extent of the interest in the joint venture. The aggregate of the Group's share of profit or loss of a joint venture is shown on the face of the statement of profit or loss.

2.24 Contingent consideration

Contingent consideration arises when settlement of all or any part of the cost of a business combination is deferred and becomes payable only when the acquiree meets certain financial performance criteria at a date pre-determined on the date of acquisition. It is stated at fair value at the date of acquisition which is determined by discounting the amount due to present value at that date. Interest is calculated on the fair value of non-interest-bearing deferred consideration at the discount rate and expensed within interest payable and similar charges. At each balance sheet date contingent consideration comprises the remaining contingent consideration valued at acquisition plus interest calculated on such amounts from acquisition to the balance sheet date.

2.25 Investments

Investments in subsidiaries are included in the financial statements initially at cost. Cost comprises all the costs associated with the acquisition of the investment including the fair value of the consideration for the investment instruments, any local taxes and costs associated with investigation and negotiating the acquisition. At the end of each financial reporting year, the directors review the investment instruments to determine the recoverable amount. If the recoverable amount is considered to be less than cost, an impairment provision is recognised.

2.26 Alternative performance measures

In the analysis of the Group's operating results, information is presented to provide readers with additional performance indicators that are prepared on a non-statutory basis. This presentation is regularly reviewed by management to identify items that are unusual and other items relevant to an understanding of the Group's performance and long term trends with reference to their materiality and nature.

The Group believes that adjusted EBITDA is the most significant indicator of operating performance and allows a better understanding of the underlying profitability of the Group.

The Group defines adjusted EBITDA as operating profit/(loss) before transaction, acquisition and other non-recurring costs, depreciation, amortisation, gains/losses on sale of assets and share based payments.

2.27 Prior year restatement

The comparative figures in the consolidated statement of financial position and the related notes have been restated to reflect the final purchase price allocations of MTC and Exova Group plc acquisitions in the year ended 31 December 2017 and the early adoption of IFRS 16 in the year ended 31 December 2018. The tax reclassification relates to the deferred tax assets being offset against the deferred tax liabilities for the year ended 31 December 2017.

The restatement of the comparatives is in line with the requirements of IFRS 3 and IFRS 16. The impact of the restatements is summarised below:

	IFRS 16					
	2017	Impact	2017			
Continuing Operations	As reported	(note 2.4)	Restated			
Revenue	533.0	-	533.0			
Operating expenses	(525.6)	6.9	(518.7)			
Operating Profit	7.4	6.9	14.3			
Finance income	1.4 .	-	1.4			
Finance costs	(209.2)	(6.5)	(215.7)			
Loss before tax	(200.4)	0.4	(200.0)			
Taxation	65.6	(0.1)	65.5			
Loss for the year	(134.8)	0.3	(134.5)			
Attributable to:						
Equity holders of the Parent	(136.6)	0.3	(136.3)			
Non-controlling interest	1.8	-	1.8			
Loss for the year	(134.8)	0.3	(134.5)			

Reconciliation of consolidated statement of profit or loss to non-statutory measures	2017 As reported	IFRS 16 Impact (note 2.4)	2017 Restated
Operating Profit	7.4	6.9	14.3
Add: transaction, acquisition and other non-recurring costs	59.5	-	59.5
Add: Depreciation of property, plant and equipment	29.5	-	29.5
Add: Depreciation of right of use assets	-	8.8	8.8
Add: Amortisation of intangible assets	44.5	-	44.5
Add: Net loss on sale of assets	0.4	-	0.4
Adjusted EBITDA (Alternative Performance Measure as defined in note 2.26)	141.3	15.7	157.0
Adjusted EBITDA margin	26.5%		29.5%

2.27 Prior year restatement (continued)

		IFRS 16		1		IFRS 16	_	
US \$ million	2016 As reported	Impact (note 2.4)	2016 Restated	2017 As reported	Fair value restatement	Impact (note 2.4)	Tax reclass	2017 Restated
00 7	Asteported	(11010 2.4)	nestatea	715 Teported	restatement	(HOLE ELT)	1001033	nestatea
Non-current assets				Į				
Goodwill	687.0	-	687.0	1,269.4	(12.8)	-	-	1,256.6
Right of use asset	-	29.7	29.7	-	-	71.8	-	71.8
Other intangible assets	329.7	-	329.7	853.3	20.9	-	-	874.2
Investments	-	-	-	0.4	•	-	-	0.4
Property, plant and equipment	129.9	-	129.9	259.8	3.1	-	-	262.9
Derivative financial instruments	4.2	-	4.2	3.1	-	-	-	3.1
Deferred tax assets	3.9	3.2	7.1	13.0	-	6.2	(19.2)	-
Government grants	-		-	6.8	-	<u> </u>	-	6.8
Martin .	1,154.7	32.9	1,187.6	2,405.8	11.2	78.0	(19.2)	2,475.8
Current assets					•			
Trade and other receivables	55.9	_	55.9	166.4	(0.1)	(0.1)	-	166.2
Accrued Income	9.2	-	9.2	16.1	(0.1)	` -	-	16.0
Income tax receivable	3.7	-	3.7	5.6	-	-		5.6
Cash and cash equivalents	44.9	-	44.9	84.2	-	-	-	84.2
***************************************	113.7	-	113.7	272.3	(0.2)	(0.1)	-	272.0
		-				,		
Current liabilities								
Trade payables	(14.9)	-	(14.9)	(34.4)	-	-	-	(34.4)
Other payables	(24.5)	-	(24.5)	(79.7)	-		-	(79.7)
Minimum lease liability	-	(5.2)	(5.2)		-	(15.1)	-	(15.1)
Current tax liabilities	(0.4)	-	(0.4)	(4.2)	-	-	-	(4.2)
Provisions	(1.3)	-	(1.3)	(10.8)	(0.1)	-	•	(10.9)
Deferred and contingent consideration	(2.2)	-	(2.2)	(6.1)	-	-	-	(6.1)
Interest bearing loans and borrowings	(2.2)	- (5.2)	(2.2)	(3.7)	- (0.1)	(15.1)		(3.7) (154.1)
	(43.3)	(5.2)	(48.5)	(138.9)	(0.1)			
Net current assets	70.4	(5.2)	65.2	133.4	(0.3)	(15.2)	-	117.9
Non-current liabilities								
Interest bearing loans and borrowings	(740.4)	-	(740.4)	(1,749.3)	-	-	-	(1,749.3)
Priority shares	(400.0)	-	(400.0)	(650.6)	-	-	-	(650.6)
Derivative financial instruments	(4.3)	-	(4.3)	(0.3)	-	-	-	(0.3)
Retirement benefit obligation	(0.6)	-	(0.6)	(25.2)	-	-	-	(25.2)
Provisions	(2.8)	-	(2.8)	(19.7)	-	-	-	(19.7)
Minimum lease liability	-	(37.9)	(37.9)		-	(84.1)	-	(84.1)
Deferred and contingent consideration	-	-	-	(10.6)	(5.1)	-	-	(15.7)
Deferred tax liabilities	(128.1)	-	(128.1)	(207.0)	(5.1)	-	19.2	(192.9)
Corporation tax	-	-	-	(4.8)	-	-	-	(4.8)
Other payables	<u> </u>			(6.7)	•	-	-	(6.7)
	(1,276.2)	(37.9)	(1,314.1)	(2,674.2)	(10.2)	(84.1)	19.2	(2,749.3)
Net liabilities	(51.1)	(10.2)	(61.3)	(135.0)	0.7	(21.3)		(155.6)
E. D.								
Equity Share capital				I				
•	0.9	-	0.9	1.2	•	-	-	1 2
Share premium	0.9	-	0.9	1.2	-	-	•	1.2
Treasury shares	-	. 0.2	- 35.3	72.1	-	(0.6)	•	71 5
Translation reserve Accumulated losses	25.0 (77.0)	0.3 (10.5)	25.3 (87.5)	72.1 (223.1)	-	(0.6) (20.7)	-	71.5 (243.8)
Equity attributable to equity holders of		(10.3)	(07.0)		-	(20.7)		
the Parent	(51.1)	(10.2)	(61.3)	(149.8)	-	(21.3)	-	(171.1)
Non-controlling interests	-	-	-	14.8	0.7	-	-	15.5
Total shareholders' equity	(51.1)	(10.2)	(61.3)	(135.0)	0.7	(21.3)	-	(155.6)
	(32.2/	,	,02.0/	,255.0/	417	(==:0)		,255.0/

2.27 Prior year restatement (continued)

	2017 As reported	IFRS 16 Impact (note 2.4)	2017 Restated
Cash flows from operating activities			
Net loss for the year	(134.8)	0.3	(134.5)
Adjustments for:			
Income tax charge/(credit) recognised in profit and loss	(65.6)	0.1	(65.5)
Finance income	(1.4)	•	(1.4)
Finance costs	209.2	6.5	215.7
Loss on disposal of property, plant and equipment	0.4	•	0.4
Depreciation of property, plant and equipment	29.5	-	29.5
Depreciation of right of use assets	•	8.8	8.8
Amortisation of other intangible assets	44.5	-	44.5
Government grants	(0.1)	•	(0.1)
Non-cash movement in defined benefit pension obligations	0.2	-	0.2
TANKS TO THE STATE OF THE STATE	81.9	15.7	97.6
Movements in working capital:			
Increase in trade and other receivables	(0.5)		(0.5)
Increase/(decrease) in trade and other payables	(14.4)	_`	(14.4)
Cash generated from operations	67.0	15.7	82.7
Income Acuse acid	/F 2\		(F. 2)
Income taxes paid	(5.3)	-	(5.3)
Net cash generated by operating activities	61.7	15.7	77.4
Cash flows from investing activities			
Purchase of property, plant and equipment	(31.6)	•	(31.6)
Proceeds from disposal of property, plant and equipment	0.5	-	0.5
Purchase of intangible assets	(2.9)	-	(2.9)
Net cash outflow on acquisition of Exova Group plc	(705.1)	-	(705.2)
Cash outflow on deferred and contingent consideration	(77. <u>3)</u>	-	(77.2)
Net cash used in investing activities	(816.4)	-	(816.4)
Cash flows from financing activities			
Borrowings	1,447.3	-	1,447.3
Repayment of borrowings	(806.4)	-	(806.4)
Interest paid	(53.7)	-	(53.7)
Repayment of finance lease liabilities	(0.1)	-	(0.1)
Payment of lease liabilities	-	(15.7)	(15.7)
Payment for debt issue costs	(28.1)	-	(28.1)
Settlement of derivative financial instrument	(17.1)	-	(17.1)
Cash outflow on defined benefit obligations	-	-	-
Issue of shares	0.3	-	0.3
Issue of priority shares	196.4	-	196.4
Issue of loan notes	54.0	-	54.0
Dividends paid to non-controlling interests	(0.4)	-	(0.4)
Net cash (used in)/provided by financing activities	792.2	(15.7)	776.5
Not increase in each and each equivalents	27.5		37.5
Net increase in cash and cash equivalents	37.5	-	
Cash and cash equivalents at the beginning of the year Effects of exchange rates on cash and cash equivalents	44.9 1.8	-	44.9 1.8
Cash and cash equivalents at the end of the year	84.2	-	84.2

3. Critical accounting judgements and key sources of estimation

In the application of the Group's accounting policies, described in note 2, the directors are required to make judgements (other than those involving estimations) that have a significant impact on the amounts recognised and to make estimates and assumptions about the carrying amounts of assets and liabilities that are not readily apparent from other sources. The estimates and associated assumptions are based on historical experience and other factors that are considered to be relevant. Actual results may differ from these estimates.

The estimates and underlying assumptions are reviewed on an ongoing basis. Revisions to accounting estimates are recognised in the year in which the estimate is revised if the revision affects only that year, or in the year of the revision and future periods if the revision affects both current and future periods.

3.1 Critical accounting judgements

The following are the critical judgements, apart from those involving estimations (which are dealt with separately below), that the directors have made in the process of applying the Group's accounting policies and that have the most significant effect on the amounts recognised in financial statements.

a) Transaction, acquisition and other non-recurring costs

The directors present the results for the Group excluding certain unusual or non-recurring items of income or expenditure which individually or in aggregate are material. In the director's judgement separately disclosing these amounts enables users of the financial statements to gain a better understanding of the underlying financial trading performance of the Group. Further detail provided in note 11.

b) Valuation of goodwill and other intangible assets

When the Group makes an acquisition, management determines initially whether any intangibles assets should be recognised separately from goodwill, and the provisional amounts at which to recognise the assets. During the first 12 months of ownership, intangible assets are reviewed to determine whether any additional information exists that supports amendments to that original assessment, including new intangible assets.

c) IFRS 16 transition

In the application of IFRS 16 the directors have been required to make estimates that have an impact on the amounts recognised for IFRS16 in the financial statements. Below the Group has outlined what some of these key estimates are and how the Group is comfortable in its judgement.

Incremental Borrowing Rate ("IBR")

Under IFRS 16 "Leases", the Group is required to estimate the IBR in each respective country where the lease contract is held from the lease commencement date. The Group has determined that 10-year government bond rates are appropriate measures to use when estimating IBRs. Risk free rates are further adjusted for credit risk adjustments to incorporate Group specific risk. Credit risk adjustment is benchmarked against the published bond rates in an active market.

Extension of non-cancellable contractual lease term

Under the requirements of IFRS 16, for those lease contracts nearing maturity, if there is a reasonable expectation that the lease will be extended, the extension of the lease should be taken into account in calculating the lease term and future undiscounted lease payments. The expectations that the Group might extend a lease are primarily driven by either historical precedent or the existence of a non-cancellable service contracts with customers. There is judgement applied when estimating the lease extension periods and estimation of the lease payments. These judgements are applied consistently and represent the best estimate of the Group taking into account the previous lease payments and any indexations that are likely to be present in the extension.

3. Critical accounting judgements and key sources of estimation (continued)

3.2 Key sources of estimation

The key assumptions concerning the future, and other key sources of estimation uncertainty at the reporting period, that may have a significant risk of causing a material adjustment to the carrying amounts of assets and liabilities within the next financial year, are discussed below.

a) Impairment of goodwill

Goodwill is tested annually for impairment or more frequently when there is an indication that the unit may be impaired. Determining whether goodwill is impaired requires an estimation of the value in use of the cash-generating units to which goodwill has been allocated. The value in use calculation requires the directors to estimate the future cash flows expected to arise from the cash-generating unit and a suitable discount rate in order to calculate present value. Note 12 provides further details of the key assumptions used for the value in use calculation.

b) Taxation

The Group operates in a number of tax jurisdictions around the world. Tax regulations generally are complex and, in some jurisdictions, agreeing tax liabilities with local tax authorities can take several years.

At the balance sheet date tax liabilities and assets are based on management's best estimate of the future amounts that will be settled. While the Group aims to ensure that the estimates recorded are accurate, the actual amounts could be different from those expected.

