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Linde plc 2018 Directors' Report and Financial Statements

LINDE PLC

DIRECTORS' REPORT AND FINANCIAL STATEMENTS
FINANCIAL YEAR ENDED 31 DECEMBER 2018

FORWARD-LOOKING STATEMENTS

This document contains “forward-looking statements” within the meaning of the Private Securities Litigation Reform Act of 1995. These forward-looking statements are identified by terms and phrases such as: anticipate, believe, intend, estimate, expect, continue, should, could, may, plan, project, predict, will, potential, forecast, and similar expressions. They are based on management’s reasonable expectations and assumptions as of the date the statements are made but involve risks and uncertainties. These risks and uncertainties include, without limitation: the ability to successfully integrate the Praxair and Linde AG businesses; regulatory or other limitations and requirements imposed as a result of the business combination of Praxair and Linde AG that could reduce anticipated benefits of the transaction; the risk that Linde plc may be unable to achieve expected synergies or that it may take longer or be more costly than expected to achieve those synergies; the performance of stock markets generally; developments in worldwide and national economies and other international events and circumstances, including trade conflicts and tariffs; changes in foreign currencies and in interest rates; the cost and availability of electric power, natural gas and other raw materials; the ability to achieve price increases to offset cost increases; catastrophic events including natural disasters, epidemics and acts of war and terrorism; the ability to attract, hire, and retain qualified personnel; the impact of changes in financial accounting standards; the impact of changes in pension plan liabilities; the impact of tax, environmental, healthcare and other legislation and government regulation in jurisdictions in which the company operates, including the impact of the U.S. Tax Cuts and Jobs Act of 2017; the cost and outcomes of investigations, litigation and regulatory proceedings; the impact of potential unusual or non-recurring items; continued timely development and market acceptance of new products and applications; the impact of competitive products and pricing; future financial and operating performance of major customers and industries served; the impact of information technology system failures, network disruptions and breaches in data security; and the effectiveness and speed of integrating new acquisitions into the business. These risks and uncertainties may cause actual future results or circumstances to differ materially from GAAP, IFRS or adjusted projections, estimates or other forward-looking statements.

Linde plc assumes no obligation to update or provide revisions to any forward-looking statement in response to changing circumstances. The above listed risks and uncertainties are further described in the Principal Risks and Uncertainties section of this report, which should be reviewed carefully. Please consider Linde plc’s forward-looking statements in light of those risks.

Directors' Report

PRINCIPAL ACTIVITIES

General

Linde plc is a public limited company formed under the laws of Ireland with its principal offices in the United Kingdom. Linde plc was formed in 2017 in accordance with the requirements of the business combination agreement, dated 1 June 2017, as amended, between Linde plc, Praxair, Inc. ("Praxair") and Linde Aktiengesellschaft ("Linde AG"). Effective 31 October 2018, the business combination was completed and Linde plc is comprised of the businesses of Praxair and Linde AG (hereinafter the combined businesses will be referred to as "the company" or "Linde").

Although the business combination has been completed, as of 31 December 2018 the companies still needed to finalize the divestitures required by the respective antitrust authorities. As of 31 December 2018 and until the completion of the majority of such divestitures, Linde AG and Praxair were obligated to operate their businesses globally as separate and independent companies, and not coordinate any of their commercial operations (hold separate order (“HSO”)). These restrictions were lifted 1 March 2019, concurrent with the sale of the required merger-related divestitures in the United States.

The business combination brought together two leading companies in the global industrial gases industry, leveraging the proven strengths of each. Linde believes the merger will combine Linde AG’s long-held expertise in technology with Praxair’s efficient operating model, thus creating a global leader. The company is expected to enjoy strong positions in key geographies and end markets and will create a more diverse and balanced global portfolio.

Linde is the largest industrial gas company worldwide. It continues to be a major technological innovator in the industrial gases industry. Its primary products in its industrial gases business are atmospheric gases (oxygen, nitrogen, argon, and rare gases) and process gases (carbon dioxide, helium, hydrogen, electronic gases, specialty gases, and acetylene). The company also designs, engineers, and builds equipment that produces industrial gases primarily for internal use and offers its customers a wide range of gas production and processing services such as olefin plants, natural gas plants, air separation plants, hydrogen and synthesis gas plants and other types of plants. The surface technologies segment supplies wear-resistant and high-temperature corrosion-resistant metallic and ceramic coatings and powders.

Linde serves a diverse group of industries including healthcare, petroleum refining, manufacturing, food, beverage carbonation, fiber-optics, steel making, aerospace, chemicals and water treatment.

In 2018, the company, Praxair and Linde AG entered into various agreements with regulatory authorities to satisfy antitrust requirements to secure approval to consummate the business combination. These agreements required the sale of the majority of Praxair's European industrial gases business (completed on 3 December 2018), the majority of Linde AG's Americas industrial gases business (completed on 1 March 2019), as well as certain divestitures of other Praxair and Linde AG businesses in Asia that are expected to be sold in 2019. As of 31 December 2018 and until the completion of the majority of such divestitures, Linde AG and Praxair were obligated to operate their businesses globally as separate and independent companies, and not coordinate any of their commercial operations. The U.S. Federal Trade Commission's (the “FTC”) hold separate order restrictions were lifted 1 March 2019, concurrent with the sale of the required merger-related divestitures in the United States. See Note 3 to the consolidated financial statements for additional information relating to divestitures.

Praxair was determined to be the accounting acquirer in the business combination. Accordingly, the historical financial statements of Praxair for the periods prior to the business combination are considered to be the historical financial statements of the company. The results of Linde AG are included in Linde's consolidated results from the date of the completion of the business combination forward. Also, during 2018 the company reported its continuing operations in six reporting segments under which it managed its operations, assessed performance, and reported earnings: North America, South America, Asia, Europe, Surface Technologies and Linde AG. Linde AG became the sixth reportable segment effective with the merger on 31 October 2018.

Process gases, including carbon dioxide, hydrogen, carbon monoxide, helium, specialty gases and acetylene are produced by methods other than air separation. Most carbon dioxide is purchased from by-product sources, including chemical plants, refineries and industrial processes or is recovered from carbon dioxide wells. Carbon dioxide is processed in Linde’s plants to produce commercial and food-grade carbon dioxide. Hydrogen and carbon monoxide can be produced by either steam methane reforming or auto-thermal reforming of natural gas or other feed streams such as naphtha. Hydrogen is also produced by purifying by-product sources obtained from the chemical and petrochemical industries. Most of the helium sold by Linde is sourced from certain helium-rich natural gas streams in the United States, with additional supplies being acquired from outside the United States. Acetylene is primarily sourced as a chemical by-product, but may also be produced from calcium carbide and water.

Industrial Gases Distribution

There are three basic distribution methods for industrial gases: (i) on-site or tonnage; (ii) merchant or bulk liquid; and (iii) packaged or cylinder gases. These distribution methods are often integrated, with products from all three supply modes coming from the same plant. The method of supply is generally determined by the lowest cost means of meeting the customer's needs, depending upon factors such as volume requirements, purity, pattern of usage, and the form in which the product is used (as a gas or as a cryogenic liquid).

On-site. Customers that require the largest volumes of product (typically oxygen, nitrogen and hydrogen) and that have a relatively constant demand pattern are supplied by cryogenic and process gas on-site plants. Linde constructs plants on or adjacent to these customers' sites and supplies the product directly to customers by pipeline. On-site product supply contracts generally are total requirement contracts with terms typically ranging from 10-20 years and containing minimum purchase requirements and price escalation provisions. Many of the cryogenic on-site plants also produce liquid products for the merchant market. Therefore, plants are typically not dedicated to a single customer. Advanced air separation processes allow on-site delivery to customers with smaller volume requirements. Customers using these systems usually enter into requirement contracts with terms typically ranging from 10-20 years.

Merchant. The merchant business is generally associated with distributable liquid oxygen, nitrogen, argon, carbon dioxide, hydrogen and helium. The deliveries generally are made from Linde's plants by tanker trucks to storage containers at the customer's site which are owned and maintained by Linde and leased to the customer. Due to distribution cost, merchant oxygen and nitrogen generally have a relatively small distribution radius from the plants at which they are produced. Merchant argon, hydrogen and helium can be shipped much longer distances. The customer agreements used in the merchant business are usually three-to seven-year requirement contracts.

Packaged Gases. Customers requiring small volumes are supplied products in metal containers called cylinders, under medium to high pressure. Packaged gases include atmospheric gases, carbon dioxide, hydrogen, helium, acetylene and related products. Linde also produces and distributes in cylinders a wide range of specialty gases and mixtures. Cylinders may be delivered to the customer's site or picked up by the customer at a packaging facility or retail store. Packaged gases are generally sold under one to three-year supply contracts and through purchase orders.

A substantial amount of the cylinder gases sold in the United States is distributed by independent distributors that buy merchant gases in liquid form and repackage the products in their facilities. Packaged gas distributors, including Linde, also distribute hardgoods and welding equipment purchased from independent manufacturers. Over time, Linde has acquired a number of independent industrial gases and welding products distributors at various locations in the United States and continues to sell merchant gases to other independent distributors. Between its own distribution business, joint ventures and sales to independent distributors, Linde is represented in 48 states, the District of Columbia and Puerto Rico.

Engineering

Linde's Engineering Division has a global presence, with its focus on market segments such as olefin, natural gas, air separation, hydrogen and synthesis gas plants. The company utilizes its own extensive process engineering know-how in the planning, project development and construction of turnkey industrial plants and associated services. Linde plants are used in a wide variety of fields: in the petrochemical and chemical industries, in refineries and fertilizer plants, to recover air gases, to produce hydrogen and synthesis gases, to treat natural gas and to produce noble gases. The Engineering Division either supplies plant components and services directly to the customer or to the industrial gas business of Linde, which operates the plants on behalf of the customer under a long-term gases supply contract.

Surface Technologies

Surface Technologies is a leading worldwide supplier of coating services and thermal spray consumables to customers in the aircraft, energy, printing, primary metals, petrochemical, textile, and other industries. Its coatings are used to provide wear resistance, corrosion protection, thermal insulation, and many other surface-enhancing functions which serve to extend component life, enable optimal performance, and reduce operating costs. It also manufactures a complete line of electric arc, plasma and wire spray, and high-velocity oxy-fuel ("HVOF") equipment.

BUSINESS REVIEW

On 31 October 2018 Praxair and Linde AG combined their respective businesses through an all-stock merger transaction, and became subsidiaries of Linde plc. The year ended 31 December 2018 reflects the results of Praxair for the entire year and the results of Linde AG for the period beginning after 31 October 2018.

CONSOLIDATED RESULTS OF OPERATIONS

The year ended 31 December 2018 reflects the results of Praxair for the entire year and the results of Linde AG for the period beginning after 31 October 2018 (the merger date), including the impacts of acquisition ("purchase") accounting (see Note 2 to the consolidated financial statements). The historical periods prior to 2018 reflect the results of Praxair, Inc.

The following table provides summary results of operations of Linde plc for 2018 and 2017:

(Millions of dollars) **Year Ended 31 December**	**2018**	**2017**	**Variance**	
Revenue	$ 15,037	$ 11,437	$ 3,600	31 %
Cost of sales (includes depreciation)	10,690	7,450	3,240	43 %
GROSS PROFIT	**4,347**	**3,987**	**360**	9 %
Gross profit as a percentage of sales	*28.9 %*	*34.9 %*		
Marketing and selling expenses, and Research and development costs (includes depreciation and amortization)	2,374	1,555	819	53 %
Net gain on divestiture of businesses and other operating income and expenses - net	3,737	4	3,733	N/M
Operating profit from continuing operations	**5,710**	**2,436**	**3,274**	134 %
Operating Margin	*38.0 %*	*21.3 %*		
Financial expenses - net	248	195	53	27 %
Share of profit and loss from associates and joint ventures (at equity)	54	47	7	15 %
Income tax expense	811	954	(143)	(15)%
PROFIT FOR THE YEAR FROM CONTINUING OPERATIONS	**$ 4,705**	**$ 1,334**	**$ 3,371**	253 %
attributable to Linde plc shareholders	$ 4,685	$ 1,273	$ 3,412	268 %
attributable to noncontrolling interests	$ 20	$ 61	$ (41)	(67)%
DILUTED EARNINGS PER SHARE FROM CONTINUING OPERATIONS - LINDE PLC SHAREHOLDERS	$ 14.02	$ 4.40	$ 9.62	219 %

Results of Operations, 2018 Compared With 2017

Sales increased 31% to $15,037 million in 2018 compared to $11,437 million in 2017 primarily reflecting the merger with Linde AG which contributed 26% to sales. Excluding the merger impact, sales increased 5% driven by higher volumes and pricing. Volume growth of 4% was primarily due to higher volumes in North America and Asia, including new project start-ups. Higher overall pricing across all geographic segments contributed 2% to sales. Currency translation impact decreased sales by about 1%. and higher cost pass-through, primarily natural gas, increased sales by about 1% with minimal impact on operating profit. The divestiture of Praxair's European businesses in December of 2018 decreased sales by 1%.

Gross profit increased $360 million, or 9%, versus 2017 primarily due to the merger. Gross margin as a percentage of sales declined to 28.9% in 2018 from 34.9% in 2017 and was negatively impacted by a $368 million charge for the fair value step-up of inventories acquired in the merger and $235 million for additional depreciation related to purchase accounting. Excluding these charges, gross margin in 2018 was 32.9%.

Marketing and selling expenses, and Research and development costs ("SG&A/R&D") increased $819 million in 2018 to $2,374 million, primarily due to the merger. SG&A/R&D for 2018 includes $146 million for additional depreciation and amortization related to the required purchase accounting. Also, SG&A/R&D includes transaction costs and other charges of $309 million in 2018 and $52 million in 2017, primarily related to the merger. Excluding the purchase accounting and transaction cost impacts, SG&A/R&D was 12.8% of sales in 2018 versus 13.1% in 2017.

Net gain on divestiture of businesses and other operating income and expenses - net in 2018 of $3,737 million, includes a $3,778 million net gain on the sale of businesses related primarily to the divestiture of Praxair's European industrial gases business in connection with the merger (See Note 3 to the consolidated financial statements). Other expenses – net in 2018 was $41 million versus a $4 million benefit in 2017 (See Note 8 to the consolidated financial statements for a summary of major components).

Operating profit of $5,710 million in 2018 was $3,274 million, or 134% higher than reported operating profit of $2,436 million in 2017. 2018 includes a net gain on divestiture of businesses of $3,778 million, partially offset by transaction costs and other charges of $309 million, and purchase accounting impacts of $739 million related to the Linde AG merger (see Notes 1, 2, and 3 to the consolidated financial statements). 2017 included transaction costs of $52 million. Excluding the impact of these items, adjusted operating profit of $2,980 million in 2018 was $492 million, or 19.8%, higher than adjusted operating profit of $2,488 million in 2017 driven primarily by the merger. Also, excluding these impacts the operating margin was 19.8% in 2018 versus 21.8% in 2017 reflecting the impact of the merger since the merger date. Higher volumes and price in the geographic segments and surface technologies also contributed to operating profit growth. A discussion of operating profit by segment is included in the segment discussion that follows.

Financial expense – net in 2018 increased $53 million, or 27%, versus 2017. 2018 included charges of $26 million relating to the early redemption of notes and a decrease of $21 million related to purchase accounting impacts related to the fair value of debt acquired in the merger (see Notes 20 and 2 to the consolidated financial statements, respectively). Excluding these impacts, adjusted interest expense of $253 million increased $58 million, or 30%, largely attributable to interest on the debt acquired in the merger and lower capitalized interest. See Note 9 to the consolidated financial statements for further information relating to interest expense.

Linde's equity investments are primarily located in the United States, China and the Middle East. Equity income increased $7 million in 2018 versus 2017 and included charges of $3 million for purchase accounting impacts related to the fair value step up of equity investments acquired in the merger. Excluding this impact, equity income increased $10 million, primarily driven by income from equity investments acquired in the merger.

The reported effective tax rate ("ETR") for 2018 was 14.7% versus 41.7% in 2017. The decrease in the ETR for the 2018 period versus prior year was primarily due to the impact of the sale of Praxair's European industrial gases business. The ETR for the 2017 period included a net $394 million charge related to the U.S Tax Act. Excluding these impacts, the ETR for the 2018 and 2017 periods was 22.5% and 28.1%, respectively. The decrease was driven primarily by the impact of the Tax Act enacted in the fourth quarter of 2017 which lowered the U.S. statutory tax rate from 35% in 2017 to 21% in 2018 (see Note 10 to the consolidated financial statements).

Income from continuing operations for 2018 was $4,705 million, $3,371 million or 253% higher than reported income from continuing operations of $1,334 million in 2017. This is primarily due to the higher operating profit from continuing operations of 3,274 million and the lower effective tax rate.

Diluted earnings per share from continuing operations ("EPS") of $14.02 in 2018 increased $9.62 per diluted share, or 219% from $4.40 in 2017. This is primarily due to the increase in income from continuing operations partially offset by an increase in diluted shares resulting from equity acquired in the merger.

SEGMENT DISCUSSION

Through 31 October 2018 the company's operations were organized into five reportable segments, four of which have been determined on a geographic basis of segmentation: North America, Europe, South America and Asia. The company's surface technologies business represents the fifth reportable segment. These segments are comprised of Praxair businesses for all years presented. As discussed above in the section *"Principal Activities"* Linde AG became a separate sixth reportable segment effective with the merger on 31 October 2018 and, accordingly, Linde AG's operations were included in the consolidated financial statements effective from the merger date (see Notes 1 and 2 to the consolidated financial statements for additional information).

Historically and through 2018, Linde assessed the performance of the operating segments determined in accordance with U.S. GAAP. Accordingly, the analysis of key performance indicators and the associated segment discussion that follows are based on U.S. GAAP results. A reconciliation from U.S. GAAP results to those determined under EU-IFRS ("IFRS") for the years ended 31 December 2018 and 2017 is also provided. The following summary of U.S. GAAP sales and operating profit by segment provides a basis for the discussion that follows (for additional information concerning Linde's segments, see Note 26 to the consolidated financial statements). Linde evaluates the performance of its reportable segments based on operating profit, excluding the items not indicative of ongoing business trends ("Segment operating profit").

(Millions of dollars) Year Ended 31 December	2018	2017	Variance	
Sales				
North America	$ 6,420	$ 6,023	$ 397	7 %
Europe	1,592	1,558	34	2 %
South America	1,369	1,501	(132)	(9)%
Asia	1,964	1,738	226	13 %
Surface Technologies	682	617	65	11 %
Linde AG	2,873	—		
Total US GAAP Sales	$ 14,900	$ 11,437	3,463	30 %
GAAP adjustments [1]	137	—		
Total IFRS Sales	$ 15,037	$ 11,437	$ 3,600	31 %
Operating Profit				
North America	$ 1,648	$ 1,517	131	9 %
Europe	316	301	15	5 %
South America	215	239	(24)	(10)%
Asia	427	333	94	28 %
Surface Technologies	118	106	12	11 %
Linde AG	252	—		
US GAAP segment operating profit	2,976	2,496	480	19 %
Reconciliation to consolidated operating profit:				
Transaction costs and other charges [2]	(309)	(52)		
Net gain on divestiture of businesses [3]	3,294	—		
Purchase accounting impacts - Linde AG [4]	(714)	—		
US GAAP consolidated operating profit	$ 5,247	$ 2,444	2,803	115 %
GAAP adjustments [5]	463	(8)		
IFRS consolidated operating profit	$ 5,710	$ 2,436	$ 3,274	134 %

(1) Primarily related to consolidation of certain entities for IFRS and equity method accounting for U.S. GAAP. These entities were acquired as part of the business combination completed during the year.

(2) Primarily related to merger transaction costs.

(3) Related to the sale of Praxair's European industrial gases business (see Note 3 to the consolidated financial statements). This balance differs from that realized for IFRS reporting purposes due to the cumulative currency translation differences for all foreign operations having been set to zero as at 1 January 2017 due to IFRS 1 adoption (see Note 29 to the consolidated financial statements).

(4) Impacts of the required purchase accounting related to the merger transaction (see Note 2 to the consolidated financial statements).

(5) Primarily related to consolidation of certain entities acquired as part of the business combination during the year for IFRS and equity method for U.S. GAAP, gain on the divestiture of businesses due to IFRS 1 adoption (see Note 29 to the consolidated financial statements), and pension accounting.

North America

The North America segment includes Praxair's historical industrial gases operations in the United States, Canada and Mexico.

Sales for 2018 increased $397 million, or 7%, versus 2017. Higher cost pass-through, primarily higher natural gas prices passed through to hydrogen customers, increased sales by 1% with minimal impact on operating profit. Excluding cost pass–through, sales increased 6% primarily due to higher volumes to most end-markets and higher pricing.

Operating profit in 2018 increased $131 million, or 9% from 2017 driven by higher volumes and pricing. Operating profit for 2018 also included a $30 million asset impairment charge which was more than offset by $43 million of gains on asset disposals.

Europe

The European segment includes Praxair's historical industrial gases operations in Spain, Ireland, Italy, France, Germany, Russia, the United Kingdom, Scandinavia and the Benelux region. In connection with the merger, Praxair was required to sell the majority of its European industrial gases business. The sale was completed on 3 December 2018 and, accordingly, the European business results are included in the consolidated financial statements through the date of sale (see Note 3 to the consolidated financial statements).

Sales in 2018 increased $34 million, or 2% from 2017. The divestiture of the European businesses decreased sales by 7%. Excluding the divestiture impact, sales increased 9% from 2017. Higher cost pass-through increased sales by 2% with minimal impact on operating profit. Favorable currency translation increased sales by 4%. Higher volumes and higher price increased sales by 1% and 2%, respectively.

Operating profit in 2018 of $316 million increased $15 million, or 5% from 2017. The divestiture of the European businesses decreased operating profit by 7%. Currency translation impact increased operating profit by 5%. Excluding the divestiture and currency impacts, operating profit increased 7% driven by higher price and higher volumes, partially offset by cost inflation.

South America

The South America segment includes Praxair's historical industrial gases operations in Brazil, Argentina, Bolivia, Chile, Colombia, Paraguay, Peru, and Uruguay.

Sales in 2018 decreased $132 million, or 9%, versus 2017. Unfavorable currency impacts decreased sales by 12% driven by the weakening of the Brazilian real and Argentine peso against the U.S. dollar. Excluding currency, sales increased 3% driven by higher price and volumes.

Operating profit decreased $24 million or 10% versus 2017. Excluding unfavorable currency impacts of 18%, operating profit increased 8% driven by higher price and lower costs partially offset by unfavorable sales mix.

Asia

The Asia segment includes Praxair's historical industrial gases operations in China, India, Korea and Thailand, with smaller operations in Taiwan and the Middle East.

Sales in 2018 increased $226 million, or 13% versus 2017. Cost pass-through, primarily energy, and currency impacts each increased sales by 1%. Volume growth of 9% was primarily attributable to base volume growth in China, Korea and India and new project start-ups in China. Higher price increased sales by 2% driven by China. Sales growth was the strongest in the metals, energy and electronics end-markets.

Operating profit for 2018 increased $94 million, or 28%, as compared to the prior year driven by higher volumes and price. Operating profit for 2018 included a $22 million asset impairment charge, offset by a litigation settlement gain.

Surface Technologies

Praxair's historical Surface Technologies business provides high-performance coatings and thermal-spray powders and equipment in the Americas, Europe, and Asia.

Sales increased $65 million, or 11% versus 2017 primarily due to higher volumes to the aerospace and manufacturing end-markets and higher price. Currency translation increased sales by 2%.

Operating profit increased $12 million, or 11% versus 2017. Currency translation increased operating profit by 2%. Excluding currency impacts, operating profit increased 9% driven by increased volumes and price partially offset by project ramp up costs.

Linde AG

Linde AG became a sixth reportable segment effective with the merger on 31 October 2018. Sales of $2,873 million and $204 million operating profit of represent results for the two month period from merger date through 31 December 2018.

CONSOLIDATED FINANCIAL POSITION

The following table provides a summary of consolidated financial position of Linde plc as of 31 December, 2018 and 2017:

(Millions of dollars)	31/12/2018	31/12/2017	Variance	
Goodwill	$ 26,738	$ 3,233	$ 23,505	727 %
Other intangible assets	17,281	785	16,496	2,101 %
Tangible assets	30,693	11,825	18,868	160 %
Other assets	9,668	3,976	5,692	143 %
Non-current assets classified as held for sale	5,670	—		
Cash and cash equivalents	4,533	617	3,916	635 %
TOTAL ASSETS	**$ 94,583**	**$ 20,436**	**$ 74,147**	**363%**
Equity	57,789	6,616	51,173	773 %
Pensions obligations and other provisions	3,098	1,088	2,010	185 %
Financial debt	15,289	8,996	6,293	70 %
Other liabilities	17,544	3,736	13,808	370 %
Liabilities in connection with non-current assets classified as held for sale	863	—	863	
TOTAL EQUITY AND LIABILITIES	**$ 94,583**	**$ 20,436**	**$ 74,147**	**363%**

Goodwill increased $23,505 million to $26,738 million as of 31 December 2018 from $3,233 million as of 31 December 2017. This increase is primarily related to the merger with Linde AG partially offset by the sale of Praxair's European industrial gases business (see Notes 2, 3 and 12 to the consolidated financial statements).

Other intangible assets – net increased $16,496 million to $17,281 million as of 31 December 2018 from $785 million as of 31 December 2017. This increase is primarily related to the merger with Linde AG (see Notes 2 and 12 to the consolidated financial statements).

Tangible assets (Property, plant and equipment – net) increased $18,868 million to $30,693 million as of 31 December 2018 from $11,825 million as of 31 December 2017. This increase is primarily related to the merger with Linde AG partially offset by the sale of Praxair's European industrial gases business and depreciation (see Notes 2, 3 and 13 to the consolidated financial statements).

Other assets increased $5,692 million to $9,668 million as of 31 December 2018 from $3,976 million as of 31 December 2017. This increase is primarily related to the merger with Linde AG which increased other assets by $7,025 million. This increase was partially offset by $670 million decrease due to the sale of Praxair's European industrial gases business and a $368 million decrease in inventories from the sale of inventories acquired at fair value in the merger. See Notes 2 and 3 to the consolidated financial statements.

Non-current assets classified as held for sale net of Liabilities in connection with non-current assets classified as held for sale and disposal groups was $4,807 million at 31 December 2018. As described in Note 1, as a condition of the European Commission ("EC"), the U.S. Department of Justice ("DOJ"), and other governmental regulatory authorities approval of the merger, Linde plc, Praxair and Linde AG were required to divest various businesses in Europe, the Americas and Asia. The balance at 31 December 2018 represents the fair value of these businesses which has been determined based on the estimated net selling prices or sales agreements. Actual amounts may differ from this preliminary determination. See Note 3 to the consolidated financial statements for further information on merger-related divestitures.

Cash and cash equivalents increased $3,916 million to $4,533 million as of 31 December 2018 from $617 million as of 31 December 2017. This increase is primarily a result of the all stock merger with Linde AG and proceeds from the sale of Praxair's European industrial gases business, partially offset by debt repayments. The cash is available for Corporate uses, including among others the planned squeeze-out of the 8% Linde AG noncontrolling interests and stock buybacks (see the consolidated statement of cash flows, and Notes 1, 2, 20 and 34 to the consolidated financial statements).

Equity increased $51,173 million to $57,789 million as of 31 December 2018 from $6,616 million as of 31 December 2017. This increase was primarily due to the all stock merger with Linde AG which increased equity by $49,062 million and Net Income of $4,803 million, partially offset by dividends of $1,215 million (see the statement of changes in consolidated equity and Note 17 to the consolidated financial statements).

Pension obligations and other provisions increased $2,010 million to $3,098 million as of 31 December 2018 from $1,088 million as of 31 December 2017. This increase is primarily related to the merger with Linde AG (see Note 2 to the consolidated financial statements).

Financial debt (the sum of short-term debt, current portion of long-term debt and long-term debt), increased $6,293 million to $15,289 million as of 31 December 2018 from $8,996 million as of 31 December2017. This increase is primarily related to the merger with Linde AG (see Notes 2 and 20 to the consolidated financial statements).

Other liabilities increased $13,808 million to $17,544 million as of 31 December2018 from $3,736 million as of 31 December 2017. This increase is primarily related to the merger with Linde AG, partially offset by the sale of Praxair's European industrial gases business (see Notes 2 and 3 to the consolidated financial statements).

LIQUIDITY AND CAPITAL RESOURCES

Following is a summary of the consolidated statement of cash flows:

(Millions of dollars)

Year Ended 31 December	**2018**	**2017**	**Variance**
Cash flow from operating activities	$ 3,683	$ 3,041	$ 642
Cash flow (for)/from investing activities	5,435	(1,314)	6,749
Cash flow for financing activities	(5,031)	(1,656)	(3,375)
Other cash activity	(171)	22	(193)
Change in cash and cash equivalents	3,916	93	3,823
Cash and cash equivalents, beginning -of-period	617	524	93
Cash and cash equivalents, end-of-period	$ 4,533	$ 617	$ 3,916

Cash increased $3,916 million in 2018 versus 2017. The primary sources of cash in 2018 were cash flows from operations of $3,683 million, proceeds from divestitures and asset sales of $5,897 million and cash acquired in the merger of $1,431 million. The primary uses of cash included capital expenditures of $1,886 million, cash dividends to shareholders of $1,166 million, net debt repayments of $2,915 million and net purchases of ordinary shares of $599 million.

Operating cash flows

Cash flows from operations was $3,683 million, or 24% of sales, an increase of $642 million from $3,041 million, or 27% of sales in 2017. The increase was primarily attributable to the merger, higher net income adjusted for non-cash charges and favorable working capital requirements, partially offset by higher pension contributions.

Investing cash flows

Net cash provided by investing activities of $5,435 million increased $6,749 million from $1,314 million used in 2017. This increase in investing cash flows was primarily driven by proceeds from the divestiture of Praxair's European business and cash acquired in the merger, partially offset by higher capital expenditures.

Divestitures and asset sales in 2018 totaled $5,897 million primarily driven by proceeds from merger-related divestitures including $5,562 million from the sale of Praxair's European business and $214 million related to the sale of Praxair's Italian joint venture (see Note 3 to the consolidated financial statements).

Capital expenditures in 2018 were $1,886 million, an increase of $575 million from 2017, driven primarily by the merger with Linde AG. Capital expenditures during 2018 related primarily to investments in new plant and production equipment for growth and density. Approximately 50% of the capital expenditures were in North America with the rest in Asia, Europe, South America and Linde AG.

Acquisition expenditures in 2018 were $25 million, a decrease of $8 million from 2017. Additionally, $1,431 million of cash was acquired in the merger (see Note 2 to the consolidated financial statements).

Financing cash flows

Linde’s financing strategy is to secure long-term committed funding by issuing public notes and debentures and commercial paper backed by a long-term bank credit agreement. Linde’s international operations are funded through a combination of local borrowing and inter-company funding to minimize the total cost of funds and to manage and centralize currency exchange exposures. As deemed necessary, Linde manages its exposure to interest-rate changes through the use of financial derivatives.

Cash used for financing activities was $5,031 million in 2018 compared to $1,656 million in 2017. The primary financing uses of cash were for net debt repayments, cash dividends and net purchases of Linde ordinary shares. Cash dividends of $1,166 million increased $265 million from 2017 driven primarily by higher shares outstanding after the merger and a 5% increase in dividends per share from $3.15 to $3.30. Net purchases of ordinary shares were $522 million in 2018 versus net issuances of ordinary shares of $108 million in 2017 driven by increased share repurchases. Noncontrolling interest transactions and other payments was $425 million in 2018 versus $92 million in 2017. Amounts paid in 2018 include $315 million for the purchase of the noncontrolling interest in Praxair's Italian joint venture in a merger-related transaction (see Note 3 to the consolidated financial statements) and $26 million in interest related to the early redemption of bonds (see Note 20 to the consolidated financial statements); while 2017 include dividends paid to NCI joint venture partners and repayment of project advances. The cash used for debt repayments-net of $2,915 million increased $2,144 million from $771 million during 2017 while cash increased $3,916 million. Net debt (defined as debt minus cash) increased $2,377 million primarily due to debt acquired in the merger partially offset by the repayments of debt and increased cash.

The company believes that it has sufficient operating flexibility, cash reserves, and funding sources to maintain adequate amounts of liquidity to meet its business needs around the world. In March 2019, Linde's credit ratings as reported by Standard & Poor’s and Moody’s were A-1 and P-1 for short-term debt, respectively, and A and A2 for long-term debt, respectively.

Note 20 to the consolidated financial statements includes information with respect to the company’s debt repayments in 2018, current debt position, debt covenants and the available credit facilities; and Note 24 to the consolidated financial statements includes information relating to derivative financial instruments. Linde's credit facilities are with major financial institutions and are non-cancelable until maturity. Therefore, the company believes the risk of the financial institutions being unable to make required loans under the credit facilities, if requested, to be low. Linde’s major bank credit and long-term debt agreements contain standard covenants. The company was in compliance with these covenants at 31 December 2018 and expects to remain in compliance for the foreseeable future.

Linde’s total net financial debt outstanding (i.e. total financial debt less cash) at 31 December 2018 was $10,756 million, or $2,377 million higher than $8,379 million at 31 December 2017. The 31 December 2018 net debt balance includes $14,258 million in public securities, $1,031 million representing primarily worldwide bank borrowings, and less $4,533 million of cash. Linde’s global effective borrowing rate was approximately 1.96% for 2018.

Following is a summary of notes that were repaid in 2018 and 2019:

- In March 2018, Linde repaid $500 million of 1.20% notes that became due.
- In November 2018, Linde repaid $475 million of 1.25% notes that became due.
- In December 2018, Linde repaid $600 million of 4.50% notes due 2019 and €600 million of 1.50% notes due 2020 resulting in a $26 million interest charge (see Note 20 to the consolidated financial statements).
- Also in December 2018, Linde repaid €750 million of 3.125% notes that became due.

In February 2019, Linde repaid $500 million of 1.90% notes that became due.

In June 2018, the company's $500 million 364-day revolving credit facility with a syndicate of banks expired and was not renewed.

On 10 December 2018 the company announced a $1.0 billion share repurchase program, of which $629 million had been repurchased through 31 December 2018. This program was completed in February of 2019. On 22 January 2019, the company’s board of directors approved the additional repurchase of up to $6.0 billion of its ordinary shares with a stated expiration date of 1 February 2021.

Other cash activity

Other cash activity includes the effects of currency translation on cash and cash reported as part of assets held for sale.

PRINCIPAL RISKS AND UNCERTAINTIES

Due to the size and geographic reach of the company's operations, a wide range of factors, many of which are outside of the company's control, could materially affect the company's future operations and financial performance. Management believes the following risks may significantly impact the company:

The company may fail to realize the anticipated strategic and financial benefits sought from the business combination.

The company may not realize all of the anticipated benefits of the business combination between Praxair, Inc. and Linde AG, which was completed on 31 October 2018. The success of the business combination will depend on, among other things, the company's ability to combine Praxair, Inc.'s and Linde AG's businesses in a manner that facilitates growth and realizes the anticipated annual synergies and cost reductions without adversely affecting current revenues and investments in future growth. The actual integration will continue to involve complex operational, technological and personnel-related challenges. Difficulties in the integration of the businesses, which may result in significant costs and delays, include:

- managing a significantly larger combined group;
- aligning and executing the strategy of the company;
- integrating and unifying the offerings and services available to customers and coordinating distribution and marketing efforts in geographically separate organizations;
- coordinating corporate and administrative infrastructures and aligning insurance coverage;
- coordinating accounting, reporting, information technology, communications, administration and other systems;
- addressing possible differences in corporate cultures and management philosophies;
- the company being subject to Irish laws and regulations and legal action in Ireland;
- coordinating the compliance program and uniform financial reporting, information technology and other standards, controls, procedures and policies;
- the implementation, ultimate impact and outcome of post-completion reorganization transactions, such as the squeeze-out with respect to remaining minority Linde AG shareholders, which has subsequently been completed;
- unforeseen and unexpected liabilities related to the business combination or the combined businesses;
- managing tax costs or inefficiencies associated with integrating operations;
- identifying and eliminating redundant and underperforming functions and assets; and
- effecting actions that may be required in connection with obtaining regulatory approvals.

These and other factors could result in increased costs and diversion of management's time and energy, as well as decreases in the amount of expected revenue and earnings. The integration process and other disruptions resulting from the business combination may also adversely affect the company's relationships with employees, suppliers, customers, distributors, licensors and others with whom Praxair, Inc. and Linde AG have business or other dealings, and difficulties in integrating the businesses could harm the reputation of the company.

If the company is not able to successfully integrate the businesses of Praxair, Inc. and Linde AG in an efficient, cost-effective and timely manner, the anticipated benefits and cost savings of the business combination may not be realized fully, or at all, or may take longer to realize than expected.

Weakening economic conditions in markets in which Linde does business may adversely impact its financial results and/or cash flows.

Linde serves a diverse group of industries across more than 100 countries, which generally leads to financial stability through various business cycles. However, a broad decline in general economic or business conditions in the industries served by its customers could adversely affect the demand for Linde's products and impair the ability of its customers to satisfy their obligations to Linde, resulting in uncollected receivables and/or unanticipated contract terminations or project delays. For example, global political and economic uncertainty could reduce investment activities of Linde's customers, which could adversely affect Linde's engineering project business.

In addition, many of Linde's customers are in businesses that are cyclical in nature, such as the chemicals, electronics, metals and energy industries. Downturns in these industries may adversely impact Linde during these cycles. Additionally, such conditions could impact the utilization of Linde's manufacturing capacity which may require it to recognize impairment losses on tangible assets such as property, plant and equipment, as well as intangible assets such as goodwill, customer relationships or intellectual property.

Increases in the cost of energy and raw materials and/or disruption in the supply of these materials could result in lost sales or reduced profitability.

Energy is the single largest cost item in the production and distribution of industrial gases. Most of Linde's energy requirements are in the form of electricity, natural gas and diesel fuel for distribution. Linde attempts to minimize the financial impact of variability in these costs through the management of customer contracts and reducing demand through operational productivity and energy efficiency. Large customer contracts typically have escalation and pass-through clauses to recover energy and feedstock costs. Such attempts may not successfully mitigate cost variability, which could negatively impact Linde's financial condition or results of operations. The supply of energy has not been a significant issue in the geographic areas where Linde conducts business. However, regional energy conditions are unpredictable and may pose future risk.

For carbon dioxide, carbon monoxide, helium, hydrogen, specialty gases and surface technologies, raw materials are largely purchased from outside sources. Where feasible, Linde sources several of these raw materials, including carbon dioxide, hydrogen and calcium carbide, as chemical or industrial byproducts. In addition, Linde has contracts or commitments for, or readily available sources of, most of these raw materials; however, their long-term availability and prices are subject to market conditions. A disruption in supply of such raw materials could impact Linde's ability to meet contractual supply commitments.

Linde's international operations are subject to the risks of doing business abroad and international events and circumstances may adversely impact its business, financial condition or results of operations.

Linde has substantial international operations which are subject to risks including devaluations in currency exchange rates, transportation delays and interruptions, political and economic instability and disruptions, restrictions on the transfer of funds, trade conflicts and the imposition of duties and tariffs, import and export controls, changes in governmental policies, labor unrest, possible nationalization and/or expropriation of assets, domestic and international tax laws and compliance with governmental regulations. These events could have an adverse effect on the international operations of Linde in the future by reducing the demand for its products, decreasing the prices at which it can sell its products, reducing the revenue from international operations or otherwise having an adverse effect on its business. For example, Linde has a meaningful presence in the U.K. and the U.K.'s ongoing exit process from the EU has continued to cause, and may in the future cause, political and economic uncertainty, which could have an adverse impact on the markets which Linde supplies.

Currency exchange rate fluctuations and other related risks may adversely affect Linde's results.

Because a significant portion of Linde's revenue is denominated in currencies other than its reporting currency, the U.S. dollar, changes in exchange rates will produce fluctuations in revenue, costs and earnings and may also affect the book value of assets and liabilities and related equity. Although the company from time to time utilizes foreign exchange forward contracts to hedge these exposures, its efforts to minimize currency exposure through such hedging transactions may not be successful depending on market and business conditions. As a result, fluctuations in foreign currency exchange rates could adversely affect Linde's financial condition, results of operations or cash flows.