The Group recognises deferred income tax assets for deductible temporary differences and tax loss carry forwards to the extent that it deems probable such assets will be recovered in the future. Further detail provided in note 10.

c) Defined benefit plans

The present value of the defined benefit obligations depend on a number of factors that are determined on an actuarial basis using a number of assumptions. The assumptions used in determining the net cost or income for pensions include the discount rate. Any changes in these assumptions will impact the carrying amount of pension obligations.

The Group determines the appropriate discount rate at the end of each year. This is the interest rate that should be used to determine the present value of estimated future cash outflows expected to be required to settle the pension obligations. In determining the appropriate discount rate, the Group considers the interest rates of high-quality corporate bonds that are denominated in the currency in which the benefits will be paid, and that have terms to maturity approximating the terms of the related pension liability.

Other key assumptions for defined pension plans are based in part on current market conditions. Further detail provided in note 24.

d) Expected credit losses ("ECL")

The Group provides services to business customers on credit terms. Certain debts may not be recovered due to default of our customers. The Group uses the IFRS 9 ECL model to measure loss allowances at an amount equal to their lifetime expected credit loss. Further detail of the expected credit loss calculation is given in note 22.

e) Share based payments

In estimating the fair value for its equity-settled share-based payment transactions, the Group has exercised judgement in the determination of the most appropriate inputs to the valuation model including the expected volatility, expected term and dividend yield. The basis for these key inputs and assumptions are described in note 27.

4. Revenue analysis

The following is an analysis of the Group's revenue for the year from continuing operations.

	2018	2017 US \$million
A STATE OF THE STA	US \$million	
Revenue from services rendered	825.4	533.0
Geographic analysis		
US	358.7	278.9
UK	157.1	102.3
Mainland Europe	109.4	62.9
Sweden	42.8	17.9
Canada	42.7	25.2
Other	114.7	45.8
Total	825.4	533.0
Set out below is the disaggregation of the Group's revenue by sector.		
Aerospace	375.5	267.2
Transportation and Industrials	217.4	133.9
Oil & Gas and Infrastructure	136.3	87.6
·	136.3 96.2	87.6 44.3

Set out below is the amount of revenue recognised from:

	2018	2017
	US \$million	US \$million
	_	
Amounts included in contract liabilities at the beginning of the year	7.9	0.7

5. Operating profit

Operating profit is stated after charging/(crediting):

	2018 US \$million	Restated (note 2.27) 2017 US \$million
Net foreign exchange gains	(0.3)	-
Depreciation of property, plant and equipment (note 14)	41.0	29.5
Loss on disposal of property, plant and equipment	0.2	0.4
Depreciation of right of use assets (note 25)	15.8	8.8
Amortisation of intangible assets (note 13)	68.7	44.5
Transaction, acquisition and other non-recurring costs (note 11)	62.2	59.5
Staff costs (note 9)	394.4	248.2
Government grants (note 15)	(0.2)	(0.2)

6. Auditor remuneration

During the year the Group obtained the following services from the Group's auditor and its associates. Ernst & Young LLP were appointed as the Group's auditors for the first time in 2018 and therefore the fees paid for audit and non-audit services in 2017 relate to the Group's previous auditors, Deloitte LLP.

	2018 US \$million	2017 US \$million
Audit fees	1.0	0.8
Fees paid for audit services provided to Group	1.0	0.8
Tax advisory fees	0.3	0.1
Transaction advisory and due diligence fees	2.8	1.1
Fees paid for non-audit services provided to Group	3.1	1.2
Total	4.1	2.0

7. Finance income

	2018 US \$million	2017 US \$million
Interest income	0.3	1.4
Foreign exchange gain	18.8	-
Gain on derivative instruments at fair value through profit or loss	7.1	-
Total	26.2	1.4

8. Finance costs

		Restated
		(note 2.27)
	2018	2017
	US \$million	US \$million_
Bank loan interest	89.4	56.1
Priority share interest	71.7	54.2
Loan notes interest	37.6	27.0
Amortisation of bank fees	4.0	25.8
Interest on defined benefit obligation	0.8	0.4
Interest expense on lease liabilities	8.8	6.5
Loss on derivative instruments at fair value through profit or loss	-	. 0.2
Foreign exchange loss		45.5
Total	212.3	215.7

Of the US \$89.4 million interest expense, US \$86.9 million was paid during the year.

In 2017 amortisation of bank fees included US \$18.3 million relating to the write off of deferred financing costs relating to the previous financing arrangement that was settled during 2017.

9. Staff costs

	2018	2017
Group employee expenses	US \$million	US \$million
Wages and salary expenses	347.8	219.8
Social security expenses	33.1	19.9
Pension cost – defined contribution plans	12.7	8.3
Pension cost – defined benefit plans	0.8	0.2
Total	394.4	248.2
Group employee numbers	2018	2017
US & Canada	2,482	2,279
Europe	2,815	2,557
Rest of the world	1,109	1,135
Group	164	149
Total	6,570	6,120

	2018	2017
Directors remuneration	US \$million	US \$million
Fees paid to non-Executive Directors	0.7	0.5
Aggregate emoluments	1.5	0.7
	2.2	1.2
Highest paid Director remuneration		
Aggregate emoluments	0.8	0.4
	0.8	0.4

There are no retirement benefits accruing to directors under pension schemes as at 31 December 2018. (31 December 2017: nil)

The employment benefits of Directors and other members of key management were:	2018 US \$million	2017 US \$million
Short term employment benefits	0.1	0.1
	0.1	0.1

A total of two of directors were remunerated by the Group.

10. Income taxes

	2018	2017
Income tax recognised in the statement of profit or loss	US \$million	US \$million
Current tax		
Current tax expense in respect of the current year	18.4	3.5
Current tax charge / (credit) in respect of unrealised foreign exchange movements	3.8	(8.8)
Current tax attributable to US repatriation tax	-	5.7
Current tax expense in respect of the prior period	0.8	0.5
Withholding tax written off	0.4	-
	23.4	0.9
Deferred tax		
Deferred tax credit recognised in the current year	(10.8)	(8.0)
Adjustments to deferred tax attributable to changes in tax rates and laws	0.9	(56.3)
Deferred tax expense in respect of prior period	. (0.8)	(2.1)
	(10.7)	(66.4)
Total income tax charge / (benefit) recognised in the year	12.7	(65.5)
		(00.07
The income tax credit for the year can be reconciled to the accounting loss as		
follows:		
Loss before tax from continuing operations	(138.1)	(200.0)
Income tax expense calculated at 19% (2017: 19.25%)	(26.2)	(38.5)
Effects of expenses that are not deductible in interest expense	16.9	17.9
Effects of expenses that are not deductible for tax purposes	4.3	3.8
Effects of unused tax losses and tax offsets not recognised as deferred tax assets	18.3	5.7
Effects of different tax rates on subsidiaries operating in other jurisdictions	(2.7)	(0.9)
Effect of foreign tax credit	•	(0.2)
Effect of change in tax rate in deferred tax balances	. 1.2	(56.3)
Overseas withholding tax	0.4	0.3
Effect of state taxes	-	(0.3)
Effect of US Repatriation Tax	-	5.7
Effect of non-taxable income	(0.4)	(0.6)
Prior year adjustment – current tax	0.8	0.5
Prior year adjustment – deferred tax	(0.8)	(2.1)
Other	0.9	(0.5)
	12.7	(65.5)
		<u> </u>
Income tax recognised directly in equity		
Current tax		
Local tax (credit) / charge on unrealised foreign exchange movements	(3.8)	8.8
	(3.8)	8.8
Deferred tax		
Defined benefit pensions obligation		0.1
	-	0.1

10. Income taxes (continued)

	2018	2017
Current tax assets	US \$million	US \$million
Tax refund receivable	4.2	5.6
Current tax liabilities		
Income tax payable	(12.0)	(4.2)
•	•	
Non-Current tax liabilities		
Income tax payable	(3.1)	(4.8)

The following is the analysis of deferred assets/(liabilities) presented in the consolidated balance sheet:

		Restated (note 2.27)
	2018	2017
Deferred tax balances	US \$million	US \$million
Net deferred tax liabilities	(187.4)	(192.9)
Total	(187.4)	(192.9)

Restated

	At 31			Current year	Prior year		At 31
US \$million	December 2017	Acquisitions / disposals	Tax rate change	(charge) / credit	(charge) / credit	Foreign exchange	December 2018
Net operating loss	2.3	-	0.1	1.6	(0.1)	0.1	4.0
Accrued Expenses	1.3	-	0.1	0.2	0.5	0.1	2.2
Prepaid expenses	(0.1)	-	-	(0.5)	(0.3)	-	(0.9)
Property, plant and							
equipment	(9.0)	(0.2)	(0.3)	(2.7)	(0.5)	(0.2)	(12.9)
Intangible assets	(195.0)	(10.3)	(0.9)	15.8	(0.5)	5.2	(185.7)
R&D	(1.7)	-	•	0.2	(0.1)	-	(1.6)
Provisions / accruals	3.3	-	-	0.6	-	0.1	4.0
Retirement benefit obligations	3.4	-	-	(0.6)	0.6	(0.1)	3.3
Other	2.6	0.4	0.1	(3.8)	1.2	(0.3)	0.2
Total	(192.9)	(10.1)	(0.9)	10.8	0.8	4.9	(187.4)

Deferred taxes

Deferred tax assets are recognised to the extent that the realisation of the related deferred tax benefit through future taxable profits is probable. At the balance sheet date, the Group did not recognise a deferred tax asset of US \$37.8 million (2017: US \$42.9 million) relating to tax losses, due to uncertainty over the availability of future taxable profits. The material components of the unrecognised deferred tax asset comprise US \$13.6 million relating to UK tax losses, US \$10.4 million relating to Dutch tax losses (which will expire between 2019 and 2025), US \$7.5 million relating to Swedish tax losses and US \$4 million relating to German tax losses.

The Group also has an unrecognised deferred tax asset of US \$10.9 million (2017: US \$4.5 million) relating to interest carried forward, arising in the UK as a result of the corporate interest restriction provisions and US \$11.1 million (2017: US \$1.3 million) relating to accrued interest in the US arising as a result of the s.163j interest limitation provisions. There is uncertainty as to when the interest amounts will be available to deduct against UK and US taxable profits.

No deferred tax liability has been recognised in respect of unremitted earnings of subsidiaries. It is likely that the majority of the overseas earnings will qualify for the UK dividend exemption and the Group can control the distribution of dividends by its subsidiaries. In some jurisdictions local tax is payable on the remittance of a dividend. If dividends were remitted from subsidiaries in these countries the additional tax payable would be US \$4.5 million with the gross timing difference being US \$89.0 million.

11. Transaction, acquisition and other non-recurring costs

	2018 US \$million	2017 US \$million
Integration costs in relation to the acquisition of Exova Group plc	22.4	14.9
Transaction fees and costs related to the refinancing of the business	14.7	11.0
Strategic restructuring and reorganisation of the Group	8.3	3.0
Acquisition and new business setup costs	6.0	27.8
Other	10.8	2.8
Total	62.2	59.5

In accordance with IAS 1, the financial statements separately disclose significant items of financial performance that management consider are outside of the normal course of business and should be disclosed separately to assist in the understanding of the underlying trading and financial results of the Group (see note 2.26).

Integration costs in relation to the acquisition of Exova Group plc

Following the acquisition of Exova Group plc in 2017 the Group has made substantial progress on the reorganisation and integration of the enlarged Group. During the year a number of laboratories have been either closed and/or combined into a single location resulting in one-off site-integration costs of US \$7.4 million (2017: US \$3.4 million).

In addition, the Group has incurred costs of US \$13.2 million in relation to the functional alignment of the business, in particular in the areas of Communications and Branding, Finance and Information Technology. Included within this total are costs related to severance payments of US \$1.4 million (2017: US \$4.6 million) and US \$3.5 million contractor and consultancy costs (2017: US \$3.2 million). Also included are dual running costs for employees holding specific roles in the integration project.

The Group-wide rebranding programme which commenced in 2017, continued in 2018 resulting in costs to execute of US \$1.8 million.

Transaction fees and costs related to the refinancing of the business

In December 2018 the Group successfully completed a refinancing of the group debt and as a result incurred directly attributable transaction fees of US \$30.6 million. Of this amount US \$15.8 million have been capitalised as deferred financing costs against the credit facility with the remaining US \$14.7 million (2017: US \$11.0 million) recognised in the statement of profit or loss.

Strategic restructuring and reorganisation of the Group

During the year the Group incurred further costs including severance payments as a result of relocating laboratories across the business and undertaking restructuring activities. Total costs incurred were US \$6.3 million (2017: US \$3.0 million).

The Group also completed a corporate restructuring to align the acquired entities with the Group's sector structure and returned the number of sectors from five to four, resulting in professional and legal costs of US \$2.0 million being incurred.

Acquisition and new business setup costs

The Group incurred costs directly attributable to transaction fees for completed or aborted acquisitions. During 2018, the Group completed three acquisitions (refer to note 23) and incurred US \$1.3 million of new business setup costs.

In the prior year, acquisition costs related to expenditure incurred on the acquisition of Exova Group plc were US \$31.8 million of which US \$11.0 million were classified within Transaction fees and costs related to the refinancing of the business.

Other

Other items include professional fees, contractor costs and legal expenses relating to specific projects that management considered as non-recurring. The other items also include the share based payment charge in 2018 of US \$3.8 million (refer to note 27).

12. Goodwill

Res	ta	te
Inata	7	27

<u> </u>	Aerospace	Oil & Gas and Infrastructure	Transportation & Industrials	Fire & Building Products	Infrastructure & Environmental	Total US \$million
As at 1 January 2017	556.8	53.8	76.4	-	-	687.0
Acquisitions	256.8	34.7	64.0	144.9	47.6	548.0
Exchange adjustments	17.3	7.2	1.5	7.2	1.2	34.4
As at 31 December 2017	830.9	95.7	141.9	152.1	48.8	1,269.4
Acquisition of a subsidiary (restated*)	(19.0)	5.1	0.3	0.8	-	(12.8)
As at 1 January 2018	811.9	100.8	142.2	152.9	48.8	1,256.6
Acquisitions (note 23)	14.1	-	26.2	-	-	40.3
Transfers between CGU	(9.2)	42.3	15.7	-	(48.8)	-
Disposals	-	-	-	(1.0)	-	(1.0)
Exchange adjustments	(14.3)	(4.8)	(3.9)	(8.6)	-	(31.6)
As at 31 December 2018	802.5	138.3	180.2	143.3	-	1,264.3

^{*}Goodwill is restated as a result of adjustments to the final valuation of the acquisitions of Delisle Inc., dba Metals Testing Company and Exova Group plc (note 2.27).

The Group tests annually for impairment, or more frequently if there are indications that goodwill might be impaired. The recoverable amounts of the cash generating units (CGUs) are determined from value in use calculations based on discounted cash flow forecasts. The cash flow forecasts are based on the most recent Board approved annual budget and projections for the next five years. The key assumptions for the value in use calculations are those regarding the growth rates and the weighted average cost of capital rates. No impairment arises from a reasonable possible change in the key assumptions underlying the goodwill impairment review.

The growth rates are based on the CGU to which they relate and take into account the various market conditions that are relevant to that CGU. The margins are assumed to remain sustainable, which is supported by historical experience. Growth rates generally approximate to the long-term average rates for the markets in which the business operates. The average revenue growth rates applied range from 3.4% to 7.4% (2017: 3.0% to 6.0%) with a long term growth rate of 2.5% (2017: 3.0%) applied in the terminal value calculation. In this exercise a discount rate of 11.5% (2017: 10.9% to 12.3%) was used.

Goodwill acquired in a business combination is allocated, at acquisition, to the CGUs or group of units that are expected to benefit from that business combination. The Group has restructured during 2018 and as a result has reduced the number of CGUs from five to four, as disclosed in the table above.

Impairment reviews were performed for each individual CGU as at 31 December 2018, including sensitivity analysis for changes in the weighted average cost of capital and the long term growth rates applied. No impairment in the value of goodwill in any of the sectors was identified.

13. Other intangible assets

								Restated (note 2.27)
76.04.00.00			Technology	 		Total	Software &	(note 2.27)
	Customer	Customer	know how &		Trade	Acquisition	Computer	Total
Cost	relationships	contracts	process	Other	name	Intangibles	licenses	US \$million
As at 1 January 2017	241.2		81.6	0.8	20.3	343.9	3.5	347.4
Acquisitions '	438.4		97.5	-	-	535.9	4.1	540.0
Additions	-	•	· -	-	-	-	2.9	2.9
Disposals Exchange movements	20.3	•		-	0.6	26.5	(0.3) 0.5	(0.3) 27.0
As at 31 December 2017	699.9		184.7	0.8	20.9	906.3	10.7	917.0
As at 31 December 2017	6.669	•	184.7	0.8	20.9	906.3	10.7	917.0
Acquisition of a subsidiary (restated*)	17.9		3.0	-	-	20.9	-	20.9
As at 1 January 2018	717.8		187.7	0.8	20.9	927.2	10.7	937.9
Acquisitions	20.6	9.4	2.7	-	-	32.7	-	32.7
Additions	-			-	-	-	2.8	2.8
Disposals	-		. .	-	-	-	(0.1)	(0.1)
Exchange movements	(21.7)	(0.2)	(5.5)	-	(0.3)	(27.7)	(0.6)	(28.3)
As at 31 December 2018	716.7	9.2	184.9	0.8	20.6	932.2	12.8	945.0
Accumulated Amortisation								
As at 1 January 2017	9.6		6.0	0.1	1.5	17.2	0.5	17.7
Charge for the period	26.9		13.1	0.2	2.0	42.2	2.3	44.5
Disposals	-		-	-	-	-	(0.3)	(0.3)
Exchange movements	1.1	-	0.6	-	0.1	1.8		1.8
As at 31 December 2017	37.6	-	19.7	0.3	3.6	61.2	2.5	63.7
Charge for the year	43.9	0.5	18.9	0.2	2.0	65.5	3.2	68.7
Exchange movements	(2.0)	-	(0.9)		(0.1)	(3.0)	-	(3.0)
As at 31 December 2018	79.5	0.5	37.7	0.5	5.5	123.7	5.7	129.4
Net book value								
As at 31 December 2018	637.2	8.7	147.2	0.3	15.1	808.5	7.1	815.6

^{*}The 2017 intangibles is restated to reflect an adjustment to the final valuation of the acquisition of Delisle Inc., dba Metals Testing Company acquired on 29 December 2017, as detailed in Note 23.

168.0

17.3

Amortisation policy for each asset class is disclosed in note 2.6.

680.2

874.2

14. Property, plant and equipment

Restated (note 2.27)

					(note 2.27)
	Land & Buildings	Leasehold Improvements	Plant & Equipment	Assets under Construction	Total US \$million
Cost					
As at 1 January 2017	28.7	8.1	94.2	10.9	141.9
Acquisitions	20.9	14.6	84.9	3.8	124.2
Additions	2.4	3.5	25.3	(3.0)	28.2
Disposals	(1.0)	(0.7)	(6.8)	•	(8.5)
Exchange movements	1.9	0.8	5.1	0.5	8.3
As at 31 December 2017	52.9	26.3	202.7	12.2	294.1
Acquisition of a subsidiary (restated*)	0.4	1.8	0.9	-	3.1
As at 1 January 2018	53.3	28.1	203.6	12.2	297.2
Acquisitions	0.8	1.7	7.4	0.1	10.0
Additions	1.2	2.5	34.2	14.2	52.1
Transfers	0.3	0.1	(1.3)	0.9	
Disposals	(1.2)	(0.2)	(1.6)	-	(3.0)
Exchange movements	(2.0)	0.2	(4.3)	(1.9)	(8.0)
As at 31 December 2018	52.4	32.4	238.0	25.5	348.3
Accumulated Depreciation					
As at 1 January 2017	0.1	0.7	11.2	-	12.0
Change for the period	1.1	2.7	25.7	-	29.5
Disposals	(0.5)	(0.7)	(6.4)	-	(7.6)
Exchange movements	-	-	0.4	-	0.4
As at 31 December 2017	0.7	2.7	30.9	-	34.3
As at 1 January 2018	0.7	2.7	30.9	-	34.3
Change for the period	1.5	4.1	35.4	•	41.0
Disposals	-	-	(0.3)	-	(0.3)
Exchange movements	(0.2)	(0.1)	(0.8)	·-	(1.1)
As at 31 December 2018	2.0	6.7	65.2	-	73.9
Net book value					
As at 31 December 2018	50.4	25.7	172.8	25.5	274.4
As at 31 December 2017	52.6	25.4	172.7	12.2	262.9

^{*}The 2017 property, plant and equipment is restated to reflect an adjustment to the final valuation of the acquisition of Delisle Inc., dba Metals Testing Company, as detailed in Note 23.

Depreciation policy for each asset class is disclosed in note 2.11.

15. Government grants

	2018 US \$million	2017 US \$million
At 1 January	6.8	-
Amount acquired in the year	-	7.5
Amount earned in the year	0.2	0.2
Utilised during the year	(2.7)	(1.3)
Exchange movements	(0.4)	0.4
As at 31 December	3.9	6.8
Included in:		
Current	1.0	-
Non-current	2.9	6.8
As at 31 December	3.9	6.8

Government grants are receivable in relation to research and development (R&D) expenditure. Accumulated tax credits (Scientific Research and Experimental Development) from R&D expenditure in Canada can be used to settle future cash tax liabilities and can be carried forward for up to 20 years. A provision has been booked against the R&D credits carried forward to provide against uncertainties in prior year claims that remain open to challenge from the Canadian tax authorities.

16. Trade receivables and other receivables

	(
	2018 US \$million	2017 US \$million
Trade receivables	154.2	145.5
Other receivables	21.9	、 20.7
As at 31 December	176.1	166.2

The Group measures the loss allowance for trade receivables and trade receivables from related parties at an amount equal to lifetime ECL. The expected credit losses on trade receivables are estimated using a provision matrix by reference to past default experience of the debtor and an analysis of the debtor's current financial position, adjusted for factors that are specific to the debtors, general economic conditions of the industry in which the debtors operate and an assessment of both the current as well as the forecast direction of conditions at the reporting date.

In determining the recoverability of a trade receivable, the Group considers any change in the credit quality of the trade receivable from the date credit was initially granted up to the reporting date. The directors consider that the carrying amount of trade and other receivables is approximately equal to their fair value.

The ageing of trade receivables not impaired is as follows:

	2018	2017
	US \$million	US \$million
Not past due	93.3	100.7
Past due 0-30 days	30.4	26.5
Past due 31-60 days	15.5	10.2
Past due 61-90 days	6.8	5.7
Past due 90 days	11.5	6.2
Less: expected credit loss	(3.3)	(3.8)
	154.2	145.5
Receivables split by currency is as follows:		
U.S. Dollar	71.3	64.8
Canadian Dollars	7.6	8.1
Pound Sterling	25.0	27.3
Euro	17.6	13.4
Swedish Krona	7.6	8.7
Other	25.1	23.2
Total	154.2	145.5

Movement in the expected credit loss

Movements in the expected credit losses	2018 US \$million	2017 US \$million
At 1 January 2018	3.8	0.4
Reversal of expected credit losses during the year	(0.4)	(0.3)
Impact of IFRS 9 transition	(0.7)	-
Increase in expected credit loss during the year	0.6	-
Acquisitions	0.2	3.9
Receivables written off during the year as uncollectable	(0.2)	(0.3)
Exchange adjustments		0.1
Total	3.3	3.8

17. Cash and cash equivalents

	2018 US \$million	2017 US \$million
U.S. Dollar	26.8	20.2
UAE – Dirham	15.0	13.6
Euro	13.9	12.2
Pound Sterling	9.3	13.6
Qatar – Riyal	2.7	4.7
Swedish Krona	2.1	2.4
Canadian Dollars	1.9	1.8
Other	16.0	15.7
Total .	87.7	84.2

18. Other payables

	2018	2017	
Current	US \$million	US \$million	
Accrued bonuses, wages and personnel costs	35.8	27.1	
Other accrued liabilities	55.3	40.0	
Deferred income	9.4	8.7	
Customer deposits	1.9	3.9	
Total	102.4	79.7	

The fair value of the Group's trade and other payables approximates their face value.

Non-Current	2018 US \$million	2017 US \$million
Other liabilities	8.3	6.7
Total	8.3	6.7

US \$5.1 million (2017: US \$5.4 million) of other accrued liabilities relates to employment liabilities accrued in accordance with regulatory requirements in foreign jurisdictions.

19. Provisions

	Dilapidation provisions	Other Provisions	Total US \$million
	provisions	FIOVISIONS	03 3111111011
As at 1 January 2017	3.2	0.9	4.1
Acquisitions	18.0	5.4	23.4
Charge for the year	3.2	(1.2)	2.0
Exchange movements	0.7	0.4	1.1
As at 31 December 2017	25.1	5.5	30.6
Reclassification of provisions	0.2	(0.2)	-
Acquisitions	2.0	-	2.0
Charge for the year	1.5	1.2	2.7
Utilised during the year	(4.4)	(0.9)	(5.3)
Exchange movements	(1.8)	(0.1)	(1.9)
As at 31 December 2018	22.6	5.5	28.1
Included in:			
Current liabilities	5.5	5.4	10.9
Non-current liabilities	19.6	0.1	19.7
As at 31 December 2017	25.1	5.5	30.6
Included in:			
Current liabilities	3.8	0.9	4.7
Non-current liabilities	18.8	4.6	23.4
As at 31 December 2018	22.6	5.5	28.1

The dilapidation provisions at 31 December 2018 and 2017 represent present value of the estimated cost of restoration of the leased properties upon expiry of the contractual lease term. A maturity analysis has been performed over the lease liabilities (note 25) which is indicative of the expiry of the dilapidations provision.

Other provisions include management's best estimate of future obligations arising from various past events.

20. Interest bearing loans and borrowings

		2018			2017	
		•	Total			Total
	Current	Non-Current	US \$millions	Current	Non-Current	US \$millions
Term B loan	7.7	1,280.5	1,288.2	7.7	1,232.3	1,240.0
Loan notes	-	398.0	398.0	-	320.0	320.0
Second lien loan	-	220.0	220.0	-	220.0	220.0
Deferred financing costs	(6.2)	(32.6)	(38.8)	(4.0)	(23.0)	(27.0)
Loans and borrowings	1.5	1,865.9	1,867.4	3.7	1,749.3	1,753.0
Second lien loan	1.8	-	1.8	-	-	-
Accrued interest	1.8	-	1.8	•	-	-
Total interest bearing loans and borrowings	3.3	1,865.9	1,869.2	3.7	1,749.3	1,753.0
Priority A shares	_	492.4	492.4	-	443.5	443.5
Priority B shares	• -	230.7	230.7	-	207.1	207.1
Priority shares	•	723.1	723.1	-	650.6	650.6
Total	3.3	2,589.0	2,592.3	3.7	2,399.9	2,403.6

The Group completed a refinancing of its facilities on 14 December 2018. On completion, the Group raised an additional €70.2 million in Term B loans (\$79.2 million), €300 million (US \$342 million) PIK notes as well as extended the Acquisition and Capex facility to US \$200 million.

The proceeds from refinancing were used to repay drawings on the Acquisition and Capex and Revolver Credit facilities and the interest accrued thereon. Of the Group's available borrowing facilities of \$225 million, \$78.0 million was drawn down in 2018 in order to fund the acquisitions in the year, all of which were repaid on 14 December 2018.

The Group incurred US \$15.8 million debt issuance costs as a result of refinancing, of which US \$13.1 million was paid in 2018. Debt issuance costs were capitalised as deferred finance costs at 31 December 2018 and are amortised over the term of the facility using effective interest method.

The principal terms of the Group's Second lien loan and Term B loan notes at the year-end were as follows:

Term B Loan

The Term B loans consist of the following facilities:

- US \$770 million principal amount was drawn on 29 June 2017. The loan has an annual principal repayment of 1% per annum. The remaining balance is repayable in full on maturity (28 June 2024). The loan carries variable interest at Libor plus 3.5% margin. The outstanding principal as at 31 December 2018 is US \$762.3 million (2017: US \$770.0 million).
- Gross GBP loan of £160 million (2018: US \$202.1 million, 2017: US \$215.0 million) was drawn on 29 June 2017 and is repayable on 28 June 2024. The interest is variable and is charged at Libor plus 4.25% margin. As at 31 December 2018, the outstanding GBP loan is US \$202.1 million (2017: US \$215.0 million). The change is due to foreign exchange movements in the year.
- Gross EUR loan of €213.7 million (2018: US \$243.7 million, 2017 US \$255.1 million) was drawn on 29 June 2017 and is repayable on 27 June 2024. The interest is variable and is charged at Euribor plus 3.25% margin. A further €70.2m (US \$79.2 million) was raised on 14 December 2018 and is an extension to the original draw down with the interest and repayment terms remaining unchanged. As at 31 December 2018, the total amount outstanding on EUR loan is US \$323.8 million (2017: US \$255.1 million). The residual movement year on year is due to foreign exchange of (US \$10.5 million).

20. Interest bearing loans and borrowings (continued)

Second Lien Loan

• The principal amount of the facility is US \$220 million and was drawn on 29 June 2017. The outstanding loan is repayable in full on 27 June 2025. The interest is variable and is charged at Libor plus 7.0% (reduced from 7.5% effective 14 December 2018).

The terms of the Loan notes and Priority shares are detailed in note 22.