Macroeconomic factors may impact Linde's ability to obtain financing or increase the cost of obtaining financing which may adversely impact Linde's financial results and/or cash flows.

Volatility and disruption in the U.S., European and global credit and equity markets, from time to time, could make it more difficult for Linde to obtain financing for its operations and/or could increase the cost of obtaining financing. In addition, Linde's borrowing costs can be affected by short- and long-term debt ratings assigned by independent rating agencies which are based, in significant part, on its performance as measured by certain criteria such as interest coverage and leverage ratios. A decrease in these debt ratings could increase the cost of borrowing or make it more difficult to obtain financing.

An impairment of goodwill or intangible assets could negatively impact the company's financial results.

As of 31 December 2018, the net carrying value of goodwill and other indefinite-lived intangible assets was $27 billion and $2 billion, respectively, primarily as a result of the business combination and the related acquisition method of accounting applied to Linde AG. In accordance with generally accepted accounting principles, the company periodically assesses these assets to determine if they are impaired. Significant negative industry or economic trends, disruptions to business, unexpected significant changes or planned changes in use of the assets, divestitures and sustained market capitalization declines may result in recognition of impairments to goodwill or other indefinite-lived assets. Any charges relating to such impairments could have a material adverse impact on Linde's results of operations in the periods recognized.

Catastrophic events could disrupt the operations of Linde and/or its customers and suppliers and may have a significant adverse impact on the results of operations.

The occurrence of catastrophic events or natural disasters such as extreme weather, including hurricanes and floods; health epidemics; and acts of war or terrorism, could disrupt or delay Linde's ability to produce and distribute its products to customers and could potentially expose Linde to third-party liability claims. In addition, such events could impact Linde's customers and suppliers resulting in temporary or long-term outages and/or the limitation of supply of energy and other raw materials used in normal business operations. Linde evaluates the direct and indirect business risks, consults with vendors, insurance providers and industry experts, makes investments in suitably resilient design and technology, and conducts regular reviews of the business risks with management. Despite these steps, however, these situations are outside Linde's control and may have a significant adverse impact on its financial results.

The inability to attract and retain qualified personnel may adversely impact Linde's business.

If Linde fails to attract, hire and retain qualified personnel, it may not be able to develop, market or sell its products or successfully manage its business. Linde is dependent upon a highly skilled, experienced and efficient workforce to be successful. Much of Linde's competitive advantage is based on the expertise and experience of key personnel regarding marketing, technology, manufacturing and distribution infrastructure, systems and products. The inability to attract and hire qualified individuals or the loss of key employees in very skilled areas could have a negative effect on Linde's financial results.

If Linde fails to keep pace with technological advances in the industry or if new technology initiatives do not become commercially accepted, customers may not continue to buy Linde's products and results of operations could be adversely affected.

Linde's research and development is directed toward developing new and improved methods for the production and distribution of industrial gases as well as for the design and construction of plants and toward developing new markets and applications for the use of industrial gases. This results in the introduction of new industrial gas applications and the development of new advanced air separation process technologies. As a result of these efforts, Linde develops new and proprietary technologies and employs necessary measures to protect such technologies within the global geographies in which Linde operates. These technologies help Linde to create a competitive advantage and to provide a platform to grow its business. If Linde's research and development activities do not keep pace with competitors or if Linde does not create new technologies that benefit customers, future results of operations could be adversely affected.

Risks related to pension benefit plans may adversely impact Linde's results of operations and cash flows.

Pension benefits represent significant financial obligations that will be ultimately settled in the future with employees who meet eligibility requirements. Because of the uncertainties involved in estimating the timing and amount of future payments and asset returns, significant estimates are required to calculate pension expense and liabilities related to Linde's plans. Linde utilizes the services of independent actuaries, whose models are used to facilitate these calculations. Several key assumptions are used in the actuarial models to calculate pension expense and liability amounts recorded in the consolidated financial statements. In particular, significant changes in actual investment returns on pension assets, discount rates, or legislative or regulatory changes could impact future results of operations and required pension contributions.

Operational risks may adversely impact Linde's business or results of operations.

Linde's operating results are dependent on the continued operation of its production facilities and its ability to meet customer contract requirements and other needs. Insufficient or excess capacity threatens Linde's ability to generate competitive profit margins and may expose Linde to liabilities related to contract commitments. Operating results are also dependent on Linde's ability to complete new construction projects on time, on budget and in accordance with performance requirements. Failure to do so may expose Linde's business to loss of revenue, potential litigation and loss of business reputation.

Also inherent in the management of Linde's production facilities and delivery systems, including storage, vehicle transportation and pipelines, are operational risks that require continuous training, oversight and control. Material operating failures at production, storage facilities or pipelines, including fire, toxic release and explosions, or the occurrence of vehicle transportation accidents could result in loss of life, damage to the environment, loss of production and/or extensive property damage, all of which may negatively impact Linde's financial results.

Linde may be subject to information technology system failures, network disruptions and breaches in data security.

Linde relies on information technology systems and networks for business and operational activities, and also stores and processes sensitive business and proprietary information in these systems and networks. These systems are susceptible to outages due to fire, flood, power loss, telecommunications failures, viruses, break-ins and similar events, or breaches of security.

Linde has taken steps to address these risks and concerns by implementing advanced security technologies, internal controls, network and data center resiliency and recovery process. Despite these steps, however, operational failures and breaches of security from increasingly sophisticated cyber threats could lead to the loss or disclosure of confidential information, result in business interruption or malfunction or regulatory actions and have a material adverse impact on Linde's operations, reputation and financial results.

The inability to effectively integrate acquisitions or collaborate with joint venture partners could adversely impact Linde's financial position and results of operations.

In addition to the business combination, Linde has evaluated and expects to continue to evaluate, a wide array of potential strategic acquisitions and joint ventures. Many of these transactions, if consummated, could be material to its financial condition and results of operations. In addition, the process of integrating an acquired company, business or group of assets may create unforeseen operating difficulties and expenditures. Although historically Linde has been successful with its acquisition strategy and execution, the areas where Linde may face risks include:

- the need to implement or remediate controls, procedures and policies appropriate for a larger public company at companies that prior to the acquisition lacked these controls, procedures and policies;
- diversion of management time and focus from operating existing business to acquisition integration challenges;
- cultural challenges associated with integrating employees from the acquired company into the existing organization;
- the need to integrate each company's accounting, management information, human resources and other administrative systems to permit effective management;
- difficulty with the assimilation of acquired operations and products;
- failure to achieve targeted synergies and cost reductions; and
- inability to retain key employees and business relationships of acquired companies.

Foreign acquisitions and joint ventures involve unique risks in addition to those mentioned herein, including those related to integration of operations across different cultures and languages, currency risks and the particular economic, political and regulatory risks associated with specific countries.

Also, the anticipated benefit of potential future acquisitions may not materialize. Future acquisitions or dispositions could result in the incurrence of debt, contingent liabilities or amortization expenses, or impairments of goodwill, any of which could adversely impact Linde's financial results.

Linde is subject to a variety of international laws and government regulations and changes in, or failure to comply with, these laws or regulations could have an adverse impact on the company's business, financial position and results of operations.

Linde is subject to regulations in the following areas, among others:

- environmental protection, including climate change and energy efficiency laws and policies;
- domestic and international tax laws and currency controls;
- safety;
- securities laws applicable in the United States, the European Union, Germany, Ireland, and other jurisdictions;
- trade and import/export restrictions, as well as economic sanctions laws;
- antitrust matters;
- data protection;
- global anti-bribery laws, including the U.S. Foreign Corrupt Practices Act; and
- healthcare regulations.

Changes in these or other regulatory areas, such as evolving environmental legislation in China, may impact Linde's profitability and may give rise to new or increased compliance risks: it may become more complex and costly to ensure compliance, and the level of sanctions in the event of non-compliance may rise. Such changes may also restrict Linde's ability to compete effectively in the marketplace. Noncompliance with such laws and regulations could result in penalties or sanctions, cancellation of marketing rights or restrictions on participation in, or even exclusion from, public tender proceedings, all of which could have a material adverse impact on Linde's financial results and/or reputation.

Doing business globally requires Linde to comply with anti-corruption, trade, compliance and economic sanctions and similar laws, and to implement policies and procedures designed to ensure that its employees and other intermediaries comply with the applicable restrictions. These restrictions include prohibitions on the sale or supply of certain products, services and any other economic resources to embargoed or sanctioned countries, governments, persons and entities. Compliance with these restrictions requires, among other things, screening of business partners. Despite its commitment to legal compliance and corporate ethics, the company cannot ensure that its policies and procedures will always protect it from intentional, reckless or negligent acts committed by employees or agents under the applicable laws. If Linde fails to comply with laws governing the conduct of international operations, Linde may be subject to criminal and civil penalties and other remedial measures, which could materially adversely affect its reputation, business and results of operations.

The outcome of litigation or governmental investigations may adversely impact the company's business or results of operations.

Linde's subsidiaries are party to various lawsuits and governmental investigations arising in the ordinary course of business. Adverse outcomes in some or all of the claims pending may result in significant monetary damages or injunctive relief that could adversely affect Linde's ability to conduct business. Linde and its subsidiaries may in the future become subject to further claims and litigation, which is impossible to predict. The litigation and other claims Linde faces are subject to inherent uncertainties. Legal or regulatory judgments or agreed settlements might give rise to expenses which are not covered, or are not fully covered, by insurance benefits and may also lead to negative publicity and reputational damage. An unfavorable outcome or determination could cause a material adverse impact on the company's results of operations.

Potential product defects or inadequate customer care may adversely impact Linde's business or results of operations.

Risks associated with products and services may result in potential liability claims, the loss of customers or damage to Linde's reputation. Principal possible causes of risks associated with products and services are product defects or an inadequate level of customer care when Linde is providing services.

Linde is exposed to legal risks relating to product liability in the countries where it operates, including countries such as the United States, where legal risks (in particular through class actions) have historically been more significant than in other countries. The outcome of any pending or future products and services proceedings or investigations cannot be predicted and legal or regulatory judgments or agreed settlements may give rise to significant losses, costs and expenses.

The manufacturing and sale of products as well as the construction of plants by Linde may give rise to risks associated with the production, filling, storage, handling and transport of raw materials, goods or waste. Industrial gases are potentially hazardous substances and medical gases and the related healthcare services must comply with the relevant specifications in order to not adversely affect the health of patients treated with them.

Linde's products and services, if defective or not handled or performed appropriately, may lead to personal injuries, business interruptions, environmental damages or other significant damages, which may result, among other consequences, in liability, losses, monetary penalties or compensation payments, environmental clean-up costs or other costs and expenses, exclusion from certain market sectors deemed important for future development of the business and loss of reputation. All these consequences could have a material adverse effect on Linde's business and results of operations.

U.S. civil liabilities may not be enforceable against Linde.

Linde is organized under the laws of Ireland and substantial portions of its assets will be located outside of the United States. In addition, certain directors and officers of Linde and its subsidiaries reside outside the United States. As a result, it may be difficult for investors to effect service of process within the United States upon Linde or such persons, or to enforce outside the United States judgments obtained against such persons in U.S. courts in any action, including actions predicated upon the civil liability provisions of the U.S. federal securities laws. In addition, it may be difficult for investors to enforce, in original actions brought in courts in jurisdictions located outside the United States, rights predicated upon the U.S. federal securities laws.

A judgment for the payment of money rendered by a court in the United States based on civil liability would not be automatically enforceable in Ireland. There is no treaty between Ireland and the United States providing for the reciprocal enforcement of foreign judgments. The following requirements must be met before the foreign judgment will be deemed to be enforceable in Ireland (i) the judgment must be for a definite sum, (ii) the judgment must be final and conclusive; and (iii) the judgment must be provided by a court of competent jurisdiction.

An Irish court will also exercise its right to refuse judgment if the foreign judgment (i) was obtained by fraud; (ii) violated Irish public policy; (iii) is in breach of natural justice; or (iv) if the judgment is irreconcilable with an earlier foreign judgment.

In addition, there is doubt as to whether an Irish court would accept jurisdiction and impose civil liability on Linde or such persons in an original action predicated solely upon the U.S. federal securities laws brought in a court of competent jurisdiction in Ireland against Linde or such member, officer or expert, respectively.

Changes in tax laws or policy could adversely impact the company's financial position or results of operations.

Linde and its subsidiaries are subject to the tax rules and regulations in the U.S., Germany, Ireland, the U.K. and other countries in which they operate. Those tax rules and regulations are subject to change on a prospective or retroactive basis. Under current economic and political conditions, including the U.K.'s ongoing exit process from the EU, tax rates and policies in any jurisdiction, including the U.S., the U.K. and the EU, are subject to significant change. In particular,since Linde is expected to be treated as U.K. tax resident, any potential changes in the tax rules applying to U.K. tax-resident companies would directly affect Linde.

A change in Linde's tax residency could have a negative effect on the company's future profitability, and may trigger taxes on dividends or exit charges. If Linde ceases to be resident in the United Kingdom and becomes resident in another jurisdiction, it may be subject to United Kingdom exit charges, and/or could become liable for additional tax charges in the other jurisdiction. If Linde were to be treated as resident in more than one jurisdiction, it could be subject to duplicative taxation. Furthermore, although Linde is incorporated in Ireland and is not expected to be treated as a domestic corporation for U.S. federal income tax purposes, it is possible that the IRS could disagree with this result or that changes in U.S. federal income tax law could alter this result. If the IRS successfully asserted such a position or the law were to change, significant adverse tax consequences may result for Linde, the company and Linde's shareholders.

When tax rules change, this may result in a higher tax expense and the need to make higher tax payments. In addition, changes in tax legislation may have a significant impact on Linde's and its subsidiaries' tax receivables and tax liabilities as well as on their deferred tax assets and deferred tax liabilities and uncertainty about the tax environment in some regions may restrict their opportunities to enforce their respective rights under the law. Linde will also operate in countries with complex tax regulations which could be interpreted in different ways. Interpretations of these regulations or changes in the tax system might have an adverse impact on the tax liabilities, profitability and business operations of Linde. Linde and its subsidiaries are subject to periodic audits by the tax authorities in various jurisdictions or other review actions by the relevant financial or tax authorities. The ultimate tax outcome may differ from the amounts recorded in Linde's or its subsidiaries' financial statements and may materially affect their respective financial results for the period when such determination is made.

FINANCIAL INSTRUMENTS

In its normal operations, Linde is exposed to market risks relating to fluctuations in interest rates, foreign currency exchange rates, energy costs and to a lesser extent precious metal prices. The objective of financial risk management at Linde is to minimize the negative impact of such fluctuations on the company's earnings and cash flows. To manage these risks, among other strategies, Linde routinely enters into various derivative financial instruments ("derivatives") including interest-rate swap and treasury rate lock agreements, currency-swap agreements, forward contracts, currency options, and commodity-swap agreements. These instruments are not entered into for trading purposes and Linde only uses commonly traded and non-leveraged instruments. Counterparties to Linde's derivatives are major banking institutions with credit ratings of investment grade or better thereby minimizing the risk of credit loss. As of year-end, Linde AG had existing Credit Support Annexes ("CSAs") in place with their principal counterparties to minimize potential default risk and to mitigate counterparty risk. Under the CSAs, the fair values of derivatives for the purpose of interest rate and currency management are collateralized with cash on a regular basis

There are three types of derivatives that the company enters into: (i) those relating to fair-value exposures, (ii) those relating to cash-flow exposures, and (iii) those relating to foreign currency net investment exposures. Fair-value exposures relate to changes in the fair value of recognized assets or liabilities, primarily financial assets and financial liabilities, and firm commitments. Cash-flow exposures relate to the variability of future cash flows associated with recognized assets or liabilities, or forecasted transactions for which no underlying exposure is yet reported in the consolidated statement of financial position. Net investment exposures relate to the impact of foreign currency exchange rate changes on the carrying value of net assets denominated in foreign currencies.

Interest Rate Risk

At 31 December 2018, Linde had debt totaling $15,289 million ($8,996 million at 31 December 2017). For fixed-rate instruments, interest rate changes affect the fair market value but do not impact earnings or cash flows. Conversely, for floating-rate instruments, interest rate changes generally do not affect the fair market value of the instrument but impact future earnings and cash flows, assuming that other factors are held constant. At 31 December 2018, including the impact of derivatives Linde had fixed-rate debt of $12,558 million and floating-rate debt of $2,731 million, representing 82% and 18%, respectively, of total debt. At 31 December 2017, Linde had fixed-rate debt of $8,249 million and floating-rate debt of $747 million, representing 92% and 8%, respectively, of total debt.

In order to mitigate interest rate risk, when considered appropriate interest-rate swaps are entered into as hedges of underlying financial instruments to effectively change the characteristics of the interest rate without actually changing the underlying financial instrument. At 31 December 2018, Linde had fixed-to-floating interest rate swaps outstanding that were designated as hedging instruments of the underlying debt issuances - refer to Note 20 to the consolidated financial statements for additional information.

Foreign Currency Risk

Linde's exchange-rate exposures result primarily from its investments and ongoing operations in South America (primarily Brazil, Argentina, Chile and Colombia), Europe (primarily Germany, Scandinavia, and the United Kingdom), Canada, Mexico, Asia Pacific (primarily Australia, China, India, and Korea) and other business transactions such as the procurement of equipment from foreign sources. Linde frequently utilizes currency contracts to hedge these exposures. See Note 24 to the consolidated financial statements for additional information.

Further details of the financial risk management objectives and policies and the exposure of the company to price risk, credit risk, liquidity risk and cash flow risk are provided in Note 24 to the consolidated financial statements.

RESEARCH AND DEVELOPMENT

Linde's research and development is directed toward developing new and improved methods for the production and distribution of industrial gases and the development of new markets and applications for these gases. This results in the development of new advanced air separation and hydrogen process technologies and the frequent introduction of new industrial gas applications. Research and development for industrial gases is principally conducted at Pullach, Germany; Tonawanda, New York and Burr Ridge, Illinois.

Linde conducts research and development for its surface technologies to improve the quality and durability of coatings and the use of specialty powders for new applications and industries. Surface technologies research is conducted at Indianapolis, Indiana.

DIVIDENDS

On 10 December 2018, the directors of Linde plc declared an interim dividend of $0.825 per share for the fourth quarter of 2018 (the “Q4 Dividend”). The Q4 Dividend was payable on 27 December 2018 to shareholders of record on 18 December 2018.

On 26 February 2019, the directors of Linde plc declared an interim dividend of $0.875 per share for the first quarter of 2019 (the “Q1 Dividend”). The Q1 Dividend was payable on 22 March 2019 to shareholders of record on 8 March 2019.

For additional information, see Note 17 to the consolidated financial statements.

FUTURE DEVELOPMENTS

The company’s business is to build, own, and operate industrial gas plants in order to supply atmospheric and process gases to customers. As such, Linde believes that its sale of gas project backlog is one indicator of future sales growth. At 31 December 2018, Linde’s backlog of large projects under construction was $3.5 billion. This represents the total estimated capital cost of large plants under construction. APAC and Americas represent 49 percent and 42 percent of the backlog, respectively, with the remaining backlog in EMEA. These plants will primarily supply customers in the energy, chemical, and electronics end-markets.

The above guidance should be read in conjunction with the section entitled “Forward-Looking Statements.”

Linde provides quarterly updates on operating results, material trends that may affect financial performance, and financial earnings guidance via earnings releases and investor teleconferences. These materials are available on the company’s website, https://www.linde.com/en/investors but are not incorporated herein.

EVENTS SINCE THE STATEMENT OF FINANCIAL POSITION DATE

Own Shares

On 22 January 2019 the company’s board of directors approved the repurchase of up to $6.0 billion of its ordinary shares ("2019 program") which could take place from time to time on the open market (which could include the use of 10b5-1 trading plans), subject to market and business conditions. The 2019 program has a maximum repurchase amount of 15% of outstanding shares and a stated expiration date of 1 February 2021.

Dividends

On 26 February 2019, the directors of Linde plc declared an interim dividend of $0.875 per share for the first quarter of 2019 (the “Q1 Dividend”). The Q1 Dividend was payable on 22 March 2019 to shareholders of record on 8 March 2019.

Divestitures

On 1 March 2019, Linde AG completed the sale of the majority of its industrial gases business in North America and certain industrial gases business activities in South America to a consortium comprising companies of the German industrial gases manufacturer Messer Group and CVC Capital Partners Fund VII, pursuant to a Sale and Purchase Agreement, dated 16 July 2018, as amended on 22 September 2018, 19 October 2018 and 20 February 2019, by and among the company, Linde AG, Praxair, Inc., Messer Group and CVC Capital Partners Fund VII (the “SPA”). Messer Group and CVC Capital Partners Fund VII paid $2.97 billion in cash consideration after purchase price adjustments for certain items relating to assets and liabilities of the sold businesses. The SPA was entered into as part of the commitments in connection with the merger control review by the U.S. Federal Trade Commission (the “FTC”) of the previously completed combination of the businesses of Praxair, Inc. and Linde AG under the company (the ”business combination” - see Note 1 to the consolidated financial statements).

As part of the company’s, Praxair’s and Linde AG’s further commitments in connection with the merger control review by the FTC, Linde AG divested additional assets within the Americas for aggregate net proceeds of $531 million (i) to Matheson Tri-Gas, Inc., five of Linde AG’s HyCO facilities outside the Gulf Coast region, along with Linde AG’s hydrogen pipeline in the Gulf Coast, intellectual property, customer contracts, and other assets, (ii) to Celanese Corporation, Linde AG's Clear Lake, Texas plant, and (iii) to LyondellBasell Industries N.V., Linde AG’s La Porte, Texas plant.

Hold Separate Order

Additionally, concurrent with the sale of the required merger-related divestitures in the United States, on 1 March 2019, the hold separate order restrictions described in Note 1 of the consolidated financial statements were lifted and the company was able to commence integration activities.

Credit Agreements

On 26 March 2019, Linde plc and certain of its subsidiaries have entered into an unsecured revolving credit agreement (the “Credit Agreement”) with Bank of America, N.A., as administrative agent (the “Administrative Agent”) and a syndicate of banking institutions as lenders. The Credit Agreement became effective on 29 March 2019 and provides for total commitments of $5,000,000,000, which may be increased to up to $6,500,000,000 subject to receipt of additional commitments and satisfaction of customary conditions. The commitments will expire on 26 March 2024, however, the company has the option to request two one-year extensions of the expiration date. Any such extension will be subject to approval by the extending lenders.

The Credit Agreement is available for general corporate purposes of the company and its subsidiaries. Revolving loans may be borrowed in U.S. Dollars, Pounds Sterling, Euros and other currencies agreed to by the Administrative Agent and the lenders. The Credit Agreement also includes commitments for swingline loans of $200,000,000 (for U.S. Dollar-denominated swingline loans) and €100,000,000 (for Euro-denominated swingline loans) and for letters of credit, letters of indemnity and bank guarantees in approved currencies of $600,000,000. Any usage of the commitments for swingline loans, letters of credit, letters of indemnity and bank guarantees will reduce availability for revolving loans.

Any revolving loans and swingline loans outstanding under the Credit Agreement will bear interest based on LIBOR, EURIBOR or the base rate, as applicable, plus, in each case, an interest margin that is subject to a ratings-based pricing grid. Commitment fees and other customary fees will be payable in connection with the Credit Agreement. The Credit Agreement contains customary representations and warranties, conditions to credit extension, affirmative covenants, negative covenants and events of default. The Credit Agreement does not contain a financial maintenance covenant. In connection with the effectiveness of the Credit Agreement, each of Praxair and Linde AG terminated their respective existing revolving credit agreements. As of the date of this Report, the Credit Agreement has no usage outstanding.

Squeeze-out Transaction

On 8 April 2019 Linde plc’s subsidiary Linde Aktiengesellschaft (“Linde AG”) completed the merger squeeze-out of all its minority shares for cash consideration of €189.46 per share. The total payment for the squeeze-out was $3.2 billion (€2.8 billion) (see Note 2 to the consolidated financial statements).

OWN SHARES

As of 1 January 2018 Linde plc had no own shares.

As of 31 December 2018 4,069 thousand ordinary shares were purchased by the company for total consideration of $629 million, or an average price of $154.48 per share (€0.001 nominal value). The consideration includes stamp duty, commission and all customary fees. The ordinary shares acquired represented less than1% of the called-up ordinary share capital immediately prior to the acquisition. These shares were acquired in order to reduce the shares outstanding or to meet obligations under Linde plc equity awards.

On 10 December 2018 the company’s board of directors approved the repurchase of up to $1.0 billion of its ordinary shares ("2018 program") which could take place from time to time on the open market (which could include the use of 10b5-1 trading plans), subject to market and business conditions. The 2018 program has a maximum repurchase amount of 5% of outstanding shares and a stated expiration date of 30 April 2019.

As of 31 December 2018, the company had purchased $629 million of its ordinary shares pursuant to the 2018 program, leaving an additional $371 million remaining authorized under the 2018 program.

All share purchases by the company are structured as redemptions under Irish law.

POLITICAL DONATIONS

No political contributions that require disclosure under Irish law were made during fiscal years 2018 or 2017.

ACCOUNTING RECORDS

The measures that the directors have taken to secure compliance with the requirements of sections 281 to 285, with regard to the keeping of accounting records, include the provision of appropriate resources to maintain adequate accounting records throughout the company, including the appointment of personnel with appropriate qualifications, experience and expertise.

The company's accounting records are maintained at The Priestley Centre, 10 Priestley Road, Surrey Research Park, Guildford, Surrey GU2 7XY, United Kingdom.

SUBSIDIARY COMPANIES AND BRANCHES

Information regarding subsidiary undertakings, including information regarding branches, is provided in Note 33 to the consolidated financial statements.

NON-FINANCIAL INFORMATION

Linde publishes non-financial indicators and qualitative information in its combined non-financial report in accordance with the Irish implementation of the European Directives 2014/95/EU and 2013/34/EU as set out in the European Union (Disclosure of Non-Financial and Diversity Information by certain large undertakings and groups) Regulations 2017, as amended (the "Irish Regulations"). The combined non-financial report is incorporated by reference and forms part of the Directors' Report (and in the case of the Board diversity report, is part of the Corporate Governance Statement) and can be found on pages 141 to 147.

The non-financial report includes reportable information on environmental matters; social and employee matters; respect for human rights and combating bribery and corruption. The non-financial report also includes a Board diversity report as required by the Irish Regulations. Reportable information includes policies, due diligence in implementing these policies and the outcomes of these actions, risk identification and management, and key performance indicators.

CORPORATE GOVERNANCE STATEMENT

Corporate Governance Practices

Linde plc is incorporated in Ireland, and is subject to Irish company law pursuant to the Irish Companies Act 2014 (the "Act"). In addition, Linde plc ordinary shares are listed and trade on the New York Stock Exchange ("NYSE") and the Frankfurt Stock Exchange ("FSE"). Linde plc's primary governance obligations arise by virtue of its listing on NYSE, and as such, the company is subject to the corporate governance rules of the NYSE, requiring it to adopt certain governance policies (which the company has complied with), and to the reporting and other rules of the United States Securities and Exchange Commission (the "SEC"), requiring it to file Forms 10-K, 10-Q, 8-K and proxy statements.

A short summary of the key aspects of Linde plc's corporate governance structure is set forth below.

Board and Governance Information			
Size of Board	12	Annual Board and Committee Evaluations	Yes
Number of Independent Directors (excludes CEO)	11 92%	Limits service on other Boards for Directors (4 other Boards) Limits service on other Boards for CEO (2 other Boards)	Yes Yes
Split Chairman and CEO	Yes	Succession Planning Process	Yes
Board Committees (Audit, Compensation, Governance and Executive)	4	Board Risk Oversight	Yes
Board Meetings	5	Code of Conduct for Directors, Officers and Employees	Yes
Annual Election of Directors	Yes	Stock Ownership Guidelines for Directors and Executive Officers	Yes
Mandatory Retirement Age	72*	Anti-Hedging and Pledging Policies	Yes
Board Diversity - 3 women, one African American	Yes	Clawback Policy	Yes
Majority Voting in Director Elections	Yes	Rights Agreement (Poison Pill)	No
Proxy Access	Yes	Comprehensive Sustainability Program	Yes
		Shareholders May Call Special Meetings	Yes

* Mandatory retirement age waived during the first three years following the completion of the business combination on 31 October 2018 (the "Integration Phase") to ensure continuity.

Internal Corporate Governance Framework

Linde plc is subject to its own internal corporate governance guidelines (the "Guidelines"), as adopted by the board of directors of Linde plc (the "Board of Directors" or "Board") at the effective time of the business combination, the current version of which is available at https://www.linde.com/en/about-linde/corporate-governance. The Guidelines provide (among other things) that, during the Integration Phase, certain matters require approval by two-thirds of the Board of Directors, including appointment and removal of a director as the Chairman of the Board of Directors and appointment and removal of the Chief Executive Officer of Linde plc.

Internal Control and Risk Management Systems in Relation to the Financial Reporting Process

Linde maintains accounting systems, including internal accounting controls, monitored by a staff of internal auditors, that are designed to provide reasonable assurance of the reliability of financial records and the protection of assets. The concept of reasonable assurance is based on recognition that the cost of a system should not exceed the related benefits. The effectiveness of those systems depends primarily upon the careful selection of financial and other managers, clear delegation of authority and assignment of accountability, inculcation of high business ethics and conflict-of-interest standards, policies and procedures for coordinating the management of corporate resources, and the leadership and commitment of top management.

The Audit Committee of the Board of Directors, which consists solely of non-employee directors, is responsible for overseeing the functioning of the accounting system and related controls and the preparation of annual financial statements. The Audit Committee periodically meets with management, internal auditors and the independent accountants to review and evaluate their accounting, auditing and financial reporting activities and responsibilities, including management's assessment of internal control over financial reporting. The external auditors and internal auditors have full and free access to the Audit Committee and meet with the committee, with and without management present. Details of the composition and operation of the Audit Committee are available at page 31 of this report.

Linde's management is responsible for establishing and maintaining adequate internal control over financial reporting, as such term is defined in Exchange Act Rule 13a-15(f). Under the supervision and with the participation of management, including the company's principal executive officer and principal financial officer, the company conducted an evaluation of the effectiveness of its internal control over financial reporting based on the framework in *Internal Control - Integrated Framework* (2013) issued by the Committee of Sponsoring Organizations of the Treadway Commission (often referred to as COSO). Based on this evaluation, management concluded that the company's internal control over financial reporting was effective as of 31 December 2018.

Linde's evaluation of internal control over financial reporting as of 31 December 2018 did not include the internal control over financial reporting related to Linde AG because the business was acquired in a merger accounted for as a business combination consummated during 2018.

Information required under the European Communities (Takeover Bids (Directive 2004/ 25/EC)) Regulations 2006

As required by the Takeover Bids Regulations, the information contained below represents the position as at 31 December 2018.

Structure of the company's capital

The capital of the company is divided into ordinary shares, A ordinary shares, deferred shares and preferred shares.

As at 31 December 2018, there were 551,310,272 ordinary shares in issue. As at 31 December 2018, there were no A ordinary shares, deferred shares or preferred shares in issue.

Further detail on the structure of the company's capital is set out in Note 17 to the consolidated financial statements.

Rights and Obligations attaching to the classes of shares

Ordinary shares

Dividend rights

Under Irish law, dividends are payable on the ordinary shares of the company only out of profits available for distribution. Subject to the provisions of the Act, holders of the ordinary shares of the company are entitled to receive such dividends as may be declared by the company by ordinary resolution, provided that the dividend cannot exceed the amount recommended by the Board of Directors. The company may pay shareholders interim dividends if it appears to the Board of Directors that they are justified by the profits of the company available for distribution. Any dividend which has remained unclaimed for twelve years from the date of its declaration may be forfeited and cease to remain owing by the company.

Details of dividends declared by Linde plc are available at page 22 of this report.

Voting rights

At any general meeting, a resolution put to the vote of the meeting is decided on a poll. Every shareholder who is present in person or by proxy has one vote for every ordinary share of €0.001 each.

The necessary quorum for a general meeting is two persons present in person or by proxy and having the right to attend and vote at the meeting and together holding shares representing more than 50% of the votes that may be cast by all shareholders at the relevant time. All business is considered to be special business if it is transacted at an extraordinary general meeting ("EGM") as is all business transacted at an annual general meeting ("AGM") other than the declaration of a dividend, the consideration of the company's statutory financial statements and reports of the Board of Directors and Auditors on those statements, the review by the shareholders of the company's affairs, the election of directors in the place of those retiring, the reappointment of the retiring Auditors (subject to sections 380 and 382 to 385 of the Act), the fixing of the remuneration of the Auditors and the consideration of a special resolution for the purpose of section

1102(2)(b) of the Act. Any business that is required to be dealt with by way of special resolution must be passed by not less than 75% of the votes cast by such shareholders as, being entitled so to do, vote in person or by proxy at a general meeting at which not less than twenty-one clear days' notice specifying the text or substance of the proposed resolution has been duly given.

Any business that is required to be dealt with by way of ordinary resolution must be passed by a simple majority of the votes cast by the shareholders as, being entitled to do so, vote in person or by proxy at a general meeting. Where an equal number of votes have been cast on any resolution the Chairman of the meeting is not entitled to a second or casting vote.

An EGM (other than an EGM called for the passing of a special resolution, which must be called by not less than twenty-one clear days' notice) may be called by not less than 14 clear days' notice where:

(a) all shareholders, who hold shares that carry rights to vote at the meeting, are permitted to vote by electronic means at the meeting; and
(b) a special resolution reducing the period of notice to fourteen days has been passed at the immediately preceding AGM, or at a general meeting held since that meeting.

Liquidation rights

In the event of any surplus arising on the occasion of the liquidation of the company, the ordinary shareholders would be entitled to a share in that surplus in proportion to the capital at the commencement of the liquidation paid up or credited as paid up on the ordinary shares held by them respectively.

A Ordinary Shares and Deferred Shares

As at 31 December 2018, there were no A ordinary shares or deferred shares in issue. On incorporation, Linde plc issued 25,000 ordinary shares to meet the minimum public limited company capitalization threshold required by Irish company law. These 25,000 ordinary shares were subsequently converted into A ordinary shares and were later converted into deferred shares, acquired by the company for nil consideration and cancelled.

The rights and obligations attaching to the A ordinary shares are the same as those attaching to the ordinary shares. The deferred shares are non-voting shares and do not convey upon the holder the right to be paid a dividend or to receive notice of or to attend, vote or speak at a general meeting. The deferred shares confer the right on a return of capital, on a winding-up or otherwise, only to the repayment of the nominal value paid up on the deferred shares after repayment of the nominal value of the ordinary shares.

Preferred shares

As at 31 December 2018, there were no preferred shares in issue. Where authorized to issue unissued shares in the capital of the company (including where relevant, by shareholder approval under section 1021 of the Act), and subject to the scope of any such authority, in accordance with the company's articles of association (the "Articles"), the Board of Directors are authorized to issue all or any of the authorized but unissued preferred shares from time to time in one or more classes or series, and to fix for each such class or series such voting power, full or limited or no voting power, and such designations, preferences or special rights and qualifications, limitations or restrictions thereof in any resolution adopted by the Board of Directors providing for the issuance of such class or series of preferred shares.

Variation of class rights

Whenever the share capital of the company is divided into different classes of shares, the rights attached to any class may be varied or abrogated with the consent in writing of 75% in nominal value of the issued shares of that class, or with the sanction of a special resolution passed at a separate general meeting of the holders of the shares of that class.

Percentage of the company's capital represented by class of share

The ordinary shares represent 95.89% of the authorized share capital and 100% of the issued share capital. The A ordinary shares represent 1.37% of the authorized share capital and 0% of the issued share capital. The deferred shares represent 1.37% of the authorized share capital and 0% of the issued share capital. The preferred shares represent 1.37 % of the authorized share capital and 0% of the issued share capital.

Restrictions on the transfer of shares in the company

There are no restrictions imposed by the company on the transfer of shares, nor are there any requirements to obtain the approval of the company or other shareholders for a transfer of shares, save in certain limited circumstances set out in the Articles. A copy of the Articles may be found on www.linde.com or may be obtained on request from the Company Secretary.

Rules of the company concerning the appointment and replacement of directors

Please see "Composition and Operation of Board of Directors and Committees of Board of Directors" section at page 30 below.

Rules of the company concerning the amendment of the company's constitution

The company's constitution may be amended by special resolution passed at an AGM or EGM. An AGM and an EGM called for the passing of a special resolution shall be called by not less than twenty-one clear days' notice. Special resolutions must be approved by not less than 75% of the votes cast by such shareholders as, being entitled so to do, vote in person or by proxy. No business may be transacted at any general meeting unless a quorum of shareholders is present at the time when the meeting proceeds to business. The necessary quorum for a general meeting is two persons present in person or by proxy and having the right to attend and vote at the meeting and together holding shares representing more than 50% of the votes that may be cast by all shareholders at the relevant time.

Powers of the company's directors, including powers in relation to issuing or buying back by the company of its shares

Under its Articles, responsibility for the management of the business of the company has been delegated by the company's shareholders to the Board of Directors, who in turn exercise all powers of the company as are not, by the Articles, reserved for the company's shareholders. The Board of Directors has further delegated the management of the company to its committees, management and the Chief Executive Officer.

The Board of Directors may exercise all the borrowing powers of the company and may give security in connection therewith. These borrowing powers may be amended or restricted only by the shareholders in general meeting.

The shareholders of the company in general meeting may at any time and from time to time by resolution increase the share capital of the company by such amount as they think proper. Whenever the share capital of the company is so increased, the Board of Directors may, subject to various provisions of the Articles, issue shares to such amount not exceeding the amount of such enlargement as they think proper. All ordinary shares so issued shall rank in equal priority with existing ordinary shares.

Subject to provisions of the Act, to any rights conferred on any class of shares in the company and to the Articles, the company may purchase any of its shares of any class and may cancel any shares so purchased or hold such shares as treasury shares (the "treasury shares") with liberty to re-issue any such treasury shares in accordance with section 109 of the Act. The company shall not make market purchases of its own shares unless such purchases shall have been authorized by an ordinary resolution of the company.

For purposes of Irish law, repurchases of shares in Linde plc may be effected by a redemption if the repurchased shares are redeemable shares or are deemed to be redeemable shares by Linde plc's constitution. Under Irish law, a company may issue redeemable shares and redeem them out of distributable reserves or the proceeds of a new issue of shares for that purpose. All redeemable shares must also be fully paid. Redeemable shares may, upon redemption, be cancelled or held in treasury. The Linde plc constitution provides that, unless the Board of Directors determines otherwise, each Linde plc ordinary share shall be deemed to be a redeemable share on, and from the time of, the existence or creation of an agreement, transaction or trade between Linde plc and any person pursuant to which Linde plc acquires or will acquire Linde plc ordinary shares, or an interest in Linde plc ordinary shares, from the relevant person. Redeemable shares of Linde plc shall have the same characteristics as any other Linde plc share save that they shall be redeemable in accordance with the arrangement.

On 10 December 2018, the Board of Directors authorized a share repurchase program for up to $1.0 billion of its ordinary shares (the "2018 Program"). Under this program, Linde may acquire up to 5% of its outstanding ordinary shares in the period from 10 December 2018 through 30 April 2019. The purpose of the program is to reduce the share capital or to meet obligations under Linde equity awards.

On 21 January 2019, the Board of Directors authorized a further share repurchase program for up to $6.0 billion of its ordinary shares (the "2019 Program"). Under the 2019 Program, Linde may acquire up to 15% of its outstanding ordinary shares in the period from 1 May 2019 (or the date following the announcement of the end of the 2018 Program, if earlier) through 1 February 2021. The purpose of the 2019 Program is to reduce the share capital or to meet obligations under Linde equity awards.

Both the 2018 Program and the 2019 Program have been structured as redemptions for Irish law purposes and are being effected pursuant to Article 9 of the Articles.

Severance and Change-in-Control Arrangements

The company provides severance benefits to eligible employees, including Executive Officers, consistent with the terms of its severance programs and applicable local law. The company has not entered into any executive severance compensation agreements with its new Executive Officers, however, in connection with the business combination, the company was required to assume severance agreements for the legacy Praxair Executive Officers that provide double trigger benefits in the event that the legacy Praxair Executive Officer's employment with the company is terminated under certain circumstances prior to 31 October 2020. Similarly, the legacy Linde Executive Officers are party to agreements with Linde AG that provide severance entitlements in the event their employment ends under specified circumstances within nine months following the merger.