20. Interest bearing loans and borrowings (continued)

Analysis of borrowings by Currency:

				Total	
	GBP	EUR	USD	US \$million	
Redeemable cumulative priority shares	• •	-	723.1	723.1	
Second lien loan (net of deferred financing costs)	-	-	216.4	216.4	
Term B loan (net of deferred financing costs)	199.0	318.6	749.9	1,267.5	
Loan notes (net of deferred financing costs)	-	330.7	54.6	385.3	
As at 31 December 2018	199.0	649.3	1,744.0	2,592.3	

					Total	
	GBP	EUR	USD	US \$million		
Redeemable cumulative priority shares	-	-	650.6	650.6		
Second lien loan (net of deferred financing costs)	-	-	213.8	213.8		
Term B loan (net of deferred financing costs)	251.4	211.3	756.5	1,219.2		
Loan notes	-	-	320.0	320.0		
As at 31 December 2017	251.4	211.3	1,940.9	2,403.6		

Analysis of undrawn borrowings:

•	Total US \$million
As at 31 December 2018	
Acquisition and capex	200.0
Revolver credit facility	87.0
Total	287.0
	Total US \$million
As at 31 December 2017	
Acquisition and capex	125.0
Revolver credit facility	100.0
Total	225.0

The available undrawn facilities are multi currency.

At 31 December 2018, the Group has US \$13.0 million letter of credit outstanding (refer to note 31).

The weighted average interest rates paid during the year/period were as follows:

	2018	2017
	%	%
Priority shares	11.0	11.0
Loans notes	` 11.1	11.1
Bank loans	6.2	5.7

21. Deferred and contingent consideration

Restated (note 2.27)

Deferred and contingent consideration

	US \$million_
As at 1 January 2017	
Acquisitions	16.7
Acquisition of a subsidiary (restated*)	5.1_
As at 31 December 2017	21.8
Payment of deferred and contingent consideration	(6.5)
Exchange movements	(0.3)_
As at 31 December 2018	15.0

*The amount of deferred and contingent consideration is restated as a result of performance measurement met in the year.

Included in:	US \$million
Current liabilities	6.1
Non-current liabilities	15.7
As at 31 December 2017	21.8
Current liabilities	14.2
Non-current liabilities	0.8
As at 31 December 2018	15.0

The consideration to acquire Metals Testing Company (MTC) included contingent consideration based on future targets being met. The maximum amount payable with respect to contingent consideration was US \$1.5 million which was accrued at 31 December 2018. The contingent consideration was subsequently paid in 2019. The fair value of the contingent consideration is the present value of expected future cash flows based on the latest forecasts of future performance.

The consideration to acquire Testing and Engineering of Aeronautical Materials and Structures S.L (TEAMS) included contingent consideration based on managements' intention for the use of certain assets specified in the sale and purchase agreement. The contingent consideration's range was between a minimum of \$nil and a maximum of US \$0.8 million. The contingent consideration becomes due in 2020 if a triggering event has not occurred prior to this date. The fair value of the contingent consideration is the present value of expected future cash flows based on management's intention of the use of the specified assets.

As a result of the Exova Group plc acquisition a number of contingent consideration balances were acquired.

- The consideration to acquire Admaterials Technologies Private Limited included contingent consideration relating to a put and call option to purchase the remaining shareholding three years after acquisition (in 2016) based on the same earnings multiple as the original offer. The contingent consideration is adjusted in 2018 to reflect that the performance measurement met in the year. The contingent consideration's range was between a minimum of \$nil and a maximum of US \$10.9 million. The contingent consideration becomes due in 2019. The fair value of the contingent consideration is the present value of expected future cash flows based on the latest forecasts of future performance. The fair value of the contingent consideration at 31 December 2018 is US \$10.9 million.
- The consideration to acquire SL Pharma Labs Inc included contingent consideration based on future targets being
 met. The fair value of contingent consideration determined at 31 December 2018 based on current performance
 forecasts and recognised through profit or loss. The contingent consideration range on acquisition was between a
 minimum of \$nil and a maximum of US \$1.3 million. US \$1.1 million was paid in 2018, of which US \$0.8 million
 related to contingent consideration and the remaining US \$0.3 million was deferred consideration. The remaining
 contingent consideration becomes payable in 2019. The fair value of the contingent consideration is US \$0.5 million
 based on the latest forecasts of future performance.
- The consideration to acquire Defire Holdings Pty Limited included contingent consideration based on future targets being met. The fair value of contingent consideration determined at 31 December 2018 based on current performance forecasts and recognised through profit or loss. The contingent consideration range is between a minimum of \$\\$nil\$ and a maximum of US \$1.4 million. The contingent consideration is payable in 2019. The fair value of the contingent consideration is US \$1.3 million based on the latest forecasts of future performance.

22. Financial instruments

Financial risk management objectives and policies

The Group's finance function provides services to the business, coordinates access to domestic and international financial markets, and monitors and manages the financial risks relating to the operations of the Group through internal risk reports which analyse exposures by degree and magnitude of risks. The Group's business and financial results are affected by fluctuations in world financial markets, including changes in currency exchange rates and interest rates. The Group manages these risks through a combination of normal operating and financing activities and derivative financial instruments. The Group uses interest rate cap contracts to manage its exposure to interest rate changes. The Group does not use derivative financial instruments for trading or speculative purposes.

Financial risk management including the use of financial instruments and the related currency, liquidity, credit and interest rate risks is dealt with by the Group finance function of the parent on behalf of the Group.

Fair value measurements

Set out below is a comparison by category of carrying amounts and fair values of all the Group's financial instruments, other than those with carrying amounts that are reasonably approximations of fair values, that are carried in the financial statements.

Financial assets / (Financial liabilities)		Fair value as at 31 December		Carrying amount as at 31 December	
	Fair value hierarchy	31 December 2018	31 December 2017 (restated note 2.27)	31 December 2018	31 December 2017 (restated note 2.27)
Contingent consideration in a business combination	Level 3	(15.0)	(21.8)	(15.0)	(21.8)
Interest rate caps	Level 2	8.3	2.8	8.3	2.8

In accordance with IFRS 7 Financial Instruments: Disclosures, financial instruments are classified in the form of a three level fair value hierarchy, by class, for all financial instruments recognised at fair value:

- Level 1: quoted prices (unadjusted) in active markets for identical assets or liabilities;
- Level 2: inputs other than quoted prices included within level 1 that are observable for the asset or liability, either directly or indirectly; and
- Level 3: inputs for the asset or liability that are not based on observable market data.

At 31 December 2018 and 31 December 2017, the Group held all financial instruments at level 2 fair value measurement for the purposes of disclosing their fair value, with the exception of trade receivables and payables, cash and cash equivalents and contingent consideration. Between 31 December 2017 and 31 December 2018, there were no transfers between level 1 and level 2 fair value measurements and no transfers into or out of level 3 fair value measurements.

At 31 December 2018 and 31 December 2017, there is one level 3 fair value measurement which relates to contingent consideration liabilities resulting from acquisition activity. The fair value of the contingent consideration liabilities is based on an assessment of the probability of possible outcomes discounted to net present value. Subsequent changes to the fair value of the contingent consideration liabilities are adjusted against the cost of acquisition where they qualify as measurement period adjustments. All other subsequent changes in the fair value of contingent consideration liabilities are accounted for in accordance with relevant IFRSs and designated through the statement of profit or loss.

For financial instruments that are recognised at fair value on a recurring basis, the Group determines whether transfers have occurred between levels in the hierarchy by re-assessing categorisation (based on the lowest level input that is significant to the fair value measurement as a whole) at the end of each reporting year. The methods and assumptions used to estimate the fair values shown above are:

- term loans and revolving credit facility loans the fair value of the term and revolving credit facility loans approximates to the carrying amount; and
- other financial instruments the fair value of all other items have been calculated by discounting the expected future cash flows at prevailing interest rates.

22. Financial instruments (continued)

Credit risk management

Credit risk refers to the risk that a counterparty will default on its contractual obligations resulting in financial loss to the Group. The Group has adopted a policy of only dealing with creditworthy counterparties and obtaining sufficient collateral where appropriate, as a means of mitigating the risk of financial loss from defaults.

Trade receivable exposures are managed locally in the operating units where they arise. Credit terms vary by country and are set as deemed appropriate for the customer. Management actively monitors concentration of credit risk whereby no customer represents greater than 10% of total trade receivables throughout the year. The Company has a concentration risk with regards to the receivable balances with related parties. The Group's exposure and the credit ratings of its counterparties and related parties are continuously monitored and the aggregate value of credit risk within the business is spread amongst a number of approved counterparties. Credit exposure is controlled by counterparty limits that are reviewed and approved by management. The carrying amount of the financial assets recorded in the financial statements, which is net of expected credit losses, represents the Group's and the Company's exposure to credit risk.

The Group uses the IFRS 9 ECL model to measure loss allowances at an amount equal to their lifetime expected credit loss.

In order to minimise credit risk, the Group has categorised exposures according to their degree of risk of default. The credit rating information is based on a range of qualitative and quantitative factors that are deemed to be indicative of risk of default and range from 1 (lowest risk of default) to 5 (greatest risk of default). Loss allowances for trade receivables from related parties held by the Company are deemed immaterial.

Group rating	Aging	Gross exposure US \$million	Loss allowance US \$million	Net Exposure US \$million
1	Not past due	93.3	(0.2)	93.1
2	Past due 0-30 days	30.4	(0.2)	30.2
3	Past due 31-60 days	15.5	(0.2)	15.3
4	Past due 61-90 days	6.8	(1.0)	5.8
5	Past due 90 days	11.5	(1.7)	9.8
Total		157.5	(3.3)	154.2

Priority shares

The priority shares are unsecured borrowings of the Group. The priority shares do not carry any equity component and are classified as financial liabilities.

Priority A shares

The Company's redeemable cumulative priority A shares of US \$368.2 million were issued on 22 March 2016. The shares carry 11 per cent interest per annum and are redeemable on 22 March 2026. Total interest accrued to 31 December 2018 was US \$124.2 million (2017: US \$75.4 million). The redeemable cumulative priority shares are classified as financial liabilities. The priority A shares do not carry voting rights.

Priority B shares

The Company's redeemable cumulative priority B shares of US \$191.4 million were issued on 29 June 2017, a further US \$4.9 million was issued on 29 December 2017. In 2018 the Group issued a further US \$0.7 million on 13 September 2018 and a further US \$0.1 million on 20 November 2018. The shares carry 11 per cent interest per annum and are redeemable on 22 March 2026. Total interest accrued to 31 December 2018 was US \$33.5 million (2017: US \$10.7 million). The redeemable cumulative priority shares are classified as financial liabilities. The priority B shares do not carry voting rights.

22. Financial instruments (continued)

Loan notes

The US \$220 million Unsecured Redeemable Loan Notes 2026 were issued on 22 March 2016 at an issue price of US \$1 per note and are redeemable on 22 March 2026 at par value plus all rolled up interests of 11 per cent per annum. The loan notes were listed on The International Stock Exchange (TISE) on 20 March 2017. US \$182.2 million principal plus \$60.3 million accrued interest were repaid on 14 December 2018. The directors consider that the carrying amount of the loan notes are approximately equal to their fair value.

The US \$50 million Unsecured Redeemable Loan Notes 2026 were issued on 29 June 2017 at an issue price of US \$1 per note and are redeemable on 22 March 2026 at par value plus all rolled up interests of 12 per cent per annum. US \$50 million principal plus \$9.1 million accrued interest were repaid on 14 December 2018.

A further US \$14 million of Unsecured Redeemable Loan Notes were issued on 29 June 2017 at an issue price of US \$1 per note, of which US \$10 million were repaid on 31 July 2017. No interest is accrued on this issue.

The Group issued €300m (US \$342 million) of PIK notes on 14 December 2018 that are redeemable on 14 December 2026. The interest is variable and is charged at Euribor plus 8.75%.

The Group management reviews and manages the key risks that could prevent the Group from meeting its business objectives. The Group management consists of senior managers from operating sectors and reports findings and actions directly to the Chief Executive Officer and the Board. This process convers all risk areas, including strategic, operational and financial risks. The key risks identified by management are as follows:

Capital risk management

The Group manages its capital to ensure that entities in the Group will be able to continue as a going concern while maximising the return to shareholders through the optimisation of the debt and equity balances. The Group's overall strategy remains unchanged.

The capital structure of the Group consists of net debt (borrowings disclosed in note 20 after deducting cash and bank balances) and equity of the Group (as disclosed in the statement of changes in equity).

The Group is not subject to any externally imposed capital requirements.

The Group's risk to the capital structure is reviewed on a regular basis by the directors. As part of this review, the directors consider the cost of capital and the risks associated with each class of capital.

22. Financial instruments (continued)

Liquidity risk

Liquidity risk is the risk that suitable sources of funding may not be available for the Group's business activities. The Group manages liquidity risk by maintaining adequate reserves and banking facilities and continuously monitoring forecast and actual cash flows including consideration of appropriate sensitivities.

The Group monitors cash balances daily and projects cash on a rolling thirteen-week basis. The Group's financial risk management activities in this area seek to achieve a balance between certainty of funding with committed facilities and a flexible cost-effective structure.

At 31 December 2018, the Group had credit facilities of US \$1,795.2 million (2017: US \$1,685.0 million), of which US \$1,508.2 million (2017: US \$1,460.0 million) had been drawn down leaving US \$287 million (2017: US \$225.0 million) undrawn facility available under the Senior Facilities Agreement (SFA). The Group held cash of US \$87.7 million (2017: US \$84.2 million) at year end.

In addition to cash and undrawn facilities available, liquidity risk is managed through on-going review of the Group's financial projections by the Group finance function. Recommendations may then be made to the Board to mitigate cash outflows through restriction or deferral of discretionary expenditure as appropriate.

The table below analyses the Group's financial liabilities which will be settled on a net basis into relevant maturity groupings based on the remaining years, at the balance sheet date, to the contractual maturity date. The amounts disclosed in the table represent the contractual undiscounted cash flows. Balances due within 12 months equal their carrying value as the impact of discounting is not considered to be significant.

	Less than one year	Between one and two years	Between two and three years	Between three and five years	More than five years	Total US \$million
Senior Facilities Agreement: secured	7.7	7.7	7.7	15.4	1,469.7	1,508.2
Trade payables	30.2	-	-	-	-	30.2
Other payables	102.4	-	-	-	8.3	110.7
Loan notes	-	-	-	-	398.0	398.0
Priority shares	-	-	-	-	723.1	723.1
As at 31 December 2018	140.3	7.7	7.7	15.4	2,599.1	2,770.2
Senior Facilities Agreement: secured	7.7	7.7	7.7	15.4	1,421.5	1,460.0
Trade payables	34.4	-	-	-	-	34.4
Other payables	79.7	-	-	-	6.7	86.4
Loan notes	-	-	-	-	320.0	320.0
Priority shares	-	-	-	-	650.6	650.6
As at 31 December 2017	121.8	7.7	7.7	15.4	2,398.8	2,551.4

22. Financial instruments (continued)

Interest rate risk

The Group is exposed to interest rate risks on its secured bank loans (note 20). Secured bank loans are managed through interest rate caps.

In addition to available cash and cash from operations, the Group uses short and long-term debt to finance business activities. Interest rate on bank borrowings range between 3.2% and 10.4% (2017: 3.3% - 8.8%). The Group is exposed to interest rate risk on its debt obligations. The Group currently uses derivative financial instruments to manage interest rate risk.

Hedging

Derivative financial instruments involve credit risk in the event the counterparty should default. It is the Group's policy to execute such instruments with global financial institutions that the Group believes to be creditworthy. The Group also uses International Swap Dealers Association (ISDA) master-netting agreements. The ISDA agreements reduce the Group's counterparty settlement risk to the net amount of any receipts or payments due between the Group and the counterparty financial institution. Such contracts enable the Group to mitigate the risk of changing interest rates on the fair value of issued fixed rate debt held and the cash flow exposures on the issued variable rate debt held. The average interest rate is based on the outstanding balances at the end of the financial year.

The following derivatives are stated at the fair values as set out below:

	2018 US \$million	2017 US \$million
Asset		
Asset (U.S. Dollar interest rate cap)	8.6	3.1
	8.6	3.1
Liability .		
Liability (GBP interest rate cap)	-	(0.2)
Liability (EUR interest rate cap)	(0.3)	(0.1)
Total	(0.3)	(0.3)

The interest rate caps fix the net interest rate payable in respect of amounts hedged maturing on 30 September 2020. The change in the Fair Value of the derivative is designated through the statement of profit or loss and therefore, the Group do not designate these derivatives as hedging instruments.

Market risk

The business activities of the Group expose it primarily to the financial risks of changes in foreign currency exchange rates and interest rates. The Group entered into a number of interest rate caps to manage its exposure to rising interest rates.

There has been no change to the Group's exposure to market risks or the manner in which these risks are managed and measured.

Foreign currency risk management

The Group undertakes transactions denominated in foreign currencies; consequently, exposures to exchange rate fluctuations arise. These risks include the translation of local currency balances and results of the Group's worldwide operations into United States Dollars. In addition, there are gains and losses related to intercompany and third-party transactions denominated in currencies other than a location's functional currency. The Group operates in 32 countries, although the principal currency exposures relate to Sterling and Euro. The Group's objective is to minimise the volatility of its exposures to these risks through a combination of normal operating and financing activities. Currency risk is managed centrally by the parent on behalf of the Group.

22. Financial instruments (continued)

Safety, health, environmental and quality risk (SHEQ)

The Group is exposed to SHEQ risk principally through its operations in the materials testing sector.

Through its formal risk assessment process, the Group has systems in place to assess risks prior to planned changes or when unplanned changes occur, whether permanent or temporary, during operations or when changes are required to facilities, equipment, procedures, laws, regulations, standards or systems. The risk assessment process involves staff with relevant knowledge and experience, with findings and changes communicated to all those who may be affected, and training provided as required.

The SHEQ risk management processes are applied to all new projects and existing operations, with risks prioritised and managed to ensure they are reduced to a level that is as low as reasonably practical. All identified risks are recorded and maintained at business unit level and are escalated to the Board as appropriate.

23. Business Combinations

Delisle Inc. dba Metals Testing Company

On 29 December 2017, the Group acquired 100% of the voting share capital of Delisle Inc., dba Metals Testing Company, (MTC) a Connecticut corporation. Total consideration was US \$47.1 million consisting of US \$40.7 million paid in cash, shares with a fair value of US \$5 million, contingent consideration of US \$1.5 million and net of cash acquired of US \$0.1 million. The consideration was paid in cash and funded by the Group's existing cash and borrowing resources.

Acquisition expenses of US \$1.2 million were incurred in respect of this acquisition and expensed to the consolidated statement of profit or loss.

Set out below is an analysis of the net book value and fair value of the net assets acquired and the consideration payable in respect of this acquisition.

Delisle Inc. dba Metals Testing Company	Book value US \$million	Fair value US \$million
Intangible assets	-	20.9
Property plant and equipment	2.5	5.8
Trade and other receivables	3.6	3.6
Trade and other payables	(1.4)	(1.4)
Deferred tax		(5.1)
Net asset acquired	4.7	23.7
Goodwill	-	23.4
		47.1
Satisfied by:		
Cash paid		40.7
Share issued		5.0
Contingent consideration		1.5
Cash acquired		(0.1)
Total consideration		47.1

The net assets recognised in the 31 December 2017 financial statements were based on a provisional assessment of their fair value while the Group sought an independent valuation of the intangible assets and property, plant and equipment (PPE). The valuation had not been completed by the date the 2017 financial statements were approved for issue by the Board of Directors.

In 2018, the valuation was completed and the acquisition date fair value of the property, plant and equipment was US \$5.8 million, an increase of US \$3.3 million over the provisional value. The 2018 valuation also identified intangible assets with a fair value of US \$20.9 million. The 2017 comparative information was restated to reflect the adjustment to the provisional amounts. As a result, a deferred tax liability of US \$5.1 million has been recognised and a corresponding reduction in the goodwill of US \$19.0 million, resulting in US \$23.4 million of total goodwill arising on the acquisition.

Goodwill, being the excess of the consideration over the net tangible and intangible assets acquired, represents benefits which do not qualify for recognition as intangible assets, including the ability of a business to generate higher returns than individual assets, skilled workforces and acquisition synergies that are specific to the Group. In addition, goodwill arises on the recognition of deferred tax liabilities in respect of intangible assets for which amortisation does not qualify for tax deductions.

If the acquisition had been made at the beginning of the 2017 financial year, the business would have contributed US \$14.2 million to revenue and US \$4.9 million to profit before tax. Profit before tax should not be viewed as indicative of the results of this business that would have occurred, if this acquisition had been completed at the beginning of 2017.

23. Business Combinations (continued)

Vohtec Qualitatssicherung GmbH

On 2 June 2018, the Group acquired 100% of the voting share capital of Vohtec Qualitatssicherung GmbH (Vohtec) in Southern Germany. Total consideration was US \$48.3 million consisting of US \$49.8 million paid in cash, shares with a fair value of US \$1.9 million and net of cash acquired of US \$3.4 million. The consideration was paid in cash and funded by the Group's existing cash and borrowing resources.

Acquisition expenses of US \$1.5 million were incurred in respect of this acquisition and expensed to the consolidated statement of profit or loss.

Set out below is an analysis of the net book value and fair value of the net assets acquired and the consideration payable in respect of this acquisition.

Vohtec Qualitatssicherung GmbH	Book value	Fair value US \$million	
	US \$million		
Intangible assets	-	23.4	
Property plant and equipment	5.4	5.4	
Trade and other receivables	5.5	5.5	
Trade and other payables	(4.2)	(4.2)	
Deferred tax	-	(8.0)	
Net asset acquired	6.7	22.1	
Goodwill		26.2	
		48.3	
Satisfied by:			
Cash paid		49.8	
Shares to be issued		1.9	
Cash acquired		(3.4)	
Total consideration		48.3	

From the date of acquisition to 31 December 2018, Vohtec contributed US \$13.4 million to revenue and US \$1.9 million to profit before tax. If the acquisition had been made at the beginning of the financial year, the business would have contributed US \$27.0 million to revenue and US \$2.2 million to profit before tax. Profit before tax should not be viewed as indicative of the results of this business that would have occurred, if this acquisition had been completed at the beginning of the year. The fair value adjustments mainly relate to the recognition of acquisition intangibles and associated deferred tax liability, as well as a fair value uplift to the property, plant and equipment.

Goodwill, being the excess of the consideration over the net tangible and intangible assets acquired, represents benefits which do not qualify for recognition as intangible assets, including the ability of a business to generate higher returns than individual assets, skilled workforces and acquisition synergies that are specific to the Group. In addition, goodwill arises on the recognition of deferred tax liabilities in respect of intangible assets for which amortisation does not qualify for tax deductions.

23. Business Combinations (continued)

Orbit Industries, Inc

On 6 August 2018, the Group acquired 100% of the voting share capital of Orbit Industries, Inc (Orbit) in the United States. Total consideration was US \$23.6 million consisting of US \$24.4 million paid in cash and net of cash acquired of US \$0.8 million. The consideration was paid in cash and funded by the Group's existing cash and borrowing resources.

Acquisition expenses of US \$0.5 million were incurred in respect of this acquisition and expensed to the consolidated statement of profit or loss.

Set out below is an analysis of the net book value and fair value of the net assets acquired and the consideration payable in respect of this acquisition.

Orbit LLC	Book value US \$million	Fair value US \$million
Intangible assets	-	9.4
Property plant and equipment	. 0.8	3.3
.Trade and other receivables	1.3	1.3
Trade and other payables	(0.9)	(0.9)
Deferred tax	-	(2.3)
Net asset acquired	1.2	10.8
Goodwill		12.8
		23.6
Satisfied by:		
Cash paid		24.4
Cash acquired		(8.0)
Total consideration		23.6

From the date of acquisition to 31 December 2018, Orbit contributed US \$3.5 million to revenue and US \$1.0 million to profit before tax. If the acquisition had been made at the beginning of the financial year, the business would have contributed US \$8.1 million to revenue and US \$2.5 million to profit before tax. Profit before tax should not be viewed as indicative of the results of this business that would have occurred, if this acquisition had been completed at the beginning of the year. The fair value adjustments mainly relate to the recognition of acquisition intangible and associated deferred tax liability, as well as a fair value uplift to the Property, plant and equipment.

Goodwill, being the excess of the consideration over the net tangible and intangible assets acquired, represents benefits which do not qualify for recognition as intangible assets, including the ability of a business to generate higher returns than individual assets, skilled workforces and acquisition synergies that are specific to the Group. In addition, goodwill arises on the recognition of deferred tax liabilities in respect of intangible assets for which amortisation does not qualify for tax deductions.

Other business combinations in the year

On 14 November 2018, the Group through Element Materials Technology Warwick Limited, acquired the assets of Cobham Technical Services, Lighting Testing & Consultancy, as an asset purchase agreement for a net cash consideration of US \$2.4 million.

The consideration for this asset acquisition was paid in cash and funded by the Group's existing cash and borrowing resources.

24. Retirement benefit obligations

The Group operates a number of pension schemes throughout the world. In most locations, these are defined contribution arrangements. However, there are defined benefit pension plans in the UK, Sweden, Germany, Netherlands and Norway, which require contributions to be made to separately administered funds or insurance companies.

Defined contribution pension schemes

A defined contribution plan is a post-employment benefit plan under which an entity pays fixed contributions into a separate entity and will have no legal or constructive obligation to pay further amounts. Obligations for contributions to defined contribution pension plans are recognised as an employee benefit expense in the statement of profit or loss as incurred. The Group made US \$12.7 million payment to defined contribution plans in 2018 (2017: US \$8.3 million).

Defined benefit pension schemes

A defined benefit plan is a post-employment benefit plan other than a defined contribution plan.

The Group's net obligation in respect of defined benefit pension plans is calculated separately for each plan by estimating the amount of future benefits that employees have earned in return for their service in the current and prior years; that benefit is discounted to determine its present value. Any unrecognised past service costs and the fair values of any plan assets are deducted.

The largest of the defined benefit pension schemes is the UK scheme, TTL Chiltern Group Pension Scheme, which was acquired as part of the Exova Group plc acquisition. The assets of this scheme are administered by trustees in a fund independent from those of the participating companies and invested directly on the advice of the independent professional investment managers.

The Scheme provides pensions in retirement and death benefits to members. Pension benefits are linked to a member's final salary at retirement and their length of service. Since 1 October 2015 the Scheme has been closed to future accrual. The Scheme is a registered scheme under UK legislation and was contracted out of the State Second Pension. The Scheme is subject to the scheme funding requirements outlined in UK legislation. The Scheme was established from 2 March 1978 under trust and is governed by the Scheme's rules dated 22 July 2011 and subsequent amending deeds (the "Rules"). The Trustees are responsible for the operation and the governance of the Scheme, including making decisions regarding the Scheme's funding and investment strategy. Under clause 66 of the Rules the Company is entitled to an unconditional right to a refund of surplus if the Scheme winds up with excess assets.

The Scheme exposes the Company to actuarial risks such as; market (investment) risk, interest rate risk, inflation risk currency risk and longevity risk. The Scheme does not expose the Company to any unusual Scheme-specific or Company-specific risks.

The Scheme's investment strategy is to invest broadly 55% in return seeking assets (with 27.5% allocated to diversified growth funds and 27.5% allocated to equities) and 45% in matching assets (with 20.5% allocated to index-linked gilts or other inflation linked assets and 24.5% allocated to corporate bonds). This strategy reflects the Scheme's liability profile and the Trustees' and Company's attitude to risk.

The last funding valuation of the Scheme was as at 31 December 2016 and revealed a funding deficit of £22.6 million (US \$30.0 million). The Company agreed to pay monthly contributions of £0.1 million (US \$0.2 million) payable from 1 October 2018, ceasing on 31 January 2025 in line with the recovery plan dated 15 October 2018. In 2018, the Group made contributions of US \$10.7 million to the UK scheme (31 December 2017: US \$0.5 million). The Group expects to make contributions of US \$7.3 million in 2019, including a one-off funding deficit contribution of US \$5.3 million.

In addition, Scheme expenses, Pension Protection Fund Levies and insurance premiums are paid directly by the Company. Contributions to the Scheme are subject to review at future actuarial valuations and subsequent certification of a new schedule of contributions. The next actuarial valuation of the Scheme is due with effective date 31 December 2019 and a new schedule of contributions must be in place within 15 months of the effective date.

The liabilities of the Scheme are based on the current value of expected benefit payment cashflows to members of the Scheme over the next 70 to 80 years. On the chosen IAS 19 assumptions the average duration of the liabilities at 31 December 2018 is approximately 19 years (31 December 2017: 16 years).

24. Retirement benefit obligation (continued)

Total pension cost

The pension expense relating to defined benefit schemes, including GMP equalisation cost, recognised in the Group statement of profit or loss consists of:

	2018 US \$million	2017 US \$million
Defined benefit schemes		
Defined benefit scheme – current service cost	0.4	0.2
Defined benefit scheme – past service cost (GMP equalisation cost)	0.4	· -
Pension cost included in operating profit	0.8	0.2

Defined benefit schemes

The amounts recognised in the statement of profit or loss were as follows:

	2018 US \$million	2017 US \$million	
Current service cost	0.4	0.2	
Past service cost	0.4	-	
Net pension interest cost	0.6	0.4	
Total charge	1.4	0.6	

The current service cost, past service cost and scheme administration costs are included in operating costs in the Group statement of profit or loss. Net pension interest cost is included in net finance costs.