Change-in-Control Arrangements

At the time of the business combination between Praxair and Linde AG, each legacy Praxair Executive Officer was party to a double-trigger executive severance agreement with Praxair that provided certain protections in the event that the Executive Officer's employment was terminated by the company without "cause" or by the Executive Officer for "good reason," in either case within the 24-month period immediately following a "change-in-control" (the "Praxair Severance Agreements"). The business combination constituted a change-in-control and upon the closing, the company assumed the Agreements. While the legacy Praxair Executive Officers continue to receive the protections afforded under the Praxair Severance Agreements through 31 October 2020, the Praxair Severance Agreements were not renewed at 31 December 2018 and no replacement severance agreements have been provided by the company to the Executive Officers.

The Praxair Severance Agreements were adopted many years prior to the business combination and were meant to:

- provide temporary income following an involuntary termination of employment,
- encourage retention of executives for continuity of management, and
- to keep executives focused on performing their duties in the event of a change-in-control transaction.

The terms of the Praxair Severance Agreements include:

- "Double trigger" is required for payments: The change-in-control must be followed by the termination of the Executive Officer's employment within the following two years either by the company other than for cause or by executive with "good reason"
- No "tax gross-ups" for excise taxes
- As a condition of entering into the agreements, each Executive Officer was required to enter into a Nondisclosure, Nonsolicitation and Noncompetition Agreement under which the Executive Officer agrees not to:
- Disclose company confidential information both during and after termination of his or her employment with the company
- Solicit the company's customers and employees for a period of two years following the Executive Officer's termination of employment with the company for any reason
- Engage in any activities that compete with those of the company for a period of two years following the Executive Officer's termination of employment

Upon the occurrence of the "double trigger," the Severance Agreements generally provide the affected Executive Officer with:

- accrued salary, variable compensation, and benefits,
- enhanced life, accident, health insurance and pension benefits, and
- a lump sum severance payment equal to two times the sum of his or her annual salary and target performance-based variable compensation award (three times for executives who became officers of the Praxair, Inc. prior to 2010).

Significant agreements relating to a change of control subsequent to a takeover bid

In the financial years 2007 to 2017, Linde AG issued benchmark bonds under its €10 billion debt issuance programme, either itself or via Linde Finance B. V., a Dutch subsidiary of Linde plc. Under the terms and conditions of the bond issuances, in the event of a change of control of the company, the bond creditor may demand immediate repayment if such change of control leads to the withdrawal of the credit rating or to a reduction in the rating to or below certain credit rating levels for unsubordinated unsecured liabilities.

There are other significant financing agreements in place with the company / certain subsidiary companies, each of which includes specific rules that apply in the event of a change in control of the company. In particular, these rules provide for a duty on the part of the company / the relevant subsidiary to provide information to the contracting party, and also provide for cancellation rights for the contracting party.

There are customer contracts in place with the company/certain subsidiary companies, containing clauses granting the customer special cancellation rights in the event of a change of control of the company. In the event that these special cancellation rights are exercised, the contracts provide for appropriate compensation in favor of the customer.

Under the terms and conditions of the 2009 Praxair, Inc. Long-Term Incentive Plan (the "2009 Plan"), which was assumed by the company pursuant to the business combination, in the event of a change of control of the company, special rules may be adopted. Those special rules, which apply to share options issued between 2013 and 2017 provide, in the event of a change of control of the company, that cancellation rights apply, which means that option/matching shares rights may be settled in cash in an amount to be determined in accordance with the 2009 Plan.

Shareholders' Meetings

The company operates under the Act. The Act provides for two types of shareholder meetings: the AGM with all other general meetings being called an EGM.

The company must hold a general meeting each year as its AGM, in addition to any other general meetings held in that year. Not more than 15 months may elapse between the date of one AGM and the next. EGMs can also be convened at the request of shareholders holding not less than 5% of the voting share capital of the company. The notice period for an AGM and an EGM to consider any special resolution (a resolution which requires a 75% majority vote, not a simple majority) is 21 clear days.

No business shall be transacted at any general meeting unless a quorum is present at the time when the meeting proceeds to business. Two shareholders present in person or by proxy and having the right to attend and vote at the meeting and together holding shares representing more than 50% of the votes that may be cast by all shareholders at the relevant time shall be a quorum. Only those shareholders registered on the company's register of shareholders at the prescribed record date, being a date not more than 48 hours before the general meeting to which it relates, are entitled to attend and vote at a general meeting.

Under the Act, ordinary resolutions may be passed by a majority of votes cast in favor, while special resolutions require a 75% majority of votes cast in favor. Any shareholder who is entitled to attend, speak and vote at a general meeting is entitled to appoint one or more proxies to attend, speak and vote on his or her behalf. A proxy need not be a shareholder of the company. All resolutions are determined by a poll.

As further described on page 28, the management of the business of the company has been delegated by company's shareholders to the Board of Directors, who may exercise all the powers of the company save for those reserved to shareholders. Matters reserved to shareholders in general meetings include the election of directors, the declaration of final dividends on the recommendation of the directors, the fixing of the remuneration of the external auditor, amendments to the Articles, measures to increase or reduce the ordinary share capital and the authority to issue shares.

The information required to be provided to shareholders in accordance with sections 1099 to 1110 of the Act is available on the company's website (www.linde.com).

Composition and Operation of Board of Directors and Committees of Board of Directors

Board of Directors

Linde plc has twelve directors, six of whom are former Praxair directors ("Praxair Class Directors"), including Steve Angel who is also the CEO, and six of whom are former Linde AG Supervisory Board members ("Linde Class Directors"), including Wolfgang Reitzle, who is the Chairman of the Board.

Under the Linde plc constitution, directors retire at each AGM and may be re-elected by shareholders at that meeting.

Until the third anniversary of the completion of the business combination, the Board shall nominate each of the Linde Class Directors and Praxair Class Directors (or his or her replacement) for re-election to the Board at each of Linde plc's AGMs as required to ensure that the Linde Class Directors and Praxair Class Directors (or his or her replacement) serve on the Board for the duration of the three years following the completion of the business combination.

Until the third anniversary of the completion of the business combination, any vacancy on the Board created by the cessation of service of a Praxair Class Director prior to the end of his or her term will be filled by the unanimous vote of the remaining members of the Board; provided that if the vacancy is not filled by the Board within three months, the vacancy may be filled by an individual nominated and appointed by a majority of the remaining Praxair Class Directors. Until the third anniversary of the completion of the business combination, any vacancy on the Board created by the cessation of service of a Linde Class Director prior to the end of his or her term will be filled by the unanimous vote of the remaining members of the Board; provided that if the vacancy is not filled by the Board within three months, the vacancy may be filled by an individual nominated and appointed by a majority of the remaining Linde Class Directors.

Linde's constitution also provides that a shareholder, or a group of up to 20 shareholders, who have owned at least 3% of the company's outstanding ordinary shares continually for at least three years, may nominate persons for election as directors and have these nominees included in the company's proxy statement. The shareholders or group must meet the requirements in the company's constitution. The number of nominees is limited to the greater of two persons or 20% of the number of directors serving on the Board.

The Board of Directors operates subject to both the Guidelines and the company's constitution, copies of which are available at https://www.linde.com/en/about-linde/corporate-governance.

The directors of the company during the financial year are listed in the table below.

Directors	Appointment Date	Resignation Date
Current Directors		
Prof. Dr. Wolfgang Reitzle	22 October 2018	N/A
Mr. Stephen F. Angel	22 October 2018	N/A
Prof. Dr. Ann-Kristin Achleitner	22 October 2018	N/A
Prof. Dr. Clemens Börsig	22 October 2018	N/A
Dr. Nance Dicciani	22 October 2018	N/A
Dr. Thomas Enders	22 October 2018	N/A
Mr. Franz Fehrenbach	22 October 2018	N/A
Mr. Edward Galante	22 October 2018	N/A
Mr. Larry McVay	22 October 2018	N/A
Dr. Victoria Ossadnik	22 October 2018	N/A
Mr. Martin Richenhagen	22 October 2018	N/A
Mr. Robert Wood	22 October 2018	N/A
Former Directors		
Mr. Guillermo Bichara Garcia	18 April 2017	22 October 2018
Mr. Andrew Brackfield	18 April 2017	22 October 2018
Mr. Christopher Cossins	18 April 2017	22 October 2018
Mr. Richard Steinseifer	18 April 2017	22 October 2018

Committees of Board of Directors

The Board of Directors has four committees: Audit, Compensation, Nomination & Governance and Executive Committees which each consist of six directors.

Audit Committee

Committee Chair:
- Prof. Dr. Clemens Börsig

Current Members:
- Dr. Nance K. Dicciani
- Dr. Thomas Enders
- Edward G. Galante

- Larry D. McVay
- Dr. Victoria Ossadnik

Meetings in 2018: 1

The Audit Committee assists the Board in its oversight of (a) the independence, qualifications and performance of Linde's independent auditor, (b) the integrity of Linde's financial statements, (c) the performance of Linde's internal audit function, and (d) Linde's compliance with legal and regulatory requirements. In furtherance of these responsibilities, the Audit Committee, among other duties,

(1) appoints the independent auditor to audit Linde's financial statements, approves the fees and terms of such engagement, approves any non-audit engagements of the independent auditor, and meets regularly with, and receives various reports from, the independent auditor. The independent auditor reports directly to the Audit Committee;

(2) reviews Linde's principal policies for accounting and financial reporting and its disclosure controls and processes, and reviews with management and the independent auditor Linde's financial statements prior to their publication;

(3) reviews assessments of Linde's internal controls, the performance of the Internal Audit function, the performance evaluations of the General Auditor and the Chief Compliance Officer, and the guidelines and policies by which Linde undertakes risk assessment and risk management; and

(4) reviews the effectiveness of Linde's compliance with laws, business conduct, integrity and ethics programs.

Compensation Committee

Committee Chair:

- Edward G. Galante

Current Members:

- Prof. Dr. Ann-Kristin Achleitner
- Dr. Nance K. Dicciani
- Franz Fehrenbach
- Dr. Victoria Ossadnik
- Prof. Dr. Martin H. Richenhagen

Meetings in 2018: 1

The Compensation Committee assists the Board in its oversight of (a) Linde's compensation and incentive policies and programs, and (b) management development and succession, in both cases particularly as they apply to Linde's executive officers. In furtherance of these responsibilities, the Compensation Committee, among other duties,

(1) determines Linde's policies relating to the compensation of executive officers and assesses the competitiveness and appropriateness of their compensation and benefits;

(2) determines the salaries, performance-based variable compensation, equity awards, terms of employment, retirement or severance, benefits, and perquisites of executive officers;

(3) approves corporate goals relevant to the CEO's compensation, evaluates the CEO's performance in light of these goals and sets the CEO's compensation accordingly;

(4) reviews management's long-range planning for executive development and succession, and develops a CEO succession plan;

(5) reviews design, administration and risk associated with Linde's management incentive compensation and equity compensation plans; and

(6) reviews periodically the company's diversity policies and objectives, and programs to achieve those objectives.

Executive Committee

Committee Chair:

- Prof. Dr. Wolfgang Reitzle

Current Members:

- Stephen F. Angel
- Dr. Thomas Enders
- Robert L. Wood

Meetings in 2018: 1

The purpose of the Executive Committee is primarily to act on behalf of the entire Board with respect to certain matters that may arise in between regularly scheduled Board meetings, and act on certain other matters from time to time. In particular, the Executive Committee duties include, among others:

(1) evaluating and approving any investments, acquisitions, partnerships or divestments requiring Board approval, that are within value thresholds specified by the Board;

(2) evaluating and approving any financing or other capital markets transactions requiring Board approval, that are within value thresholds specified by the Board; and

(3) acting upon any other such matters within the competencies of the Board, that are not reserved solely to the Board, that are within value thresholds specified by the Board and, in the opinion of the Chairman of the Board, should not be postponed until the next regularly scheduled Board meeting.

Nomination and Governance Committee

Committee Chair:

- Robert L. Wood

Current Members:

- Prof. Dr. Ann-Kristin Achleitner
- Prof. Dr. Clemens Börsig
- Franz Fehrenbach
- Larry D. McVay
- Prof. Dr. Martin H. Richenhagen

Meetings in 2018: 1

The Nomination and Governance Committee assists the Board in its oversight of (a) the selection, qualifications, compensation and performance of Linde's directors, (b) Linde's governance, including the practices and effectiveness of the Board, and (c) various important public policy concerns that affect the company. In furtherance of these responsibilities, the Nomination and Governance Committee, among other duties,

(1) recommends to the Board nominees for election as directors, and periodically reviews potential candidates, including incumbent directors;

(2) reviews policies with respect to the composition, compensation, organization and practices of the Board, and developments in corporate governance matters generally; and

(3) reviews Linde's policies and responses to broad public policy issues such as social responsibility, corporate citizenship, charitable contributions, legislative issues, and important shareholder issues, including management and shareholder proposals offered for shareholder approval.

DIRECTORS' AND COMPANY SECRETARY'S INTERESTS

No director, the company secretary or any member of their immediate families had any interest in shares or debentures of any subsidiary. Directors' remuneration is set forth in Note 30 to the consolidated financial statements. The interests of the directors and secretary of the company in office as at 31 December 2018 in the ordinary share capital of Linde plc as of 31 December 2018, as required to be stated pursuant to section 329 of the Act, are presented in the table below. Please note that no Linde plc directors or the secretary of the company in office as at 31 December 2018 were interested in Linde plc shares as at 22 October 2018 for the purposes of section 329 of the Act.

Directors	At 31 December 2018		At 22 October 2018	
	Ordinary Shares	Options	Ordinary Shares	Options
Prof. Dr. Wolfgang Reitzle	16,077	—	—	—
Mr. Stephen F. Angel	443,499	1,529,558	—	—
Prof. Dr. Ann-Kristin Achleitner	979	—	—	—
Prof. Dr. Clemens Börsig	979	—	—	—
Dr. Nance Dicciani	17,672	—	—	—
Dr. Thomas Enders	—	—	—	—
Mr. Franz Fehrenbach	979	—	—	—
Mr. Edward Galante	13,229	—	—	—
Mr. Larry McVay	11,254	—	—	—
Dr. Victoria Ossadnik	—	—	—	—
Mr. Martin Richenhagen	4,114	—	—	—
Mr. Robert Wood	13,844	—	—	—
Secretary				
Susan Kelly	—	—	—	—

DIRECTORS' COMPLIANCE STATEMENT

As required by section 225(2) of the Act, the directors acknowledge that they are responsible for securing the company's compliance with its relevant obligations (as defined in section 225(1)). The directors further confirm that a "compliance policy statement" (as defined in section 225(3)(a)) has been drawn up, that appropriate arrangements and structures that are, in the directors' opinion, designed to secure material compliance with the relevant obligations have been put in place and that a review of those arrangements and structures has been conducted in the financial year to which this report relates.

STATEMENT OF DISCLOSURES TO AUDITORS

So far as each person who was a director at the date of approving this report is aware, there is no relevant audit information, being information needed by the auditor in connection with preparing its report, of which the auditor is unaware. Having made enquiries of fellow directors and the company's auditor, each director has taken all the steps that he/she is obliged to take as a director in order to made himself/herself aware of any relevant audit information and to establish that the auditor is aware of that information.

DIRECTORS' RESPONSIBILITY STATEMENT

The directors are responsible for preparing the directors' report and the financial statements in accordance with Irish law.

Irish law requires the directors to prepare financial statements for each financial year that gives a true and fair view of the company's assets, liabilities and financial position as at the end of the financial year and of the profit and loss of the company for the financial year. Under that law, the Directors have prepared the consolidated financial statements in accordance with International Financial Reporting Standards as adopted by the European Union ("IFRS") and with those parts of the Act applicable to companies applying IFRS and the Parent Company financial statements in accordance Irish Generally Accepted Accounting Practice (accounting standards issued by the UK Financial Reporting Council, including Financial Reporting Standard 102 The Financial Reporting Standard applicable in the UK and Republic of Ireland and Irish law).

Under Irish law, the directors shall not approve the financial statements unless they are satisfied that they give a true and fair view of the company's assets, liabilities and financial position as at the end of the financial year and the profit and loss of the company for the financial year.

In preparing these financial statements, the directors are required to:

- select suitable accounting policies and then apply them consistently;
- make judgments and estimates that are reasonable and prudent;
- state whether the financial statements have been prepared in accordance with applicable accounting standards and identify the standards in question, subject to any material departures from those standards being disclosed and explained in the notes to 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.

The directors are responsible for keeping adequate accounting records that are sufficient to:

- correctly record and explain the transactions of the company;
- enable, at any time, the assets, liabilities, financial position and profit and loss of the company to be determined with reasonable accuracy; and
- enable the directors to ensure that the financial statements comply with the Companies Act and enable those financial statements to be audited.

The directors 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 Ireland governing the preparation and dissemination of financial statements may differ from legislation in other jurisdictions.

Approved by the Board of Directors and signed on its behalf on 30 April 2019 by:

[Signature]	[Signature]	[Signature]
Prof. Dr. Wolfgang Reitzle	Stephen F. Angel	Prof. Dr. Clemens Börsig
Chairman	*Chief Executive Officer and Director*	*Director*

Independent auditors' report to the members of Linde plc

Report on the audit of the financial statements

Opinion

In our opinion:

- Linde plc's consolidated financial statements and entity financial statements (the "financial statements") give a true and fair view of the group's and the company's assets, liabilities and financial position as at 31 December 2018 and of the group's profit and cash flows for the year then ended;
- the consolidated financial statements have been properly prepared in accordance with International Financial Reporting Standards ("IFRSs") as adopted by the European Union;
- the entity financial statements have been properly prepared in accordance with Generally Accepted Accounting Practice in Ireland (accounting standards issued by the Financial Reporting Council of the UK, including Financial Reporting Standard 102 "The Financial Reporting Standard applicable in the UK and Republic of Ireland" and Irish law); and
- the financial statements have been properly prepared in accordance with the requirements of the Companies Act 2014 and, as regards the group financial statements, Article 4 of the IAS Regulation.

We have audited the financial statements, included within the Directors' Report and Financial Statements (the Annual Report), which comprise:

- the consolidated statement of financial position as at 31 December 2018;
- the company statement of financial position of Linde plc as at 31 December 2018;
- the consolidated statement of profit and loss and consolidated statement of comprehensive income for the year then ended;
- the consolidated statement of cash flows for the year then ended;
- the statement of changes in consolidated equity for the year then ended;
- the company statement of changes in equity of Linde plc for the year then ended; and
- the notes to the consolidated financial statements and the notes to the entity financial statements, which include a description of the significant accounting policies.

Our opinion is consistent with our reporting to the Audit Committee.

Basis for opinion

We conducted our audit in accordance with International Standards on Auditing (Ireland) ("ISAs (Ireland)") and applicable law. Our responsibilities under ISAs (Ireland) are further described in the Auditors' responsibilities for the audit of the financial statements section of our report. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinion.

Independence

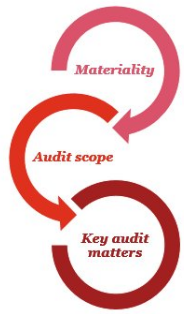
We remained independent of the group in accordance with the ethical requirements that are relevant to our audit of the financial statements in Ireland, which includes IAASA's Ethical Standard as applicable to listed public interest entities, and we have fulfilled our other ethical responsibilities in accordance with these requirements.

To the best of our knowledge and belief, we declare that non-audit services prohibited by IAASA's Ethical Standard were not provided to the group or the company.

Other than those disclosed in note 32 to the financial statements, we have provided no non-audit services to the group or the company in the period from 1 January 2018 to 31 December 2018.

Our audit approach

Overview



Materiality

• $119 million – consolidated financial statements.

• Based on circa 5% of profit before tax from continuing operations adjusted for non-recurring items relating to the gain on the divestiture of businesses, merger related inventory step up and initial transaction costs.

• $443 million - entity financial statements.

• Based on circa 0.5% of net assets.

Audit scope

• We conducted four full scope audits of the group's largest reporting components.

• Specified audit procedures were performed at three additional components.

• Additionally, certain other activities controlled and managed centrally at group level such as acquisitions and disposals, intangible asset and goodwill accounting and impairment testing, financing and treasury, legal and certain elements of income taxes were audited as part of our group procedures.

•Taken together, the components and group functions where we performed our audit work accounted for 80% of group net revenues and 87% of total assets.

Key audit matters

Valuation of property, plant and equipment and customer relationship intangible assets related to the Linde AG merger

The scope of our audit

As part of designing our audit, we determined materiality and assessed the risks of material misstatement in the financial statements. In particular, we looked at where the directors made subjective judgements, for example in respect of significant accounting estimates that involved making assumptions and considering future events that are inherently uncertain. As in all of our audits we also addressed the risk of management override of internal controls, including evaluating whether there was evidence of bias by the directors that represented a risk of material misstatement due to fraud.

Key audit matters

Key audit matters are those matters that, in the auditors' professional judgement, were of most significance in the audit of the financial statements of the current period and include the most significant assessed risks of material misstatement (whether or not due to fraud) identified by the auditors, including those which had the greatest effect on: the overall audit strategy; the allocation of resources in the audit; and directing the efforts of the engagement team. These matters, and any comments we make on the results of our procedures thereon, were addressed in the context of our audit of the financial statements as a whole, and in forming our opinion thereon, and we do not provide a separate opinion on these matters. This is not a complete list of all risks identified by our audit.

Key audit matter	*How our audit addressed the key audit matter*
Valuation of property, plant and equipment and customer relationship intangible assets related to the Linde AG merger *Refer to Note 2 -"Business Combinations, Note 12- Goodwill/ other intangible assets and Note 13- Tangible assets"* As discussed in Note 2 to the consolidated financial statements, the merger of Praxair, Inc. and Linde AG was completed on 31 October 2018. The fair value of property plant and equipment and customers relationships intangible assets acquired from the merger is \$20.4 billion and \$16.7billion respectively. The fair values for identifiable intangible assets and property, plant and equipment are provisional fair values. As permitted by IFRS, the Group will finalise its valuations within twelve months of the transaction. In determining the fair value of property, plant and equipment, management primarily used the replacement cost approach. Management applied significant judgement in determining the valuation of property, plant and equipment, which involved the use of significant estimates and assumptions related to replacement costs and the estimated useful lives of the assets acquired. In determining the fair value of customer relationship intangible assets acquired, management used the multi-period excess earnings method, a form of the income approach. Management applied significant judgement in determining the valuation of customer relationship intangible assets, which involved the use of significant estimates and assumptions related to estimated future cash flows to be generated from Linde AG's existing customer base, estimates of customer attrition, the discount rate and market rates of return on estimated values of contributory assets. We determined that this was a key audit matter due to the nature of the judgements and assumptions made by management as described above in determining the fair value of property, plant and equipment and customer relationship intangible assets.	We tested management's process and key controls for determining the fair value of property, plant and equipment and customer relationship intangible assets related to the Linde AG merger. The controls included the review and approval of valuation results, review and approval of purchase price accounting calculations against expected results, the review of adjustments to forecasts and approval of the customer attrition rate calculation. - For property, plant and equipment, with assistance of our internal valuation specialists, we: o Evaluated the methods used in the valuation of property, plant and equipment; o Evaluated the reasonableness of the replacement costs assumption by comparing the cost indices data used to external data. We also checked the mathematical accuracy of management's replacement cost calculation by comparing them to our independently calculated values; o Evaluated the estimated useful life of assets acquired by comparing the useful lives assigned to the different assets to external industry data; and o Re-calculated the estimated remaining useful lives by reference to the historical in-service dates per the company's property, plant and equipment listings. We evaluated the reasonableness of the estimated future cash flows attributed to existing customers by evaluating management's assumptions of future results including EBITDA estimates by comparing to historical results and industry data. - With the assistance of our internal valuation specialists we also: o Evaluated the reasonableness of the use of the multi-period excess earnings method to determine the value of customer relationships and tested the accuracy of the model; o Considered the appropriateness of the method selected by management to calculate attrition rates and compared the rate used to historical attrition rates that we tested based on historic sales data; o Evaluated the reasonableness of the discount rates by developing an independent expectation of the discount rates using external data and comparing the rates used by management to our independent expectation; and

Key audit matter	*How our audit addressed the key audit matter*
	o Evaluated other significant assumptions, including the estimated value of the contributory assets charges. We also considered whether all tangible and intangible assets which contribute to the generation of cash flows were identified as contributory assets, and assessed the reasonableness of the required returns on each of the contributory assets by reference to external data on the expected return of a market participant.

How we tailored the audit scope

We tailored the scope of our audit to ensure that we performed enough work to be able to give an opinion on the financial statements as a whole, taking into account the structure of the group, the accounting processes and controls, and the industry in which the group operates.

The group is structured along 6 segments, North America, South America, Asia, Europe, Surface Technologies and Linde AG. There are a number of reporting components within each segment, mainly structured on a country level.

Certain other activities are controlled and managed centrally from Corporate within the consolidated group such as acquisitions and disposals, intangible asset and goodwill accounting, impairment testing, financing and treasury, legal, stock based compensation and certain elements of income taxes.

In determining our audit scope we first focused on individual reporting components and determined the type of work that needed to be performed at the reporting components by us, as the Irish group engagement team, PwC US as the US component team, or other component auditors within the PwC network and other non-network firms. Where the work was performed by PwC US and other component auditors, we determined the level of involvement we needed to have in the audit work of those reporting components to be able to conclude whether sufficient appropriate audit evidence had been obtained as a basis for our opinion on the financial statements as a whole.

Taken together the four full scope audits of the group's largest reporting components, specified procedures performed at three components, and the audit work that was performed for group functions accounted for 80% of group net revenues and 87% of total assets. We allocated materiality levels and issued instructions to each component auditor. In addition to the audit report from each of the component auditors, we received detailed memoranda of examinations on work performed and relevant findings which supplemented our understanding of the component, its results and the audit findings. We also held discussions with component teams on the work performed and the detailed memoranda of examinations issued. This, together with additional procedures performed at the group level, gave us evidence we needed for our opinion on the financial statements as a whole.

Materiality

The scope of our audit was influenced by our application of materiality. We set certain quantitative thresholds for materiality. These, together with qualitative considerations, helped us to determine the scope of our audit and the nature, timing and extent of our audit procedures on the individual financial statement line items and disclosures and in evaluating the effect of misstatements, both individually and in aggregate on the financial statements as a whole.

Based on our professional judgement, we determined materiality for the financial statements as a whole as follows:

	Consolidated financial statements	*Entity financial statements*
Overall materiality	$119 million.	$443 million.
How we determined it	Circa 5% of profit before tax from continuing operations adjusted for non-recurring items relating to the gain on the divestiture of businesses, merger related inventory step up and initial transaction costs.	Circa 0.5% of net assets.
Rationale for benchmark applied	The engagement team believes the adjusted profit before tax is the most appropriate measure reflecting the underlying operations of the combined company.	The entity is a holding company whose main activity is the management of investments in subsidiaries.

For each component in the scope of our group audit, we allocated a materiality that is less than our overall group materiality.

We agreed with the Audit Committee that we would report to them misstatements identified during our audit above $10 million (consolidated audit) and $10 million (company audit) as well as misstatements below that amount that, in our view, warranted reporting for qualitative reasons.

Conclusions relating to going concern

We have nothing to report in respect of the following matters in relation to which ISAs (Ireland) 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 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.

However, because not all future events or conditions can be predicted, this statement is not a guarantee as to the group's or the company's ability to continue as a going concern.

Reporting on other information

The other information comprises all of the information in the Annual Report other than the financial statements and our auditors' report thereon. The directors are responsible for the other information. Our opinion on the financial statements does not cover the other information and, accordingly, we do not express an audit opinion or, except to the extent otherwise explicitly stated in this report, any form of assurance 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 an apparent material inconsistency or material misstatement, we are required to perform procedures to conclude whether there is a material misstatement of 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 this other information, we are required to report that fact. We have nothing to report based on these responsibilities.

With respect to the Directors' Report, we also considered whether the disclosures required by the Companies Act 2014 (excluding the information included in the "Non-Financial Statement" as defined by that Act on which we are not required to report) have been included.

Based on the responsibilities described above and our work undertaken in the course of the audit, ISAs (Ireland) and the Companies Act 2014 require us to also report certain opinions and matters as described below.

Directors' Report

- In our opinion, based on the work undertaken in the course of the audit, the information given in the Directors' Report (excluding the information included in the "Non-Financial Statement" on which we are not required to report) for the year ended 31 December 2018 is consistent with the financial statements and has been prepared in accordance with the applicable legal requirements.

- Based on our knowledge and understanding of the group and company and their environment obtained in the course of the audit, we have not identified any material misstatements in the Directors' Report(excluding the information included in the "Non-Financial Statement" on which we are not required to report).

Corporate governance statement

- In our opinion, based on the work undertaken in the course of the audit of the financial statements:
  - the description of the main features of the internal control and risk management systems in relation to the financial reporting process; and
  - the information required by Section 1373(2)(d) of the Companies Act 2014;

  included in the Corporate Governance Statement, is consistent with the financial statements and has been prepared in accordance with section 1373(2) of the Companies Act 2014.

- Based on our knowledge and understanding of the company and its environment obtained in the course of the audit of the financial statements, we have not identified material misstatements in the description of the main features of the internal control and risk management systems in relation to the financial reporting process and the information required by section 1373(2)(d) of the Companies Act 2014 included in the Corporate Governance Statement.

- In our opinion, based on the work undertaken during the course of the audit of the financial statements, the information required by section 1373(2)(a),(b),(e) and (f) of the Companies Act 2014 and regulation 6 of the European Union (Disclosure of Non-Financial and Diversity Information by certain large undertakings and groups) Regulations 2017 is contained in the Corporate Governance Statement.

Responsibilities for the financial statements and the audit

Responsibilities of the directors for the financial statements

As explained more fully in the Directors' Responsibility Statement set out on page 35, the directors are responsible for the preparation of the financial statements in accordance with the applicable framework and for being satisfied that they give a true and fair view.

The directors are also responsible for such internal control as they 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 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 company or to cease operations, or have no realistic alternative but to do so.

Auditors' 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 auditors' 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 (Ireland) 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 IAASA website at:

https://www.iaasa.ie/getmedia/b2389013-1cf6-458b-9b8f-a98202dc9c3a/Description_of_auditors_responsibilities_for_audit.pdf

This description forms part of our auditors' report.

Use of this report

This report, including the opinions, has been prepared for and only for the company's members as a body in accordance with section 391 of the Companies Act 2014 and for no other purpose. We do not, in giving these opinions, accept or assume responsibility for any other purpose or to any other person to whom this report is shown or into whose hands it may come save where expressly agreed by our prior consent in writing.

Other required reporting

Companies Act 2014 opinions on other matters

- We have obtained all the information and explanations which we consider necessary for the purposes of our audit.
- In our opinion the accounting records of the company were sufficient to permit the entity financial statements to be readily and properly audited.
- The statement of financial position of Linde plc is in agreement with the accounting records.

Companies Act 2014 exception reporting

Directors' remuneration and transactions

Under the Companies Act 2014 we are required to report to you if, in our opinion, the disclosures of directors' remuneration and transactions specified by sections 305 to 312 of that Act have not been made. We have no exceptions to report arising from this responsibility.

Appointment

We were appointed by the directors on 17 October 2018 to audit the financial statements for the year ended 31 December 2018 and subsequent financial periods. This is therefore our first year of uninterrupted engagement.

/s/ Alisa Hayden

Alisa Hayden

for and on behalf of PricewaterhouseCoopers
Chartered Accountants and Statutory Audit Firm
Dublin
30 April 2019

- The maintenance and integrity of the Linde plc website is the responsibility of the directors; the work carried out by the auditors does not involve consideration of these matters and, accordingly, the auditors accept no responsibility for any changes that may have occurred to the financial statements since they were initially presented on the website.
- Legislation in the Republic of Ireland governing the preparation and dissemination of financial statements may differ from legislation in other jurisdictions.

Consolidated Financial Statements

CONSOLIDATED STATEMENT OF PROFIT AND LOSS

For The Years Ended 31 December *(Millions of dollars)*	*Note*	**2018**	**2017**
Revenue	[7]	$ 15,037	$ 11,437
Cost of sales		10,690	7,450
GROSS PROFIT		**$ 4,347**	**$ 3,987**
Marketing and selling expenses		936	608
Research and development costs		139	100
Administration expenses		1,274	814
Impairment losses on receivables and contract assets	[24]	25	33
Net gain on divestiture of businesses	[3]	3,778	—
Other operating income	[8]	109	67
Other operating expenses	[8]	150	63
OPERATING PROFIT FROM CONTINUING OPERATIONS		**$ 5,710**	**$ 2,436**
Financial income	[9]	120	70
Financial expenses	[9]	368	265
Share of profit and loss from associates and joint ventures (at equity)	[14]	54	47
PROFIT BEFORE TAX FROM CONTINUING OPERATIONS		**$ 5,516**	**$ 2,288**
Income tax expense	[10]	811	954
PROFIT FOR THE YEAR FROM CONTINUING OPERATIONS		**$ 4,705**	**$ 1,334**
PROFIT FOR THE YEAR FROM DISCONTINUED OPERATIONS, NET OF TAX		**98**	**—**
PROFIT FOR THE YEAR		**$ 4,803**	**$ 1,334**
attributable to Linde plc shareholders		4,775	1,273
attributable to noncontrolling interests of continuing operations		20	61
attributable to noncontrolling interests of discontinued operations		8	—
PROFIT FOR THE YEAR - LINDE PLC SHAREHOLDERS			
Income from continuing operations		$ 4,685	$ 1,273
Income from discontinued operations		$ 90	$ 0
EARNINGS PER SHARE – CONTINUING OPERATIONS LINDE PLC SHAREHOLDERS	[11]		
Earnings per share in USD – undiluted		$ 14.18	$ 4.45
Earnings per share in USD – diluted		$ 14.02	$ 4.40
EARNINGS PER SHARE – DISCONTINUED OPERATIONS LINDE PLC SHAREHOLDERS	[11]		
Earnings per share in USD – undiluted		$ 0.27	$ 0.00
Earnings per share in USD – diluted		$ 0.27	$ 0.00

CONSOLIDATED STATEMENT OF COMPREHENSIVE INCOME

Year Ended 31 December *(Millions of dollars)*	**2018**	**2017**
PROFIT FOR THE YEAR	$ 4,803	$ 1,334
OTHER COMPREHENSIVE INCOME (LOSS)		
ITEMS THAT WILL BE RECLASSIFIED SUBSEQUENTLY TO PROFIT AND LOSS		
Currency translation adjustments		
Foreign currency translation adjustments	(420)	433
Reclassifications to net income	(166)	—
Income taxes	(5)	103
Currency translation adjustments	(591)	536
Derivative instruments		
Current year unrealized gain (loss)	—	—
Reclassifications to net income	(1)	—
Income taxes	—	—
Derivative instruments	(1)	—
Securities		
Current year unrealized gain (loss)	(1)	—
Reclassifications to net income	—	—
Income taxes	—	—
Securities	(1)	—
ITEMS THAT WILL NOT BE RECLASSIFIED SUBSEQUENTLY TO PROFIT AND LOSS		
Funded status - retirement obligation remeasurement	(91)	71
Income taxes	37	(131)
Funded status - retirement obligations	(54)	(60)
TOTAL OTHER COMPREHENSIVE INCOME (LOSS)	$ (647)	$ 476
COMPREHENSIVE INCOME (INCLUDING NONCONTROLLING INTERESTS)	$ 4,156	$ 1,810
Less: noncontrolling interests	(62)	(95)
COMPREHENSIVE INCOME - LINDE PLC	$ 4,094	$ 1,715

CONSOLIDATED STATEMENT OF FINANCIAL POSITION

(Millions of dollars)	*Note*	**31/12/2018**	**31/12/2017**	**1/1/2017**
Assets				
Goodwill	[12]	$ 26,738	$ 3,233	$ 3,117
Other intangible assets	[12]	17,281	785	811
Tangible assets	[13]	30,693	11,825	11,249
Investments in associates and joint ventures (at equity)	[14]	980	727	717
Other financial assets	[14]	87	—	—
Receivables from finance leases	[16]	52	5	6
Trade receivables	[16]	7	—	—
Miscellaneous other receivables and other assets	[16]	777	377	367
Deferred tax assets	[10]	517	199	185
NON-CURRENT ASSETS		**77,132**	**17,151**	**16,452**
Inventories	[15]	1,658	614	550
Receivables from finance leases	[16]	23	1	1
Trade receivables	[16]	4,104	1,675	1,518
Contract Assets	[7, 16]	267	—	—
Miscellaneous other receivables and other assets	[16]	1,024	320	248
Income tax receivables	[16]	172	58	39
Cash and cash equivalents	[24]	4,533	617	524
Non-current assets classified as held for sale	[3]	5,670	—	—
CURRENT ASSETS		**17,451**	**3,285**	**2,880**
TOTAL ASSETS		**$ 94,583**	**$ 20,436**	**$ 19,332**

(Millions of dollars)	*Note*	**31/12/2018**	**31/12/2017**	**1/1/2017**
EQUITY AND LIABILITIES				
Called-up share capital presented as equity	[17]	$ 1	$ 4	$ 4
Share premium	[17]	—	4,207	4,106
Retained earnings	[17]	52,448	8,607	8,296
Treasury shares	[17]	(629)	(7,196)	(7,336)
Other reserves	[17]	(125)	501	(1)
TOTAL EQUITY ATTRIBUTABLE TO LINDE PLC SHAREHOLDERS		**$ 51,695**	**$ 6,123**	**$ 5,069**
Noncontrolling interests	[17]	6,094	493	420
TOTAL EQUITY		**$ 57,789**	**$ 6,616**	**$ 5,489**
Long-term pensions and similar obligations	[18]	2,007	868	880
Other non-current provisions	[19]	535	136	123
Deferred tax liabilities	[10]	7,726	1,080	1,181
Financial liabilities	[20]	12,276	7,780	8,514
Liabilities from finance leases	[21]	59	3	3
Trade payables	[22]	1	—	—
Contract liabilities	[7, 22]	154	—	—
Income tax liabilities	[22]	266	388	—
Other non-current liabilities	[22]	433	229	225
NON-CURRENT LIABILITIES		**$ 23,457**	**$ 10,484**	**$ 10,926**
Current pensions and similar obligations	[18]	104	30	24
Current provisions	[19]	452	54	88
Financial liabilities	[20]	3,013	1,216	993
Liabilities from finance leases	[21]	19	1	5
Trade payables	[22]	4,095	922	857
Contract liabilities	[7, 22]	1,709	—	—
Other current liabilities	[22]	2,187	829	766
Income tax liabilities	[22]	895	284	184
Liabilities in connection with non-current assets classified as held for sale and disposal groups	[3]	863	—	—
CURRENT LIABILITIES		**$ 13,337**	**$ 3,336**	**$ 2,917**
TOTAL EQUITY AND LIABILITIES		**$ 94,583**	**$ 20,436**	**$ 19,332**