Actuarial losses recognised directly in the group statement of comprehensive income:

	2018	2017	
	US \$million	US \$million_	
Cumulative losses at 1 January	(0.6)	-	
Recognised loss / (gains) in the year	0.1	(0.6)	
Cumulative loss as at 31 December	(0.5)	(0.6)	

Remeasurements of the net defined liability shown in the group statement of comprehensive income are as follows:

·	2018 US \$million	2017 US \$million
Net remeasurement – financial	(3.7)	(2.2)
Net remeasurement – demographic	0.1	0.1
Net remeasurement – experience	1.2	(0.3)
Return on assets – excluding interest income	2.5	1.8
Total remeasurement of the net defined liability shown in the group statement of other comprehensive income	0.1	(0.6)

Employer contributions

In 2018, the Group made contributions of US \$11.2 million (2017: US \$0.5 million) to all defined benefit schemes of which US \$10.7 million relates to the UK scheme. The Group expects to make contributions of US \$7.3 million in 2019, including a one-off funding deficit contribution of US \$5.3 million.

24. Retirement benefit obligation (continued)

Pension liability for defined benefit schemes

The amounts recognised in the balance sheet for defined benefit schemes were as follows:

	2018 US \$million	2017 US \$million
Fair value of scheme assets	58.5	55.7
Present value of funded defined benefit obligations	(72.6)	(80.9)
Net funded obligations	(14.1)	(25.2)
Present value of unfunded defined benefit obligations	-	
Net liability in the balance sheet	(14.1)	(25.2)

The fair value changes in the schemes are shown below:

	Fair value of plan assets 2018	Defined benefit obligation 2018	Total US \$million
As at 1 January 2018	55.7	(80.9)	(25.2)
Current service cost	-	(0.4)	(0.4)
Past service cost	-	(0.4)	(0.4)
Net interest cost	1.4	(2.0)	(0.6)
Actuarial gains / (losses)	(2.5)	2.6	0.1
Contributions by the employer	11.2	-	11.2
Benefits paid	(3.4)	3.4	-
Effect of exchange rate changes on overseas schemes	(3.9)	5.1	1.2
As at 31 December 2018	58.5	(72.6)	(14.1)

Composition of scheme assets in each category:

	UK scheme 2018 US \$million	Sweden scheme 2018 US \$million	Norway scheme 2018 US \$million	Germany schemes 2018 US \$million	Netherlands scheme 2018 US \$million
Equities	21.5	0.7	-	-	-
Bonds	8.9	3.1	-	-	-
Property	10.1	-	-	-	-
LDI	3.8	-	-	-	-
Structured products	-	1.1	-	-	-
Cash	9.3	-	-	-	-
	53.6	4.9	-	-	-

The equities and bonds held within the UK and Swedish scheme are all quoted in active markets. The other schemes have no assets.

24. Retirement benefit obligation (continued)

The actual return on scheme assets was as follows:

		Sweden	Germany	Norway	Netherlands
	UK scheme	scheme	schemes	scheme	scheme
	2018	2018	2018	2018	2018
	US \$million				
Actual return	2.3	0.2	•	-	-

The pension deficit of each scheme at 31 December was as follows:

	UK scheme 2018 US \$million	Sweden scheme 2018 US \$million	Germany schemes 2018 US \$million	Norway scheme 2018 US \$million	Netherlands scheme 2018 US \$million
Present value of funded defined benefit obligations	(61.6)	(9.2)	-	. (0.1)	-
Present value of unfunded defined benefit obligations	-	-	(0.8)	-	(0.4)
Fair value of scheme assets	53.6	4.4	-	-	-
Net defined benefit obligation	(8.0)	(4.8)	(0.8)	(0.1)	(0.4)

Principal actuarial assumptions:

	UK scheme	Sweden scheme Ge	ermany schemes	Norway scheme	Netherlands scheme
	2018 US \$million	2018 US \$million	2018 US \$million	2018 US \$million L	2018 US \$million
Discount rate	2.85%	2.40%	2.00%	2.60%	- -
Inflation rate	2.00%	2.00%	2.00%	2.00%	-
Rate of salary increases Life expectancy for pensioners at the age of 65 (years):	•	2.20%	2.00%	2.20%	-
Male	21.8	21.8	20.0	. 21.3	-
Female	23.7	24.4	23.6	24.5	-

Changes in significant assumptions and the impact on the defined benefit obligations at 31 December 2018 are shown below:

2018 Sensitivity level

	UK Scheme		Sweden Scheme		Norway Scheme	
	0.25% Increase US \$million	0.25% Decrease US \$million	0.50% Increase US \$million	0.50% Decrease US \$million	0.25% Increase US \$million	0.25% Decrease US \$million
Assumptions						***
Inflation rate	(3.1)	3.1	(8.0)	0.9	-	-
Discount rate	1.6	(1.6)	0.7	(0.6)	-	-
Rate of salary increase	n/a	n/a	0.4	(0.3)	-	-
	Increase by one year US \$million	year	Increase by one year US \$million	year	Increase by one year US \$million	Decrease by one year US \$million
Assumed life expectancy at age 65	2.5	n/a	0.3	(0.3)	-	-

The sensitivity analyses above have been determined based on a method that extrapolates the impact on the defined benefit obligation as a result of reasonable changes in key assumptions occurring at the end of the reporting period.

25. Lease arrangements

Right of use asset	Property	Non-property	Total US \$million
Cost			·
As at 1 January 2017	51.7	2.4	54.1
Acquisitions	38.2	3.4	41.6
Additions	5.0	2.2	7.2
Exchange movements	3.9	0.3	4.2
As at 31 December 2017	98.8	8.3	107.1
As at 1 January 2018	98.8	8.3	107.1
Acquisitions	3.1	0.9	4.0
Additions	. 10.5	3.2	13.7
Expiry	(1.5)	(1.8)	(3.3)
Exchange movements	(1.8)	(0.1)	(1.9)
As at 31 December 2018	109.1	10.5	119.6
Accumulated Depreciation			
As at 1 January 2017	23.4	1.1	24.5
Charge for the period	7.2	1.6	8.8
Exchange movements	1.9	0.1	2.0
As at 31 December 2017	32.5	2.8	35.3
As at 1 January 2018	32.5	2.8	35.3
Charge for the period	12.0	3.8	15.8
Expiry	(1.5)	(1.8)	(3.3)
Exchange movements	(1.3)	(0.2)	(1.5)
As at 31 December 2018	41.7	4.6	46.3
Net book value			
As at 31 December 2018	67.4	5.9	73.3
As at 31 December 2017	66.3	5.5	71.8
		2018 US \$million	2017 US \$million
Lease Liability			
Current Property		14.4	12.0
		3.0	3.1
Non-property		17.4	15.1
Nanauran			
Non-current		70.0	
Property		78.9	81.6
Non-property		3.0	2.5
		81.9	84.1
Total			
Property		93.3	93.6
			5.6
Non-property		6.0	ס.כ

25. Lease arrangements (continued)

Lease Liability	Within 1 year	2 - 5 years	5+ years	Total US \$million
Property	14.4	46.7	32.2	93.3
Non-property	3.0	3.0	-	6.0
31 December 2018	17.4	49.7	32.2	99.3

Interest expense on the lease liabilities recognised within finance costs was US \$8.8 million (2017: US \$6.5 million, 2016: US \$4.1 million). As at 31 December 2018, the Group was committed to leases with future cash flows of \$1.2 million discounted to present value. As these leases had not yet commenced they have not been accounted for as a liability as at 31 December 2018.

A liability and corresponding right-of-use asset will be recognised for these leases at the lease commencement date. The Group subleases vacant space available within its leased properties. IFRS 16 specifies conditions whereby a sublease is classed as a finance lease for the sub-lessor. The finance lease receivable balance held is as follows:

Net finance lease receivable	2018	2017	
Net finance lease receivable	US \$million	US \$million	
Income recognised in relation to lease receivables	. 0.9	0.9	
Total	0.9	0.9	

26. Uncompleted performance obligations

The table below represents uncompleted performance obligations at the end of the reporting period. This is total revenue which is contractually due to the Group, subject to the performance of the obligations of the Group related to these revenues.

	2018	2017	
	US \$million	US \$million	
Total contracted revenue	75.8	67.5	

The total contracted revenue with customers as at 31 December 2018 with local currency amounts converted at the applicable spot rate for US dollars on 31 December 2018 held constant is below. Contracted revenue calculation split between current and non-current assumes: (i) no changes in service fees, (ii) no changes to the performance obligations in the master service agreements ("MSAs") otherwise described elsewhere in these financial statements, (iii) customers do not utilise any cancellation allowances set forth in their MSAs and (iv) customers do not terminate MSAs early for any reason.

	Current US \$million	Non-current US \$million
Total 2018 contracted revenue	55.0	20.8

27. Share capital and reserves

Share capital

		2018		2017	
Туре		Issued	2018 Total	Issued	2017 Total
	Nominal value	number	US \$	number	US \$
A1 ordinary shares	, 0.0001	775,585	78	775,585	78
A2 ordinary shares	0.0001	44,991	4	43,786	4
A3 ordinary shares	0.03	25,271	758	. 25,271	758
A4 ordinary shares	0.000001	258,141	-	258,141	-
B ordinary shares	0.0001	1,408,775	141	1,005,230	101
B1 Ordinary shares	0.0001	64,924	6	-	
C ordinary shares	250	4	1,000	4	1,000
As at 31 December		2,577,691	1,987	2,108,017	1,941
			2018		2017
			\$'000		\$'000

\$'000 \$'000
Authorised, issued and fully paid, as at 31 December 2 2

During 2018 the Company issued 1,205 A2 ordinary shares, 403,545 B Ordinary Shares and 64,924 B1 Ordinary Shares. Of the total shares issued, 161,206 B shares and 64,924 B1 shares were issued to the directors of the Company.

1,205 A2 ordinary shares were issued during 2018 at US \$1 per share inclusive of share premium. The total share premium from the shares issued in the year was US \$1,205.

235,907 B ordinary shares were issued during 2018 at US \$0.0001. These shares did not have share premium attached.

167,638 B ordinary shares were issued during 2018 at US \$0.22 per share inclusive of share premium. The total share premium from the shares issued in the year was US \$38,863.

64,924 B1 ordinary shares were issued during 2018 at US \$0.0001 per share. These shares did not have share premium attached.

Rights and conditions of each class of share:

- A1 ordinary shares have full voting entitlement.
- A2 ordinary shares have no voting entitlement.
- A3 ordinary shares have full voting entitlement.
- A4 ordinary shares have full voting entitlement.
- B ordinary shares have no voting entitlement.
- B1 ordinary shares have no voting entitlement.
- C ordinary shares have no voting entitlement.

Share premium reserve: The share premium reserve contains the premium arising on issue of equity shares, net of issue expenses.

27. Share capital and reserves (continued)

Share premium

The share premium reserve contains the premium arising on issue of equity shares, net of issue expenses.

Share based payment reserve

The Company has issued B and B1 Ordinary shares ("B shares") to certain employees and Directors under an Employee Shareholder Status ("ESS" scheme). Pursuant to the terms set out in the Articles of incorporation, the pay-out for these B shares are based on a calculation dependent on the enterprise exit value of the Group and are subject to meeting certain hurdle rates. These shares are treated as equity-settled share based payments, where the grant date fair value is spread over the period between the grant date and the best estimate of the anticipated exit date.

An option pricing model is used to determine the fair value at grant date. The key inputs and assumptions include:

- Expected volatility the Company applied re-levered equity volatility based on historical equity volatility of publicly traded peer companies.
- Expected term the period until an exit event which is estimated to be 4 to 6 years from the initial investment by the majority shareholder.
- Risk free interest rate determined by reference to US Treasury yield curve for the period commensurate with the
 expected timing of exit.
- A total of 1.5m B shares has been issued as at 31 December 2018 (including 0.5m shares issued during 2018). The
 fair value at grant date was determined to be \$5.4 per share in 2018.

Based on the above, the Company recognised share-based payment expense of \$3.8m in 2018.

28. Non-controlling interests

The Group holds equity interests of less than 51% in the following companies where it exercises control:

	% shareholding
Element Doha LLC	24.5%
Al Futtaim Elements Material Technology Dubai LLC	49.0%
Exova Warringtonfire Middle East LLC	49.0%
Element (Saudi Arabia) Company Limited	50.0%
Exova Waringtonfire LLC	49.0%

Element Doha LLC approved and paid a dividend of US \$1.6 million. In addition, Admaterials Technologies Private Limited, a subsidiary of the Group, paid US \$1.2 million dividend to its non-controlling interest in the year.

The Group is exposed, or has rights, to variable returns from its involvement with the equity interests and has the ability to affect those returns through its power over the equity interests. Based on this, the directors have determined that the Group has control over these equity interests and therefore consolidates them within the financial statements.

The Group has interests in joint venture arrangements in the following companies:

Name	Principal place of business	Group ownership interest	Held by
BM Trada RKCA Certifications Private Limited	India	50%	BM TRADA Overseas Limited
FIRA – CMA Testing Services Limited	Hong Kong	50%	BM TRADA Overseas Limited
Standardt BM TRADA Belgelendirme AS	Turkey	50%	BM TRADA Overseas Limited
BM TRADA Latvia	Latvia	50%	BM TRADA Overseas Limited
BM TRADA RKCA Lanka Certifications (Private) Limited	Sri Lanka	50%	BM TRADA RKCA Certification Private Limited
BM TRADA Suomi OY	Finland	50%	BM TRADA Latvija
BM TRADA Eesti Ou	Estonia	50%	BM TRADA Latvija
BM TRADA Deutschland GmbH	Germany	50%	BM TRADA Latvija
BM TRADA Lietuva	Lithuania	50%	BM TRADA Latvija
Tianjin C-Kai BM TRADA Certification Company Limited	China	40%	BM TRADA Certification Limited

During 2018, the Group disposed of their interest in BM Trada (HK) Limited and BM Trada Cyprus Limited.

29. Events after the balance sheet date

Between the end of the financial year and the date of this report, no item, transaction or event of a material nature has occurred, in the opinion of the directors of the Company, that is likely to significantly affect the operations of the Group, the results of those operations, or the state of affairs of the Group in future financial years.

30. Related party transactions

Transactions between the Group and its subsidiaries which are related parties have been eliminated on consolidation and are not disclosed in this note.

Bridgepoint Advisers Limited provides certain administrative services for the Group in return for a monitoring fee. Monitoring fees of US \$0.4 million (2017: US \$0.4 million) were charged by Bridgepoint Advisers Limited in the year.

Bridgepoint Advisers Limited funded set up costs in respect of the development of the Group's Greenfield laboratory in China. At the end of the year the costs of US \$0.4 million were owed to Bridgepoint Advisors Limited.

Remuneration to key management personnel are disclosed in note 9. The key management personnel are directors of the Company.

31. Commitments and contingent liabilities

The Group signed Senior Facilities Agreement ("SFA") with the institutional lenders in order to secure the credit facilities. The SFA names specific entities of the Group that may borrow under the various facilities of the agreement. In addition, all borrowings under the SFA are subject to security over material subsidiaries organised in Canada, the United Kingdom, Netherlands and the United States, subject to certain exclusions. Material subsidiaries of the Group, as defined by the SFA, are the guarantors to any borrowings. Security will only be enforceable on the occurrence of an Event of Default as defined by the SFA.