On behalf of the board

/s/ Prof. Dr. Wolfgang Reitzle
Prof. Dr. Wolfgang Reitzle
Chairman

/s/ Stephen F. Angel
Stephen F. Angel
Chief Executive Officer
and Director

/s/ Prof. Dr. Clemens Börsig
Prof. Dr. Clemens Börsig
Director

30 April 2019

STATEMENT OF CHANGES IN CONSOLIDATED EQUITY

(Millions of dollars)	Called-up share capital	Share premium	Retained earnings (including remeasurement of defined benefit plans)	Other reserves: Currency translation differences	Other reserves: Hedging instruments	Treasury shares	Total equity attributable to Linde plc shareholders	Non-controlling interests	Total equity
AS AT 01/01/2017	**$ 4**	**$ 4,106**	**$ 8,296**	**$ 0**	**$ (1)**	**$ (7,336)**	**$ 5,069**	**$ 420**	**$ 5,489**
Profit for the year	–	–	1,273	—	—	—	1,273	61	1,334
Other comprehensive income (net of tax)	–	–	(60)	502	—	—	442	34	476
TOTAL COMPREHENSIVE INCOME	**—**	**—**	**1,213**	**502**	**—**	**—**	**1,715**	**95**	**1,810**
Dividend payments	–	–	(901)	—	—	—	(901)	(35)	(936)
Changes as a result of share option schemes and stock purchase plans	–	101	—	—	—	141	242	—	242
TOTAL CONTRIBUTIONS BY AND DISTRIBUTIONS TO OWNERS OF THE COMPANY	**—**	**101**	**(901)**	**—**	**—**	**141**	**(659)**	**(35)**	**(694)**
Acquisition/disposal of a subsidiary with noncontrolling interests	—	—	—	—	—	—	—	15	15
CHANGES IN OWNERSHIP INTERESTS IN SUBSIDIARIES	—	—	(1)	—	—	—	(1)	—	(1)
OTHER CHANGES	—	—	—	—	—	(1)	(1)	(2)	(3)
AT 31/12/2017	**$ 4**	**$ 4,207**	**$ 8,607**	**$ 502**	**$ (1)**	**$ (7,196)**	**$ 6,123**	**$ 493**	**$ 6,616**
Profit for the year	–	–	4,775	—	—	—	4,775	28	4,803
Other comprehensive income (net of tax)	–	–	(55)	(625)	(1)	—	(681)	34	(647)
TOTAL COMPREHENSIVE INCOME	**—**	**—**	**4,720**	**(625)**	**(1)**	**—**	**4,094**	**62**	**4,156**
Dividend payments	–	–	(1,166)	—	—	—	(1,166)	(49)	(1,215)
Changes as a result of share option schemes and stock purchase plans	–	29	—	—	—	84	113	—	113
Other changes	—			—	—	(630)	(630)	—	(630)
TOTAL CONTRIBUTIONS BY AND DISTRIBUTIONS TO OWNERS OF THE COMPANY	**—**	**29**	**(1,166)**	**—**	**—**	**(546)**	**(1,683)**	**(49)**	**(1,732)**
CHANGES IN OWNERSHIP INTERESTS IN SUBSIDIARIES	–	(127)	—	—	—	—	(127)	(186)	(313)
IMPACT OF MERGER (Notes 2 and 17)	(3)	(4,109)	40,287	—	—	7,113	43,288	5,774	49,062
AS AT 31/12/2018	**$ 1**	**$ —**	**$ 52,448**	**$ (123)**	**$ (2)**	**$ (629)**	**$ 51,695**	**$ 6,094**	**$ 57,789**

CONSOLIDATED STATEMENT OF CASH FLOWS

For The Years Ended 31 December *(Millions of dollars)*	*Note*	2018	2017
Profit for the year attributable to Linde plc shareholders		$ 4,775	$ 1,273
Less: Profit for the year from discontinued operations		(90)	—
Add: Profit for the year from continuing operations attributable to noncontrolling interests		20	61
Profit for the year from continuing operations		4,705	1,334
Adjustments to profit after tax to calculate cash flow from operating activities – continuing operations			
Restructuring and merger costs, and other		40	26
Amortization of intangible assets/depreciation of tangible assets	[12,13]	1,863	1,184
Impairments of financial assets		25	33
Amortization of merger-related inventory step-up		369	—
Deferred income taxes, excluding Tax Act		(228)	123
Tax Act income tax charge, net		(61)	300
Gain on divestiture of business		(3,407)	—
Share of profit and loss from associates and joint ventures (at equity)	[14]	(54)	(47)
Distributions/dividends received from associates and joint ventures	[14]	58	111
Share based compensation		62	59
Non-cash charges and other		122	(54)
Changes in assets and liabilities			
Change in trade receivables	[16]	(119)	(92)
Change in inventories	[15]	(3)	(22)
Change in prepaid and other current assets	[16]	43	(66)
Change in payables, provisions and accruals	[19, 22]	284	22
Pension Contributions		(87)	(19)
Long-term assets, liabilities and other		71	149
CASH FLOW FROM OPERATING ACTIVITIES		**$ 3,683**	**$ 3,041**
Capital expenditures		$ (1,886)	$ (1,311)
Acquisitions / Payments for investments in consolidated companies		(25)	(33)
Cash acquired in Merger transaction	[2]	1,431	—
Payments for investments in financial assets		(13)	—
Proceeds on disposal of securities		1	—
Proceeds on disposal of tangible and intangible assets, and receivables from finance leases in accordance with IFRIC 4/IAS 17		5,897	30
Proceeds on disposal of financial assets		30	—
CASH FLOW (FOR)/FROM INVESTING ACTIVITIES		**$ 5,435**	**$ (1,314)**

(Millions of dollars)	*Note*	2018	2017
Dividend payments to Linde plc shareholders		$ (1,166)	$ (901)
Cash inflows/outflows due to changes of noncontrolling interests		(425)	(92)
Issuance of common stock		77	120
Purchases of common stock		(599)	(12)
Short-term debt borrowings (repayments) - net		199	(199)
Long-term debt borrowings		10	11
Long-term debt repayments		(3,124)	(583)
Cash outflows for the repayment of liabilities from finance leases		(3)	—
CASH FLOW FOR FINANCING ACTIVITIES		**$ (5,031)**	**$ (1,656)**
Discontinued Operations			
Cash provided by operating activities		**52**	—
Cash used for investing activities		**(24)**	—
Cash provided by financing activities		—	—
CASH FLOW FROM DISCONTINUED OPERATIONS		**28**	—
CHANGE IN CASH AND CASH EQUIVALENTS	[25]	**4,115**	**71**
OPENING BALANCE OF CASH AND CASH EQUIVALENTS	[24]	**$ 617**	**$ 524**
Effects of currency translation		(61)	22
Cash and cash equivalents reported as non-current assets classified as held for sale and disposal groups	[3]	(138)	—
CLOSING BALANCE OF CASH AND CASH EQUIVALENTS	[24]	**$ 4,533**	**$ 617**

OTHER CASH FLOW FROM OPERATING ACTIVITIES			
Income taxes paid		**$ 770**	**$ 565**
Interest paid, net of capitalized interest		**$ 216**	**$ 184**

NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS

[1] Business Overview and Basis of Preparation

Linde plc ("Linde" or the "company") was formed for the purpose of effecting the business combination comprising the merger of an indirect subsidiary of Linde plc with and into Praxair, Inc ("Praxair"), together with its subsidiaries, as a result Praxair, Inc. became a wholly-owned indirect subsidiary of Linde plc ("Merger"). Following the Merger, Linde plc acquired all outstanding shares of Linde Aktiengesellschaft ("Linde AG"), which became a wholly-owned indirect subsidiary of Linde plc. Linde plc trades on the New York Stock Exchange ("NYSE") and on the Frankfurt Stock Exchange under the symbol LIN.

Praxair was determined to be the accounting acquirer in the business combination. The conclusion that Praxair was the accounting acquirer under IFRS was based primarily on the following factors: (i) the background of the Business Combination, (ii) the Business Combination Agreement, (iii) the anticipated share ownership and voting rights of the shareholders of each of the combining companies, (iv) the intended corporate governance structure of Linde plc, (v) the designation of certain senior management positions, (vi) the relative market values, size, and profitability of the combining companies, and (vii) the premium provided to Linde AG Shareholders. Although no single factor was the sole determinant, the primary factors that resulted in Praxair being designated as the accounting acquirer were the intended governance structure, especially the composition of senior management positions including Praxair's Chief Executive Officer and Chief Financial Officer; the premium provided to Linde AG Shareholders embedded in the 1.54 exchange ratio; and the background of the Business Combination which indicates that Praxair was the initiator of the Business Combination.

As Praxair has historically prepared financial statement in accordance with generally accepted accounting principles in the United States ("U.S." or "USA") ("U.S. GAAP"), Linde plc, as successor to Praxair, has applied International Financial Reporting Standard 1, *First-time Adoption of International Financial Reporting Standards* ("IFRS 1") to transition from those U.S. GAAP financial statements to IFRS. See further discussion related to the adoption at Note 29. The historical financial statements of Praxair for the periods prior to the business combination are considered to be the historical financial statements of the company. The results of Linde AG are included in Linde's consolidated results from the date of the completion of the business combination forward. Also, during 2018 the company reported its continuing operations in six reporting segments under which it managed its operations, assessed performance, and reported earnings: North America, South America, Asia, Europe, Surface Technologies and Linde AG. Linde AG became the sixth reportable segment effective with the merger on 31 October 2018.

Linde is the largest industrial gas company worldwide. It continues to be a major technological innovator in the industrial gases industry. Its primary products in its industrial gases business are atmospheric gases (oxygen, nitrogen, argon, and rare gases) and process gases (carbon dioxide, helium, hydrogen, electronic gases, specialty gases, and acetylene). Linde serves a diverse group of industries including healthcare, petroleum refining, manufacturing, food, beverage carbonation, fiber-optics, steel making, aerospace, chemicals and water treatment. The company also designs, engineers, and builds equipment that produces industrial gases primarily for internal use and offers its customers a wide range of gas production and processing services such as olefin plants, natural gas plants, air separation plants, hydrogen and synthesis gas plants and other types of plants. The surface technologies segment supplies wear-resistant and high-temperature corrosion-resistant metallic and ceramic coatings and powders.

The parent company is Linde plc, an incorporated public limited company formed under the laws of Ireland. Linde plc's registered office (Registration number 602527) is located at Ten Earlsfort Terrace, Dublin 2, D02 T380 Ireland. Linde plc's principal executive offices are located at The Priestley Centre, 10 Priestley Road, Surrey Research Park, Guildford, Surrey GU2 7XY, United Kingdom.

The consolidated financial statements of Linde for the year ended 31 December 2018 have been prepared in accordance with International Financial Reporting Standards ("IFRS") issued by the International Accounting Standards Board ("IASB") as adopted by the European Union pursuant to EU Regulation No. 1606/2002 of the European Parliament and the Council on the application of International Accounting Standards in the European Union. The consolidated financial statements have also been prepared in accordance with the provisions of the Irish Companies Act ("Companies Act 2014"), as applicable to companies reporting under IFRS.

The consolidated financial statements of Linde have been prepared on a historical cost basis, except for the following: 1) certain financial assets and liabilities - measured at fair value 2) certain assets and disposal groups held for sale acquired in a business combination-measured at fair value less costs to sell and 3) defined benefit pension plans - plans assets measured at fair value.

The reporting currency is the US dollar ("USD"). All amounts are shown in millions of US dollars ($ million), unless stated otherwise. Expenses are presented by function in the consolidated income statement.

The annual financial statements of companies included in the consolidation are prepared at the same reporting date as the annual financial statements of Linde plc.

The consolidated financial statements of Linde plc and subsidiaries were authorized for issue by the Board of Directors on 30 April 2019. The Board of Directors has the power to amend and reissue financial statements.

[2] Business Combinations

Merger of Praxair, Inc. and Linde AG

In connection with the business combination, the company, Praxair and Linde AG entered into various agreements with regulatory authorities to satisfy anti-trust requirements to secure approval to consummate the business combination. These agreements included the sale of the majority of Praxair's European businesses (subsequently completed on 3 December 2018), the majority of Linde AG's America's business (subsequently completed on 1 March 2019), as well as certain divestitures of other Praxair and Linde AG businesses in Asia that are expected to be sold in 2019 (collectively, the "merger-related divestitures"). See Note 3 for additional information relating to merger-related divestitures.

To obtain merger approval in the United States ("U.S.") Linde, Praxair and Linde AG entered into an agreement with the U.S. Federal Trade Commission dated 1 October 2018 ("hold separate order" or "HSO"). Under the HSO, the company, Praxair and Linde AG agreed to (i) continue to operate Linde AG and Praxair as independent, ongoing, economically viable, competitive businesses held separate, distinct, and apart from each other's operations; (ii) not coordinate any aspect of the operations of Linde AG and Praxair, including the marketing or sale of any products; and (iii) maintain separate financial ledgers, books, and records that report on a periodic basis, consistent with past practices, the assets, liabilities, expenses, revenues, and income of each, until certain divestitures in the United States have been completed. The restrictions under the hold separate order were lifted 1 March 2019, concurrent with the sale of the required merger-related divestitures in the United States.

In connection with the Business Combination, each share of common stock of Praxair, Inc. par value $0.01, (excluding any shares held in treasury immediately prior to the effective time of the merger, which were automatically canceled and retired for no consideration) was converted into the one share of common stock, par value €0.001 per share, of Linde plc Common Stock. Additionally, each tendered share of common stock of Linde AG was converted into 1.54 shares of Linde plc Common Stock.

As provided in the business combination agreement, at the effective time of the business combination outstanding Praxair stock options and other equity awards were generally converted into stock options and equity awards on a 1:1 basis with respect to Linde shares. Outstanding Linde AG share-based compensation awards were either settled in cash (for the portion vested), or are required to be converted into similar stock options and equity awards with respect to Linde shares (for the portion unvested), after giving effect to the 1.54 exchange ratio. This grant is expected to occur in the first half of 2019. See Notes 17 and 23 for additional information.

Preliminary Allocation of Purchase Price

In accordance with the IASB's IFRS 3, *Business Combinations*, Praxair was determined to be the accounting acquirer. As such, the company has applied the acquisition method of accounting with respect to the identifiable assets and liabilities of Linde AG, which have been measured at fair value as of the date of the Business Combination.

In accordance with the Business Combination Agreement, Linde AG shareholders that accepted the Exchange Offer received Linde plc Common Shares in exchange for Linde AG Shares at an exchange ratio of 1.54 Linde plc shares for each Linde AG share. Because Praxair is the accounting acquirer, the fair value of the equity issued by Linde plc to Linde AG shareholders in the exchange transaction was determined by reference to the market price of Praxair shares. Accordingly, the purchase consideration below reflects the estimated fair value of the 92% of Linde AG shares tendered and Linde plc shares issued in exchange for those Linde AG shares, which is based on the final closing price of Praxair shares prior to the effective time of the merger on 31 October 2018 of $164.50 per share.

The purchase price and estimated fair value of Linde AG's net assets acquired as if the merger date on 31 October 2018 is presented as follows:

(in thousands, except value per share data, Linde AG exchange ratio, and Purchase Price)	
Linde AG common stock tendered as of 31 October 2018 (i)	170,875 Shares
Business combination agreement exchange ratio (ii)	1.54 : 1
Linde plc ordinary shares issued in exchange for Linde AG	263,148
Per share price of Praxair, Inc. common stock (iii)	$164.50
Purchase price (millions of dollars)	$43,288

(i) Number of Linde AG shares tendered in the Exchange Offer.

(ii) Exchange ratio for Linde AG shares as set forth in the Business Combination Agreement.

(iii) Closing price of Praxair shares on the New York Stock Exchange prior to the effective time of the Business Combination on 31 October 2018.

In accordance with IFRS 3, Linde AG's assets and liabilities were measured at estimated fair values at 31 October 2018, primarily using Level 3 inputs, except debt which was Level 1. Fair value is defined as the price that would be received to sell an asset, or paid to transfer a liability, in an orderly transaction between market participants at the measurement date. Fair value was estimated using management's best estimate of assumptions about future events and uncertainties, including significant judgments related to future cash flows (sales, costs, customer attrition rates, and contributory asset charges), discount rates, competitive trends, market data input factors, and others. Inputs used were generally obtained from historical data supplemented by current and anticipated market conditions and growth rates.

The following table summarizes the preliminary allocation of purchase price to the identifiable assets acquired and liabilities assumed by Linde, with the excess of the purchase price over the fair value of Linde AG's net assets recorded as goodwill. At 31 December 2018, the valuation process to determine the fair values is not complete. The company estimated the preliminary fair value of net assets acquired based on information currently available and will continue to adjust those estimates as additional information becomes available, analysis is able to be performed, upon refinement of market participant assumptions and finalization of tax returns in the pre-merger period. The determination of preliminary fair values are substantially complete with the exception of identifiable intangible assets, property, plant and equipment, income taxes and goodwill. Due to the timing of the close of the merger to 31 December 2018, the HSO which has deferred integration, and the magnitude of the net assets acquired, further adjustments are expected into 2019. As the company finalizes the fair value of net assets acquired, additional purchase price allocation adjustments may be recorded during the measurement period, but no later than one year from the date of the acquisition. The company will reflect measurement period adjustments, if any, in the period in which the adjustments are determined.

Therefore, final determination of the fair values may result in further adjustments to the values presented in the following table:

Millions of dollars	Estimated fair value of assets and liabilities
Goodwill	$ 24,025
Intangible assets	16,689
Tangible assets	20,375
Investments in associated and joint ventures (at equity)	493
Other long-term assets	1,014
Non-current assets	**$ 62,596**
Inventories	1,460
Trade receivables	2,711
Other assets	1,347
Cash	1,431
Assets classified as held for sale	5,348
Current assets	**$ 12,297**
Total assets	**$ 74,893**
Equity acquired equals purchase price paid (i)	**$ 43,288**
Noncontrolling Interest	5,774
Total equity	**49,062**
Provisions for pensions and similar obligations	1,165
Deferred tax liabilities	7,000
Financial liabilities	6,295
Other Long-term Liabilities	834
Non-current liabilities	**$ 15,294**
Trade payables	3,007
Current liabilities classified as held for sale	771
Other current liabilities	6,759
Current liabilities	**$ 10,537**
Total equity and liabilities	**$ 74,893**

(i) See above for the calculation of the purchase price.

Summary of Significant Fair Value Methods

The methods used to determine the fair value of significant identifiable assets and liabilities included in the preliminary allocation of purchase price are discussed below.

Inventories

Acquired inventory is comprised of finished goods, work in process and raw materials. The fair value of finished goods was calculated as the estimated selling price, adjusted for costs of the selling effort and a reasonable profit allowance relating to the selling effort. The fair value of work in process inventory was primarily calculated as the estimated selling price, adjusted for estimated costs to complete the manufacturing, estimated costs of the selling effort, as well as a reasonable profit margin on the remaining manufacturing and selling effort. The fair value of raw materials and supplies was determined based on replacement cost which approximates historical carrying value. The preliminary fair value step-up of inventories is being recognized in "Cost of sales" as the inventory is sold.

Assets classified as held for sale and Liabilities classified as held for sale

As a condition of the European Commission ("EC"), the U.S. Department of Justice ("DOJ"), and other governmental regulatory authorities approval of the merger, Linde plc, Praxair and Linde AG were required to divest various businesses in Europe, the Americas and Asia. The fair value of these businesses has been determined based on the estimated net selling prices or sales agreements. Actual amounts may differ from this preliminary determination. See Note 3 for further information on merger-related divestitures.

Property, Plant and Equipment

The fair value of property, plant and equipment was primarily calculated using replacement costs adjusted for the age and condition of the asset.

Identifiable Intangible Assets

The fair value estimate for all identifiable intangible assets is based on assumptions that market participants would use in pricing an asset, based on the most advantageous market for the asset (i.e., its highest and best use). The final fair value determination for identifiable intangibles or estimates of remaining useful lives may differ materially from this preliminary determination.

The fair value of the customer relationships intangible asset was valued using a multi-period excess earnings method, a form of the income approach, which incorporates the estimated future cash flows to be generated from Linde AG's existing customer base. Excess earnings are the earnings remaining after deducting the market rates of return on the estimated values of contributory assets, including debt-free net working capital, tangible assets, and other identifiable intangible assets. The excess earnings are thereby calculated for each year of multi-year projection periods and discounted to present value.

Brands/Tradenames includes the "Linde" brand which is considered to have an indefinite life. The brand has been long established and will continue to be used as the name for the merged company. The Linde brand has been used and in existence for many years, demonstrating proven value over that period. The brand name continues to have a strong market presence and there are no material legal, contractual, or other factors that limit its useful life. Based on an analysis of these relevant factors there is no foreseeable limit to the period over which the asset is expected to generate cash inflows. Other intangibles primarily includes acquired technology. These intangible assets were valued using the relief from royalty method under the income approach; this method estimates the cost savings generated by a company related to the ownership of an asset for which it would otherwise have had to pay royalties or license fees on revenues earned through the use of the asset and discounted to present value.

Pension and Other Postretirement Liabilities

Linde recognized a pretax net liability representing the unfunded portion of Linde AG's defined-benefit pension and other postretirement benefit ("OPEB") plans. Refer to Note 18 for further information on pensions and OPEB arrangements.

Long-Term Debt

The fair value for long-term debt was primarily obtained from third party quotes, as the majority of the Linde AG bond portfolio is publicly traded.

Deferred Income Tax Assets and Liabilities

The deferred income tax assets and liabilities include the expected future U.S. federal, U. S. state and non-U.S. ("foreign") tax consequences associated with temporary differences between the preliminary fair values of the assets acquired and liabilities assumed and the respective tax bases. Tax rates utilized in calculating deferred income taxes generally represent the enacted or substantially enacted statutory tax rates at the effective date of the merger in the jurisdictions in which legal title of the underlying asset or liability resides. The final fair value of deferred income tax assets and liabilities may differ from this preliminary determination.

Refer to Note 10 for further information related to income taxes.

Equity Investments

The fair value of equity investments was determined using a discounted cash flow approach. The final fair value of equity investments may differ from this preliminary determination.

Other Assets Acquired and Liabilities Assumed (excluding Goodwill)

Linde utilized the carrying values, net of allowances, to value accounts and notes receivable and accounts payable as well as other current assets and liabilities as it was determined that carrying values represented the fair value of those items at the merger date.

Receivables were acquired mainly in the form of trade receivables. The gross contractual amount of these trade receivables was $3,147 million, fair value was determined to be $2,711 million. The difference of $436 million between fair value of the trade receivables and the contractual amount equals the contractual cash flows expected not to be collected.

No contingent liabilities have been identified so far.

Goodwill

The excess of the consideration for the merger over the preliminary fair value of net assets acquired was recorded as goodwill. The merger resulted in the recognition of $24,025 million of goodwill, which is not deductible for tax purposes. The goodwill balance is primarily attributed to the assembled workforce, expanded market opportunities and cost and other operating synergies anticipated upon the integration of the operations of Praxair and Linde AG.

Noncontrolling Interests

Noncontrolling interests include the fair value of noncontrolling interests of Linde AG, including approximately $3.2 billion relating to the 8% of Linde AG shares which were not tendered in the Exchange Offer and are intended to be the subject of a cash-merger squeeze-out. The company's wholly-owned indirect subsidiary, Linde Intermediate Holding AG ("Linde Holding"), which directly owns the 92% of Linde AG shares acquired in the Exchange Offer, determined the adequate cash compensation to be paid to the 8% remaining Linde AG minority shareholders in exchange for the transfer of their Linde AG shares for each Linde AG share. The cash-merger squeeze-out was approved by the shareholders of Linde AG at an extraordinary shareholders meeting of Linde AG on 12 December 2018, and was effectuated at 8 April 2019. The remaining noncontrolling interests relate to the fair value of historic noncontrolling interests of Linde AG and its subsidiaries. Fair value of the remaining noncontrolling interest was determined using a discounted cash flow approach that accounts for entity-specific risk situations as well as discounts for lack of marketability. The final fair value determination for noncontrolling interests may differ from this preliminary determination. The company recognizes noncontrolling interests in an acquired entity either at fair value or at the noncontrolling interest's proportionate share of the acquired entity's net identifiable assets. This decision is made on an acquisition-by-acquisition basis. For this business combination the company has elected to recognize non controlling interest at fair value. See Note 6 for the company's accounting policies for business combinations.

Results of Linde AG Operations Since Merger

The results of operations of Linde AG have been included in the company's consolidated statements of income since the merger. The following table provides Linde AG "Sales from continuing operations" and "Profit for the year from continuing operations" included in the company's results since the merger.

Linde AG Results of Operations Since Merger (*Millions of dollars*)	**1 November - 31 December 2018**
Revenues from continuing operations	$ 3,019
Profit (loss) from continuing operations*	$ (432)

* Includes charges related to the impacts of acquisition ("purchase") accounting.

Proforma Information

Below are the full year consolidated proforma results of Linde plc presented as though the acquisition date for the business combination was at 1 January 2018.

Linde plc Proforma Results of Operations (*Millions of dollars*)	**1 January - 31 December 2018**
Revenues from continuing operations	$ 30,026
Profit (loss) from continuing operations	$ 4,497

These amounts have been calculated using the subsidiary's results and adjusting them for $2,183 million of additional depreciation and amortization that would have been charged assuming the fair value adjustments to property, plant and equipment and intangible assets had applied from 1 January 2018, together with the consequential tax effects.

Significant nonrecurring amounts reflected in the proforma results are as follows:

A $3.8 billion gain ($3.4 billion after tax) was recorded in the fourth quarter 2018 as a result of the divestiture of Praxair's European industrial gases business and is included in the 31 December 2018 proforma profit from continuing operations.

For the year ended 31 December 2018, Praxair, Inc. and Linde AG collectively incurred pre-tax costs of $579 million, recorded in administration expenses, to prepare for and close the merger. These merger costs were reflected within the results of operations in the proforma results as incurred.

The company also incurred pre-tax charges of $368 million ($279 million after tax) and $10 million ($8 million after tax) in 2018 related to the fair value step-up of inventories acquired and sold as well as a pension settlement due to the payout to certain participants as a result of change in control provisions within a U.S. nonqualified pension plan, respectively. The 2018 proforma results include these charges. See Note 18 for further information relating to the U.S. nonqualified pension plan settlements.

Acquisition-related Costs

Acquisition-related costs of $236 million for 2018 (2017:$52 million) are included in administration expense in the consolidated statement of profit and loss in the operating cash flows in the statement of cash flow.

2018 Non-Merger Related Acquisitions

Non-merger related acquisitions of $25 million during the year ended 31 December 2018 are not material individually or in the aggregate.

2017 Acquisitions

During the year ended 31 December 2017, Linde had acquisitions totaling $33 million, primarily acquisitions of packaged gas businesses and a carbon dioxide joint venture in North America. These transactions resulted in goodwill and other intangible assets of $24 million and $3 million, respectively (see Note 12).

[3] Merger-Related Divestitures, Discontinued Operations And Assets Held For Sale

As a condition of the European Commission ("EC"), the U.S. Department of Justice ("DOJ"), and other governmental regulatory authorities approval of the merger, Linde plc, Praxair and Linde AG were required to divest the following businesses:

Praxair Merger-Related Divestitures - Primarily European Industrial Gases Business

As a condition of the EC regulatory approval of the merger transaction, Praxair agreed to sell the majority of its industrial gases business in Europe. The sale was completed by 3 December 2018 in two transactions, as described below:

- The Società Italiana Acetilene e Derivati S.p.A. ("SIAD") Sale and Purchase Agreement ("SPA") dated 5 December 2017 whereby Praxair agreed, *inter alia*, to sell its 34% non-controlling participation in its Italian joint venture SIAD to its joint venture partner Flow Fin in exchange for Flow Fin's 40% non-controlling participation in Praxair's consolidated subsidiary, Rivoira S.p.A., and payment of a net purchase price of €90 million ($102 million as of 31 October 2018) by Praxair to Flow Fin. This transaction was completed on 31 October 2018 and;

- The Praxair Europe Sale and Purchase Agreement dated 5 July 2018 pursuant to which Praxair sold the majority of its European businesses to Taiyo Nippon Sanso Corporation for €5 billion in cash consideration ($5.7 billion at 3 December 2018), reduced by normal closing adjustments of €86 million ($96 million). These transactions were completed on 3 December 2018.

In connection with these transactions, the company recognized a net pre-tax gain of $3.8 billion ($3.4 billion after tax) in the consolidated statements of profit and loss as part of the net gain on divestiture of businesses.

The net carrying value of Praxair's European business assets and liabilities divested on 3 December 2018 is presented below:

(Millions of dollars)	Carrying Value
Tangible assets	$ 1,342
Investments in associates and joint ventures (at equity)	234
Goodwill	620
Other intangible assets	115
Other receivables and other assets	36
Total Non-Current Assets	2,347
Cash and cash equivalents	$ 38
Trade receivables	311
Inventories	67
Other receivables and other assets	22
Total Current Assets	$ 438
Total Assets Divested	$ 2,785
Financial liabilities	2
Other non-current liabilities	92
Deferred tax liabilities	174
Total Non-Current Liabilities	$ 268
Trade payables	215
Income tax liabilities	27
Other current liabilities	111
Total Current Liabilities	$ 353
Total Liabilities Divested	$ 621
Noncontrolling interests	$ 200
Pension/OPEB funded status obligation, net of taxes	(8)
Cumulative translation adjustment, net of taxes	165
Net Assets Divested	$ 1,807

The divestiture of the interests in the businesses in Europe sold to Taiyo Nippon Sanso Corporation (including the transaction with SIAD) do not represent a disposal of a separate major line of business or geographical area of operations. The net gain on the divestment has been recorded in profit and loss from continuing operations. This reflects the position that post the merger and divestiture the company continues to operate in Europe as part of the EMEA business (see Note 26).

Discontinued operations and assets held for sale

Additionally, to satisfy regulatory requirements to consummate the Business Combination, Praxair agreed to the following transactions which will be completed during 2019:

- Praxair's Chilean business which will be sold as part of the Americas' SPA (as defined below) for $21 million proceeds which is further described below.
- Various transactions within China, India and South Korea.
- 2018 sales related to these businesses were approximately $160 million.

Effective 22 October 2018, the date of final regulatory approvals, these businesses have been accounted for as Non-current assets held for sale on the consolidated statement of financial position. These businesses were evaluated for discontinued operations accounting treatment under IFRS and it was determined that they did not meet the definition of a discontinued operation as these transactions did not represent a disposal of a separate major line of business or geographical area of operations, after considering the impact of the merger.

Linde AG Merger-Related Divestitures - Primarily Americas Industrial Gases Business

As a condition of the U.S. regulatory approval of the merger, Linde AG agreed to sell the majority of its industrial gases business in the Americas, as described below:

- The Linde AG Americas Sales and Purchase Agreement, dated 16 July 2018, as and further amended on 22 September 2018, 19 October 2018, and 20 February 2019 whereby Linde AG and Praxair, Inc. entered into an agreement with a consortium comprising companies of the German industrial gases manufacturer Messer Group and CVC Capital Partners Fund VII to sell the majority of Linde AG's industrial gases business in North America and certain industrial gases business activities of Linde AG's in South America for $2.97 billion in cash consideration after purchase price adjustments for certain items relating to assets and liabilities of the sold businesses. In addition, divestitures include $531 million of proceeds for incremental plant sales within the Americas under other agreements. These transactions were completed on 1 March 2019.

- Various transactions within China, India and South Korea.

Only the sales of the Linde AG merger-related divested subsidiaries meet the criteria for discontinued operations, under IFRS as they were acquired with a view to being sold, and so related earnings are included within profit for the year from discontinued operations, net of tax for periods subsequent to the merger, as summarized below:

(Millions of dollars)	1 November - 31 December 2018
Net sales	$ 340
Cost of sales	141
Other operating costs	92
Operating profit	107
Income tax expense	9
Profit for the year from discontinued operations	$ 98

For the year ended 31 December 2018 there were no material amounts of depreciation, amortization, capital expenditures, or significant operating or investing non-cash items related to discontinued operations.

Assets held for sales includes both the Linde AG merger-related divestitures that meet the criteria for discontinued operations and the Praxair merger-related divestitures that do not. As of 31 December 2018 the following assets and liabilities are reported as components of the net assets held for sale in the consolidated statement of financial position:

(Millions of dollars)	Carrying / Fair Market Value
Assets	
Trade receivables	$ 315
Inventories	213
Other current receivables and other assets	280
Tangible assets	2,123
Other receivables and other assets	114
Fair value adjustment of assets relating to subsidiaries acquired for sale as part of business combination (Note 2)	2,625
Total Non-current assets classified as held for sale	$ 5,670
Liabilities	
Current liabilities	$ 506
Other non-current liabilities	357
Total liabilities in connection with non-current assets classified as held for sale	863
Net Assets Classified as Held for Sale	**$ 4,807**

[4] Scope of consolidation

The following table provides the structure of companies included in the consolidated financial statements:

	As at 31/12/2017	Additions	Disposals	As at 31/12/2018
Consolidated subsidiaries	**207**	**561**	**51**	**717**
Companies accounted for as a joint operation	**0**	**7**	**0**	**7**
Companies accounted for using the equity method	**93**	**33**	**71**	**55**

Changes in the scope of the consolidation may arise as a result of acquisitions, sales, mergers or closures or as a result of changes in the assessment as to whether Linde plc exercises control or joint control.

[5] Foreign Currency Translation

The consolidated financial statements are presented in USD currency units , which is the company's functional and presentation currency.

Items included in the financial statements of each of the company's entities are measured using the currency of the primary economic environment in which the entity operates ("the functional currency"). Transactions in foreign currency are translated into the relevant functional currency of the individual entity on the transaction date. After initial recognition, foreign currency fluctuations relating to monetary items are recognized in profit and loss. Foreign exchange gains and losses that relate to borrowings are presented in the statement of profit and loss, within finance costs. All other foreign exchange gains and losses are presented in the consolidated statement of profit and loss on a net basis within other operating income/expense. For non-monetary items, historical translation rates form the measurement basis.

Translation differences arising from the translation of items into the reporting currency are recognized in other comprehensive income. The financial statements of foreign subsidiaries, including any fair value adjustments identified during a purchase price allocation, that have a functional currency different from the presentation currency are translated into the presentation currency in accordance with IAS 21, *The Effects of Changes in Foreign Exchange Rates*.

Assets and liabilities, contingent liabilities, and other financial commitments are translated at the mid-rate on the reporting date (closing rate method). Items in the consolidated statement of profit and loss for the year are translated at a rate which approximates to the translation rate on the date of the transaction (the average rate).

Foreign exchange gains and losses are deferred in equity if they relate to qualifying cash flow hedges and qualifying net investment hedges or are attributable to part of the net investment in a foreign operation. During the years ended 31 December 2018 and 2017, the company recognized $105 million and $242 million, respectively, of gains in net investment hedges in the statement of comprehensive income within currency translation adjustments.

The financial statements of foreign companies accounted for using the equity method are translated using the same principles for the adjustment of equity as are applied to consolidated subsidiaries.

In general, the financial statements of subsidiaries which report in a functional currency which is the currency of a hyperinflationary economy are adjusted for the change in purchasing power arising from the inflation in accordance with IAS 29, *Financial Reporting in Hyperinflationary Economies*.

Principal exchange rates of Linde plc:

	Statement of Profit and Loss		Statement of Financial Position		
	Average Year Ended 31 December		31 December		1 January
Currency	2018	2017	2018	2017	2017
Euro	0.85	0.89	0.87	0.83	0.95
Brazilian real	3.63	3.19	3.87	3.31	3.26
Chinese yuan	6.60	6.76	6.88	6.51	6.95
Canadian dollar	1.30	1.30	1.36	1.26	1.34
Mexican peso	19.20	18.86	19.65	19.66	20.73
Korean won	1,100	1,131	1,111	1,067	1,206
British pound	0.75	0.78	0.78	0.74	0.81
Indian rupee	68	65	70	64	68
Australia dollars	1.34	NM*	1.42	NM*	NM*
Taiwan dollars	30.13	30.43	30.55	29.73	32.33
Norwegian krone	8.13	8.26	8.64	8.20	8.64
Argentina peso (refer to above)	26.19	16.51	37.70	18.65	15.89

NM* - Not meaningful as this rate is used solely by the historic Linde AG business which was not included in the results during these periods as the acquisition was consummated on 31 October 2018.

[6] Accounting Policies

This note provides a list of the significant accounting policies adopted in the preparation of these consolidated financial statements to the extent they have not already been disclosed in the other notes. These policies have been consistently applied to all the years presented, unless otherwise stated.

The financial statements of companies included in the consolidated financial statements of Linde have been prepared using uniform accounting policies in accordance with IFRS 10, *Consolidated Financial Statements* ("IFRS 10").

The preparation of the consolidated financial statements in accordance with IFRS requires management judgments and estimates for some items, which might have an impact on their recognition and measurement in the consolidated statement of financial position and consolidated statement of profit and loss. The actual amounts realized may differ from these estimates.

The primary accounting and valuation policies, as well as the estimates and management judgments associated with them, are explained below:

Principles of consolidation

Consolidation

The consolidated financial statements comprise Linde and all the companies over which Linde is able to exercise control as defined by IFRS 10.

Control is achieved when Linde has power over the investee, is exposed, or has rights, to variable returns from its involvement with the investee and has the ability to affect those returns through its power over the investee. If Linde plc holds a majority of the voting rights in a company, this typically indicates that it exercises control over the company in the absence of any other restrictive contractual agreements. Subsidiaries are fully consolidated from the data on which control is transferred to the company. They are deconsolidated from the date the control ceases.

Intra-company sales, income and expenses and accounts receivable and payable are eliminated. Intra-company profits and losses arising from intra-company deliveries of non-current assets and inventories are also eliminated. Accounting policies of subsidiaries have been changed where necessary to ensure consistency with the policies adopted by the company.

Noncontrolling Interests

Noncontrolling interests in the results and equity of subsidiaries are shown separately in the consolidated statement of profit and loss, consolidated statement of comprehensive income, consolidated statement of changes in equity and consolidated statement of financial position.

Joint arrangements

Linde has several joint arrangements in which it has joint control with one or several parties through a contractual agreement. If joint control exists, Linde needs to distinguish whether the investment is a joint operation or a joint venture. This distinction is dependent on whether Linde has rights to the assets and obligations for the liabilities of the arrangement or whether it has rights to the net assets of the arrangement. To make the distinction, Linde considers the structure and legal form of the arrangement, any contractual agreements which might apply and any other relevant circumstances.

Significant influence

Associates over which Linde plc can exercise significant influence as defined by IAS 28, *Investments in Associates and Joint Ventures* are also accounted for using the equity method. Significant influence is presumed if Linde holds (directly or indirectly) 20 percent or more of the voting rights in an investee.

Joint ventures

Investments in associates and joint ventures are accounted for under the equity method at cost at the date of acquisition. In subsequent periods, the carrying amount is adjusted up or down to reflect Linde's share of the total comprehensive income of the investee. Any distributions received from the investee and other changes in the investee's equity reduce or increase the carrying amount of the investment. If the losses of an associate or joint venture attributable to Linde equal or exceed the value of the interest held in this associate or joint venture, no further losses are recognised unless Linde incurs an obligation or makes payments on behalf of the associate or joint venture. The same principles apply to companies accounted for using the equity method as for the consolidation of subsidiaries.

Investments in associates and joint ventures are reviewed for impairment whenever events or circumstances reflect that an impairment may have occurred.

Joints operations

If the joint arrangement qualifies as joint operation, Linde recognizes the assets, liabilities, revenues and expenses relating to its interest in a joint operation in accordance with the IFRS's applicable to the particular assets, liabilities, revenues and expenses.

Other investments

Other investments, when taken individually and together, are immaterial from Linde's point of view in terms of total assets, revenue and profit and loss for the year and do not have a significant impact on the consolidated net assets, financial position and results of operations of Linde.

Change in ownership interests

Linde treats transactions with noncontrolling interests that do not result in a loss of control as equity transactions. Where noncontrolling interests are acquired, any remaining balance between the acquisition cost and the share of net assets acquired is offset directly in equity. Intra-company sales, income and expenses and accounts receivable and payable are eliminated.

When Linde loses control over a subsidiary, it derecognizes: the assets and liabilities of the subsidiary, any related noncontrolling interests and other components of equity. Any resulting gain or loss is recognized in profit and loss. Any interest retained in the former subsidiary is measured at fair value when control is lost.

When Linde ceases to consolidate (or account for as an equity method investment) an investment because of a loss of control, joint control or significant influence, any retained interest in the entity is remeasured to its fair value when control is lost. Any resulting gain or loss is recognized in profit and loss. In addition, any amounts previously recognized in other comprehensive income in related to that entity are accounted for as if the company had directly (or partially) disposed of the related assets or liabilities. This may mean that amounts previously recognized in other comprehensive income are reclassified to profit and loss.

Management judgments in relation to control

When assessing whether Linde exercises control, joint control or significant influence over companies in which it holds less than 100 percent of the voting rights, management judgment is required to assess whether it controls the investee. In addition, companies are fully consolidated if Linde exerts increased management authority in those companies and is able to exercise the most extensive decision-making powers over major portions of the operating activities of the entities.

Changes to contractual agreements or facts or circumstances are monitored on an ongoing basis and are evaluated to determine whether they have an impact on the assessment as to whether Linde is exercising control or joint control over its investment.

Business Combinations

Business combinations require estimates to be made when determining fair values. When discounted cash flow methods are used, discretionary aspects include in particular the time period and amount of the cash flow and the determination of an appropriate discount rate. In connection with management judgments about purchase price allocations in the case of significant business combinations, Linde may utilize external valuation services.

Acquisitions are accounted for using the acquisition method. The cost of an acquisition is measured at the fair value of the assets acquired, and liabilities assumed. Any excess of the purchase price, and noncontrolling interests recognized over the fair value of the net identifiable assets and liabilities acquired is recorded as goodwill. Allocations of the purchase price are initially based on preliminary estimates and assumptions at the date of acquisition and are subject to revision based on final information received, including appraisals and other analyses which support underlying estimates.