The Group is involved in various claims incidental to the ordinary course of its business, including claims for commercial disputes regarding inspection and testing, and disputes with employees and former employees. The Group is not currently party to any legal proceedings other than ordinary litigation incidental to the conduct of business. The Group maintains appropriate insurance cover to provide protection from the small number of significant claims it is subject to from time to time.

At 31 December 2018, the Group has US \$13.0 million letter of credit outstanding.

Capital commitments of the Group as at 31 December 2018 is US \$4.9 million (31 December 2017: US \$2.2 million).

32. Subsidiaries and associated companies

The Group's and Company's subsidiaries are listed below. All the subsidiaries were consolidated at 31 December 2018.

Name Continuing businesses	Country of incorporation or registration	Proportion Held	Activity	Registered Address
Element Materials Technology Detroit LLC	USA	100%	Testing and inspection operations	40600 Ann Arbour Road E Suite 201, Plymouth, MI 48170
Element Materials Technology Cleveland Inc.	USA	100%	Testing and inspection operations	160 Mine Lake Court, Suite 200, Raleigh, NC 27615
Element Materials Technology Huntington Beach LLC	USA	100%	Testing and inspection operations	160 Mine Lake Court, Suite 200, Raleigh, NC 27615
Element Materials Technology Jupiter LLC	USA	100%	Testing and inspection operations	1200 South Pine Island Road, Plantation, FL 33324
Element Materials Technology New Berlin Inc.	USA	100%	Testing and inspection operations	301 S Bedford Street, Suite 1, Madison, WI 53703
Element Materials Technology St. Paul Inc.	USA	100%	Testing and inspection operations	160 Mine Lake Court, Suite 200, Raleigh, NC 27615
Element Materials Technology Cincinnati Inc.	USA	100%	Testing and inspection operations	4400 Easton Commons Way Suite 125, Columbus, OH 43219
Element Materials Technology Houston LLC	USA	100%	Testing and inspection operations	160 Mine Lake Court, Suite 200, Raleigh, NC 27615
Element Materials Technology Wixom Inc.	USA	100%	Testing and inspection operations	306 West Main Street Suite 512, Frankfort, KY 40601
Element Materials Technology Daleville, LLC	USA	100%	Testing and inspection operations	150 West Market Street Suite 800, Indianapolis, IN 46204
Element Materials Technology Lafayette, LLC	USA	100%	Testing and inspection operations	3867 Plaza Tower Dr, Baton Rouge, LA 70816
Element Materials Technology Broken Arrow, LLC	USA	100%	Testing and inspection operations	1833 South Morgan Road, Oklahoma City, OK 73128
Element Materials Technology Los Angeles LLC.	USA	100%	Testing and inspection operations	818 West 7th Street, Los Angeles, CA 90017
Element Materials Technology Minneapolis LLC	USA	100%	Testing and inspection operations	1010 Dale Street N, Saint Paul, MN 55117
Element Materials Technology Minneapolis Inc.	USA	100%	Testing and inspection operations	1010 Dale Street N, Saint Paul, MN 55117
Element Materials Technology Portland Inc.	USA	100%	Testing and inspection operations	780 Commercial Street SE Suite 100, Salem, OR 97301

8818, Languang Technology Park, No. 7 Xinxi Road, High-tech Industrial Park, Nanshan, Shenzhen	Testing and inspection operations	100%	China	Element Materials Technology Shenzhen Ltd
Herentalsebaan 406, 2160 Wommelgem	Testing and inspection operations	100%	Belgium	Element Materials Technology Antwerpen N.V.
Tempowerking 11, 21079, Hamburg	Testing and inspection operations	100%	Germany	Element Materials Technology Hamburg GmbH
Friedrich-Wöhler-Str. 1, 12489 Berlin	Testing and inspection operations	100%	Germany	Element Materials Technology Berlin GmbH
Tempowerkring 11 D-21079, Hamburg Germany	Testing and inspection operations	100%	Germany	tennent Materials Technology Holding Germany GmbH (formerly Element Materials Technology Herne GmbH)
Sevillaweg 46, 3047 Al, Rotterdam	Testing and inspection operations	100%	Netherlands	Element Materials Technology Rotterdam B.V.
Zekeringstraat 33, 1014 BV, Amsterdam	Testing and inspection operations	100%	Netherlands	Element Materials Technology Amsterdam B.V.
10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN	Testing and inspection operations	100%	United Kingdom	Element Materials Technology Warwick Ltd
10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN	Testing and inspection operations	100%	United Kingdom	Element Materials Technology Hitchin Limited
10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN	Testing and inspection operations	100%	United Kingdom	Materials Engineering Research Laboratory Limited
10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN	Testing and inspection operations	100%	United Kingdom	Element Materials Technology Aberdeen Ltd.
10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN	Testing and inspection operations	100%	United Kingdom	Element Materials Technology Sheffield Ltd.
600 North 2nd Street, Suite 401Harrisburg Pennsylvania, 17101	Testing and inspection operations	100%	· USA	OrbitNDT-PA, Inc.
111 Eighth Avenue, 13th Floor New York, NY 10011	Testing and inspection operations	100%	USA	OrbitNDT-DNK Inc.
4400 Easton Commons Way, Suite 125 Columbus, Ohio, 43219	Testing and inspection operations	100%	USA	Orbit Industries, Inc.
780 Commercial Street SE Suite 100, Salem, OR 97301	Testing and inspection operations	100%	USA	Element Materials Technology Portland - Evergreen Inc.
Registered Address	Activity	Proportion Held	Country of incorporation or registration	Name Continuing businesses

Name Continuing businesses	Country of incorporation or registration	Proportion Held	Activity	Registered Address
Exova (UK) Limited	United Kingdom	100%	Testing	Lochend Industrial Estate, Queen Anne Drive, Newbridge, Midlothian, EH28 8LP
FIRA International Limited	United Kingdom	100%	Testing	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
N.D.T. Limited	United Kingdom	100%	Testing	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Exova (Ireland) Limited	Ireland	100%	Testing	Unit D8, North City Business Park, North Road, Finglas, Dublin 11, D11Y267
Warringtonfire Consulting Ireland Limited	Ireland	100%	Testing	Unit D8, North City Business Park, North Road, Finglas, Dublin 11, D11Y267
Element Materials Technology Pilsen s.r.o.	Czech Republic	100%	Testing	Podnikatelska 1184/39, 301 00, Plzen
Element Metech s.r.o.	Czech Republic	100%	Testing	Toužimská 767, Letňany, Praha 9, 19900 Czech Republic
Exova B.V.	Netherlands	100%	Testing	Kapitein Nemostraat 12, 7821 AC, Emmen, Drenthe
Element Materials Technology Milan s.r.l.	italy 	100%	Testing	Via della Pierina 9/11, 26013 Crema (CR)
C.T.R. S.R.L.	Italy	100%	Testing	Via Visco 7/A, 35010, Limena (PD)
Exova Metech AS	Norway	100%	Testing	Bygning 3, Fabrikkvegen 11, Raufoss, 2830
Element Materials Technology Toulouse SAS	France	100%	Testing	3 Avenue André Marie Ampère, Zone d'Activité Commerciale du Perget, 31770, Colomiers
Element Materials Technology France SAS	France	100%	Testing	3 Avenue André Marie Ampère, Zone d'Activité Commerciale du Perget, 31770, Colomiers
Warringtonfire Frankfurt GmbH	Germany	100%	Testing	Industriepark, Hochst, Geb. C369, am Main, 65926, Frankfurt
Element Metech GmbH	Germany	100%	Testing	Hans-Böckler-Ring 9, D-22851 Norderstedt
Vohtec Qualitätssicherung GmbH	Germany	100%	Testing	Carl-Zeiss-Str. 17; Aalen, 73431, Germany
WFRGent NV*	Belgium	65%	Testing	Ottergemsesteenweg-Zuid 711, Ghent, Flemish Region 9000

Name Continuing businesses	Country of incorporation or registration	Proportion Held	Activity	Registered Address
Element Materials Technology AB	Sweden	100%	Testing	Box 1340, 581 13, Linkoping
CSM NDT Certification AB*	Sweden	80%	Testing	Artilleriplan 4 691 50, Karlskoga
Element Metech AB	Sweden	100%	Testing	Box 1340, 581 13, Linkoping
Element Metech A/S	Denmark	100%	Testing	Flyvestation, Karup, DK-7470, Herningvej 30, Karup
Element Metech OY	Finland	100%	Testing	Kuormakuja, Nummela, 03100
Element Metech Measurement Technology Services (Tianjin) Co. Limited	China	100%	Testing	Room 1719, 17F, C1, TEDA MSD, No.79 First Avenue, TEDA, Tianjin, 300457
Exova, Inc	USA	100%	Testing	1209 Orange Street, Wilmington DE 19801
BM TRADA Certification North America Inc	USA	100%	Testing	820 Bear Tavern Road, Mercer County, West Trenton, NJ 08628
Element Materials Technology Canada Inc (formerly Exova Canada Inc)	Canada	100%	Testing	2395 Speakman Drive, Mississauga ON LSK 1B3
BM TRADA Certification Canada Inc.	Canada	100%	Testing	398-2416 Main Street, Vancouver BC VST 3E2
Element Materials Technology Monterry S. de R. L de CV	Mexico	100%	Testing	Carretera Monterrey-Saltillo 3279 B, Privada de Santa Catarina, Santa Catarina, Nuevo Leon, C.P. 66367
Element Doha LLC*	Qatar	24.5%	Testing	Street 46, Gate 16, Salwa Industrial Area, P.O. Box 23650, Doha
Exova Warringtonfire LLC*	Qatar	49%	Testing	P.O. Box 24863, Doha
Element Materials Technology Singapore Pte Ltd.	Singapore	100%	Testing	60 Paya Lebar Road, #08-43 Paya Lebar Square, Singapore, 409051
Warringtonfire Singapore Pte. Ltd.	Singapore	100%	Testing	60 Paya Lebar Road, #08-43 Paya Lebar Square, Singapore, 409051
Admaterials Technologies Pte. Ltd.*	Singapore	70%	Testing	58 Sungei Kadut Loop, Prospaq Industrial Building, Singapore, 729501
Element Materials Technology ME Limited LLC*	Oman	70%	Testing	Muscat Governorate/Bawshar/Ghala, PO Box 3552, PC 112

Name Continuing businesses	Country of incorporation or registration	Proportion Held	Activity	Registered Address
Element Saudi Arabia Company Limited*	Saudi Arabia	50%	Testing	Dammam, 2nd Industrial City, Road 76-27
Element Material Technology ME Limited	Cayman Islands	100%	Testing	PO Box 309, Ugland House, Grand Cayman, KY1-1104
Al Futtaim Element Materials Technology Dubai L.L.C*	Dubai	49%	Testing	Dubai Investments Park, P.O. Box 34924, Dubai
Metallurgical Services Private Limited	India	100%	Testing	Mehta House, Ashok Silk Mills Lane, Khatkopar (West), Mumbai, 40086
Exova (Malaysia) Sdn.Bhd	Malaysia	100%	Testing	Suite 13.03, 13th Floor, Menara Tan & Tan, 207 Jalan Tun Razak, 50400, Kuala Lumpur
Admaterials Technologies Sdn. Bhd	Malaysia	100%	Testing	2C Jalan Giam, Taman Majidee, 80250 Johor Bahru, Johor
Warringtonfire Consulting ME Limited	Channel Islands	100%	Testing	Heritage Hall, Le Marchant Street, St Peter Port, GY1 4HY, Guernsey
Warringtron Fire Hong Kong Limited	Hong Kong	100%	Testing	Unit C 18/F Infotech Centre, 21 Hung To Road, Kwun Tong, Kowloon
Warringtonfire Australia Pty Limited	Australia	100%	Testing	Unit 2, 409-411 Hammond Road, Dandenong South, Victoria 3175
Exova Certifire Pty Ltd	Australia	100%	Testing	Unit 2, 409-411 Hammond Road, Dandenong South, Victoria 3175
Warringtonfire Limited	Cayman Islands	100%	Testing	PO Box 309, Ugland House, Grand Cayman, KY1-1104
Exova Jones Environmental South Africa (Pty) Ltd*	South Africa	90%	Testing	Unit D2 and D5, 9 Quantum Road, Firgrove Business PA, Somerset West, Western Cape, 7130
Defire (ACT) Pty Ltd	Australia	100%	Testing	Unit 2, 409-411 Hammond Road, Dandenong South, Victoria 3175
Defire (NSW) Pty Ltd	Australia	100%	Testing	Unit 2, 409-411 Hammond Road, Dandenong South, Victoria 3175
Defire (QLD) Pty Ltd	Australia	100%	Testing	Unit 2, 409-411 Hammond Road, Dandenong South, Victoria 3175
Defire (WA) Pty Ltd	Australia	100%	Testing	Unit 2, 409-411 Hammond Road, Dandenong South, Victoria 3175
Element Materials Technology Seville S.L.	Spain	100%	Testing	Wilburg y Orville Wright 1, Aeropolis, Seville, 41309, La Rinconada

Name Continuing businesses	Country of incorporation or registration	Proportion Held	Activity	Registered Address
Element Materials Technology Hartford Inc.	USA	100%	Testing	One Constitution Plaza, Hartford CT 06103-1919
Element Materials Technology Wilmington Inc. (formerly SL Pharma Labs Inc)	USA	100%	Testing	1209 Orange Street, Wilmington, DE 19801
BM TRADA Deutschland GmbH~	Germany	50%	Certification	Heilbronner Str. 150, 70191, Stuttgart, Germany
BM TRADA Suomi OY~	Finland	50%	Certification	Kalevantie 2, Tampere, 33100, FINLAND
Tianjin C-Kai BM TRADA Certification Company Limited~	China	40%	Certification	Room 708, Suite F Hai Tai Plaza, No.8 Hua Tian Road, Tianjin, Hua Yuan Industrial Zone
Element Materials Technology (Shanghai) Co. Ltd.	China	100%	Certification	1st Floor, Building No. 7, No. 398 Songying Road, Qingpu District, Shanghai
BM TRADA (HK) Limited~	Hong Kong	70%	Certification	Unit 5, 5/F, Wah Chun Industrial Centre, No.54 Tai Chung Road, Tsuen Wan, N.T.
FIRA – CMA Testing Services Limited~	Hong Kong	50%	Certification	Room 1401-3 Yan Hing Centre, 9-13 ·Wong Chuk Yeung Street, Fo Tan, Shatin
Standart BM TRADA Belgelendirme AS~	Turkey	50%	Certification	CEVİZLİ MH, TUGAY YOLU CD, N.20/B OFİSİM İST, İŞM.K.7, MALTEPE, N.42
BM TRADA Latvija~	Latvia	50%	Certification	Jūrkalnes 15, Riga, LV-1046, Latvia
BM TRADA RKCA Lanka Certifications (Private) Limited~	Sri Lanka	50%	Certification	No. 1041-2/1 Maradana Road, Borella, Columbo 8
BM TRADA Eesti Ou~	Estonia	50%	Certification	Peterburi tee 23 / Väike-Paala 1, Tallinn, 11415 Estonia
BM TRADA Lietuva~	Lithuania	50%	Certification	Neires Krantine 16, Kaunas, LT-48402
Herculean Testing Group B.V.	Netherlands	100%	Holding Company	Herikerbergweg 238, Luna Arena, 1101 CM, Amsterdam
Element Materials Technology Holding Netherlands B.V.	Netherlands	100%	Holding Company	Zekeringstraat 33, 1014 BV, Amsterdam
Sherry Holdings LLC	USA	100%	Holding Company	150 West Market Street Suite 800, Indianapolis, IN 46204
Herculean US Holdings, Inc.	USA	100%	Holding Company	1209 Orange Street, Wilmington, DE 19801