The company recognizes noncontrolling interests in an acquired entity either at fair value or at the noncontrolling interest's proportionate share of the acquired entity's net identifiable assets. This decision is made on an acquisition-by-acquisition basis.

If the business combination is achieved in stages, the acquisition date carrying value of the acquirer's previously held equity interest in the acquiree is remeasured to fair value at the acquisition date. Any gains or losses arising from such remeasurement are recognised in consolidated statement of profit and loss.

Intangible assets

Intangible assets are stated at acquisition cost or manufacturing cost less accumulated amortization and any impairment losses. An intangible asset is recognized if it can be identified as an asset, if it is probable that the future economic benefits that are attributable to the asset will flow to Linde, and if the cost of the asset can be measured reliably. It is important to determine whether the intangible assets have finite or indefinite useful lives. The estimated useful life of customer relationships purchased is calculated on the basis of the term of the contractual relationship underlying the customer relationship, or on the basis of expected customer behavior. Goodwill, intangible assets with indefinite useful lives and intangible assets not yet ready for use are not amortized, but are subject instead to an impairment test once a year, or more often if there is any indication that an asset may be impaired. Other intangible assets are tested for impairment whenever events, or changes in circumstances, indicate that the asset may be impaired.

The "Linde" brandname is considered to have an indefinite useful life. The brand has been long established and will continue to be used as the name for the merged company. The Linde brand has been used and in existence for many years, demonstrating proven value over that period. The brand name continues to have a strong market presence and there are no material legal, contractual, or other factors that limit its useful life. Based on an analysis of these relevant factors there is no foreseeable limit to the period over which the asset is expected to generate cash inflows.

In a business combination, goodwill is initially measured at cost, which is the excess of the fair value of consideration transferred and the fair value of net assets (including noncontrolling interests) acquired. After initial recognition, goodwill is measured at cost less any accumulated impairment losses. Goodwill is tested for impairment annually, in the financial year of acquisition, if later, or more frequently if events or circumstances indicate that an impairment loss may have been incurred. The company performs the annual impairment testing in the second quarter.

Goodwill acquired in a business combination is, from the acquisition date, allocated to each of the company's cash-generating units ("CGUs") that are expected to benefit from the combination. The impairment review of goodwill is performed for groups of CGUs, i.e. each of the business units: Linde AG, US packaged gas, US industrial gases, Mexico, Canada, South America, Europe, Asia, and Surface Technologies, as management monitors goodwill at that level during the reporting period presented.

Impairment is determined for goodwill by assessing the recoverable amount of each group of CGUs to which the goodwill is allocated to. Where the recoverable amount of the group of CGUs is less than its carrying amount, an impairment loss is recognized. The recoverable amount is determined as the group of CGU's fair value less costs to sell. If the carrying amount of the group of CGUs exceeds or is close to the fair value less costs to sell, a test is performed to determine whether the value in use is higher than the carrying amount. In order to determine the fair value of the group of CGUs, the company utilizes a market multiples approach, multiplying the earnings before interest, tax, depreciation, and amortization ("EBITDA") of each group of CGU's by an EBITDA multiple. Impairment losses relating to goodwill cannot be reversed in future periods.

If the reason for an impairment loss recognised in prior years no longer exists, the carrying amount of the intangible asset is increased to a maximum figure of the carrying amount that would have been determined had no impairment loss been recognised.

Costs incurred in connection with the purchase of software or in-house development of software used internally, including the costs of bringing this software to an operational state, are capitalized and amortized on a straight-line basis.

The useful lives of intangible assets are:

Intangible Asset Classification	Weighted Average Amortization Period
Customer relationships	27 years
Linde Brand	Indefinite useful life
Brands / Tradenames	27 years
Other intangible assets	8 years

Tangible assets

Tangible assets are reported at acquisition cost or manufacturing cost less accumulated depreciation based on the estimated useful life of the asset and any impairment losses. Tangible assets are depreciated using the straight-line method, and the depreciation expense is disclosed in the consolidated statement of profit and loss under the heading which corresponds to the functional features of the underlying asset.

The depreciation method and the estimated useful lives of the assets are reviewed on an annual basis and adapted to prevailing conditions.

The following useful lives apply to the different types of tangible assets:

	Depreciable Lives (Yrs)
Production plants (primarily 15-year life)	10-20
Storage tanks	15-20
Transportation equipment and other	3-15
Cylinders	10-30
Buildings	25-40
Land and improvements	0-20

The useful lives are estimated based on past experience. Assumptions also need to be made when Linde assesses whether an asset may be capitalized and which components of the cost of the asset may be capitalised. Estimates need to be made here, for example, of the expected future economic benefits of an asset or the expected future costs of the dismantling of plants. In addition, the capitalization of costs which are incurred during the operating phase of an asset, such as the costs of upgrades to plants or their complete overhaul, depends on whether these costs will lead to better or higher output or whether they extend the estimated useful life of the asset. The company capitalizes borrowing cost as part of the cost of constructing major facilities.

If significant events or market developments indicate an impairment in the value of the tangible or intangible asset, Linde reviews the recoverability of the carrying amount of the asset by testing for impairment. The impairment test is performed at the CGU level to which the asset belongs. A cash-generating unit is the smallest identifiable group of assets that generates cash inflows from external parties that are largely independent of the cash inflows from other assets. In identifying whether cash inflows are largely independent, Linde considers various factors including how management monitors the operations and how management makes decisions about continuing or disposing of the entity's assets and operations. The recoverable amount of the CGU is calculated, which is the higher of its fair value less costs of disposal and its value in use. Linde typically uses value in use. To determine the value in use, estimated future cash flows are discounted at a rate which reflects the risk specific to the CGU. When estimating future cash flows, segment specific, technological, economic and general developments are taken into account. If the reason for an impairment loss recognized in prior years no longer exists, the carrying amount of the tangible asset is increased to the new recoverable amount, but not exceeding the carrying amount that would have been determined had no impairment loss been recognized.

Inventories

Inventories are reported at the lower of acquisition or manufacturing cost and net realizable value. Cost is determined using the average-cost method.

Non-current assets classified as held for sale, and discontinued operations

Non-current assets, as well as liabilities directly related to these, are classified separately in the consolidated statement of financial position as held for sale if they are available for sale in their present condition and the sale within the next twelve months is highly probable.

Non-current assets classified as held for sale are measured at the lower of carrying amount and fair value less costs to sell. Amortization and depreciation are discontinued from the date on which the non-current assets are classified as held for sale. The process involved in determining the fair value less costs to sell involves estimates and assumptions that are subject to uncertainty.

Discontinued operations are reported when a part of the business is classified as held for sale, or has already been disposed of, and the business area in question represents either a separate major line of business or a geographical area of operations, or is part of a single coordinated plan to dispose of a separate major line of business or geographical area of operations, or is a subsidiary acquired exclusively with a view to resale. The profit/loss from discontinued operations is reported separately from the expenses and income from continuing operations in the consolidated statement of profit and loss; prior-year figures are shown on a like-for-like basis. In the consolidated statement of cash flows, the cash flows from discontinued operations are shown separately from the cash flows from continuing operations; prior-year figures are shown on a like-for-like basis. If the information relates exclusively to discontinued operations, this is highlighted accordingly.

Provisions for pensions and similar obligations

The valuation of pension provisions is based on the projected unit credit method set out in IAS 19, *Employee Benefits* ("IAS 19") for defined benefit obligations. This method takes into account not only vested future benefits and known pensions at the reporting date, but also expected future increases in salaries and pensions. The calculation of the provisions is determined using actuarial reports.

The fair value of the plan assets is deducted from the present value of the pension obligations (gross pension obligation) to give the net pension obligation or net pension asset in respect of defined benefit pension plans. The net pension asset is adjusted if necessary to comply with the rules relating to the asset ceiling set out in IAS 19.64. According to IAS 19.64, a net pension asset may only be disclosed if Linde, under its obligation as an employer, has the right to receive a refund of the surplus or to reduce future contributions.

The net interest expense for the financial year is calculated by multiplying the net pension obligation or net pension asset at the beginning of the period by the interest rate underlying the discounting of the gross defined benefit obligation at the beginning of the period.

The discount rate is calculated on the basis of the returns achieved on the relevant call date for high quality fixed-interest corporate bonds in the market. The currency and period to maturity of the underlying bonds correspond to the currency and probable period to maturity of the post-employment benefit obligations. If such returns are not available, the discount rates are based on market returns for government bonds.

Remeasurements comprise of the actuarial gains and losses on the remeasurement of the gross defined benefit obligation and the difference between the return on plan assets actually realized and the return assumed at the beginning of the period, which is based on the discount rate of the corresponding gross defined benefit obligation. If a pension plan is overfunded and the asset ceiling applies, remeasurements also comprise the change in the net asset from the application of the asset ceiling rules to the extent that this has not been accounted for in net interest.

Actuarial gains and losses arise from changes in actuarial assumptions or from variations between earlier actuarial assumptions and actual events.

All remeasurements (i.e. actuarial gains and losses, the cumulative effect of an asset ceiling and the effects of an increase in the pension obligation in accordance with IFRIC 14, *The Limit on a Defined Benefit Asset, Minimum Funding Requirements and their Interaction*) are recognized immediately in other comprehensive income.

The expense arising from additions to the pension provisions resulting from service during the period and past service costs are allocated to functional costs. The net interest expense or net interest income from defined benefit plans is disclosed in the financial result. For each pension plan, it is established whether the net figure is a net interest expense or net interest income and the amounts are disclosed accordingly in the financial result.

Miscellaneous provisions

In accordance with IAS 37, *Provisions, Contingent Liabilities and Contingent Assets*, miscellaneous provisions are recognised when a present obligation to a third party exists as a result of a past event, it is probable that an outflow of resources will be required to settle the obligation and a reliable estimate can be made of the amount of the obligation.

Miscellaneous provisions are recognised for all identifiable risks and liabilities of uncertain timing or amount. The amounts provided are the best estimate of the probable expenditure required to settle the obligation and are not offset against recourse claims. The settlement amount is calculated based on the assessment of the probability of an outflow of resources, and on past experience and the circumstances known at the reporting date. This also includes any cost increases which need to be taken into account at the reporting date. The actual outflow of resources at a future date may therefore vary from the figure included in other provisions. Provisions which relate to periods of more than twelve months are discounted.

Provisions include provisions for warranties, onerous contracts and provisions for litigation. Assumptions are made here about the probability of occurrence of the risk and the expected future outflow of resources. The uncertainty associated with the measurement of warranty provisions is relatively moderate, as Linde has recourse to historical warranty cost ratios when determining the amounts to be set aside.

Litigation is associated with great uncertainty. A degree of discretion is required to assess whether a present obligation to a third party exists at the reporting date as a result of a past event, whether it is probable that an outflow of resources will be required in future to settle the obligation and whether a reliable estimate can be made of the amount of the obligation. The current status of outstanding litigation is regularly reviewed and updated by Linde's legal department and lawyers appointed by Linde. Changes to this status as a result of new information may result in adjustments being made to the provision.

Provisions for warranty claims are recognised taking current or estimated future claims experience into account.

Dismantling provisions are capitalised when they arise, at the discounted value of the obligation, and a provision for the same amount is established at the same time. An estimate is made, based on past experience, of future costs expected to be incurred to dismantle plants and restore the land on which the plant was built to its original condition. The expected costs are reassessed on an annual basis and the amount of the provision is adjusted if required. The depreciation charged on the asset and the unwinding of interest applied to the provision are both allocated as an expense to the periods of use of the asset.

Provisions for restructuring are recognised if a formal, detailed restructuring plan has been drawn up and communicated to the relevant parties.

Income tax provisions are disclosed in income tax liabilities.

Revenue recognition

Revenue from contracts with customers is recognized when control of the goods or services are transferred to the customer at an amount that reflects the consideration to which Linde expects to be entitled in exchange for those goods or services. If the consideration in a contract includes a variable amount, Linde estimates the amount of consideration to which it will be entitled in exchange for transferring the goods to the customer. The variable consideration is estimated at contract inception and is recognized only when it is highly probable that a significant revenue reversal in the amount of cumulative revenue recognized will not occur when the associated uncertainty with the variable consideration is subsequently resolved.

Revenue is recognized at a point in time or over time depending on when control is transferred for each individual contract (see Note 7).

Linde pays sales commission to its employees for each contract that they obtain for bundled sales of equipment and installation services.

Linde has elected to apply the optional practical expedient for costs to obtain a contract which allows Linde to immediately expense sales commissions (included under employee benefits and part of marketing and selling expense) because the amortization period of the asset that Linde otherwise would have used is one year or less.

Cost of sales

Cost of sales comprises the cost of goods and services sold and the cost of merchandise sold. It includes not only the cost of direct materials and direct manufacturing expenses, but also overheads including depreciation of production plants, amortization of certain intangible assets and inventory write-downs.

Research and development costs

Research costs and development costs which cannot be capitalized are recognized immediately in profit and loss.

Financial result

The financial result includes:

- interest expenses on liabilities,
- dividends received,
- interest income on receivables,
- gains and losses on financial instruments recognized in profit and loss,
- the net interest expense and net interest income from defined benefit plans, and
- interest expense and income from finance leases.

Interest income and interest expenses are recognized in profit and loss on the basis of the effective interest rate method. Dividends are recognized in profit and loss when they have been declared.

Financial instruments

Financial assets and liabilities are only recognized in the statement of financial position when Linde becomes a party to the contractual provisions of the financial instrument. In the normal course of events, purchases and sales of financial assets are accounted for on settlement day. The same does not apply to derivatives, which are accounted for on the trading day.

The classification of financial instruments at initial recognition depends on their contractual terms and the business model for managing the instruments.

Financial assets are classified, at initial recognition, as financial assets at amortized cost, fair value through other comprehensive income ("OCI"), or fair value through profit and loss. Linde did not elect the fair value option. Linde measures financial assets at amortized cost if both, the business model and the solely payments of principal and interest ("SPPI") test are met. Debt instruments are measured at fair value through OCI if both, the business model and the SPPI test are met. An entity can elect on an instrument-by-instrument basis to classify irrevocably its equity investments as equity instruments designated at fair value through OCI when they meet the definition of equity under IAS 32, *Financial Instruments: Presentation* and are not held for trading. Linde did not elect to classify investments under this category. Financial assets at fair value through profit and loss include equity investments and derivative financial assets unless they are designated as effective hedging instruments. Linde trade receivables are generally recognized at amortized cost.

<u>Business model assessment</u>

The company determines its business model at the level that best reflects how it manages groups of financial assets to achieve its business objective.

The company's business model is not assessed on an instrument-by-instrument basis, but at a higher level of aggregated portfolios that is based on observable factors.

Financial instruments are initially recognized at fair value. Transaction expenses which are directly attributable to the acquisition or issue of financial instruments are only included in the determination of the carrying amount if the financial instruments are not recognized at fair value through profit and loss.

Financial assets at amortized cost are subsequently measured using the effective interest ("EIR") method and are subject to impairment. Linde's financial assets at amortized cost includes trade receivables, receivables from finance lease, loan receivables and other financial assets included under other assets. Trade receivables are measured at the transaction price, the face value less impairment, if the receivables do not contain a significant financing component. Management has considered factors such as the difference between the cash price for assets and transaction prices within its agreements, terms of its agreements and market interest rates. Management has reviewed its current portfolio noting that its receivables do not contain significant financing components.

The starting point of the impairment model for trade receivables, contract assets and lease receivables is an analysis of the actual historical default rates per business and product area, taking into account regional circumstances. These historical default rates are adjusted for the impact of current macroeconomic changes, if indicated, taking into account forward-looking information. Furthermore, a critical review of the default rates takes place against the background of the expectations of the responsible management with regard to the realizability of the receivables.

Expected credit losses ("ECLs") s are based on the difference between the contractual cash flows due in accordance with the contract and all the cash flows that the company expects to receive, discounted at the appropriate effective interest rate.

The company considers a financial asset to be in default (credit impaired) when contractual payments are 360 days past due. However, in certain cases, the company may also consider a financial asset to be in default when internal or external information indicates that the company is unlikely to receive the outstanding contractual amounts. A financial asset is written off when there is no reasonable expectation of recovering the contractual cash flows.

A financial asset is derecognized if, it is settled, Linde loses its contractual entitlement to cash flows from such an asset or if it transfers virtually all the risks and opportunities associated with that financial asset. No financial assets that would not qualify for derecognition were transferred or sold to another party by Linde.

All derivative financial instruments are reported at fair value, irrespective of their purpose or the reason for which they were acquired. Embedded derivatives (i. e. derivatives which are included in host contracts) are separated from the host contract and accounted for as derivative financial instruments, if certain requirements are met.

For more information about risk management and the impact on the statement of financial position of derivative financial instruments, see Note 24.

Financial liabilities are classified, at initial recognition, as financial liabilities at amortized cost, at fair value through profit and loss, or as derivatives designated as hedging instruments in an effective hedge. All financial liabilities are recognized initially at fair value and, in the case of financial liabilities at amortized cost, net of directly attributable transaction costs. Liabilities from finance leases, trade payables, financial debt, as well as miscellaneous liabilities, are reported at amortized cost as long as they are not derivative financial instruments. Differences between historical cost and the repayment amount are accounted for using the effective interest rate method. The carrying amount of the financial debt which comprises the hedged item in a fair value hedge is adjusted for the corresponding gain or loss with respect to the hedged risk. A financial liability is derecognized when the obligation under the liability is discharged, cancelled or expires.

Financial liabilities which contain both an equity portion and a liability portion (commonly refer as “compound financial instruments”) are classified in accordance with IAS 32. The financial instruments issued by Linde are classified entirely as financial liabilities and reported at amortized cost. No compound financial instruments exist.

Financial assets and financial liabilities are offset and the net amount is reported in the consolidated statement of financial position if there is a currently enforceable legal right to offset the recognized amounts and there is an intention to settle on a net basis, to realize the assets and settle the liabilities simultaneously.

Income taxes

The income tax expense or credit for the period is the tax payable on the current period's taxable income based on the applicable income tax rate for each jurisdiction adjusted by changes in deferred tax assets and liabilities attributable to temporary differences and to unused tax losses. The current income tax charge is calculated on the basis of the tax laws enacted or substantively enacted at the end of the reporting period. Management periodically evaluates positions taken in tax returns with respect to situations in which applicable tax regulation is subject to interpretation. It establishes provisions where appropriate on the basis of amounts expected to be paid to the tax authorities.

Deferred taxes

Deferred tax assets and liabilities are accounted for in accordance with IAS 12, *Income Taxes* under the liability method in respect of all temporary differences between the carrying amounts of the assets and liabilities under IFRS and the corresponding tax base used in the computation of taxable profit, and in respect of all consolidation adjustments affecting net income and unused tax loss carryforwards.

Deferred tax assets are only recognised for unused tax losses to the extent that it is probable that taxable profits will be available in future years against which the tax losses can be utilized. Deferred taxes are calculated at the tax rates that apply to the period when the asset is realized or the liability is settled, using tax rates set out in laws that have been enacted or substantively enacted in the individual countries by the reporting date.

The company evaluates deferred tax assets quarterly to ensure that estimated future taxable income will be sufficient in character (e.g., capital gain versus ordinary income treatment), amount and timing to result in their recovery. After considering the positive and negative evidence, the company reduces the assets to their realizable value when management determines that it is probable (i.e., greater than 50% likelihood) that a deferred tax asset will not be realized.

Accounting for leases

According to IFRIC 4, *Determining whether an Arrangement contains a Lease*, if specific criteria are met, certain arrangements should be accounted for as leases that do not take the legal form of a lease. In particular, in the Gases Division, certain gas supply contracts are classified as embedded leases if the fulfillment of the arrangement depends upon a specific asset and if the customer's revenue share accounts for an overwhelming proportion of the production capacity of the asset. If an embedded lease exists, the criteria set out in IAS 17, *Leases* are used to examine in each individual case whether, under the gas supply contract, substantially all the risks and rewards incidental to ownership of the plant have been transferred to the customer, meaning that this constitutes an embedded finance lease. This involves separating that portion of the gas supply contract which relates to the embedded lease from the rest of the contract. Then it is established whether the minimum lease payments thus identified amount to substantially all the fair value of the plant and whether the minimum lease term is for the major part of the plant's economic life.

When classifying procurement lease agreements, Linde must also make assumptions: e.g. to determine the appropriate interest rate or the residual value or estimated useful lives of the underlying assets. If Linde is the lessee under a finance lease agreement, the assets are disclosed at the beginning of the lease under tangible assets at the fair value of the leased asset or, if lower, at the present value of the future lease payments. Corresponding liabilities from finance leases are recognised.

Rental and lease payments under operating leases are recognised in functional costs in the consolidated statement of profit and loss on a straight-line basis over the lease term.

Rounding of amounts

All amounts disclosed in the financial statements and notes have been rounded off to the nearest million currency units unless otherwise stated.

New standards and interpretations that have not yet been adopted

The following standards have been issued by the IASB, but have not been applied in the consolidated financial statements of Linde for the year ended 31 December 2018, as they are either not yet effective and/or have not yet been adopted by the European Union:

- IFRS 16, *Leases* (first-time application according to IASB in financial years beginning on or after 1 January 2019)
- IFRIC 23, *Uncertainty over Income Tax Treatments* (first-time application according to IASB in financial years beginning on or after 1 January 2019)
- Amendments to IFRS 9, *Prepayment Features with Negative Compensation* (first-time application according to IASB in financial years beginning on or after 1 January 2019)

- Amendments to IAS 28, *Long-term Interests in Associates and Joint Ventures* (first-time application according to IASB in financial years beginning on or after 1 January 2019)
- Amendments to IAS 19, *Plan Amendment, Curtailment or Settlement* (first-time application according to IASB in financial years beginning on or after 1 January 2019)
- Amendments to IFRS 3, *Definition of a Business* (first-time application according to IASB in financial years beginning on or after 1 January 2020)
- Amendments to IAS 1 and IAS 8, *Definition of Material* (first-time application according to IASB in financial years beginning on or after 1 January 2020)
- The Conceptual Framework for Financial Reporting (first-time application according to IASB in financial years beginning on or after 1 January 2020)
- Amendments to IFRS 10 and IAS 28, *Sale or Contribution of Assets between an Investor and its Associate or Joint Venture* (in December 2015, the IASB postponed the effective date of this effective date of this amendment indefinitely pending the outcome of its research project on the equity method of accounting)
- Annual improvements to IFRS Standards 2015 - 2017 Cycle (first-time application according to IASB in financial years beginning on or after 1 January 2019)
    - IFRS 3, *Business Combinations* - Previously held Interests in a joint operation
    - IFRS 11, *Joint Arrangements* - Previously held interests in a joint operation
    - IAS 12, *Income Taxes* - Income tax consequences of payments on financial instruments classified as equity
    - IAS 23, *Borrowing Costs* - Borrowing costs eligible for capitalization

IFRS 16

IFRS 16 establishes principles for the recognition, measurement, presentation and disclosure of leases. The new standard now provides a single lessee accounting model requiring lessees to recognize assets and liabilities for all leases unless the lease term is twelve months or less or the underlying asset has a low value (option in each case). Lessors continue to classify leases as operating or finance, with IFRS 16's approach to lessor accounting substantially unchanged from its predecessor, IAS 17.

Linde enters into lease agreements principally as the lessee. The number of operating leases is much higher than the number of finance leases. As a result, the application of IFRS 16 will result in an increase in both assets and financial liabilities at Linde. No significant impact on finance leases is expected. Linde will make use of the options relating to short-term and low-value leases. As far as the transitional requirements are concerned, Linde will apply the modified retrospective method.

Linde will apply IFRS 16 for the first time as at 1 January 2019 and the adoption of this standard is expected to result in a right to use asset and financial lease obligation of approximately $1 billion.

The company's activities as a lessor are not material and hence the company does not expect any significant impact on the financial statements beyond some additional disclosure requirements.

IFRIC 23

IFRIC 23 clarifies how to apply the recognition and measurement requirements of IAS 12 when there is uncertainty over income tax treatments. When it is probable (more likely than not) that the taxation authority will accept an uncertain tax treatment, taxable profit and loss is determined consistent with the tax treatment used or planned to be used in the income tax filings.

When it is not probable that a taxation authority will accept an uncertain tax treatment, the amount of uncertainty to be recognized is calculated using either the expected value or the most likely amount, whichever method better predicts the resolution of the uncertainty. Detection risk is not considered in the analysis. Uncertain tax treatments may be considered separately or together based on the approach that better predicts the resolution of the uncertainty. Linde will apply IFRIC 23 for the first time as at 1 January 2019. The company does not expect any significant impact as a result of this interpretation.

The remaining standards are not expected to have a significant impact on the net assets, financial position and results of operations of Linde.

[7] Revenue

Contracts with Customers

Approximately 75% of Linde's consolidated sales are generated from industrial gases and related products in four geographic segments (North America, Europe, South America and Asia), Linde AG represents approximately 20% of 2018 sales and the remaining 5% is related to the global surface technologies segment. Linde serves a diverse group of industries including healthcare, petroleum refining, manufacturing, food, beverage carbonation, fiber-optics, steel making, aerospace, chemicals and water treatment.

Industrial Gases

Within each of the company's geographic segments for industrial gases, there are three basic distribution methods: (i) on-site or tonnage; (ii) merchant or bulk liquid; and (iii) packaged or cylinder gases. The distribution method used by Linde to supply a customer is determined by many factors, including the customer's volume requirements and location. The distribution method generally determines the contract terms with the customer and, accordingly, the revenue recognition accounting practices. Linde's primary products in its industrial gases business are atmospheric gases (oxygen, nitrogen, argon, rare gases) and process gases (carbon dioxide, helium, hydrogen, electronic gases, specialty gases, acetylene). These products are generally sold through one of the three distribution methods.

Following is a description of each of the three industrial gases distribution methods and the respective revenue recognition policies:

On-site. Customers that require the largest volumes of product and that have a relatively constant demand pattern are supplied by cryogenic and process gas on-site plants. Linde constructs plants on or adjacent to these customers' sites and supplies the product directly to customers by pipeline. Where there are large concentrations of customers, a single pipeline may be connected to several plants and customers. On-site product supply contracts generally are total requirement contracts with terms typically ranging from 10-20 years and contain minimum purchase requirements and price escalation provisions. Many of the cryogenic on-site plants also produce liquid products for the merchant market. Therefore, plants are typically not dedicated to a single customer. Additionally, Linde is responsible for the design, construction, operations and maintenance of the plants and customers typically have no involvement in these activities. Advanced air separation processes also allow on-site delivery to customers with smaller volume requirements.

The company's performance obligations related to on-site customers are satisfied over time as customers receive and obtain control of the product. Linde has elected to apply the practical expedient for measuring progress towards the completion of a performance obligation and recognizes revenue as the company has the right to invoice each customer, which generally corresponds with product delivery. Accordingly, revenue is recognized when product is delivered to the customer and the company has the right to invoice the customer in accordance with the contract terms. Consideration in these contracts is generally based on pricing which fluctuates with various price indices. Variable components of consideration exist within on-site contracts but are considered constrained.

Merchant. Merchant deliveries generally are made from Linde's plants by tanker trucks to storage containers at the customer's site. Due to the relatively high distribution cost, merchant oxygen and nitrogen generally have a relatively small distribution radius from the plants at which they are produced. Merchant argon, hydrogen and helium can be shipped much longer distances. The customer agreements used in the merchant business are usually three-to seven-year supply agreements based on the requirements of the customer. These contracts generally do not contain minimum purchase requirements or volume commitments.

The company's performance obligations related to merchant customers are generally satisfied at a point in time as the customers receive and obtain control of the product. Revenue is recognized when product is delivered to the customer and the company has the right to invoice the customer in accordance with the contract terms. Any variable components of consideration within merchant contracts are constrained however this consideration is not significant.

Packaged Gases. Customers requiring small volumes are supplied products in containers called cylinders, under medium to high pressure. Linde distributes merchant gases from its production plants to company-owned cylinder filling plants where cylinders are then filled for distribution to customers. Cylinders may be delivered to the customer's site or picked up by the customer at a packaging facility or retail store. Linde invoices the customer for the industrial gases and the use of the cylinder container(s). The company also sells hardgoods and welding equipment purchased from independent manufacturers. Packaged gases are generally sold under one to three-year supply contracts and purchase orders and do not contain minimum purchase requirements or volume commitments.

The company's performance obligations related to packaged gases are satisfied at a point in time. Accordingly, revenue is recognized when product is delivered to the customer or when the customer picks up product from a packaged gas facility or retail store, and the company has the right to payment from the customer in accordance with the contract terms. Any variable consideration is constrained and will be recognized when the uncertainty related to the consideration is resolved.

Surface Technologies

The company's surface technologies segment, operated through Praxair Surface Technologies, Inc., supplies wear-resistant and high-temperature corrosion-resistant metallic and ceramic coatings and powders. Praxair Surface Technologies is a leading global supplier of coatings services and thermal spray consumables to customers in the aircraft, energy, printing, primary metals, petrochemical, textile, and other industries. Its coatings are used to provide wear resistance, corrosion protection, thermal insulation, and many other surface-enhancing functions which serve to extend component life, enable optimal performance, and reduce operating costs. It also manufactures a complete line of electric arc, plasma and wire spray, and high-velocity oxy-fuel ("HVOF") equipment.

The company's performance obligation related to surface technologies customers are generally satisfied at a point in time when the customer receives and takes control of product. Accordingly, revenue is recognized when product is delivered to the customer or when the customer picks up the product from the company's facility, and the company has the right to invoice the customer in accordance with the contract terms.

Linde Engineering

The company designs and manufactures equipment for air separation and other industrial gas applications manufactured specifically for end customers. Sale of equipment contracts are generally comprised of a single performance obligation. Revenue from sale of equipment is generally recognized over time as Linde has an enforceable right to payment for performance completed to date and performance does not create an asset with alternative use. For contracts recognized over time, revenue is recognized primarily using a cost incurred input method. Costs incurred to date relative to total estimated costs at completion are used to measure progress toward satisfying performance obligations. Costs incurred include material, labor, and overhead costs and represent work contributing and proportionate to the transfer of control to the customer. Contract modifications are typically accounted for as part of the existing contract and are recognized as a cumulative adjustment for the inception-to-date effect of such change.

Contract Assets and Liabilities

Contract assets and liabilities result from differences in timing of revenue recognition and customer invoicing. Contract assets primarily relate to sale of equipment contracts for which revenue is recognized over time. The balance represents unbilled revenue which occurs when revenue recognized under the measure of progress exceeds amounts invoiced to customers. Customer invoices may be based on the passage of time, the achievement of certain contractual milestones or a combination of both criteria.

Contract liabilities include advance payments or right to consideration prior to performance under the contract. Contract liabilities are recognized as revenue as performance obligations are satisfied under contract terms.

Linde had contract assets of $267 million as of 31 December 2018, contract assets as 31 December 2017 and 1 January 2017 were not material. Contract liabilities were $1,863 million as of 31 December 2018 contract liabilities as 31 December 2017 and 1 January 2017 were not material. Contract assets and liabilities primarily relate to the Linde Engineering business acquired in the merger. The Industrial Gases Businesses and Surface Technologies do not have material contract assets or liabilities.

Payment Terms and Other

Linde generally receives payment after performance obligations are satisfied, and customer prepayments are not typical for the Industrial Gases Businesses and Surface Technologies. Payment terms vary based on the country where sales originate and local customary payment practices. Linde does not offer extended financing outside of customary payment terms. Amounts billed for sales and use taxes, value-added taxes, and certain excise and other specific transactional taxes imposed on revenue producing transactions are presented on a net basis and are not included in sales within the consolidated statement of income. Additionally, sales returns and allowances are not a normal practice in the industry and are not significant. There is no significant concentration of sales with any single customer.

Disaggregated Revenue Information

The company manages its industrial gases business on a geographic basis, while the surface technologies business is managed on a global basis. Linde AG had been managed as a separate segment due to the restrictions under the hold separate order, which were lifted on 1 March 2019. Further, the company believes that reporting sales by distribution method by reportable geographic segment best illustrates the nature, timing, type of customer, and contract terms for its revenues, including terms and pricing.

The following table shows sales by distribution method for each reportable segment and at the consolidated level for the years ended 31 December 2018 and 2017.

(Millions of dollars)	2018							
Sales	**North America**	**Europe**	**South America**	**Asia**	**Surface Technologies**	**Linde AG**	**Total**	**%**
Merchant	$ 2,364	$ 548	$ 520	$ 624	$ —	$ 531	$ 4,587	31%
On-Site	1,901	291	454	984	—	632	4,262	28%
Packaged Gas	1,995	685	361	221	—	1,260	4,522	30%
Other	160	68	34	135	682	587	1,666	11%
	$ 6,420	$ 1,592	$ 1,369	$ 1,964	$ 682	$ 3,010	$ 15,037	100%

(Millions of dollars)	2017							
Sales	**North America**	**Europe**	**South America**	**Asia**	**Surface Technologies**	**Linde AG**	**Total**	**%**
Merchant	$ 2,223	$ 552	$ 570	$ 526	$ —	$ —	$ 3,871	34%
On-Site	$ 1,795	287	499	870	—	—	3,451	30%
Packaged Gas	$ 1,841	660	400	230	—	—	3,131	27%
Other	$ 163	60	32	112	617	—	984	9%
	$ 6,022	$ 1,559	$ 1,501	$ 1,738	$ 617	$ —	$ 11,437	100%

Remaining Performance Obligations

As described above, Linde’s contracts with on-site customers are under long-term supply arrangements which generally require the customer to purchase their requirements from Linde and also have minimum purchase requirements. The company estimates the consideration related to minimum purchase requirements is approximately $48 billion. This amount excludes all sales above minimum purchase requirements, which can be significant depending on customer needs. In the future, actual amounts will be different due to impacts from several factors, many of which are beyond the company’s control including, but not limited to, timing of newly signed, terminated and renewed contracts, inflationary price escalations, currency exchange rates, and pass-through costs related to natural gas and electricity. The actual duration of long-term supply contracts ranges up to twenty years. The company estimates that approximately half of the revenue related to minimum purchase requirements are estimated to be earned in the next five years and the remaining thereafter.

[8] Other Operating Income and Expenses

Other Operating Income

(Millions of dollars)	2018	2017
Exchange gains including hedges	$ 37	$ 7
Profit on disposal of non-current assets	28	19
Compensation payments received	4	2
Partnership Income	8	6
Ancillary revenue	5	1
Income from release of provisions	9	0
Income from long-term construction contracts	2	0
Miscellaneous operating income	16	32
TOTAL	**$ 109**	**$ 67**

Other Operating Expense

(Millions of dollars)	2018	2017
Exchange losses including hedges	$ 41	$ 10
Loss on disposal of non-current assets	74	7
Taxes	6	2
Miscellaneous operating expenses	29	44
TOTAL	**$ 150**	**$ 63**

[9] Financial income and expenses

Financial Income

(Millions of dollars)	2018	2017
Net interest income from defined benefit plans, see Note 18	$ 2	$ 0
Finance income from finance leases in accordance with IFRIC 4/IAS 17	1	0
Income from investments	18	8
Exchange gains including hedged financing items	20	30
Other interest and similar income	79	32
TOTAL	**$ 120**	**$ 70**

Financial Expense

(Millions of dollars)	2018	2017
Net interest expense from defined benefit plans, see Note 18	$ 35	$ 26
Interest incurred on debt	307	228
Exchange losses including hedged financing items	—	2
Other interest and similar charges	26	9
TOTAL	**$ 368**	**$ 265**

In interest income and interest expenses, gains and losses from fair value hedge accounting on debt instruments are offset against each other, in order to give a fair presentation of the economic effect of the underlying hedging relationship. Interest income and interest expenses relating to derivatives were also disclosed net. An overview of the composition of the financial result can be found in Note 24.

[10] Income Tax Expense

The year ended 31 December 2018 reflects Praxair for the entire year and Linde AG for the period beginning after 31 October 2018 (the merger date), including the impacts of purchase accounting. The amounts for historical periods prior to 2018 solely reflect the results of Praxair. See Notes 1 and 3.

Pre-tax income applicable to U.S. and non-U.S. ("foreign") operations is as follows:

(Millions of dollars) **Year Ended 31 December**	**2018**	**2017**
United States	$ 956	$ 971
Foreign (a)	4,560	1,317
Total income before income taxes	$ 5,516	$ 2,288

(a) includes a $3.778 billion gain related to Europe divestiture (see Notes 3).

U.S. Tax Cuts and Jobs Act (Tax Act)

On 22 December 2017 the U.S. government enacted the Tax Cuts and Jobs Act ("Tax Act"). This comprehensive tax legislation significantly revised the U.S. corporate income tax rules by, among other things, lowering the corporate income tax rate from 35% to 21%, implementing a territorial tax system and imposing a one-time tax on accumulated earnings of foreign subsidiaries. Given the substantial uncertainties surrounding the Tax Act and the short period of time between 22 December 2017 and 31 December 2017 to calculate the U.S. Federal, U.S. state, and non-U.S. tax impacts of the Tax Act, at 31 December 2017 the company estimated its income tax provision to reflect changes in the Tax Act. The company's 2017 estimated net income tax charge of $394 million has three main components: (i) an estimated $467 million U.S. Federal and state tax charge for deemed repatriation of accumulated foreign earnings recorded in continuing operations; (ii) an estimated $260 million charge for foreign withholding taxes related to anticipated future repatriation of foreign earnings recorded in continuing operations; and (iii) an estimated $333 million net deferred tax benefit ($427 million benefit recorded in continuing operations and $94 million charge recorded in accumulated other comprehensive income) for the revaluation of net deferred tax liabilities from 35% to the new 21% tax rate. The $467 million U.S. federal and state tax charge for deemed repatriation of accumulated foreign earnings includes $422 million of deemed repatriation tax payable over eight years, of which $388 million is classified as of 31 December 2017 as non-current income tax liabilities on the consolidated statement of financial position (see Note 22).

During 2018, the company continued to evaluate the Tax Act, additional guidance from the Internal Revenue Service, its historical foreign earnings and taxes and other items that could impact its net provisional tax charge. Additionally, the company continued to review its foreign capital structures, organizational cash needs and the foreign withholding tax cost of planned repatriation. In the fourth quarter of 2018, the company completed its accounting and updated its provisional estimates resulting in a net reduction to tax expense of $61 million, $41 million U.S. federal and $20 million of state income tax (net of federal tax benefit). This resulted in a deemed repatriation tax payable of $291 million payable over the remaining seven years, of which $265 million is classified as of 31 December 2018 as non-current income tax liabilities on the consolidated statement of financial position (see Note 22).

Further, the Tax Act enacted new provisions related to the taxation of foreign earnings, known as GILTI. The company accounts for GILTI as period costs when incurred.

Provision for Income Taxes

The following is an analysis of the provision for income taxes:

(Millions of dollars) Year Ended 31 December	2018 (a)	2017 (a)
Current tax expense (benefit)		
U.S. federal	$ 412	$ 591
U.S. state and local	(7)	91
Foreign	621	376
	$ 1,026	$ 1,058
Deferred tax expense (benefit)		
U.S. federal	$ (2)	$ (326)
U.S. state and local	15	19
Foreign	(228)	203
	(215)	(104)
Total income taxes (b)	$ 811	$ 954

(a) Includes a benefit of $61 million and a charge of $300 million related to the Tax Act in 2018 and 2017, respectively and a charge of $371 million related to divestitures in 2018 (see Note 3) as follows:

(Millions of dollars)	2018	2017
Current tax expense (benefit)		
U.S. federal	$ 219	$ 414
U.S. state and local	(36)	53
Foreign	114	60
	297	527
Deferred tax expense (benefit)		
U.S. federal	6	(427)
U.S. state and local	7	—
Foreign	—	200
	13	(227)
Total income taxes	$ 310	$ 300

(b) Includes prior year current income tax benefit $40 million and prior year current income tax expense of $0 million for 2018 and 2017; includes prior year deferred income tax benefit of $36 million and prior year deferred income tax expense of $3 million for 2018 and 2017, respectively.

Effective Tax Rate Reconciliation

For purposes of the effective tax rate reconciliation, the company utilized the U.S. statutory income tax rate of 21% in 2018 and 35% in 2017, respectively. An analysis of the difference between the provision for income taxes and the amount computed by applying the U.S. statutory income tax rate to pre-tax income follows:

(Dollar amounts in millions) Year Ended 31 December	2018		2017	
U.S. statutory income tax	$ 1,158	21.0 %	$ 801	35.0 %
U.S. state and local taxes – net of federal benefit	30	0.5 %	32	1.4 %
U.S. tax credits and deductions (a)	(12)	(0.2)%	(27)	(1.2)%
Foreign tax differentials (b)	47	0.9 %	(145)	(6.3)%
Tax Act	(61)	(1.1)%	300	13.1 %
Divestitures (c)	(423)	(7.7)%	—	— %
Other – net (d)	72	1.3 %	(7)	(0.3)%
Provision for income taxes	$ 811	14.7 %	$ 954	41.7 %

(a) U.S. tax credits and deductions relate to foreign derived intangible income in 2018, the research and experimentation tax credit in 2018 and 2017 and manufacturing deduction in years 2017.
(b) Primarily related to differences between the U.S. tax rate (21% in year 2018 and 35% in year 2017) and the statutory tax rate in the countries where the company operates. Other permanent items and tax rate changes were not significant.
(c) Divestitures primarily relate to the sale of the Praxair's European businesses (see Note 3).
(d) Other - net includes $34 million of U.S tax related to GILTI and a decrease in tax benefits in Europe of $44 million in 2018.

Net Deferred Tax Liabilities

Net deferred tax liabilities included in the consolidated statement of financial position are comprised of the following:

	31 December		1 January
(Millions of dollars)	2018	2017	2017
Deferred tax liabilities			
Fixed assets	$ 4,064	$ 1,128	$ 1,522
Goodwill	124	143	178
Other intangible assets	3,969	72	115
Subsidiary/equity investments	570	200	—
Other	819	93	201
	$ 9,546	$ 1,636	$ 2,016
Deferred tax assets			
Carryforwards	346	143	154
Benefit plans and related (a)	651	344	432
Inventory	63	16	26
Accruals and other (b)	1,277	252	408
	2,337	755	1,020
Net deferred tax liabilities (c)	$ 7,209	$ 881	$ 996
Recorded in the consolidated statement of financial position as:			
Deferred tax assets	517	199	185
Deferred tax liabilities	7,726	1,080	1,181
	$ 7,209	$ 881	$ 996

(a) Includes deferred taxes of $292 million, $217 million and $352 million as of 31 December 2018 and 2017, and 1 January 2017, respectively, related to pension / OPEB funded status (see Notes 9 and 18).
(b) Includes $104 million, $130 million, $233 million as of 31 December 2018 and 2017, and 1 January 2017, respectively, related to research and development costs.
(c) Movements in deferred tax assets and liabilities result from the following items:

(Millions of dollars)	31 December 2018	31 December 2017	1 January 2017
Net deferred tax liability, 1 January	$ 881	$ 996	$ 998
Deferred income tax expense (benefit)	(215)	(104)	(13)
Merger with Linde AG	6,612	—	—
Divestitures	(118)	—	—
Change in Accumulated Other Comprehensive Income	35	12	2
Other	(3)	(47)	5
Translation adjustments	17	24	4
Net deferred tax liability, 31 December	$ 7,209	$ 881	$ 996

In 2018, the net deferred income tax benefit of $215 million comprised primarily of deferred income tax benefit related to inventory of $100 million. The $6,612 million addition due to the merger of Linde AG increased deferred income tax liabilities primarily related to fixed assets of $2.9 billion, other intangible assets of $3.9 billion, subsidiary/equity investments of $418 million offset by increase in carryforwards of $217 million and benefit plans of $300 million. The $118 million reduction in net deferred income tax liability due to the Praxair's European divestiture in 2018 reduced deferred income taxes primarily related to fixed assets of $102 million and goodwill of $36 million.

In 2017, the net deferred income tax benefit of $104 million comprised primarily of deferred tax expense related to foreign withholding tax of $200 million, research and development costs of $113 million offset by deferred tax benefit related to fixed assets of $404 million, and goodwill and intangibles of $69 million. The Tax Act contributed $427 million of deferred tax benefit due to the reduction in the U.S. tax rate from 35% to 21% - see Tax Act section. In 2016, the net deferred income tax benefit of $13 million comprised primarily of deferred tax expense related to fixed assets of $30 million and goodwill of $15 million offset by deferred tax benefits related to research and development costs of $17 million, exchange losses of $23 million.

The company evaluates deferred tax assets quarterly to ensure that estimated future taxable income will be sufficient in character (e.g., capital gain versus ordinary income treatment), amount and timing to result in their recovery. After considering the positive and negative evidence, the company reduces the assets to their realizable value when management determines that it is probable (i.e., greater than 50% likelihood) that a deferred tax asset will not be realized. Considerable judgment is required in valuing deferred tax assets.

The company had $346 million, $143 million and $154 million of deferred tax assets relating to net operating losses ("NOLs") and tax credits as of 31 December 2018 and 2017, and 1 January 2017, respectively. These deferred tax assets include $292 million, $132 million and $141 million relating to NOLs and $54 million, $11 million and $13 million related to tax credits as of 31 December 2018 and 2017, and 1 January 2017, respectively. Of the NOL's, $20 million ($0 million at both 31 December 2017 and 1 January 2017) expire within 5 years, $84 million (31 December 2017 - $45 million, 1 January 2017 $70 million) expire after 5 years and $188 million (31 December 2017 - $87 million, 1 January 2017 - $71 million) have no expiration. Of the credits, $1 million (($0 million at both 31 December 2017 and 1 January 2017) expire within 5 years, $20 million (31 December 2017 - $11 million, 1 January 2017 - $13 million), expire after 5 years and $33 million ($0 million at both 31 December 2017 and 1 January 2017) have no expiration.

Deferred tax assets of $210 million (31 December 2017 - $54 million, 1 January 2017 - $56million) have not been recognized relating to NOL's of $853 million (31 December 2017 - $200 million, 1 January 2017 - $194 million), tax credits of $58 million (31 December 2017 - $22 million, 1 January 2017 - $84 million) and deductible temporary differences of $42 million (31 December 2017 - $10 million, 2016 - $2 million), respectively. The tax benefits related to NOL's, tax credits and deductible temporary differences were not recognized as it is probable (i.e., greater than 50% likelihood) that the NOL's and deferred tax assets will not be realized.

Of the loss carryforwards and tax credits not recognized totaling $911 million (31 December 2017 - $222 million, 1 January 2017 - $277 million), $134 million (31 December 2017 - $50 million, 1 January 2017 - $58 million) expire within 5 years, $61 million (31 December 2017 - $25 million, 1 January2017 - $86 million) expire after 5 years and $716 million (31 December 2017 - $147 million, 1 January 2017 - $133 million) have no expiration.

A summary of net operating loss carryforwards follows:

(Millions of dollars)	31 December 2018	31 December 2017	1 January 2017
May be carried forward for up to 5 years	$ 218	$ 27	$ 58
May be carried forward for longer than 5 years	282	124	136
May be carried forward indefinitely	1,235	416	342
TOTAL	$ 1,735	$ 567	$ 536

The company also has U.S. state NOL carryforwards of $1,037 million, $404 million, and $642 million as of 31 December 2018 and 2017, and 1 January 2017, respectively.

The company has $570 million of foreign income taxes accrued related to its investments in subsidiaries and equity investments as of 31 December 2018 (2017 - $260 million, $0 at 1 January 2017). A provision has not been made for any additional foreign income tax at 31 December 2018 on approximately $30 billion related to its investments in subsidiaries because the company controls the subsidiaries and intends to remain indefinitely reinvested. While the $30 billion could become subject to additional foreign income tax if there is a sale of a subsidiary or if earnings are remitted as dividends, it is not practicable to estimate the unrecognized deferred tax liability.

Distributions to Linde plc shareholders do not have any impact on taxes on income at the level of Linde plc.

[11] Earnings Per Share

	2018	2017
Numerator *(Millions of dollars)*		
Income From Continuing Operations - Linde plc shareholders	$ 4,685	$ 1,273
Loss from discontinued operations, net of tax - Linde plc shareholders	90	—
Net income – Linde plc	$ 4,775	$ 1,273
Denominator *(Thousands of shares)*		
Weighted average shares outstanding	330,088	285,893
Shares earned and issuable under compensation plans	313	368
Weighted average shares used in basic earnings per share *	330,401	286,261
Effect of dilutive securities		
Stock options and awards	3,726	2,853
Weighted average shares used in diluted earnings per share *	334,127	289,114
Basic earnings per share from continuing operations	$ 14.18	$ 4.45
Basic earnings per share from discontinued operations	$ 0.27	$ —
Basic Earnings Per Common Share	$ 14.45	$ 4.45
Diluted earnings per share from continuing operations	$ 14.02	$ 4.40
Diluted earnings per share from discontinued operations	$ 0.27	$ —
Diluted Earnings Per Common Share	$ 14.29	$ 4.40

* As a result of the merger, share amounts for the year ended 31 December 2018 reflect a weighted average effect of Praxair shares outstanding prior to 31 October 2018 and Linde plc shares outstanding on and after 31 October 2018.

Further information about the share option schemes is given in Note 23.

[12] Goodwill/other intangible assets

Movement Schedule Intangible Assets - Acquisition Cost

(Millions of dollars)	Goodwill	Customer Relationships	Brands/ Tradenames	Other Intangible Assets	Total
Year beginning 1 January 2017	**$ 3,117**	**$ 751**	**$ 45**	**$ 586**	**$ 4,499**
Currency adjustments	92	22	1	10	125
Additions due to acquisitions	24	1	—	40	65
Other	—	(2)	—	(17)	(19)
Year ended 31 December 2017	**$ 3,233**	**$ 772**	**$ 46**	**$ 619**	**$ 4,670**
Currency adjustments	83	95	24	(9)	193
Additions due to merger	24,025	13,649	2,226	814	40,714
Additions, primarily due to acquisitions	5	1	—	26	32
Disposals	(620)	(141)	(8)	(78)	(847)
Other	12	(20)	—	(3)	(11)
Year ended 31 December 2018	**$ 26,738**	**$ 14,356**	**$ 2,288**	**$ 1,369**	**$ 44,751**

Schedule of Intangible Assets - Cumulative Amortization

(Millions of dollars)	Goodwill	Customer Relationships	Brands/ Tradenames	Other Intangible Assets	Total
Year beginning 1 January 2017	**$ —**	**$ 214**	**$ 15**	**$ 342**	**$ 571**
Currency adjustments	—	8	—	6	14
Amortization	—	40	3	48	91
Reclassifications	—	(2)	—	(22)	(24)
Year ended 31 December 2017	**$ —**	**$ 260**	**$ 18**	**$ 374**	**$ 652**
Currency adjustments	—	(4)	—	(8)	(12)
Amortization	—	147	9	72	228
Disposals	—	(55)	(5)	(52)	(112)
Other	—	(19)	—	(5)	(24)
Year ended 31 December 2018	**$ —**	**$ 329**	**$ 22**	**$ 381**	**$ 732**
NET CARRYING AMOUNT AT 31/12/2017	**$ 3,233**	**$ 512**	**$ 28**	**$ 245**	**4,018**
NET CARRYING AMOUNT AT 31/12/2018	**$ 26,738**	**$ 14,027**	**$ 2,266**	**$ 988**	**$ 44,019**

See Note 2 for further discussion of intangible assets acquired due to the merger.

The Linde name acquired in the course of the Merger of $1,669 million has an indefinite useful life. The indefinite lived asset at Linde AG acquired as part of the business combination has been assessed for impairment, and there is no indication that the recoverable amount is below the carrying amount.

The amortization expense for intangible assets with finite useful lives was disclosed in functional costs, principally in marketing and selling expenses.

Software solutions are the main component of other intangible assets.

The carrying amount of goodwill for each unit for the opening statement of financial position as of 1 January 2017 and the years ended 31 December 2017 and 31 December 2018 is as follows:

(Millions of dollars)	31/12/2018	31/12/2017	1/1/2017
Linde AG	$ 24,183	$ —	$ —
U.S. Packaged gas	1,043	1,038	1,024
U.S. Industrial gases	942	930	920
Mexico	100	100	96
Canada	124	134	125
South America	106	129	132
Europe	41	698	629
Asia	61	61	58
Surface Technologies	138	143	133
Total	**$ 26,738**	**$ 3,233**	**$ 3,117**

The company performs annual impairment testing each year. Impairment testing is performed by business unit, which is a group of cash-generating units ("CGUs"), as this is the level at which management monitors goodwill.

The recoverable amount of each unit is determined using the unit's fair value less costs to sell. In order to determine the fair value of the unit, the company utilizes a market multiples approach, multiplying the earnings before interest, tax, depreciation, and amortization ("EBITDA") of each unit by an EBITDA multiple.

The EBITDA multiple used to determine fair value was calculated by an external financial information as of the date at which the impairment test is performed, based on the enterprise value of comparable companies divided by the EBITDA of these companies. The share prices of comparable companies, used to calculate the enterprise value, are derived from publicly available information. Inputs such as adjusted earnings before interest, tax, depreciation, and amortization of comparable companies, are developed by the external provider using financial data published by these companies. The data used to calculate the multiple is assigned to Level 2 of the fair value hierarchy.

The company has not recorded any goodwill impairment losses. As of 1 January 2017, 31 December 2017, and 31 December 2018 the recoverable amounts of each unit significantly exceeded their net carrying amount.

The market multiples used as of 31 December 2018 were within the range of 10.2 to 13.8. At 31 December 2017 the market multiple was 9.1 (1 January 2017 was 12.1), and the valuation technique was consistently applied for each period. No reasonably possible change in key assumptions would result in an impairment. A significant decline in EBITDA across any group of CGUs could result in a future impairment charge. EBITDA would have to decline by 25% before there would be risk of a goodwill impairment charge.

[13] Tangible assets

Schedule of Tangible Assets - Acquisition Cost

(Millions of dollars)	Production plants (primarily 15-year life)	Storage tanks	Transportation equipment and other	Cylinders (primarily 30-year life)	Buildings	Land and improvements	Construction in progress	Total
Year beginning 1 January 2017	**$ 14,594**	**$ 2,360**	**$ 1,492**	**$ 1,722**	**$ 1,096**	**$ 559**	**$ 1,558**	**$ 23,381**
Additions due to acquisitions	3	—	1	2	—	—	—	6
Additions	898	109	65	92	48	13	49	1,274
Disposals	(30)	(6)	(16)	(24)	(3)	(3)	(8)	(90)
Currency and other adjustments	793	157	46	83	61	20	(440)	720
Year ended 31 December 2017	**$ 16,258**	**$ 2,620**	**$ 1,588**	**$ 1,875**	**$ 1,202**	**$ 589**	**$ 1,159**	**$ 25,291**
Additions due to merger	10,907	1,813	1,263	2,493	2,052	616	1,231	20,375
Additions due to acquisitions	—	—	1	5	—	—	—	6
Additions	1,028	146	122	132	93	10	338	1,869
Disposals	(1,877)	(410)	(268)	(504)	(145)	(43)	(58)	(3,305)
Currency and other adjustments	(810)	(104)	(7)	(46)	(38)	(11)	(288)	(1,304)
Year ended 31 December 2018	**$ 25,506**	**$ 4,065**	**$ 2,698**	**$ 3,955**	**$ 3,164**	**$ 1,161**	**$ 2,382**	**$ 42,932**

Schedule of Tangible Assets - Cumulative Depreciation

(Millions of dollars)	Production plants (primarily 15-year life)	Storage tanks	Transportation equipment and other	Cylinders (primarily 30-year life)	Buildings	Land and improvements	Construction in progress	Total
Year beginning 1 January 2017	**$ 8,256**	**$ 1,386**	**$ 966**	**$ 794**	**$ 564**	**$ 166**	**$ —**	**$ 12,132**
Depreciation	754	136	79	77	36	11	—	1,093
Disposals	(28)	(5)	(20)	(19)	(2)	—	—	(74)
Currency and other adjustments	185	64	33	29	3	1	—	315
Year ended 31 December 2017	**$ 9,167**	**$ 1,581**	**$ 1,058**	**$ 881**	**$ 601**	**$ 178**	**$ —**	**$ 13,466**
Depreciation	1,095	184	137	140	69	10	—	1,635
Disposals	(1,181)	(275)	(143)	(254)	(64)	(10)	—	(1,927)
Currency and other adjustments	(675)	(121)	(44)	(51)	(38)	(6)	—	(935)
Year ended 31 December 2018	**$ 8,406**	**$ 1,369**	**$ 1,008**	**$ 716**	**$ 568**	**$ 172**	**$ —**	**$ 12,239**
NET CARRYING AMOUNT AT 12/31/2017	**$ 7,091**	**$ 1,039**	**$ 530**	**$ 994**	**$ 601**	**$ 411**	**$ 1,159**	**$ 11,825**
NET CARRYING AMOUNT AT 12/31/2018	**$ 17,100**	**$ 2,696**	**$ 1,690**	**$ 3,239**	**$ 2,596**	**$ 989**	**$ 2,382**	**$ 30,693**

Tangible leased assets include buildings, machinery and equipment, and fixtures, with a carrying amount totaling $71 million (2017: $3 million). Due to the form of the underlying finance leases, these tangible assets are attributable to Linde in its capacity as the economic owner of the assets. Of the total $24 million (none in 2017) relates to land and buildings, $0 million (2017: $2 million) to machinery and equipment and $47 million (2017: $1 million) to vehicles.

Impairment tests were based on the recoverable amount of the assets examined, whereby generally the value in use was applied. Impairment losses of $51 million were recognized in 2018 (no impairments in 2017) within currency and other adjustments. The impairment losses related mainly to production plants and were allocated to the following segments: Asia $22 million and North America $29 million. The impairment losses relating to tangible assets are largely included in cost of sales.

Borrowing costs during the construction phase of $20 million (2017: $28 million) were capitalized, based on an approximately 2.8% interest rate for both 2018 and 2017.

Tangible assets of $53 million were pledged as security.

[14] Investments in associates and joint ventures/other financial assets

Schedule of Financial Assets - Acquisition Cost

(Millions of dollars)	Investments in associates and joint ventures (at equity)	Other investments	Non-current Loans	Total
Year beginning 1 January 2017	**$ 717**	**$ —**	**$ —**	**$ 717**
Currency adjustments	76	—	—	76
Additions	52	—	—	52
Disposals	118	—	—	118
Year ended 31 December 2017	**$ 727**	**$ —**	**$ —**	**$ 727**
Currency adjustments	(4)	—		(4)
Additions (Primarily Merger Impact)	546	21	66	633
Disposals	289	—	—	289
Year ended 31 December 2018	**$ 980**	**$ 21**	**$ 66**	**$ 1,067**

The share of profit and loss from associates and joint ventures in the 2018 financial year was $54 million (2017: $47 million). $34 million of the total figure related to the Asia segment (2017: $32 million) and $20 million to the Europe segment (2017: $15 million).

On the reporting date, there were no contingent liabilities relating to shares in associates or joint ventures. There were no payment obligations relating to joint ventures and associates that had not been recognized in the statement of financial position at 31 December 2018 and 2017. There were no significant restrictions on the ability of the associates and joint ventures to transfer dividends or funds to Linde or to repay loans to Linde as of 31 December 2018 and 2017. Cumulative amortization was not considered material.

More information about associates and joint ventures is given in Note 33.

No individual investment in associates or joint ventures is material and as such no individual financial information is disclosed. Aggregate financial information about associates and joint ventures based on the investment in those associates held by Linde is immaterial and is therefore not disclosed separately.

[15] Inventories

(Millions of dollars)	12/31/2018	12/31/2017	1/1/2017
Inventories			
Raw materials and supplies	$340	$224	$197
Work in process	321	57	45
Finished goods (including merchandise)	997	333	308
Total Inventories	**$ 1,658**	**$ 614**	**$ 550**

At 31 December 2018, the total inventory allowance was $54 million ($51 million at 31 December 2017 and $49 million at 1 January 2017). The inventories recognized as an expense in the 2018 financial year were $10.2 billion ($7.4 billion in 2017). Employee expenses are not a significant component of capitalized inventory costs.

[16] Receivables from finance leases, trade receivables, miscellaneous receivables and assets and income tax receivables

Receivables And Other Assets

	Current			Non-current			Total		
(Millions of dollars)	31/12/2018	31/12/2017	1/1/2017	31/12/2018	31/12/2017	1/1/2017	31/12/2018	31/12/2017	1/1/2017
Receivables from finance leases	$ 23	$ 1	$ 1	$ 52	$ 5	$ 6	$ 75	$ 6	$ 7
Contract assets	267	—	—	—	—	—	267	—	—
Trade receivables	4,104	1,675	1,518	7	—	—	4,111	1,675	1,518
Derivatives with positive fair values	66	17	14	127	—	4	193	17	18
Other financial assets	137	35	43	85	73	65	222	108	108
Other receivables and assets	821	268	191	565	304	298	1,386	572	489
Miscellaneous other receivables and other assets	$ 1,024	$ 320	$ 248	$ 777	$ 377	$ 367	$ 1,801	$ 697	$ 615
Income tax receivables	$ 172	$ 58	$ 39	$ —	$ —	$ —	$ 172	$ 58	$ 39

Receivables from finance leases

Almost all the receivables from finance leases relate to agreements which are classified as embedded finance leases according to IFRIC 4/IAS 17. The counterparty risk arising from receivables from finance leases is covered by the air separation plants and other plants underlying the contracts.

Receivables From Finance Leases

(Millions of dollars)	31/12/2018	31/12/2017	1/1/2017
TOTAL FUTURE MINIMUM LEASE PAYMENTS (GROSS INVESTMENT)	**$ 94**	**$ 9**	**$ 11**
due within one year	32	2	2
due in one to five years	59	6	6
due in more than five years	3	1	3
PRESENT VALUE OF MINIMUM LEASE PAYMENTS	**$ 75**	**$ 6**	**$ 7**
due within one year	23	1	1
due in one to five years	51	5	5
due in more than five years	1	0	1
UNEARNED FINANCE INCOME INCLUDED IN THE MINIMUM LEASE PAYMENTS	**$ 19**	**$ 3**	**$ 4**

Miscellaneous trade receivables

Miscellaneous trade receivables are due from a large number of customers in a wide variety of industry sectors and many different regions. To assess the recoverability of accounts receivable, the creditworthiness of customers is subject to constant review.

[17] Equity

Equity Presentation

Called-up share capital presented as equity ("Called-up share capital") represents the notional value of outstanding ordinary shares.

Share premium represents the accumulated premiums arising on the issue of shares.

Retained earnings (including remeasurement of defined benefit plans) represents the portion of net income retained by the company that have not been declared or distributed to shareholders as dividends.

Treasury shares represents the premium over par value of Linde plc share that have been repurchased by the company and not yet cancelled or retired.

Other reserves reports the differences arising from currency translation differences of the financial statements of foreign subsidiaries and gains or losses on the remeasurement of securities and hedging instruments, accounted for in equity rather than being recognised in the statement of profit and loss.

Initial Adoption of IFRS

Effective 1 January 2017, the company applied the provisions of IFRS 1*, First-time Adoption of International Financial Reporting Standards*. The initial adoption of IFRS resulted in certain adjustments to the equity of Linde plc as of 1 January 2017. See Note 29 for a detailed analysis of these adjustments.

Linde plc Shareholders' Equity

At 31 December 2018, Linde has total authorized share capital of €1,825,000 divided into 1,750,000,000 ordinary shares of €0.001 each, 25,000 A ordinary shares of €1.00 each, 25,000 deferred shares of €1.00 each and 25,000,000 preferred shares of €0.001 each.

At 31 December 2018 there were 551,310,272 and 547,241,630 of Linde plc ordinary shares issued and outstanding, respectively. At 31 December 2018 there were no shares of A ordinary shares, deferred shares or preferred shares issued or outstanding.

At 31 December 2017 there were 800,000,000 shares of Praxair common stock authorized (par value $0.01 per share) of which shares 383,230,625 were issued and 286,776,991 were outstanding at 31 December 2017. At 31 December 2017, there were 25,000,000 shares of Praxair preferred stock (par value $0.01 per share) authorized, of which no shares were issued and outstanding.

The Linde Board of Directors may from time to time authorize the issuance of one or more series of preferred stock and, in connection with the creation of such series, determine the characteristics of each such series including, without limitation, the preference and relative, participating, optional or other special rights, and the qualifications, limitations or restrictions of the series.

Merger of Praxair and Linde AG

The total fair value of consideration transferred for the merger was $43,288 million, resulting in an increase to stockholders' equity (see Note 2 for additional information). On 31 October 2018, the conversion of Praxair common stock and Linde AG common stock into Linde ordinary shares resulted in a $3 million decrease to "Called-up share capital " in order to reflect the aggregate par value of outstanding ordinary shares. Each share of Praxair common stock held in treasury immediately prior to the merger was canceled. The elimination of Praxair's historical treasury shares at cost resulted in a $7,113 million decrease in "Treasury shares". The current balance reported in Treasury shares represent the value of those shares of Linde plc acquired subsequent to the merger.

As indicated above, in connection with the merger, Praxair and Linde AG common stock was converted into shares of Linde plc ordinary shares.

The following table summarizes the equity transactions related to the merger:

(Millions of dollars)	Called up share capital	Share premium	Retained earnings (including remeasurement of defined benefit plans)	Treasury shares	Total equity attributable to Linde plc shareholders	Non-controlling interests	Total equity
Merger with Linde AG (a)	$ —	$ —	$ 43,288	$ —	$ 43,288	$ —	$ 43,288
Increase in noncontrolling interests (a)	—	—	—	—	—	5,774	5,774
Reclassification of Praxair share premium	—	(4,109)	4,109	—	—		—
Conversion of Praxair to Linde plc shares (b)	(3)	—	3	—	—	—	—
Cancellation of Praxair treasury shares (c)	—	—	(7,113)	7,113	—	—	—
Impact of Merger	**$ (3)**	**$ (4,109)**	**$ 40,287**	**$ 7,113**	**$ 43,288**	**$ 5,774**	**$ 49,062**

The following table summarizes the ordinary share transactions during 2017 and 2018:

(in thousands of shares)	Shares subscribed	Treasury shares	Shares outstanding
Balance 1 January 2017	**383,231**	**98,330**	**284,901**
Issuances for employee savings and incentive plans	—	(1,885)	1,885
Purchases	—	9	(9)
Balance 31 December 2017	**383,231**	**96,454**	**286,777**
Issuances for employee savings and incentive plans	255	(1,140)	1,395
Purchases	—	4,079	(4,079)
Impact of Merger:			
Issued in exchange for Linde AG (d)	263,148	—	263,148
Cancellation of Praxair treasury shares (c)	(95,324)	(95,324)	—
Balance 31 December 2018	**551,310**	**4,069**	**547,241**

(a) The total fair value of consideration transferred for the merger was $43,288 million, resulting in an increase to "Retained earnings" in the statement of changes in consolidated equity. The fair value of noncontrolling interests increased $5,774 million (see Note 3 for additional information).

(b) On October 31, 2018, the conversion of Praxair common stock and Linde AG common stock into Linde ordinary shares resulted in a $3 million decrease to "Called-up share capital" with a corresponding increase to "Retained earnings" in stockholders' equity.

(c) Each share of Praxair common stock held in treasury immediately prior to the merger was canceled. The elimination of Praxair's historical treasury shares at cost resulted in a $7,113 million decrease in "Treasury shares" and "Retained earnings" in the statement of changes in consolidated equity.

(d)The following table provides the share exchange calculation:

(in thousands, except Linde AG exchange ratio)	
Linde plc shares exchanged for Linde AG shares	
Linde AG common stock tendered as of 31 October 2018	170,875
Business combination agreement exchange ratio	1.54
Linde plc ordinary shares issued in exchange for Linde AG	263,148
Linde plc shares issued to Praxair shareholders upon conversion	
Praxair shares outstanding at merger date	287,907
Total Linde plc shares issued at merger date	**551,055**

Refer to the Linde plc entity financial statements for more detail on the capitalization activities upon and subsequent to the merger.

Other Linde plc Ordinary Share and Treasury Shares Transactions

Linde may issue new ordinary shares for dividend reinvestment and stock purchase plans and employee savings and incentive plans. The number of new Linde ordinary shares issued from merger date through 31 December 2018 was approximately 255,000 shares. Prior to the merger, Praxair issued shares related to such activity out of treasury stock.

On 10 December 2018 the Linde board of directors approved $1.0 billion for the repurchase of its ordinary shares under which Linde had repurchased 4,068,642 shares through 31 December 2018. Subsequently, on 22 January 2019 the company's board of directors approved the additional repurchase of up to $6.0 billion of its ordinary shares.

On 10 December 2018, the directors of Linde plc declared an interim dividend of $0.825 per share for the fourth quarter of 2018 (the "Q4 Dividend"). The Q4 Dividend was payable on 27 December 2018 to shareholders of record on 18 December 2018.

Noncontrolling interests

The total noncontrolling interest ("NCI") as of 31 December 2018, 31 December 2017 and 1 January 2017 was $6,094 million, $493 million, and $420 million respectively. The NCI that is material to the company at the end of 2018 relates to 8% NCI in Linde AG. Summary financial information for Linde AG is disclosed in Note 2 Acquisitions. Additionally Operating cash flows, including the impact of discontinued operations, for Linde AG for 2018 was $735 million, while Investing and Financing activities utilized $449 million.

On 8 April 2019 Linde AG completed the merger squeeze-out of the NCI for a cash consideration of €189.46 per share. The total payment for the squeeze out was $3.2 billion (€2.8 billion).

In general the voting rights of noncontrolling shareholders correspond to their share of the equity in the companies concerned. Detailed information about other individual subsidiaries which have noncontrolling shareholders is not disclosed due to the individual figures not being material.

Capital structure management

The aim of Linde's capital structure management is to obtain unrestricted low-cost access to the capital markets, to maintain A/2 credit ratings while consistently growing dividends. Linde follows a disciplined investment strategy and targets value enhancing investment opportunities that offer growth rates above the company's cost of capital. The company also anticipates regularly repurchasing shares while maintaining its target credit ratings.

Linde has a $5 billion syndicated revolving credit line at its disposal, which is available until 2024.

[18] Provisions for pensions and similar obligations

Provisions For Pensions And Similar Obligations

Millions of dollars	**31/12/2018**	**31/12/2017**	**1/1/2017**
Provisions for pension plans	$ 2,053	$ 898	$ 905
Provisions for similar obligations	58	—	—
TOTAL PROVISIONS	**$ 2,111**	**$ 898**	**$ 905**
Prepaid pension costs	$ 120	$ 18	$ 35

Different countries have different pension systems, due to the variety of legal, economic and fiscal conditions applicable in each country. These are generally based on the remuneration and length of service of the employees.

The provisions for similar obligations include bridging allowances as well as other obligations. Occupational pension schemes can be either defined contribution or defined benefit schemes. In the case of defined benefit plans, the company's obligation is to meet the defined benefit commitments to current and former employees. Two different methods can be distinguished: the recognition of provisions for pensions and the use of externally financed pension schemes.

Defined Contribution Plans

Linde's U.S. business employees are eligible to participate in the Linde defined contribution savings plan. Employees may contribute up to 40 percent of their compensation, subject to the maximum allowable by IRS regulations. For the U.S. packaged gases business, company contributions to this plan are calculated as a percentage of salary based on age plus service. U.S. employees other than those in the packaged gases business have company contributions to this plan calculated on a graduated scale based on employee contributions to the plan. The cost for these defined contribution plans was $33 million in 2018 and $29 million in 2017 (these costs are not included in the tables that follow).

The defined contribution plans include a non-leveraged employee stock ownership plan ("ESOP") which covers all employees participating in this plan. The collective number of shares of Linde ordinary shares in the ESOP totaled 2,381,714 at 31 December 2018.

Certain non-U.S. subsidiaries of the company also sponsor defined contribution plans where contributions are determined under various formulas. The expense for these plans was $32 million in 2018 and $21 million in 2017 (these expenses are not included in the tables that follow).

Defined Benefit Pension Plans

Linde has two main U.S. retirement programs which are non-contributory defined benefit plans: the Linde Pension Plan and the CBI Pension Plan. The latter program benefits primarily former employees of CBI Industries, Inc. which Linde acquired in 1996. Effective 1 July 2002, the Linde Pension Plan was amended to give participating employees a one-time choice to remain covered by the old formula or to elect coverage under a new formula. The old formula is based predominantly on years of service, age and compensation levels prior to retirement, while the new formula provides for an annual contribution to an individual account which grows with interest each year at a predetermined rate. Also, this new formula applies to all new employees hired after 30 April 2002 into businesses adopting this plan. The plan participants have the option to take a lump-sum payment or annual pension payments. Legal and regulatory minimum funding requirements are in place.

In addition to the U.S. retirement plans Linde has other global defined benefit commitments, primarily in Germany and the United Kingdom ("UK"). The defined benefit commitments in Germany relate to old age pensions, invalidity pensions and surviving dependents pensions. These commitments also take into account vested rights for periods of service prior to 1 January 2002 based on earlier final salary pension plan rules. In addition, there are direct commitments in respect of the salary conversion scheme for the form of cash balance plans. The resulting pension payments are calculated on the basis of an interest guarantee and the performance of the corresponding investment. There are no minimum funding requirements. The pension obligations in Germany are partly funded by a Contractual Trust Agreement ("CTA"). Defined benefit commitments in the U.K. prior to 1 July 2003 are earnings-related and dependent on the period of service. Such commitments relate to old age pensions, invalidity pensions and surviving dependents pensions. Beginning in 1 April 2011, the amount of future increases in inflation-linked pensions and of increases in pensionable emoluments was restricted. Legal, regulatory and contractual minimum funding requirements are in place. Regulatory funding obligations to resolve a deficit, based on the local valuation, mainly relate to the UK. A renegotiated multi-year funding plan has been signed in 2018. The annual payments are £35 million per year payable in December as long as there is a deficit under local valuation.

The U.S. and non-U.S. pension plan assets are comprised of a diversified mix of investments, including domestic and international corporate equities, government securities and corporate debt securities. Linde has several plans that provide supplementary retirement benefits primarily to higher level employees that are unfunded and are nonqualified for federal tax purposes. Pension coverage for employees of certain of Linde's non-U.S. subsidiaries generally is provided by those companies through separate plans. Obligations under such plans are primarily provided for through diversified investment portfolios, with some smaller plans provided for under insurance policies or by book reserves.

Multi-employer Pension Plans

In the United States Linde participates in six multi-employer defined benefit pension plans ("MEPs"), pursuant to the terms of collective bargaining agreements, covering approximately 200 union-represented employees. The collective bargaining agreements expire on different dates through 2021. In connection with such agreements, the company is required to make periodic contributions to the MEPs in accordance with the terms of the respective collective bargaining agreements. Linde's participation in these plans is not material either at the plan level or in the aggregate. Linde's contributions to these plans were $2 million in 2018 and 2017 (these costs are not included in the tables that follow). For all MEPs, Linde's contributions were significantly less than 1 percent of the total contributions to each plan for 2017. Total 2018 contributions were not yet available from the MEPs.

Linde has obtained the most recently available Pension Protection Act ("PPA") annual funding notices from the Trustees of the MEPs. The PPA classifies MEPs as either Red, Yellow or Green zone plans. Among other factors, plans in the Red zone are generally less than 65 percent funded with a projected insolvency date within the next twenty years; plans in the Yellow zone are generally 65 to 80 percent funded; and plans in the Green zone are generally at least 80 percent funded. According to the most current data available, three of the MEPs that the company participates in are in a Red zone status and three are in a Green zone status. As of 31 December 2018, the three Red Zone plans have pending or have implemented financial improvement or rehabilitation plans. Linde does not currently anticipate significant future obligations due to the funding status of these plans. If Linde determined it was probable that it would withdraw from an MEP, the company would record a liability for its portion of the MEP's unfunded pension obligations, as calculated at that time. Historically, such withdrawal payments have not been significant.

The amount of the pension obligation (actuarial present value of the defined benefit obligation, or DBO) was calculated using actuarial valuation methods, which require the use of estimates. In addition to assumptions about mortality and disability, the following assumptions, which depend on the economic situation in that particular country, are also relevant; for countries classed as "All Other", weighted average figures based on the obligation are given:

Assumptions Used To Calculate The Provisions For Pensions

in percent	**Germany**		**UK**		**USA**		**All Other**	
Year ended 31 December	**2018**	**2017**	**2018**	**2017**	**2018**	**2017**	**2018**	**2017**
Discount rate	1.82%	2.22%	2.94%	2.50%	4.20%	3.61%	3.95%	5.69%
Growth in future benefits	2.51%	3.00%	2.35%	3.75%	2.69%	3.25%	2.36%	3.29%
Growth in pensions	1.64%	4.00%	2.36%	4.00%	2.29%	0.00%	1.34%	0.00%

The growth in future benefits comprises expected future increases in salaries, which are estimated annually, taking inflation and the economic situation into account.

The sensitivity analysis below demonstrates the extent to which the present value of the defined benefit obligation changes when, in each case, just one of the actuarial assumptions changes while the other actuarial assumptions remain the same.

For the pension plans in Germany, an increase of one year in life expectancy would result in an increase in the defined benefit obligation of 4.9 percent. The sensitivity analysis of life expectancy in Germany is based on pension funds held at 31 December 2018. For the pension plans in the UK, an increase of one year in life expectancy would result in an increase in the DBO of 3.9 percent (2017: 3.4 percent). For the pension plans in the United States, no sensitivity analysis of life expectancy was prepared, as the plan participants generally avail themselves of the option to be paid a lump sum.

In Germany, life expectancy is calculated on the basis of the “2018 G mortality tables” produced by Professor Dr Klaus Heubeck. Pension plans in the UK use their own mortality tables and biometric assumptions. These are determined on the basis of actual experience in a pool of comparable pension plans. At the reporting date, the average life expectancy applicable to pension plans in the UK is 22.7 years for a male pensioner aged 65 (2017: 22.4 years) and 24.5 years for a female pensioner aged 65 (2017: 24.4 years), while the future average life expectancy at the pensionable age of 65 for active members of the pension plans is currently 25.0 years for men aged 45 (2017: 23.6 years) and 27.3 years for women aged 45 (2017: 25.7 years).