Name Continuing businesses	Country of incorporation or registration	Proportion Held	Activity	Registered Address
Element Materials	LICA	100%	Holding	1209 Orange Street,
Technology Holding USA Inc.	USA	100%	Company	Wilmington, DE 19801
Element Materials Technology Group US Holdings Inc.	USA	100%	Holding Company	1209 Orange Street, Wilmington, DE 19801
MERL Technology Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Element Materials Technology G.C. Ltd.	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Element Materials Technology Holding UK Ltd.	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Element Materials Technology Group Holdings Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Element Materials Technology Group Holdings CC1 Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W OEN
Element Materials Technology Group Holdings CC2 Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
EMT Holdings Limited	United Kingdom	100%	Holding Company	5 Fleet Place, London, EC4M 7RD
Element Materials Technology Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Greenrock Topco Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Greenrock Bidco Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Greenrock Midco Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
EMT Finance Inc	USA	100%	Holding Company	1209 Orange Street, Wilmington, DE 19801
Greenrock Finance, Inc	USA	100%	Holding Company	1209 Orange Street, Wilmington, DE 19801
Linbob, LLC	USA	100%	Holding Company	447 Center Street, Manchester, CT 06040
EMT 2 Holdings Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN

Name Continuing businesses	Country of incorporation or registration	Proportion Held	Activity	Registered Address
EMT FX EUR Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Element Materials Technology China Holding Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
N.D.T. (Holdings) Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Exova Group Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Exova 2014 Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Exova Treasury Limited	Únited Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
EMT Finance 1 Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
EMT Finance 2 Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Exova Group (UK) Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
MTS Pendar Limited	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Warrington Fire Research Group Limited	United Kingdom	. 100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
BM TRADA Overseas Limíted	United Kingdom	100%	Holding Company	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Warringtonfire Holdings GmbH .	Germany	100%	Holding Company	Industriepark, Hochst, 65926, Geb. C369, Frankfurt
Element Materials Technology Sweden Holdings AB	Sweden	100%	Holding Company	Box 1340, 581 13, Linkoping
Exova (US) Holdings Inc	USA	100%	Holding Company	1209 Orange Street, Wilmington, DE 19801
Defire Holdings Pty Ltd	Australia	100%	Holding Company	Unit 2, 409-411 Hammond Road, Dandenong South, Victoria 3175
Exova Property Holdings Inc	Canada	100%	Property Holding Company	2395 Speakman Drive, Mississauga, ON L5K 1B3

Name Continuing businesses	Country of incorporation or registration	Proportion Held	Activity	Registered Address
Western Technical Services Limited	United Kingdom	100%	Non-trading	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Exova Warringtonfire Middle East LLC*	Dubai	49%	Non-Trading	Dubai investments Park, P.O. Box 34924, Dubai
EMT FX GBP Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
EMT FX USD Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
EMC Projects Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
TRaC EMC & Safety Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
TRaC Environmental and Analysis Ltd **	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
TRaC Telecoms & Radio Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
TRaC Global Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W OEN
Element Materials Technology (Mexico) Ltd.	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Catalyst Environmental Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SVV1W OEN
Environmental Evaluation Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Accusense Systems Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Warrington Certification Limited**	United Kingdom	100%	Dormant	Holmesfield Road, Warrington, Cheshire, WA1 1RE
Warrington Fire Research Centre (London) Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Warrington Fire Research Consultants Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Warrington Fire Research Centre Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN

Name Continuing businesses	Country of incorporation or registration	Proportion Held	Activity	Registered Address
Warrington APT Laboratories Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Certifire Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Firas Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
BM TRADA Group Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
BM TRADA Certification Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
TRADA Technology Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Chiltern International Fire Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
U.K. First Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
TRADA Certification Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
CCB Evolution Limited**	United Kingdom	100%	Dormant	Chiltern House, Stocking Lane, Hughenden Valley, High Wycombe, Buckinghamshire, HP14 4ND
Jones Environmental Forensics Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Insight N.D.T. Limited**	United Kingdom	100%	Dormant	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Morel Ventures, LLC	USA	100%	Dormant	4400 Easton Commons Way Suite 125, Columbus, OH 43219
Cascade Methods, LLC	USA	100%	Dormant	780 Commercial Street SE Suite 100, Salem, OR 97301
McCloy Engineering, LLC	USA	100%	Dormant	4400 Easton Commons Way Suite 125, Columbus OH 43219
Front Range Methods, LLC	USA	100%	Dormant	780 Commercial Street SE Suite 100, Salem, OR 97301
BM TRADA RKCA Certifications Private Limited~	India	50%	Dormant	515 Tulsiani Chambers, Nariman Point, Mumbai, 400021

Name Continuing businesses	Country of incorporation or registration	Proportion Held	Activity	Registered Address
Certifire (Hong Kong) Limited	Hong Kong	100%	Dormant	Unit C, 18/F Infotech Centre, 21 Hung To Road, Kwun Tong, Kowloon
Warringtonfire Certification and Inspection Hong Kong Limited	Hong Kong	100%	Dormant	Unit C, 18/F Infotech Centre, 21 Hung To Road, Kwun Tong, Kowloon
Exova Warringtonfire NZ Limited	New Zealand	100%	Dormant	Whitelaw Weber & Co, 2 Clifford Street, Kaikohe, 0405
Exova Environmental UK Limited.	United Kingdom	100%	Testing	10 Lower Grosvenor Place, London, SW1W 0EN
Element Materials Technology Oil & Gas UK Limited.	United Kingdom	100%	Testing	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Element Materials Technology Aerospace UK Limited.	United Kingdom	100%	Testing	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Warringtonfire & Building Products UK Limited.	United Kingdom	100%	Testing	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Warringtonfire Testing and Certification Limited.	United Kingdom	100%	Testing	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Warringtonfire Consulting Limited.	United Kingdom	100%	Testing	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Elements Materials Technology Shared Services Limited.	United Kingdom	100%	Testing	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Elements Materials Technology Wednesbury Limited	United Kingdom	100%	Testing	10 Lower Grosvenor Place, London, England, United Kingdom, SW1W 0EN
Element Materials Technology Food US LLC (formerly Exova Food US LLC)	USA	100%	Testing	1209 Orange Street, Wilmington DE 19801
Element Materials Technology Pharma US LLC (formerly Exova Pharma US LLC)	USA	100%	Testing	1209 Orange Street, Wilmington DE 19801
Element Materials Technology Transportation US LLC	USA	100%	Testing	1209 Orange Street, Wilmington DE 19801
Element Materials Technology Aerospace US LLC	USA	100%	Testing	1209 Orange Street, Wilmington DE 19801

32. Subsidiaries and associated companies (continued)

- * These companies are treated as subsidiaries in the results of the Group as effective control over their operations exists, as described in the shareholder and management services agreements with the related parties.
- ** For the year ending 31 December 2018 this subsidiary of the Group was entitled to exception from audit under s479A of the Companies Act 2016 relating to subsidiary companies.

EMT Holdings Limited's shareholding is held directly whilst all others are held through wholly owned subsidiaries.

Element Materials Technology Group Limited is majority owned by the Bridgepoint V Fund, which is in turn managed by Bridgepoint Advisors Limited, a company incorporated in England.

[~] These are companies where the Group exercises joint control.

COMPANY STATEMENT OF FINANCIAL POSITION

As at 31 December 2018

	Note	2018 US \$million	2017 US \$million
Non-current assets			
Investments	e	558.7	558.7
		558.7	558.7
Current assets			
Amounts owned by Group companies		8.9	7.1
Cash and cash equivalents	f	0.9	_
		9.8	7.1
Current liabilities			
Other payables	g	(1.9)	-
		(1.9)	-
Non-current liabilities			
Priority shares		(723.1)	(650.6)
		(723.1)	(650.6)
Net liabilities		(156.5)	(84.8)
Equity			
Share capital	h	-	-
Share premium	h	1.2	1.2
Treasury shares		-	-
Retained earnings		(157.7)	(86.0)
Total shareholders' equity		(156.5)	(84.8)

The Company's loss after tax for the year ended 31 December 2018 was US \$71.6 million (2017: US \$54.2 million).

The financial statements of Element Materials Technology Group Limited (Company registration number 09915743) were approved by the Board of Directors and authorised for issue on 9 May 2019. They were signed on its behalf by:

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Jo Wetz Director 9 May 2019

COMPANY STATEMENT OF CHANGES IN EQUITY

Year ended 31 December 2018

	Share capital	Share premium	Treasury shares	Retained earnings	Total US \$million
As at 1 January 2017	-	0.9	-	(31.8)	(30.9)
Total Comprehensive Loss	-	-	-	(54.2)	(54.2)
Issue of shares	-	0.3	-	-	0.3
As at 31 December 2017	-	1.2	-	(86.0)	(84.8)
Total Comprehensive Loss	-		-	(71.7)	(71.7)
Issue of shares	•	-	-	-	-
As at 31 December 2018	-	1.2	-	(157.7)	(156.5)

The notes on the following pages form part of these financial statements.

NOTES TO THE COMPANY FINANCIAL STATEMENTS

a) Accounting policies

(i) Basis of accounting

These financial statements have been prepared on a going concern basis and under the historical cost convention in accordance with the Companies Act 2006 and applicable FRS 101 "Reduced Disclosure Framework". As permitted by section 408 of the Companies Act 2006, no separate statement of profit or loss account is presented for the Company.

As permitted by FRS 101, the Company has taken advantage of the disclosure exemptions available under that standard in relation to the presentation of a cash-flow statement, standards not yet effective, impairment of assets and related party transactions. Where required, equivalent disclosures are given in the Group accounts of Element Materials Technology Group Limited.

Going concern

The Company's directors have a reasonable expectation that the Company has access to adequate resources to continue in operational existence for the foreseeable future. The Company has a net liability position of US \$156.5 million, mainly driven by priority shares which are classified as debt and are not expected to be redeemed until 2026. Thus, they continue to adopt the going concern basis of accounting in preparing the financial statements.

(ii) Priority shares

The Company issued priority shares that pay a fixed rate of interest and have a mandatory redemption feature at a future date. The priority shares are a contractual obligation to deliver cash and therefore are recognised as a liability.

(iii) Investments

Investments are stated at cost less provision for impairment.

(iv) Dividends

Dividend income is recognised when received. Final dividend distributions are recognised in the Company's financial statements in the year in which the dividends are approved by the Company's shareholders.

b) Directors' and employees' remuneration

No emoluments were paid directly by the Company; information on the directors' remuneration can be found in Key Management Remuneration in note 9 of the Consolidated Group Financial Statements. The Company has no employees.

c) Related parties

For details of related party transactions please refer to note 30 of the Consolidated Group Financial Statements.

d) Auditor's remuneration

Fees payable to Ernst & Young LLP and their associates for the audit of the Company's financial statements and other services have been borne by another company within the Group and have not been recharged to the Company. The total audit fee for the year was US \$10,000 (2017: US \$10,000).

e) Investments

	2018	2017	
	US \$million	US \$million	
Investments	558.7	558.7	
	558.7	558.7	

The investment relates to direct holdings in EMT Holdings Limited. Details of the subsidiaries directly and indirectly held by the Company are included in note 32.

NOTES TO THE COMPANY FINANCIAL STATEMENTS

f) Cash and cash equivalents

	2018	2017
***************************************	 US \$million	US \$million
U.S. Dollar	 0.9	-
	0.9	_

g) Other payables

	2018 US \$million	2017 US \$million
Other payables	1.9	-
	1.9	_

The other payables balance relates to unissued shares in 2018 as a result of an acquisition made by the Group during the year (disclosed in the consolidated group financial statements). These shares are expected to be issued in 2019 from Element Materials Technology Group Limited to Element Materials Technology Limited.

h) Share capital and share premium

	Nominal value	2018 Issued	2018 Total	2017 Issued	2017
		number	US \$	number	US \$
A1 ordinary shares	0.0001	775,585	78	775,585	78
A2 ordinary shares	0.0001	44,991	4	43,786	4
A3 ordinary shares	0.03	25,271	758	25,271	758
A4 ordinary shares	0.000001	258,141	-	258,141	-
B ordinary shares	0.0001	1,408,775	141	1,005,230	101
B1 ordinary shares	0.0001	64,924	6	-	-
C ordinary shares	250	4	1,000	4	1,000
As at 31 December		2,577,691	1,987	2,108,017	1,941
		_	2018	3	2017

	2018	2017
<u> </u>	\$'000	\$'000
Authorised, issued and fully paid, as at 31 December	2	2

During 2018 the Company issued 1,205 A2 ordinary shares, 403,545 B Ordinary Shares and 64,924 B1 Ordinary Shares.

1,205 A2 ordinary shares were issued during 2018 at US \$1 per share inclusive of share premium. The total share premium from the shares issued in the year was US \$1,205.

235,907 B ordinary shares were issued during 2018 at US \$0.0001. These shares did not have share premium attached.

167,638 B ordinary shares were issued during 2018 at US \$0.22 per share inclusive of share premium. The total share premium from the shares issued in the year was US \$38,863.

64,924 B1 ordinary shares were issued during 2018 at US \$0.0001 per share. These shares did not have share premium attached.

NOTES TO THE COMPANY FINANCIAL STATEMENTS

h) Share capital and share premium (continued)

Rights and conditions of each class of share:

- A1 ordinary shares have full voting entitlement.
- A2 ordinary shares have no voting entitlement.
- A3 ordinary shares have full voting entitlement.
- A4 ordinary shares have full voting entitlement.
- B ordinary shares have no voting entitlement.
- B1 ordinary shares have no voting entitlement.
- C ordinary shares have no voting entitlement.

Share premium: The share premium reserve contains the premium arising on issue of equity shares, net of issue expenses.

i) Events after the balance sheet date

No significant events have occurred after 31 December 2018 other than those disclosed in the consolidated group financial statements.

DIRECTORS AND ADVISERS

Directors

Allan Leighton Charles Noall Jo Wetz Christopher Busby Raoul Hughes

Registered Office

5 Fleet Place London, England, United Kingdom, EC4M 7RD

Company Registration Number

09915743

Auditor

Ernst and Young LLP 5 George Square Glasgow G2 1DY United Kingdom

Solicitors to the Group

Allen & Overy LLP One Bishop Square London EC1 6AD

Principal Bankers

ING Bank N.V., London Branch 8-10 Moorgate, London EC2R 6DA United Kingdom