Sensitivity Analysis

(Millions of dollars)	Change	Discount rate		Growth in future benefits		Growth in pensions	
		+50 bp	–50 bp	+50 bp	–50 bp	+50 bp	–50 bp
Germany	31/12/2018	$ (152)	$ 176	$ 13	$ (14)	$ 81	$ (74)
	31/12/2017	(7)	8	1	(1)	4	(4)
UK	31/12/2018	(366)	418	15	(15)	320	(287)
	31/12/2017	(9)	10	—	—	4	(5)
USA	31/12/2018	(118)	130	16	(15)	–	—
	31/12/2017	(148)	126	5	(36)	–	—
All other	31/12/2018	(76)	85	17	(17)	49	(51)
	31/12/2017	(31)	33	6	(37)	6	(5)
TOTAL	31/12/2018	**$ (712)**	**$ 809**	**$ 61**	**$ (61)**	**$ 450**	**$ (412)**
	31/12/2017	**$ (195)**	**$ 177**	**$ 12**	**$ (74)**	**$ 14**	**$ (14)**

Reconciliation Of The Defined Benefit Obligation And Of The Plan Assets

(Millions of dollars)	**Germany**		**UK**		**USA**		**All other**		**Total**	
	Defined benefit obligation	**Plan assets**	**Defined benefit obligation**	**Plan assets**	**Defined benefit obligation**	**Plan assets**	**Defined benefit obligation**	**Plan assets**	**Defined benefit obligation**	**Plan assets**
Year beginning 1 January 2017	**$ 83**	**$0**	**$109**	**$ (99)**	**$2,066**	**$ (1,506)**	**$625**	**$ (408)**	**$2,883**	**$ (2,013)**
Service cost	3	–	–	–	32	–	14	–	49	–
Current service cost	2	–	–	–	32	–	14	–	48	–
Past service cost	1	–	–	–	–	–	—	–	1	–
Effects of plan curtailments	–	–	–	–	—	–	—	–	—	–
Effects from plan settlements	–	–	–	–	–	–	—	–	—	–
Interest expense (+)/interest income (–)	2	0	3	(3)	71	(59)	33	(21)	109	(83)
Remeasurements	(6)	0	1	(5)	168	(184)	7	(15)	170	(204)
Return on plan assets (excluding amounts included in interest expenses and income)	–	—	–	(5)	–	(184)	—	(15)	—	(204)
Actuarial gains (–)/losses (+)	(6)	—	1	–	168	–	7	–	170	–
Effects from changes in demographic assumptions	–	—	(2)	–		–	(2)	–	(4)	–
Effects from changes in financial assumptions	(7)	—	3	–		–	14	–	10	–
Effects from changes in experience assumptions	1	–	—	–	168	–	(5)	–	164	–
Effect due to asset ceiling	–	–	–	–	–	–	—	–	—	–

Reconciliation Of The Defined Benefit Obligation And Of The Plan Assets

Employers' contributions	—	—	–	(2)	–	(4)	—	(13)	—	(19)
Employees' contributions	—	—	—	—	–	–	–	—	0	—
Pension payments made	(2)	—	(9)	9	(105)	98	(39)	23	(155)	130
Settlement payments	–	–	–	–	–	–	—	—	—	0
Effects of changes in exchange rates	12	–	10	(10)	–	—	24	(23)	46	(33)
Changes in Group structure/other changes	–	–	—	—	–	–	—	—	—	0
Year ended 31 December 2017	**$ 92**	**$ —**	**$ 114**	**$ (110)**	**$ 2,232**	**$ (1,655)**	**$ 664**	**$ (457)**	**$ 3,102**	**$ (2,222)**
Merger impact (a)	1,826	(1,056)	4,354	(4,282)	429	(475)	795	(542)	7,404	(6,355)
Service cost	8	—	9	—	70	—	19	—	106	—
Current service cost	8	—	7	—	37	—	19	—	71	—
Past service cost	—	—	2	—	28	—	—	—	30	—
Effects of plan curtailments	—	—	—	—	—	—	—	—	—	—
Effects from plan settlements	—	—	—	—	5	—	—	—	5	—
Interest expense (+)/interest income (–)	6	(2)	21	(20)	73	(54)	30	(21)	130	(97)
Remeasurements	20	32	(14)	87	(148)	127	(10)	11	(152)	257
Return on plan assets (excluding amounts included in interest expenses and income)	—	32	—	87	—	127	—	11	—	257
Actuarial gains (–)/losses (+)	20	—	(14)	—	(148)	—	(10)	—	(152)	—
Effects from changes in demographic assumptions	—	—	(1)	—	30	—	2	—	31	—
Effects from changes in financial assumptions	16	—	(9)	—	(150)	—	(23)	—	(166)	—
Effects from changes in experience assumptions	4	—	(4)	—	(28)	—	11	—	(17)	—
Effect due to asset ceiling	—	—	—	—	—	—	—	—	—	—
Employers' contributions	—	—	—	(55)	—	(12)	(40)	(20)	(40)	(87)
Employees' contributions	3	(3)	—	—	—	—	1	(1)	4	(4)
Pension payments made	(12)	—	(31)	31	(120)	100	(13)	40	(176)	171
Settlement payments	(50)	—	—	—	(18)	18	(56)	48	(124)	66
Effects of changes in exchange rates	23	(14)	(9)	10	—	—	(33)	30	(19)	26

Reconciliation Of The Defined Benefit Obligation And Of The Plan Assets

Changes in Group structure/other changes	—	0	—	—	—	—	—	1	—	1
Year ended 31 December 2018	**$ 1,916**	**$ (1,043)**	**$ 4,444**	**$ (4,339)**	**$ 2,518**	**$ (1,951)**	**$ 1,357**	**$ (911)**	**$ 10,235**	**$ (8,244)**

(a) Represents plan assets and benefit obligations assumed as part of the merger between Praxair and Linde AG. Such plan assets and benefit obligations were remeasured as of the merger date and all subsequent activity through 31 December 2018 is presented within the respective caption above.

Contributions

At a minimum, Linde contributes to its pension plans to comply with local regulatory requirements (e.g., ERISA in the United States). Discretionary contributions in excess of the local minimum requirements are made based on many factors, including long-term projections of the plans' funded status, the economic environment, potential risk of overfunding, pension insurance costs and alternative uses of the cash. Changes to these factors can impact the timing of discretionary contributions from year to year. Pension contributions were $87 million in 2018, $19 million in 2017 and $11 million in 2016. Estimated required contributions for 2019 are currently expected to be in the range of $95 million to $160 million.

The expense for newly acquired pension entitlements in the financial year and the net interest cost for each respective financial year are determined each year on the basis of the prior year’s net obligation at the reporting date.

Pension Expense Relating To Defined Benefit Plans

	Germany		**UK**		**USA**		**All Other**		**Total**	
(Millions of dollars)	**2018**	**2017**	**2018**	**2017**	**2018**	**2017**	**2018**	**2017**	**2018**	**2017**
Service cost	$ 8	$ 3	$ 9	$ 0	$ 70	$ 32	$ 19	$ 13	$ 106	$ 49
Current service cost	8	2	7	—	37	32	19	13	71	48
Past service cost	—	1	2	—	28	–	—		30	1
Gains (–)/losses (+) from plan curtailments	—	–	—	—	—	–	—	–	—	—
Gains (–)/losses (+) from plan settlements	—	–	—	—	5	—	—	–	5	—
Net interest expense (+)/ income (–)	4	2	1	—	19	12	9	12	33	26
Interest expense from DBO	6	2	21	3	73	71	30	33	130	109
Interest income from plan asset	(2)	—	(20)	(3)	(54)	(59)	(21)	(21)	(97)	(83)
Other effects recognised in the statement of profit and loss	—	–	—	—	14	–	1	1	15	1
Total net pension cost	**$ 12**	**$ 5**	**$ 10**	**$ 0**	**$ 103**	**$ 44**	**$ 29**	**$ 27**	**$ 154**	**$ 76**

For the external financing of defined benefit obligations, The company uses standard international models for the transfer of pension assets (e.g. pension funds and Contractual Trust Arrangements). Pension plans financed via external pension funds exist principally in Australia, Canada, Germany, Ireland, South Africa, Switzerland, the UK and the U.S.

In some countries, Linde is obliged to make contributions to plan assets as a result of legal requirements or contractual agreements. In certain countries, however, these increases in plan assets will not lead to the recognition of an asset because of the asset ceiling described in IAS 19.64 (IFRIC 14). In 2018, as in the previous year, there was no asset ceiling.

Funding Status Of The Defined Benefit Obligation

(Millions of dollars)	Germany		UK		USA		All Other		Total	
For the years ended 31 December	**2018**	**2017**	**2018**	**2017**	**2018**	**2017**	**2018**	**2017**	**2018**	**2017**
Actuarial present value of pension obligations (defined benefit obligation)	$1,916	$ 92	$4,444	$ 114	$2,518	$2,232	$1,357	$ 664	$10,235	$3,102
of which unfunded pension obligations	115	92	—	—	140	134	225	63	480	289
of which funded pension obligations	1,801	—	4,444	114	2,378	2,098	1,132	601	9,755	2,813
Fair value of plan assets	(1,043)	—	(4,339)	(110)	(1,951)	(1,655)	(911)	(457)	(8,244)	(2,222)
NET OBLIGATION	**$ 873**	**$ 92**	**$ 105**	**$ 4**	**$ 567**	**$ 577**	**$ 446**	**$ 207**	**$ 1,991**	**$ 880**
Year ended 31 December	**$ 873**	**$ 92**	**$ 105**	**$ 4**	**$ 567**	**$ 577**	**$ 446**	**$ 207**	**$ 1,991**	**$ 880**
of which pension provision (+)	873	92	140	4	604	577	494	225	2,111	898
of which pension asset (–)	—	–	(35)	—	(37)	—	(48)	(18)	(120)	(18)

Linde is exposed to various risks in relation to defined benefit pension schemes. In addition to general actuarial risks, the company is exposed to currency risk and investment risk in respect of the plan assets.

Plan assets and the defined benefit obligation may fluctuate over time. To compensate for such fluctuations, potential fluctuations in the defined benefit obligation are taken into account in the course of the investment management of the plan assets. In ideal circumstances, plan assets and pension obligations are influenced in the same way by external factors, which provides a natural protection against such factors (liability-driven investment). Moreover, the broadly-based portfolio structure of plan assets in the company results in diversification of capital market risk.

Portfolio Structure Of Pension Assets

(Millions of dollars)	Germany		UK		USA		All Other		Total			
	2018	**2017**	**2018**	**2017**	**2018**	**2017**	**2018**	**2017**	**2018**	**in %**	**2017**	**in %**
Shares	$ 297	$ —	$ 759	$ 28	$ 933	$1,005	$308	$187	$2,297	27.9%	$ 1,220	54.9%
Fixed-interest securities	463	—	2,201	71	772	503	413	220	3,849	46.7%	794	35.7%
Property	63	—	20	—	145	147	62	—	290	3.5%	147	6.6%
Insurance	0	—	—	—	—	—	56	50	56	0.7%	50	2.3%
Others	220	—	1,359	11	101	—	72	—	1,752	21.2%	11	0.5%
TOTAL	**$1,043**	**$ —**	**$ 4,339**	**$110**	**$ 1,951**	**$1,655**	**$911**	**$457**	**$8,244**	**100%**	**$ 2,222**	**100%**

Plan assets comprise mainly shares and fixed-interest securities. Prices quoted in an active market are not available in the case of property and insurance. Around half of the fixed-interest securities relate to government bonds issued by first-rate debtors (the UK, the U.S. and Germany) as part of the "liability-driven investment" strategies pursued by the corresponding pension plans, while the rest relate to broadly diversified portfolios of bonds issued by companies and emerging markets, as well as loans to finance companies and property.

Financial instruments issued by the company are not included in plan assets to any significant extent. The plan assets do not include any real estate used by the company.

[19] Miscellaneous provisions

Miscellaneous Provisions

	Current			Non-current			Total		
	31 December		1 January	31 December		1 January	31 December		1 January
(Millions of dollars)	2018	2017	2017	2018	2017	2017	2018	2017	2017
Warranty obligations and risks from transactions in course of completion	$ 56	$ —	$ —	$ 18	$ —	$ —	$ 74	$ —	$ —
Provisions for legal disputes	77	2	1	83	16	14	160	18	15
Obligations relating to personnel	94	15	12	92	61	48	186	76	60
Dismantling obligations	8	1	—	296	28	27	304	29	27
Restructuring provisions	97	20	61	9	3	6	106	23	67
Environmental provisions	7	4	6	12	5	3	19	9	9
Insurance provisions	7	12	8	25	23	25	32	35	33
Other obligations	106	—	—	—	—	—	106	—	—
TOTAL	**$ 452**	**$ 54**	**$ 88**	**$ 535**	**$ 136**	**$ 123**	**$ 987**	**$ 190**	**$ 211**

The provisions for warranties and onerous contracts consist principally of provisions for onerous contracts, guarantees and warranties. The provisions for warranties relate mainly to the Engineering Division and are generally utilized within three years.

The provisions for obligations relating to personnel comprise mainly provisions for profit-sharing and other variable compensation.

The provisions for dismantling obligations are stated at a discounted settlement amount. A corresponding item is recognised in tangible assets and is subject to depreciation. The provision is compounded over the duration of the underlying contracts. Due to the wide range of residual terms of the contracts, the residual term of the provision falls mainly in a range of between one and twenty years.

The restructuring provisions include provisions for the cost reduction and efficiency programs.

The unwinding of interest applied to miscellaneous long-term provisions was not material.

Movements In Miscellaneous Provisions

(Millions of dollars)	1/1/2018	Impact of merger	Changes in scope of consolidation [1]	Utilization	Release	Addition	Transfers and other activity	31/12/2018
Warranty obligations and risks from transactions in course of completion	$ —	$ 74	$ 2	$ (4)	$ (4)	$ 6	$ —	$ 74
Provisions for legal disputes	18	101	(3)	(2)	—	46	—	160
Obligations relating to personnel	76	208	(9)	(121)	(39)	71	—	186
Dismantling obligations	29	280	3	(22)	(1)	19	(4)	304
Restructuring provisions	23	110	(14)	(26)	(8)	22	(1)	106
Environmental provisions	9	25	(19)	(2)	(1)	7	—	19
Insurance provisions	35	—	—	(15)	—	12	—	32
Other obligations	—	101	—	—	—	2	3	106
TOTAL	**$ 190**	**$ 899**	**$ (40)**	**$ (192)**	**$ (53)**	**$ 184**	**$ (2)**	**$ 987**

[1] Including currency adjustments

[20] Financial debt

The following is a summary of Linde's outstanding debt at 31 December 2018, 31 December 2017 and 1 January 2017. 2018 reflects the impact of the Linde AG merger on 31 October 2018 (see Notes 1 and 2).

(Millions of dollars)	31/12/2018	31/12/2017	1/1/2017
Short-term (a)			
Current portion of long-term debt	$ 1,499	$ 978	$ 559
Commercial paper and U.S. bank borrowings	829	202	333
Other bank borrowings (primarily non-U.S.) (b)	685	36	101
Total short-term debt	**$ 3,013**	**$ 1,216**	**$ 993**
Long-term (a)			
Long-term notes	$ 11,930	$ 7,740	$ 8,463
Other	10	7	9
Non-U.S. bank borrowings	336	33	42
Total long-term debt	**$ 12,276**	**$ 7,780**	**$ 8,514**
Total Debt	**$ 15,289**	**$ 8,996**	**$ 9,507**
Long-term note carrying values (a)			
Floating Rate Notes due 2017	$ —	$ —	$ 150
1.05% Notes due 2017	—	—	400
1.20% Notes due 2018 (c)	—	498	499
1.25% Notes due 2018 (d)	—	475	478
1.90% Notes due 2019 (g)	500	500	499
Variable rate notes due 2019	150	—	—
1.75% Euro denominated notes due 2019 (f)	578	—	—
4.25% AUD denominated notes due 2019	71	—	—
4.50% Notes due 2019 (e)	—	599	598
Variable rate notes due 2019	200	—	—
1.50% Euro denominated notes due 2020 (e)	—	717	627
2.25% Notes due 2020	299	299	299
1.75% Euro denominated notes due 2020 (f)	1,185	—	—
0.634% Euro denominated notes due 2020	58	—	—
4.05% Notes due 2021	499	498	497
3.875% Euro denominated notes due 2021 (f)	755	—	—
3.00% Notes due 2021	498	497	496
0.250% Euro denominated notes due 2022 (f)	1,156	—	—
2.45% Notes due 2022	598	598	597
2.20% Notes due 2022	498	498	498
2.70% Notes due 2023	498	498	497
2.00% Euro denominated notes due 2023 (f)	805	—	—
5.875% GBP denominated notes due 2023 (f)	454	—	—
1.20% Euro denominated notes due 2024	628	658	575
1.875% Euro denominated notes due 2024 (f)	373	—	—
2.65% Notes due 2025	398	397	397
1.625% Euro denominated notes due 2025	568	594	519
3.20% Notes due 2026	725	725	725
3.434% Notes due 2026	195	—	—

1.652% Euro denominated notes due 2027	96	—	—
1.00% Euro denominated notes due 2028 (f)	861	—	—
1.90% Euro denominated notes due 2030	121	—	—
3.55% Notes due 2042	$ 662	$ 662	$ 662

(a) Amounts are net of unamortized discounts, premiums and/or debt issuance costs as applicable.

(b) Amounts include $69 million of Credit Support Annexes, see Note 24.

(c) In March 2018, Linde repaid $500 million of 1.20% notes that became due.

(d) In November 2018, Linde repaid $475 million of 1.25% notes that became due and the associated interest rate swap was settled. See Note 24 Financial Instruments for additional information regarding the $475 million notional value interest rate swap outstanding at 31 December 2017.

(e) In December 2018, Linde repaid $600 million of 4.50% notes due 2019 and €600 million of 1.50% notes due 2020 resulting in a $26 million interest charge. Also during December Linde repaid €750 million of 3.125% notes acquired in the merger that became due in December 2018.

(f) The fair value decrease in debt related to hedge accounting for the year ended 31 December 2018 was $14 million; the impact in 2017 was not significant. See Note 24 Financial Instruments for additional information on the $2,164 million notional value interest rate swaps outstanding at 31 December 2018.

(g) In February 2019, Linde repaid $500 million of 1.90% notes that became due.

Credit Facilities

At 31 December 2018, the company has the following major credit facilities available for future borrowing:

(Millions of dollars)	Total Facility	Borrowings Outstanding	Available for Borrowing	Expires
Praxair Senior Unsecured	$ 2,500	$ —	$ 2,500	January 2019
Linde AG Revolving Credit Facility	€ 2,500	$ —	€ 2,500	July 2020

In June 2017, Praxair entered into a $500 million 364-day revolving credit facility with a syndicate of banks which expired in June 2018 and was not renewed.

The $2.5 billion and €2.5 billion credit facilities are with major financial institutions and are non-cancelable by the issuing financial institutions until their respective maturities. There are no financial covenants contained in the agreement relating to the Linde AG €2.5 billion credit facility; the only financial covenant for the senior unsecured $2.5 billion credit facility requires the company not to exceed a maximum 70% leverage ratio. No borrowings were outstanding under the credit agreements as of 31 December 2018.

On 26 March 2019 the company entered into an unsecured revolving credit agreement ("the Credit Agreement") with a syndicate of banking institutions. The Credit Agreement became effective on 29 March 2019. The Credit Agreement provides for total commitments of $5 billion, which may be increased to up to $6.5 billion subject to receipt of additional commitments and satisfaction of customary conditions. In connection with the effectiveness of the Credit Agreement, each of Praxair and Linde AG terminated their respective existing revolving credit agreements disclosed in the table above.

Covenants

Linde's $2.5 billion senior unsecured credit facility and long-term debt agreements contain various covenants which may, among other things, restrict certain types of mergers and changes in beneficial ownership of the company, and the ability of the company to incur or guarantee debt, sell or transfer certain assets, create liens against assets, enter into sale and leaseback agreements, or pay dividends and make other distributions beyond certain limits. These agreements also require Linde to not exceed a maximum 70 percent leverage ratio defined in the agreements as the ratio of consolidated total debt to the sum of consolidated total debt plus consolidated shareholders' equity of the company. For purposes of the leverage ratio calculation, consolidated shareholders' equity excludes changes in the cumulative foreign currency translation adjustments after 30 June 2011. At 31 December 2018, the actual leverage ratio, as calculated according to the agreement, was 34 percent and the company is in compliance with all financial covenants. Also, there are no material adverse change clauses or other subjective conditions that would restrict the company's ability to borrow under the agreement.

Other Debt Information

As of 31 December 2018 and 2017, the weighted-average interest rate of short-term borrowings outstanding was 0.6 percent and 2.1 percent, respectively. The decrease in the rate year-over-year is related primarily to significant European commercial paper balances at negative interest rates, which offsets the impact of higher rates on other bank borrowings.

In February 2016, Linde redeemed $325 million of 5.20% notes due March 2017 resulting in a $16 million interest charge ($10 million after-tax, or $0.04 per diluted share).

[21] Liabilities from finance leases

Liabilities from finance leases are repaid over the lease term. They have the following residual lease terms at the reporting date:

(Millions of dollars)	31/12/2018	31/12/2017	1/1/2017
Total future minimum lease payments (gross investment)	$ 105	$ 4	$ 8
due within one year	18	1	5
due in one to five years	45	3	3
due in more than five years	42	—	—
Present value of minimum lease payments	$ 78	$ 4	$ 8
due within one year	19	1	5
due in one to five years	39	3	3
due in more than five years	20	—	—
Finance charge included in the minimum lease payments	**$ 27**	**$ —**	**$ —**

The carrying amounts of assets held under finance leases are disclosed principally under tangible assets. See Note 13. These assets comprise distribution equipment, vehicles and other fixtures and fittings. Buildings are also included here. Some of the lease agreements contain extension clauses, purchase options or price adjustment clauses customary in the market.

[22] Trade payables, miscellaneous liabilities, liabilities from income taxes

	Current			Non-current			Total		
	31 December		1 January	31 December		1 January	31 December		1 January
(Millions of dollars)	2018	2017	2017	2018	2017	2017	2018	2017	2017
Trade payables	$ 4,095	$ 922	$ 857	$ 1	$ —	$ —	$ 4,096	$ 922	$ 857
Contract liabilities	1,709	—	—	154	—	—	1,863	—	—
Income tax liabilities	895	284	184	266	388	—	1,161	672	184
Miscellaneous liabilities	2,187	829	766	433	229	225	2,620	1,058	991
Other taxes	257	53	52	47	3		304	56	55
Derivatives with negative fair values	78	17	18	43	—		121	17	18
Obligations relating to personnel	752	193	177	15	—	—	767	193	177
Other financial liabilities	637	509	462	132	136	140	769	645	602
Other liabilities	463	57	57	196	90	82	659	147	139
Total	$ 8,886	$ 2,035	$ 1,807	$ 854	$ 617	$ 225	$ 9,740	$ 2,652	$ 2,032

Income tax liabilities disclosed as current are due with immediate effect and generally Linde has no option to defer them. Included in the non-current income tax liabilities disclosed are amounts which may not fall due until more than twelve months after the reporting date.

Also included in current income tax liabilities are liabilities relating to prior periods arising from external tax audits in various countries.

[23] Share option schemes

Share-based compensation expense was $62 million in 2018 ($59 million in 2017). The related income tax benefit recognized was $8 million in 2018 ($18 million in 2017). The expense was primarily recorded in marketing & selling and administration expenses and no share-based compensation expense was capitalized.

Summary of Plans

The 2009 Praxair, Inc. Long-Term Incentive Plan was initially adopted by the board of directors and shareholders of Praxair, Inc. on 28 April 2009 and has been amended since its initial adoption ("the 2009 Plan"). Upon completion of the business combination of Praxair, Inc. with Linde AG on 31 October 2018, the 2009 Plan was assumed by the company. Prior to 28 April 2009, Praxair, Inc. granted equity awards under the 2002 Praxair, Inc. Long-Term Incentive Plan, ("the 2002 Plan") which was also assumed by the company upon completion of the business combination. The 2009 Plan permits awards of stock options, stock appreciation rights, restricted stock and restricted stock units, performance-based stock units and other equity awards to eligible officer and non-officer employees and non-employee directors of the company and its affiliates. As of 31 December 2018, 8,009,603 shares remained available for equity grants under the 2009 Plan, of which 2,600,000 shares may be granted as awards other than options or stock appreciation rights.

In 2005, the board of directors and shareholders of Praxair, Inc. adopted the 2005 Equity Compensation Plan for Non-Employee Directors of Praxair, Inc. ("the 2005 Plan"). Upon completion of the business combination in October 2018, the 2005 Plan was also assumed by the company. Under the 2005 Plan, the aggregate number of shares available for option and other equity grants was limited to a total of 500,000 shares. The 2005 Plan expired on 30 April 2010, by its own terms, and no shares were available for grant thereafter.

Upon the completion of the business combination, all options outstanding under the 2009 Plan, the 2002 Plan and the 2005 Plan were converted into options to acquire the same number of shares of the company and at the same exercise price per share that applied prior to the business combination.

Exercise prices for options granted under the 2009 Plan may not be less than the closing market price of the company's common stock on the date of grant and granted options may not be re-priced or exchanged without shareholder approval. Options granted under the 2009 Plan subject only to time vesting requirements may become partially exercisable after a minimum of one year after the date of grant but may not become fully exercisable until at least three years have elapsed from the date of grant, and all options have a maximum duration of ten years. Options granted under predecessor plans had similar terms.

In connection with the business combination, on 31 October 2018 the company's Board of Directors adopted the Long Term Incentive Plan of Linde plc ("the LTIP 2018"), the purpose of which is to replace certain outstanding Linde AG equity based awards that were terminated in connection with the Exchange offer. Under the LTIP 2018, the aggregate number of shares available for replacement option rights and replacement restricted share units was set at 473,128. As of 31 December 2018, all shares remained available for grant, as the company is not obligated to make these replacement awards until 2019.

Exercise prices for the replacement option rights to be granted in 2019 under the LTIP 2018 will be equal to €1.67 as prescribed in the business combination agreement. Each replacement option right granted under the LTIP 2018 will be subject to vesting based on continued service until the end of the four-year waiting period applicable to the relevant Linde AG award that had been granted before the business combination. After vesting, each option right will be exercisable for one year.

In order to satisfy option exercises and other equity grants, the company may issue authorized but previously unissued shares or it may issue treasury shares.

Stock Option Fair Value

The company utilizes the Black-Scholes Options-Pricing Model to determine the fair value of stock options consistent with that used in prior years. Management is required to make certain assumptions with respect to selected model inputs, including anticipated changes in the underlying stock price (i.e., expected volatility) and option exercise activity (i.e., expected life). Expected volatility is based on the historical volatility of the company's stock over the most recent period commensurate with the estimated expected life of the company's stock options and other factors. The expected life of options granted, which represents the period of time that the options are expected to be outstanding, is based primarily on historical exercise experience. The expected dividend yield is based on the company's most recent history and expectation of dividend payouts. The risk-free rate is based on the U.S. Treasury yield curve in effect at the time of grant for a period commensurate with the estimated expected life. If factors change and result in different assumptions in future periods, the stock option expense that the company records for future grants may differ significantly from what the company has recorded in the current period.

The weighted-average fair value of options granted during 2018 was $19.29 ($12.40 in 2017) based on the Black-Scholes Options-Pricing model. The increase in grant date fair value year-over-year is primarily attributable to an increase in the company's stock price.

The following weighted-average assumptions were used to value the grants in 2018 and 2017:

Year Ended 31 December	2018	2017
Dividend yield	2.1%	2.7%
Volatility	14.4%	14.0%
Risk-free interest rate	2.67%	2.13%
Expected term years	5	6

The following table summarizes option activity under the plans as of 31 December 2018 and 2017 and changes during the periods then ended (averages are calculated on a weighted basis; life in years; intrinsic value expressed in millions):

Activity	Number of Options (000's)	Average Exercise Price	Average Remaining Life	Aggregate Intrinsic Value
Outstanding at 1 January 2017	11,708	$ 101.58		
Granted	2,091	$ 118.71		
Exercised	(2,877)	$ 86.82		
Cancelled or expired	(135)	$ 113.37		
Outstanding at 1 January 2018	10,787	$ 108.70		
Granted	1,625	154.00		
Exercised	(1,714)	95.25		
Cancelled or expired	(74)	131.91		
Outstanding at 31 December 2018	10,624	$ 117.65	5.9	$ 408
Exercisable at 31 December 2018	7,065	$ 111.16	4.7	$ 317

The aggregate intrinsic value represents the difference between the company's closing stock price of $156.04 as of 31 December 2018 and the exercise price multiplied by the number of in the money options outstanding as of that date. The total intrinsic value of stock options exercised during 2018 was $113 million ($137 million in 2017.)

Cash received from option exercises under all share-based payment arrangements for 2018 was $66 million ($107 million in 2017). The cash tax benefit realized from share-based compensation totaled $30 million for 2018 ($51 million in 2017).

As of 31 December 2018, $19 million of unrecognized compensation cost related to non-vested stock options is expected to be recognized over a weighted-average period of approximately 1 year.

Performance-Based and Restricted Stock Awards

No performance-based stock awards were granted in 2018 as restricted stock units were granted in place of performance-based stock awards. In years prior to 2018, the company granted performance-based stock awards under the 2009 Plan to senior management that vest, subject to the attainment of pre-established minimum performance criteria, principally on the third anniversary of their date of grant. These awards were tied to either return on capital ("ROC") performance or relative total shareholder return ("TSR") performance versus that of the S&P 500. The actual number of shares issued in settlement of a vested award can range from zero to 200 percent of the target number of shares granted based upon the company's attainment of specified performance targets at the end of a three-year period. Compensation expense related to these awards is recognized over the three-year performance period based on the fair value of the closing market price of the company's common stock on the date of the grant and the estimated performance that will be achieved. Compensation expense for ROC awards were adjusted during the three-year performance period based upon the estimated performance levels that will be achieved. TSR awards were measured at their grant date fair value and not subsequently re-measured.

Upon completion of the merger, each outstanding ROC and TSR performance-based award was converted into a Linde plc RSU based on performance achieved as of immediately prior to the closing of the merger, and became subject to service-vesting conditions only. This resulted in the conversion of 435,000 performance-based shares into 704,000 restricted stock units. Compensation expense related to these awards will continue to be recognized over the remainder of the respective three-year service period.

There were 278,907 restricted stock units granted to employees by Praxair during 2018. In addition, Praxair had previously granted restricted stock to certain key employees that vest after a designated service period ranging from 2 to 10 years although the majority of the restricted stock units vest at the end of a three-year service period. Generally, restricted stock does not earn quarterly dividends while vesting. Compensation expense related to the restricted stock units is recognized over the vesting period. These awards were converted into equivalent Linde plc restricted stock units at the time of the business combination.

The weighted-average fair value of ROC performance-based stock awards granting during 2017 $109.68. The weighted-average fair value of restricted stock units granted during 2018 was $144.86 ($111.95 in 2017). These fair values are based on the closing market price of Linde's common stock on the grant date adjusted for dividends that will not be paid during the vesting period.

The weighted-average fair value of performance-based stock tied to relative TSR performance granted during 2017 was $124.12, and was estimated using a Monte Carlo simulation performed as of the grant date.

The following table summarizes non-vested performance-based and restricted stock award activity as of 31 December 2018 and 2017, and changes during the periods then ended (shares based on target amounts, averages are calculated on a weighted basis):

	Performance-Based		**Restricted Stock**	
	Number of Shares (000's)	**Average Grant Date Fair Value**	**Number of Shares (000's)**	**Average Grant Date Fair Value**
Non-vested at 1 January 2017	714	$ 115.72	274	$ 109.49
Granted	224	114.82	83	111.95
Vested	(77)	121.16	(83)	118.24
Cancelled and Forfeited	(196)	113.66	(10)	108.44
Non-vested at 1 January 2018	665	$ 113.40	264	$ 107.56
Granted	—	—	279	144.86
Vested	(79)	119.98	(153)	117.67
Award modifications or conversions	(435)	—	704	—
Cancelled and Forfeited	(151)	110.29	(23)	111.41
Non-vested at 31 December 2018	—	$ —	1,071	$ 118.84

There are approximately 12 thousand restricted stock shares that are non-vested at 31 December 2018 which will be settled in cash due to foreign regulatory limitations. The liability related to these grants reflects the current estimate of performance that will be achieved and the current common stock price.

As of 31 December 2018, $30 million of unrecognized compensation cost related to the restricted stock awards is expected to be recognized primarily through the first quarter of 2021.

[24] Financial instruments

Accounting standard IFRS 9, *Financial Instruments* sets out the rules on the classification and measurement of financial assets and contains rules on impairment losses on financial instruments as well as on hedge accounting.

Financial Assets

	Fair value			Carrying amount		
(Millions of dollars)	**31/12/2018**	**31/12/2017**	**1/1/2017**	**31/12/2018**	**31/12/2017**	**1/1/2017**
At fair value in other comprehensive income (debt instruments) ("FVtOCI")						
Investments and securities	$ —	$ —	$ —	$ —	$ —	$ —
At fair value through profit and loss						
Freestanding derivatives	178	16	11	178	16	11
Derivatives designated as hedging instruments	15	1	3	15	1	3
Cash and cash equivalents	317	—	—	317	—	—
Investments and securities	54	—	—	54	—	—
At amortized cost						
Cash and cash equivalents	4,216	617	524	4,216	617	524
Trade receivables	4,111	1,675	1,518	4,111	1,675	1,518
Other receivables and assets	1,608	680	597	1,608	680	597
Investments and securities	1	—	—	1	—	—
Total	**$ 10,500**	**$ 2,989**	**$ 2,653**	**$ 10,500**	**$ 2,989**	**$ 2,653**

Financial Liabilities

	Fair value			Carrying amount		
(Millions of dollars)	**31/12/2018**	**31/12/2017**	**1/1/2017**	**31/12/2018**	**31/12/2017**	**1/1/2017**
Financial liabilities at amortised cost						
Financial liabilities	$ 15,203	$ 9,203	$ 9,644	$ 15,289	$ 8,996	$ 9,507
Trade payables	4,096	922	857	4,096	922	857
Miscellaneous liabilities	1,428	792	741	1,428	792	741
Derivatives with negative fair values						
Freestanding derivatives	108	16	18	108	16	18
Derivatives designated as hedging instruments	13	1	—	13	1	—
Liabilities from finance leases	78	4	8	78	4	8
Total	**$ 20,926**	**$ 10,938**	**$ 11,268**	**$ 21,012**	**$ 10,731**	**$ 11,131**

The fair value of cash and cash equivalents, short-term debt, accounts receivables-net, and accounts payable approximate carrying value because of the short-term maturities of these instruments.

The fair value of financial instruments is generally determined using stock exchange prices. If stock exchange prices are not available, the fair value is determined using measurement methods customary in the market, based on market parameters specific to the instrument.

The fair value of derivative financial instruments is determined as follows: Options are valued using the Black-Scholes option pricing model. Futures are measured with recourse to the quoted market price in the relevant market. All other derivative financial instruments are measured by discounting expected future cash flows using the net present value method. As far as possible, the entry parameters used in these models are relevant observable market prices and interest rates at the reporting date.

The following table shows the financial instruments in Linde plc which are measured at fair value. Linde plc uses the following hierarchy to determine and disclose fair values based on the method used to ascertain their fair values:

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

Financial Assets And Liabilities Measured At Fair Value

	Level 1			Level 2			Level 3		
(Millions of dollars)	**31/12/18**	**31/12/17**	**1/1/17**	**31/12/18**	**31/12/17**	**1/1/17**	**31/12/18**	**31/12/17**	**1/1/17**
Investments and securities	$ 24	$ —	$ —	$ —	$ —	$ —	$ 30	$ —	$ —
Thereof debt instruments at FVtOCI	—	—	—	—	—	—	—	—	—
Thereof at FVtPL	24	—	—	—	—	—	30	—	—
Freestanding derivatives with positive fair values	—	—	—	178	16	11	—	—	—
Derivatives designated as hedging instruments with positive fair values	—	—	—	15	1	3	—	—	—
Freestanding derivatives with negative fair values	—	—	—	108	16	18	—	—	—
Derivatives designated as hedging instruments with negative fair values	—	—	—	13	1	—	—	—	—
Cash and cash	317	—	—	—	—	—	—	—	—

During the reporting year, there were no transfers between Levels 1, 2 and 3 of the fair value hierarchy.

The fair value of financial instruments in the "financial assets at amortised cost", and "financial liabilities at amortised cost" categories is determined by discounting the expected cash flows. The interest rates applied are the same as those that would apply to new financial instruments with a similar risk structure, currency and maturity. Fair value is determined using the discounted cash flow method, taking into account individual credit ratings and other market circumstances in the form of credit and liquidity spreads generally applied in the market (Level 2). The exception to this is bonds issued by Linde AG and Linde Finance B.V. traded in the capital market (Level 1). The fair value of these instruments is determined using the current stock exchange price. In cases involving short-term financial instruments in the "financial assets at amortised cost", and "financial liabilities at amortised cost" categories, it is assumed that the fair value corresponds to the carrying amount.

Level 3 investments and securities contain a venture fund. For the valuation, Linde uses the net asset value received as part of the fund's quarterly reporting, which for the most part is not based on quoted prices in active markets. In order to reflect current market conditions, Linde proportionally adjusts these by observable market data (stock exchange prices) or current transaction prices.In the 2018 financial year, there were no differences between the fair value of a financial instrument when it was first recognized and the amount which would have been recognized at that time had the valuation methods described above been used.

The following table summarizes the changes in level 3 investments and securities for the years ended 31 December 2018 and 31 December 2017. Gains (losses) recognized in earnings are recorded to in financial income (expense) within the company's consolidated statements of profit and loss.

(Millions of dollars)	**2018**
Balance at 1 January	$ —
Merger impact	28
Gains (losses) recognized in earnings	2
Balance at 31 December	**$ 30**

Net Financial Gains And Losses

(Millions of dollars)	2018	2017
From freestanding derivatives	$ 116	$ (121)
From financial assets at amortized cost	32	(13)
From financial assets at fair value other comprehensive income		
of which reported in the income statement	$ (3)	$ —
of which reported in other reserves	—	—
From financial liabilities at amortized cost	(99)	110
Total	**$ 46**	**$ (24)**

The net financial gains and losses on financial instruments arise from changes in fair value, the recognition and reversal of impairment losses, eliminations and exchange rate fluctuations.

The net financial gains and losses correspond to the valuation gains and losses of the financial instruments but exclude interest and dividends.

Free-standing derivatives comprise all those derivatives which are not designated as hedging instruments. They include those derivatives in economic hedging relationships not designated as hedges in respect of which gains and losses arising from the underlying transaction and the hedged item are recognised at the same time in the statement of profit and loss.

The financial result includes fees and other costs of capital of $6 million (2017: $3 million) relating to financial instruments not at fair value through profit and loss.

No interest income has been accrued which relates to impaired financial instruments, especially receivables.

The following table provides information about the exposure to credit risk for financial assets.

Impairment Loss At 31 December

	2018				2017			
(Millions of dollars)	Carrying amount before impairment	Cumulative impairment loss	Carrying amount after impairment	Of which impairment loss for 2018 financial year	Carrying amount before impairment	Cumulative impairment loss	Carrying amount after impairment	Of which impairment loss for 2017 financial year
Investments and securities at fair value	$ 54	$ —	$ 54	$ —	$ —	$ —	$ —	$ —
Investments and securities at amortised cost	1	—	1	—	—	—	—	—
Receivables from finance leases	75	—	75	—	6	—	6	—
Trade receivables	4,224	(113)	4,111	(25)	1,813	(138)	1,675	(33)
Contract assets	272	(5)	267	(5)	—	—	—	—
Derivatives with positive fair values	193	—	193	—	17	—	17	—
Other receivables and assets	1,637	(29)	1,608	—	714	(34)	680	—
Cash and cash equivalents	4,533	—	4,533	—	617	—	617	—

For cash and cash equivalents and other receivables, Linde determines the 12-month expected credit loss as a basis for impairment losses. In the reporting period these impairment losses were not significant.

Financial assets which are initially measured at amortized cost are subsequently measured using the effective interest (EIR) method and are subject to impairment. Linde's financial assets at amortized cost includes trade receivables, receivables from finance lease, loan receivables and other financial assets included under other assets. Trade receivables are measured at the transaction price, the face value less impairment, if the receivables do not contain a significant financing component. Management has considered factors such as the difference between the cash price for assets and transaction prices within its agreements, terms of its agreements and market interest rates. Management has reviewed its current portfolio noting that its receivables do not contain significant financing components.

For trade receivables, Linde applies the simplified approach permitted by IFRS 9, which requires expected lifetime losses to be recognized from initial recognition of the receivables. The expected loss rates are based on an analysis of the actual historical default rates (between 1.5 and 2 years) for each business and product area, taking regional circumstances into account. If necessary, these historical default rates are adjusted to reflect the impact of current changes in the macroeconomic environment using forward-looking information. The default rates are also critically evaluated based on the expectations of the responsible management team regarding the collectability of the receivables. Gross receivables aged less than one year were $4,048 million and $1,703 million at 31 December 2018 and 2017 respectively and gross receivables aged greater than one year were $177 million and $110 million at 31 December 2018 and 2017. Average loss rates on receivables aged less than one year were approximately 1.9% and 1.6% at 31 December 2018 and 2017 respectively. Receivables aged greater than one year are generally fully reserved unless specific circumstances warrant exceptions.

Trade receivables net of reserves were $4,111 million at 31 December 2018 and $1,675 million at 31 December 2017. Allowances for expected credit losses were $113 million at 31 December 2018 and $138 million at 31 December 2017. Provisions for expected credit losses were $25 million and $33 million in 2018 and 2017 respectively. The allowance activity in each period related primarily to write-offs of uncollectible amounts, net of recoveries and currency movements.

Interest Income/Expense From Financial Instruments Not Measured At Fair Value[1]

(Millions of dollars)	**2018**	**2017**
Interest income	$ 70	$ 41
Interest expenses	317	251
Total	**$ (247)**	**$ (210)**

[1]Income and expenses are shown as positive figures where the line item designation is clear. In the “total” line item, net expenses are shown as negative figures.

Not included here are the interest income and interest expense from derivatives or the interest income and interest expense from assets and liabilities outside the scope of IFRS 7.

Risk positions and risk management

Linde plc is exposed to a variety of financial risks. These include in particular: counterparty risk, liquidity risk, interest rate risk, exchange rate risk and other market price risks. These are described below. For further information about risk management at Linde, please refer to the disclosures in the management report.

Counterparty risk

Counterparties to Linde’s derivatives are major banking institutions with credit ratings of investment grade or better. As of year-end, Linde AG had existing Credit Support Annexes ("CSAs") in place with their principal counterparties to minimize potential default risk and to mitigate counterparty risk. Under the CSAs, the fair values of derivatives for the purpose of interest rate and currency management are collateralized with cash on a regular basis. As 31 December, 2018, the impact of such collateral posting arrangements on the fair value of derivatives was insignificant. Management believes the risk of incurring losses on derivative contracts related to credit risk is remote and any resulting losses would be immaterial.

Financial Assets/Liabilities Subject To Offsetting Or Enforceable Master Agreements For Financial Derivative Transactions

31 December 2018, *(Millions of dollars)*	Gross amount of recognised financial assets/ liabilities	Gross amount of recognised financial assets/ liabilities set off in the statement of financial position	Net amount of financial assets/ liabilities presented in the statement of financial position	Financial instruments that qualify for netting	Net amount before CSAs	Collaterals received from collateral agreements[1]	Collaterals due to pledged collateral agreements[1]	Net amount
Derivatives with positive fair values	$ 193	$ —	$ 193	$ (57)	$ 136	$ (60)	$ 14	$ 90
Derivatives with negative fair values	(121)	—	(121)	57	(64)	(9)	18	(55)
Trade receivables	6	(3)	3	—	3	—	—	3
Trade payables	(7)	3	(4)	—	(4)	—	—	(4)
Total	**$ 71**	**$ —**	**$ 71**	**$ —**	**$ 71**	**$ (69)**	**$ 32**	**$ 34**

[1]The terms governing CSAs may result in the net fair value position per counterparty being over-secured.

For the 2016 and 2017 financial years, there were no derivatives with either positive or negative fair values that were subject to offsetting or enforceable master agreements. Therefore, no information has been presented in the table above for these periods.

Liquidity Risk

Liquidity risk is the risk that the company will no longer be able to meet its financial payment obligations. Contractual undiscounted expected future cash flows from financial liabilities are shown in the table below:

Future Cash Flows From Financial Liabilities

	Due within one year		Due in one to five years		Due in more than five years	
(Millions of dollars)	2018	2017	2018	2017	2018	2017
Cash outflows from non-derivative financial liabilities	$8,547	$2,917	$ 9,424	$ 5,522	$ 4,696	$ 3,669
Cash outflows from derivative financial liabilities	$ 297	$ 17	$ 415	$ —	$ 93	$ —

Within this context, it is important to note that the cash outflows from derivative financial liabilities in the amount of $804 million (2017: $0 million) are offset by cash inflows from derivatives with gross settlement in the amount of $722 million (2017: $0 million).

Interest rate risks

Interest rate risks arise from market fluctuations in interest rates. As a result of its financing activities, Linde plc is exposed to a risk from interest rate changes. At 31 December 2018, Linde plc held interest-bearing instruments (net, including interest rate derivatives/hedges) totaling $15.3 billion (2017: $9.0 billion). Of these, $12.6 billion (2017: $8.2 billion) related to instruments bearing interest at fixed interest rates and $2.7 billion (2017: $747 million) to instruments bearing interest at variable rates. This is equivalent to a company-wide fixed-rate ratio of 82 percent (2017: 91 percent).

Linde plc has used forward payer swaps to provide an element of hedging against exposure to rising interest rates with regard to future bond issues.

Based on instruments bearing interest at variable rates and financial instruments hedging interest rate risks which Linde plc holds or has issued, a hypothetical change in the interest rates applicable to the respective instruments would have had the following effects (if exchange rates remained constant):

Effect Of Changes In Interest Rates

(Millions of dollars)	Change	Recognised in profit and loss 2018	Recognised in profit and loss 2017	Directly in equity 2018	Directly in equity 2017
EUR	+ 100 bp	$ 117	$ —	$ —	$ —
	– 100 bp	(117)	—	—	—
GBP	+ 100 bp	(20)	—	—	—
	– 100 bp	20	—	—	—
USD	+ 100 bp	(25)	—	—	—
	– 100 bp	25	—	—	—
AUD	+ 100 bp	(24)	—	—	—
	– 100 bp	24	—	—	—
Other currencies	+ 100 bp	(22)	—	—	—
	– 100 bp	22	—	—	—

Exchange rate risks

Due to its activities as an international group, Linde is exposed to exchange rate risks. Its broad spread of activities over many different currency areas and its local business model result in a low concentration of risk for the company.

Linde monitors and manages its exchange rate risk, a risk which has an impact on its operations. The gross exchange rate risk encompasses all the operating activities of the company. This gross exchange rate risk is reduced by around 85 percent (2017: 94 percent). Therefore, Linde is exposed at the reporting date to a net exchange rate risk from operating activities involving foreign currency corresponding to 15 percent (2017: 6 percent) of the original unsecured risk.

The risk of exchange rate movements is monitored for internal management purposes on the basis of a value-at-risk, which relates to positions in currencies other than the relevant functional currency.

The value-at-risk is calculated on the basis of historical data (250 working days) in accordance with international banking standards. The value-at-risk presents the maximum potential loss based on a probability of 97.5 percent for a holding period of twelve months. The calculation takes into account correlations between the transactions being considered; the risk of a portfolio is generally lower than the total of the respective individual risks.

At 31 December 2018, the value-at-risk was $22 million (2017: $14 million).

Other market price risks

As a result of its energy purchases, Linde is exposed to risks arising from changes in commodity prices. Linde plc monitors and manages these commodity price risks arising from the purchase of electricity, natural gas and propane for use in production. These hedging operations are governed by risk management guidelines, compliance with which is monitored. Commodity price risks are hedged in the main by long-term supply contracts or limited by the form and structure of sales contracts. Derivatives are also used to a much lesser extent to hedge against the exposure to changes in the price of electricity, natural gas and propane gas. The commodity price risk from financial instruments is therefore not material.

Hedge Accounting

Cash flow hedges

Linde hedges cash flows at both consolidated and company levels, based on agreed minimum hedging rates. At the company level, future transactions which are highly probable are hedged against foreign exchange risks.

In general, these hedges are accounted for as cash flow hedges in accordance with IFRS 9, *Financial Instruments*. The effective portion of the gain or loss on the hedging instruments is recognized directly in equity and released to the statement of profit and loss when the hedged cash flows are also recognised in the statement of profit and loss or if a hedged future transaction is no longer expected to occur. In addition, the risks associated with changes in interest rates relating to certain financial liabilities or future financing measures are hedged by derivative financial instruments and accounted for as cash flow hedges.

Linde also hedges the exposure to commodity price risks which arise in the normal course of business from its procurement transactions and result in open risk positions. To reduce the extent of the risk, Linde enters into a small number of electricity, natural gas and propane gas derivatives. Usually, hedging relationships of this type are also designated as cash flow hedging relationships, if this accords with the facts.

If the hedged future transactions (forecast transactions as defined by IFRS 9) result in the recognition of a non-financial asset or liability, the initial carrying amounts of these are adjusted for the amount recorded in equity. This is usually the case for non-current assets and inventories.

The following table presents a reconciliation of the reserve for cash flow hedges:

Reserve For Cash Flow Hedges

(Millions of dollars)	2018	2017
Opening balance at 1 Janaury	$ (1)	$ (1)
Additions	—	—
Transfers to the statement of profit and loss	(1)	—
of which relating to revenue	—	—
of which relating to cost of sales	—	—
of which relating to financial income and expenses	(1)	—
Closing balance at 31 December	**$ (2)**	**$ (1)**

In the 2018 and 2017 financial years, no amounts were recognised in the financial result as a result of ineffectiveness in cash flow hedges.

Cash Flow Hedge Accounting

	Exchange rate		Interest rate		Commodity risk	
(Millions of dollars)	2018	2017	2018	2017	2018	2017
In a cash flow hedge designated hedging instruments						
Fair value	$ (1)	$ 1	$ —	$ —	$ —	$ —
Nominal value	158	42	—	—	—	—
Cash flow hedge reserve for continuing hedge relationships	(2)	(1)	—	—	—	—
Cash flow hedge reserve for discontinued hedge relationships	—	—	—	—	—	—

Cash Flow Hedge Accounting

	Within one year		In one to five years		In more than five years		Total	
	2018	2017	2018	2017	2018	2017	2018	2017
FX risk EUR/USD								
Net exposure (nominal volume) - in m USD	$ 54	$ —	$ 14	$ —	$ —	$ —	$ 68	$ —
Average hedged rate	0.8664	—	0.8312	—	—	—		
Cash flows from hedging instrument	(48)	—	(8)	—	—	—	(56)	—
FX risk EUR/RUB								
Net exposure (nominal volume) - in m RUB	$ 685	$ —	$ 2,143	$ —	$ —	$ —	$ 2,828	$ —
Average hedged rate	0.014	—	0.0123	—	—	—		
Cash flows from hedging instrument	(521)	—	(1,283)	—	—	—	(1,804)	—
FX risk USD/EUR								
Net exposure (nominal volume) - in m EUR	$ 8	$ 4	$ 2	$ —	$ —	$ —	$ 10	$ 4
Average hedged rate	1.1627	1.0809	1.2157	—	—	—		
Cash flows from hedging instrument	(8)	(4)	(2)	—	—	—	(10)	(4)

Fair value hedges

Linde uses interest rate swaps to hedge the exposure to changes in the fair value of financial assets and financial liabilities as a result of interest rate changes. If the hedge is deemed to be effective, the carrying amount of the hedged item is adjusted for changes in the fair value attributable to the hedged risk.

The following table shows the changes in underlying transactions and hedging instruments in fair value hedging relationships recognised in profit and loss.

Fair Value Hedge Accounting *(Millions of dollars)*	**2018**	**2017**
Fair value changes of hedged items and hedging instruments		
From hedged items	$ (14)	$ —
From hedging instruments (interest rate swaps)	14	—
Ineffectiveness recognized in the financial result	$ —	$ —
In Fair value hedge accounting designated hedging instruments		
Fair Value	$ 3	$ —
Nominal value	$ 2,164	$ 475

Hedges of a net investment in a foreign operation

Linde hedges its exposure to translation risk by taking out loans in foreign currencies and by entering into forward exchange contracts and cross-currency interest rate swaps. These hedges generally qualify as hedges of a net investment in a foreign operation (referred to below as net investment hedges) in accordance with IFRS 9, and hence the effective portion of the hedge is transferred to equity. If the foreign operation is subsequently sold or relinquished, the amount recognised in equity is released to the statement of profit and loss.

Praxair has historically designated its Euro-denominated notes as a hedge of the net investment position in its European operations. In 2014, Praxair designated the €600 million 1.50% Euro-denominated notes due 2020 and the €500 million ($568 million as of 31 December 2018) 1.625% Euro-denominated notes due 2025, as a hedge of the net investment position in its European operations. In 2016, Praxair designated an incremental €550 million ($628 million as of 31 December 2018) 1.20% Euro-denominated notes due 2024 as an additional hedge of the net investment position in its European operations.

On 31 October 2018, Praxair and Linde AG combined their respective businesses through an all-stock transaction and became subsidiaries of Linde plc. In December 2018, as a condition of the merger, Praxair completed the sale of the majority of its European operations to Taiyo Nippon Sanso Corporation. This significantly reduced the net investment position in Praxair's European operations. During the same month Praxair also repaid the €600 million 1.50% Euro-denominated notes due 2020, which significantly reduced the debt balance designated as a hedge. In response to the above transactions, Praxair de-designated €965 million of its Euro-denominated notes. At 31 December 2017 Praxair had de-designated €200 million of its Euro-denominated notes in response to the U.S. government enacted Tax Cuts and Jobs Act and associated decrease in the tax rate.

These Euro-denominated debt instruments reduce the company's exposure to changes in the currency exchange rate on investments in foreign subsidiaries with Euro-functional currencies. Since hedge inception, exchange rate movements have reduced long-term debt by $202 million (long-term debt decreased by $105 million during the year ended 31 December 2018), with the offsetting gain shown within the currency translation difference component of equity in the consolidated statement of financial position and the consolidated statement of comprehensive income.

No amounts were recognised in 2018 or 2017 as a result of ineffectiveness in net investment hedges.

[25] Consolidated statement of cash flows

The statement of cash flows shows the source and application of funds. In accordance with IAS 7, *Cash Flow Statements*, cash flows from operating activities are distinguished from cash flows from investing and financing activities.

The cash and cash equivalents disclosed in the statement of cash flows comprise all cash and cash equivalents disclosed in the statement of financial position: i.e. cash in hand, bank balances and money market funds with a maturity of three months or less. Cash equivalents include an amount of $32 million (2017: $0 million) for bilateral Credit Support Annexes. Explanatory information on CSAs can be found in Note 24.

Cash flows for investing and financing activities are calculated on the basis of payments, while cash flow from operating activities is derived indirectly from profit for the year from continuing operations.

When the cash flow from operating activities is calculated, the changes in assets and liabilities are adjusted for certain effects, such as foreign currency translation. As a result, it is not possible to reconcile the figures to the differences between the headings in the published consolidated statement of financial position.

Distributions received and income taxes paid included in cash inflows from operating activities are disclosed separately. Cash inflows from associates and joint ventures are disclosed in cash inflows from operating activities. Finance income from embedded finance leases (IFRIC 4/IAS 17) has been included in cash inflows from operating activities, due to the fact that such income is clearly related to the operating business of Linde plc, while capitalised borrowing costs of $20 million (2017: $28 m) are disclosed in cash flows from investing activities. All other interest payments are disclosed in cash flow for financing activities.

The total increase in cash and cash equivalents as a result of the business combination between Praxair and Linde AG is included in cash inflows from investing activities and was $1.4 billion. Cash inflows of $5.9 billion are also included in cash inflows from investing activities and relate primarily to the divestiture of Praxair's European Industrial Gases Business on 3 December 2018, which was one of the regulatory conditions of the merger. For cash outflows relating to newly consolidated companies, please refer to the consolidated statement of cash flows.

Investing activities comprise additions to and disposals of tangible assets, financial assets, intangible assets and consolidated companies. Additions and disposals in foreign currencies have been translated at average rates.

Reconciliation Of Liabilities From Financing Activities

			Non-cash changes				
(Millions of dollars)	Opening balance at 01/01/2018	Cash flows	Exchange rate effects[1]	Changes in fair value	Other changes[2]	Changes due to Merger	Closing balance at 12/31/2018
Non-current financial debt	$ 7,780	$ (686)	$ (8)	$ —	$ (1,105)	$ 6,295	$ 12,276
Current financial debt	1,216	(2,375)	43	—	1,098	3,031	3,013
Derivative financial instruments	0	146	—	(126)	—	(46)	(26)
Liabilities from finance leases	4	(3)	—	—	4	73	78
LIABILITIES FROM FINANCING ACTIVITIES	**$ 9,000**	**$ (2,918)**	**$ 35**	**$ (126)**	**$ (3)**	**$ 9,353**	**$ 15,341**

1 For financial debt, incl. adjustments due to hedging transactions.

2 Under financial debt, reclassification from non-current to current financial debt; under liabilities from finance leases, addition of new leases.

Total financial debt at 1 January 2017 was $9,507 million, the $511 million reduction to $8,996 million at 31 December 2017 was primarily due to the repayment of $150 million floating rate and $400 million 1.05% rate notes that matured during 2017.

The following table presents the cash flows from continuing and discontinued operations:

(Millions of dollars)

Year Ended 31 December	2018	2017
Cash flow from operating activities from continuing operations	$ 3,683	$ 3,041
Cash flow from operating activities from discontinued operations	52	—
CASH FLOW FROM OPERATING ACTIVITIES	3,735	3,041
Cash flow (for)/from investing activities from continuing operations	5,435	(1,314)
Cash flow for investing activities from discontinued operations	(24)	—
CASH FLOW (FOR)/FROM INVESTING ACTIVITIES	5,411	(1,314)
CASH FLOW FOR FINANCING ACTIVITIES FROM CONTINUING OPERATIONS	(5,031)	(1,656)
CHANGE IN CASH AND CASH EQUIVALENTS	$ 4,115	$ 71

[26] Segment information

Effective 31 October 2018, Linde plc completed the previously announced a merger transaction pursuant to the business combination agreement (See Notes 1 and 2 for additional information on the merger). Although it is the company's intention to create new operating segments that will be used by management to allocate company resources and assess performance, due to the hold separate order with the U.S. Federal Trade Commission (see Note 1) it was not possible to implement this new management organization structure in calendar 2018. Therefore, the company has added Linde AG as a separate segment for 2018 reporting purposes effective with the merger date, which is consistent with the way the company was managed and results reviewed by the Chief Operating Decision Maker. As the restrictions under the hold separate order was lifted effective 1 March 2019, the company implemented a new operating segment structure effective for 2019 reporting periods, as follows: Americas; EMEA (Europe/ Middle East/Africa); APAC (Asia/Pacific), Engineering and Other.

Accordingly, during 2018 the company's operations were organized into five reportable segments, four of which have been determined on a geographic basis of segmentation: North America, Europe, South America and Asia. The company's worldwide surface technologies business represents the fifth reportable segment. As discussed above, Linde AG became a sixth reportable segment effective with the merger on 31 October 2018.

Linde's operations consist of two major product lines: industrial gases and surface technologies. The industrial gases product line centers on the manufacturing and distribution of atmospheric gases (oxygen, nitrogen, argon, rare gases) and process gases (carbon dioxide, helium, hydrogen, electronic gases, specialty gases, acetylene). Many of these products are co-products of the same manufacturing process. Linde manufactures and distributes nearly all of its products and manages its customer relationships on a regional basis. Linde's industrial gases are distributed to various end-markets within a regional segment through one of three basic distribution methods: on-site or tonnage; merchant or bulk; and packaged or cylinder gases. The distribution methods are generally integrated in order to best meet the customer's needs and very few of its products can be economically transported outside of a region. Therefore, the distribution economics are specific to the various geographies in which the company operates and are consistent with how management assesses performance.

Historically and through 2018, Linde assessed the performance of the operating segments determined in accordance with U.S. GAAP. Accordingly, the segment discussion that follows is based on U.S. GAAP results. A reconciliation from U.S. GAAP results to those determined under EU-IFRS for the years ended 31 December 2018 and 2017 is also provided for each segment. Linde evaluates the performance of its reportable segments based on operating profit, excluding the items not indicative of ongoing business trends (referred to as "Segment operating profit"). Corporate and globally managed expenses, and research and development costs relating to Praxair's global industrial gases business, are allocated to operating segments based on sales. The same accounting policies as those set out in Note 6 apply to the segments.

A brief description of the segments is given below:

North America

The North America segment includes Linde's industrial gases operations in the United States, Canada and Mexico.

Europe

Linde's European industrial gases business operated in Spain, Ireland, Italy, France, Germany, Russia, the United Kingdom, Scandinavia and the Benelux region. In connection with the merger, Praxair was required to sell the majority of its European industrial gases business. The sale was completed on 3 December 2018 and the European business results are included in the consolidated financial statements through the date of sale. See Note 3 to the consolidated financial statements.

South America

The South America segment includes Linde's industrial gases operations in Brazil, Argentina, Bolivia, Chile, Colombia, Paraguay, Peru, and Uruguay.

Asia

The Asia segment includes Linde's industrial gases operations in China, India, Korea and Thailand, with smaller operations in Taiwan and the Middle East.

Surface Technologies

Surface Technologies provides high-performance coatings and thermal-spray powders and equipment in the Americas, Europe, and Asia.

Linde AG

Linde AG became a sixth reportable segment effective with the merger on 31 October 2018. Linde AG is a gases and engineering company with global operations in over 100 countries. Segment sales of $2,873 million and operating profit of $252 million represent results for the two month period from merger date through 31 December 2018.

The table below presents information about reportable segments in accordance with U.S. GAAP for the years ended 31 December 2018 and 2017. Also, each table includes a reconciliation of U.S. GAAP to IFRS amounts along with an explanation of the major differences.

(Millions of dollars)	Year ended 31 December 2018	2017
Sales (a)		
North America	$ 6,420	$ 6,023
Europe	1,592	1,558
South America	1,369	1,501
Asia	1,964	1,738
Surface Technologies	682	617
Linde AG	2,873	$ —
Total US GAAP sales	$ 14,900	$ 11,437
GAAP adjustments [1]	137	—
Total IFRS sales	**$ 15,037**	**$ 11,437**

(1) Related to consolidation of certain entities for IFRS, not for U.S. GAAP. These entities were acquired as part of the business combination completed during the year.

(Millions of dollars)	Year ended 31 December 2018	2017
Operating Profit		
North America	$ 1,648	$ 1,517
Europe	316	301
South America	215	239
Asia	427	333
Surface Technologies	118	106
Linde AG	252	—
US GAAP segment operating profit	$ 2,976	$ 2,496
Transaction costs and other charges [1]	(309)	(52)
US GAAP net gain on divestiture of business [2]	3,294	—
Purchase accounting impacts - Linde AG [3]	(714)	—
US GAAP operating profit from continuing operations	$ 5,247	$ 2,444
GAAP adjustments [4]	463	(8)
IFRS operating profit from continuing operations	**$ 5,710**	**$ 2,436**

(1) Primarily related to the merger transaction costs which are not included in Management's view of segment profitability. Linde incurred transaction costs which totaled $236 million for the year ended 31 December 2018. Also included in Transaction costs and other charges are other charges of $73 million for the year ended 31 December 2018 comprised of the following; (i) a $40 million charge related to an unfavorable development related to a supplier contract in China, (ii) restructuring charges of $21 million and (iii) a $12 million charge associated with the transition to hyper-inflationary accounting in Argentina.

(2) Related to the sale of Praxair's European industrial gases business under U.S. GAAP. The sale of this business under IFRS resulted in a net gain on divestiture of $3,778, a difference of $484 million due to the cumulative currency translation differences for all foreign operations having been set to zero as at 1 January 2017 due to IFRS 1 adoption (see Note 29).

(3) Related to the impacts of the required purchase accounting related to the merger transaction under US GAAP (see Note 3).

(4) Primarily related to differences in accounting between U.S. GAAP and IFRS such as: consolidation of entities, pension accounting and the aforementioned net gain on Praxair's European divestiture.

(Millions of dollars)	31 December 2018	31 December 2017	1 January 2017
Total Assets (b)			
North America	$ 11,643	$ 10,419	$ 10,019
Europe	769	3,282	2,928
South America	2,675	2,738	2,748
Asia	3,518	3,252	2,984
Surface Technologies	940	745	653
Linde AG	73,841	—	—
Total US GAAP assets	$ 93,386	$ 20,436	$ 19,332
GAAP adjustments [1]	1,197	—	—
Total IFRS assets	**$ 94,583**	**$ 20,436**	**$ 19,332**

(1) Primarily related to differences in accounting between U.S. GAAP and IFRS such as: consolidation of entities and deferred tax assets calculations for share-based compensation.

(Millions of dollars)	Year ended 31 December 2018	Year ended 31 December 2017
Depreciation and Amortization		
North America	$ 660	$ 631
Europe	146	169
South America	148	159
Asia	204	185
Surface Technologies	44	40
Linde AG	282	—
US GAAP segment depreciation and amortization	$ 1,484	$ 1,184
Purchase accounting impacts - Linde AG [1]	346	—
Total US GAAP depreciation and amortization	$ 1,830	$ 1,184
GAAP adjustments [2]	33	—
Total IFRS depreciation and amortization	**$ 1,863**	**$ 1,184**

(1) Related to the impacts of the required purchase accounting related to the merger transaction under US GAAP.
(2) Related to consolidation of certain entities for IFRS, not for U.S. GAAP. These entities were acquired as part of the business combination completed during the year.

(Millions of dollars)	Year ended 31 December 2018	Year ended 31 December 2017
Expenditures on Long-lived Assets		
North America	$ 916	$ 779
Europe	157	141
South America	97	129
Asia	248	209
Surface Technologies	93	86
Linde AG	397	—
Total US GAAP expenditures on long-lived assets	$ 1,908	$ 1,344
GAAP adjustments [1]	3	—
Total IFRS assets expenditures on long-lived assets	**$ 1,911**	**$ 1,344**

(1) Related to consolidation of certain entities for IFRS, not for U.S. GAAP. These entities were acquired as part of the business combination completed during the year.

(Millions of dollars)	Year ended 31 December 2018		Year ended 31 December 2017	
Sales by Product Group				
Atmospheric gases and related	$	8,375	$	7,938
Process gases and other		2,970		2,882
Surface technologies		682		617
Linde AG		2,873		—
Total US GAAP sales	$	14,900	$	11,437
GAAP adjustments [1]		137		—
Total IFRS sales	**$**	**15,037**	**$**	**11,437**

(1) Related to consolidation of certain entities for IFRS, not for U.S. GAAP

(Millions of dollars)	Year ended 31 December 2018		Year ended 31 December 2017	
Sales by Major Country				
United States	$	5,942	$	4,973
Europe, excluding Germany		2,435		1,372
Brazil		1,067		1,179
China		1,032		735
Germany		868		401
Other – foreign		3,556		2,777
Total US GAAP sales	$	14,900	$	11,437
GAAP adjustments [1]		137		—
Total IFRS sales	**$**	**15,037**	**$**	**11,437**

(1) Related to consolidation of certain entities for IFRS, not for U.S. GAAP. These entities were acquired as part of the business combination completed during the year.

(Millions of dollars)	31 December 2018		31 December 2017		1 January 2017	
Long-lived Assets by Major Country (c)						
United States	$	7,189	$	4,979	$	4,779
Europe, excluding Germany		7,754		1,318		1,170
Germany		2,411		413		379
China		2,237		1,060		975
Brazil		1,012		1,204		1,240
Other – foreign		9,114		2,851		2,706
Total US GAAP long-lived assets	$	29,717	$	11,825	$	11,249
GAAP adjustments [1]		44,995		4,018		3,928
Total IFRS long-lived assets	**$**	**74,712**	**$**	**15,843**	**$**	**15,177**

(1) U.S. GAAP amounts include only property plant and equipment. IFRS amounts also include goodwill and other intangible assets. Other adjustments primarily reflect the consolidation of certain entities for IFRS that are not consolidated for U.S. GAAP . These entities were acquired as part of the business combination completed during the year. Following is a summary of the 2018 GAAP adjustments related to these items, which include the impact of the merger with Linde AG (refer to Note 2).

Segment	Goodwill	Other intangibles	Other	Total
Europe/Middle East/Africa	$ 10,805	$ 7,936	$ 332	$ 19,073
Americas	9,055	2,566	3	11,624
Asia/Pacific	5,354	5,324	640	11,318
Engineering	1,075	998	—	2,073
Other	449	458	—	907
Total	$ 26,738	$ 17,282	$ 975	$ 44,995

* As described in Note 2, the amounts reflect the preliminary allocation of the purchase price to identifiable assets and liabilities, with the excess of the purchase price over the fair value of the Linde AG net assets recorded to goodwill. The final fair values may differ from their preliminary determination, and will be recored when known.

(a) Sales reflect external sales only and include two months of Linde AG sales from the merger date of 31 October 2018 to year end. Intersegment sales, primarily from North America to other segments, were not material. There is no significant concentration of sales with any single customer.

(b) Includes equity investments as of 31 December as follows:

	31 December		1 January
(Millions of dollars)	2018	2017	2017
North America	$ 118	$ 115	$ 121
Europe [1]	34	287	243
Asia	306	325	353
Linde AG [2]	1,380	—	—
Total US GAAP equity investments	$ 1,838	$ 727	$ 717
GAAP adjustments [3]	(858)	—	—
Total IFRS equity investments	**$ 980**	**$ 727**	**$ 717**

(1) The reduction in European equity investments relates primarily to the sale of Praxair's 34% noncontrolling interest participation in its Italian joint venture - refer to Note 3 for additional information. Other fluctuations relate to equity investment earnings, dividends, and foreign currency impacts.

(2) Linde AG equity investments relate primarily to Asia.

(3) Related to consolidation of certain entities within the Linde AG segment for IFRS, not for U.S. GAAP

(c) Long-lived assets include property, plant and equipment – net, goodwill and intangible assets and reflect the impact of the merger with Linde AG (refer to Note 2).

[27] Employees

In 2018, the average number of employees was 33,533 (2017: 25,204). As of 31 December 2018, the total number of employees of Linde plc was 80,946 of which 1,251 (578 in 2017) are designated as senior management based upon their level within the overall organization. The increase for both average employees and senior management from 2017 to 2018 was primarily due to the acquisition of Linde AG on 31 October 2018.

In 2018, the average number of employees in the joint operations included in the consolidated financial statements was 196 (2017: 0). Part-time employees have been included on a pro-rata basis.

All in all, personnel expenses in 2018 totaled $2.793 billion (2017: $2.059 billion), of which $1.872 billion (2017: $1.353 billion) related to salaries (including social security contributions of approximately $300 million in 2018 and $219 million in 2017), $153 million (2017: $93 million) to pensions, and share-based compensation expense of $62 million in 2018 ($59 million in 2017). In 2018, approximately $160 million ($86 million in 2017) of personnel costs were capitalized within fixed assets.

[28] Related party transactions

In addition to the subsidiaries included in the consolidated financial statements, Linde plc is related, directly or indirectly, while carrying out its normal business activities, to other investments, joint ventures and associates. The business relationships with these companies are generally conducted under the same conditions as for non-related third parties. Related companies which are controlled by Linde plc or over which Linde plc may exercise significant influence are disclosed in the list of shareholdings, arranged by division.

The information about the remuneration of the Board of Directors and the Key Management Personnel is set out in Note 30.

Revenue With Related Parties

	2018				2017			
(Millions of dollars)	Other investments	Associates or joint ventures	Other related parties	Total	Other investments	Associates or joint ventures	Other related parties	Total
Sales of goods	$ 31	$ 182	–	$ 213	–	$ 174	–	$ 174
Revenues recognized over time	2	4	–	6	–	–	–	—
Other revenue	1	1	–	2	–	–	–	—

Purchased Goods And Services From Related Parties

	2018				2017			
(Millions of dollars)	Other investments	Associates or joint ventures	Other related parties	Total	Other investments	Associates or joint ventures	Other related parties	Total
Goods and services purchased from related parties	$ 3	$ 177	–	$ 180	$ —	$ 163	–	$ 163

Related persons are mainly the members of the Board of Directors. In 2018, there were no material transactions between Linde plc and members of the Board of Directors or their family members which were outside the bounds of existing employment, service or appointment agreements or remuneration contracts.

Some members of Linde's Board of Directors hold similar positions in other companies. Linde has normal business relationships with virtually all these companies. The sale and purchase of goods and services to and from these companies take place under the usual market conditions.

Receivables From And Payables To Related Parties

	31 December 2018				31 December 2017			
(Millions of dollars)	Other investments	Associates or joint ventures	Other related parties	Total	Other investments	Associates or joint ventures	Other related parties	Total
Receivables from related parties	$ 3	$ 110	–	$ 113	–	$ 23	–	$ 23
Payables to related parties	1	76	–	77	–	9	–	9

There were no material charge-free guarantee agreements in place for associates or joint ventures on the reporting date, nor any material open purchase orders relating to joint ventures.

[29] Transition to IFRS

Effective as of the Merger date Linde became Praxair's accounting successor, Praxair being the accounting predecessor. For the periods up to and including the year ended 31 December 2017, Praxair prepared its financial statement in accordance with U.S. GAAP. Linde plc, as accounting successor to Praxair has adopted IFRS as of 1 January 2017, Linde's date of transition to IFRS. Linde plc will also continue to prepare financial statements under U.S. GAAP as a requirement of the NYSE listing rules.

Accordingly, Linde plc has prepared these financial statements as at 31 December 2018, together with the comparative period data for the year ended 31 December 2017, as described in the summary of significant accounting policies in accordance with IFRS. Linde's opening statement of financial position was prepared as at1 January 2017.

This note explains the principal adjustments made by the company in restating Praxair's U.S. GAAP financial statements, including the statement of financial position as at 1 January 2017 and the financial statements for the year ended 31 December 2017.

Exemptions applied

IFRS 1 *First-time Adoption of International Financial Reporting Standards* allows first-time adopters certain exemptions from the retrospective application of IFRS. Linde has applied the following exemptions:

- IFRS 3 *Business Combinations* has not been applied to business combinations or acquisitions of interests in associates and joint ventures that have occurred before 1 January 2017. The U.S. GAAP carrying amounts of assets and liabilities, that are required to be recognized under IFRS, are their deemed cost at the date of the acquisition. Assets and liabilities that do not qualify for recognition under IFRS would have to be excluded from the opening IFRS statement of financial position. Linde did not recognize or exclude any previously recognized amounts as a result of the IFRS recognition requirements. IFRS 1 also requires that the U.S. GAAP carrying amount of goodwill must be used in the opening IFRS statement of financial position and tested for impairment at the date of transition to IFRS. No goodwill impairment was deemed necessary by Linde at 1 January 2017.
- Linde has elected to not apply IFRS 2 *Share-based Payment* retrospectively to equity-settled share-based payment transactions that have already vested at the date of transition to IFRS. For cash-settled share-based payment transactions, Linde has not applied IFRS 2 to liabilities that were settled before 1 January 2017.
- Linde did not reassess the determination of whether an arrangement contained a lease as Linde made the same determination of whether an arrangement contained a lease in accordance with U.S. GAAP as that required by IFRIC 4 *Determining whether an Arrangement contains a Lease*.
- Linde has elected to deem the cumulative exchange differences on translation of foreign operations to be zero as at 1 January 2017.
- Linde has elected to apply IFRS 9 *Financial Instruments* prospectively to transactions for which it has determined that the fair value at initial recognition differs from the transaction price entered into.
- IFRIC 1 *Changes in Existing Decommissioning, Restoration and Similar Liabilities* requires specified changes in a decommissioning, restoration or similar liability to be added or deducted from the cost of the asset to which it relates. Linde elected to measure the liability in accordance with IAS 37 *Provisions, Contingent Liabilities and Contingent Assets* and to estimate the amount to include in cost of the asset based on the facts and circumstances that existed on 1 January 2017.
- Linde has elected to not restate the borrowing cost component that was capitalized under U.S. GAAP in the carrying amount of assets prior to 1 January 2017 and accounts for borrowing costs incurred on or after 1 January 2017 in accordance with IAS 23 *Borrowing Costs*, including those borrowing costs incurred on or after that date on qualifying assets already under construction.
- Linde has elected to apply the transition provisions in IFRS 15 *Revenue from contracts with customers* and (i) did not restate contracts that were completed before 1 January 2017 or contracts that begin and end in the same reporting period, (ii) for completed contracts that have variable consideration, used the transaction price at the date the contract was completed, did not restate contracts for any modifications that occurred before 1 January 2017 and (iii) for the reporting periods presented before 1 January 2018 did not disclose the amount of the transaction price allocated to the remaining performance obligations and an explanation of when the entity expects to recognize that amount as revenue.
- Linde has elected not to apply IFRIC 22 *Foreign Currency Transactions and Advance Consideration* to assets, expenses and income initially recognized before 1 January 2017.

Estimates

The estimates at 1 January 2017 and at 31 December 2017 are consistent with those made for the same dates in accordance with U.S. GAAP (after adjustments to reflect any differences in accounting policies). The estimates used by the company to present these amounts in accordance with IFRS reflect conditions at 1 January 2017, the date of transition to IFRS and as at 31 December 2017.

Reconciliation from U.S. GAAP to IFRS

In preparing the consolidated financial statements under IFRS, Linde adjusted the amounts reported in the consolidated financial statements under U.S. GAAP. The impacts of these adjustments are as follows:

Reconciliation of equity as at 1 January 2017 (date of transition to IFRS)

(Millions of dollars)	U.S. GAAP 1/1/2017	Reclassification Adjustments	Notes below	U.S. GAAP to IFRS Adjustments	Notes below	IFRS 1/1/2017
Assets						
Goodwill	$ 3,117	$ —		$ —		$ 3,117
Other intangible assets	583	—		228	[j]	811
Tangible assets	11,477	—		(228)	[j]	11,249
Investments in associates and joint ventures (at equity)	717	—		—		717
Other financial assets	—	—		—		—
Contract assets	—	—		—		—
Receivables from finance leases	—	6	[a]	—		6
Trade receivables	—	—		—		—
Other receivables and other assets	—	367	[a]	—		367
Other tax receivables	—	—		—		—
Deferred tax assets	—	185	[a]	—		185
Other long-term assets	558	(558)	[a]	—		—
NON-CURRENT ASSETS	**16,452**	—		—		**16,452**
Inventories	550	—		—		550
Receivables from finance leases	—	1	[b]	—		1
Trade receivables	—	1,518	[b]	—		1,518
Contract assets	—	—		—		—
Other receivables and other assets	—	248	[b] [c]	—		248
Other financial assets	—	—		—		—
Income tax receivables	—	39	[c]	—		39
Accounts receivable - net	1,641	(1,641)	[b]	—		—
Prepaid and other current assets	165	(165)	[c]	—		—
Cash and cash equivalents	524	—		—		524
Non-current assets classified as held for sale	—	—		—		—
CURRENT ASSETS	**2,880**	—		—		**2,880**
TOTAL ASSETS	**$ 19,332**	**$ —**		**$ —**		**$ 19,332**

(Millions of dollars)	U.S. GAAP 1/1/2017	Reclassification Adjustments	Notes below	U.S. GAAP to IFRS Adjustments	Notes below	IFRS 1/1/2017
Equity and liabilities						
Called-up share capital presented as equity	$4	$—		$ —		$ 4
Retained earnings	12,879	(653)	[d]	(3,930)	[m] [n] [o]	8,296
Share premium	4,074	—		32	[p]	4,106
Treasury shares	(7,336)	—		—		(7,336)
Other reserves	(4,600)	653	[d]	3,946	[o]	(1)
TOTAL EQUITY ATTRIBUTABLE TO LINDE PLC SHAREHOLDERS	**5,021**	—		**48**		**5,069**
Noncontrolling interests	420	—				420
TOTAL EQUITY	**5,441**	—		**48**		**5,489**
REDEEMABLE NONCONTROLLING INTEREST	11	—		(11)	[l]	—
Long-term pensions and similar obligations	—	866	[f]	14	[n]	880
Other non-current provisions	—	123	[e]	—		123
Deferred credits	1,272	(1,272)	[e] [f]	—		—
Deferred tax liabilities	—	1,209	[e]	(28)	[p] [o]	1,181
Financial liabilities	8,917	(3)	[g]	(400)	[q]	8,514
Liabilities from finance leases	—	3	[g]	—		3
Trade payables	—			—		—
Contract liabilities	—			—		—
Non-current tax liability	—	51	[f]	(51)	[k]	—
Other non-current liabilities	1,213	(977)	[f]	(11)	[l] [m]	225
NON-CURRENT LIABILITIES	**11,402**	—		**(476)**		**10,926**
Current pensions and similar obligations	—	24	[i]	—		24
Current provisions	—	88	[i]	—	[k]	88
Financial liabilities	—	593	[h]	400	[q]	993
Short-term debt	434	(434)	[h]	—		—
Current portion of long term debt	164	(164)	[h]	—		—
Liabilities from finance leases	—	5	[h]	—		5
Trade payables	906	(49)	[i]	—		857
Contract liabilities	—	—		—		—
Other current liabilities	841	(63)	[i]	(12)	[m]	766
Income tax liabilities	133	—		51	[k]	184
Liabilities in connection with non-current assets classified as held for sale	—	—		—		—
CURRENT LIABILITIES	**2,478**	—		**439**		**2,917**
TOTAL EQUITY AND LIABILITIES	**$19,332**	**$—**		**$ —**		**$ 19,332**

Reconciliation of equity as at 31 December 2017

(Millions of dollars)	U.S. GAAP 31/12/2017	Reclassification Adjustments	Notes below	U.S. GAAP to IFRS Adjustments	Notes below	IFRS 31/12/2017
Assets						
Goodwill	$ 3,233	$ —		$ —		$ 3,233
Other intangible assets	553	—		232	[j]	785
Tangible assets	12,057	—		(232)	[j]	11,825
Investments in associates and joint ventures (at equity)	727	—		—		727
Other financial assets	—	—		—		—
Contract assets	—	—		—		—
Receivables from finance leases	—	5	[a]	—		5
Trade receivables	—	—		—		—
Other receivables and other assets	—	377	[a]	—		377
Other tax receivables	—	—		—		—
Deferred tax assets	—	199	[a]	—		199
Other long-term assets	581	(581)	[a]	—		—
NON-CURRENT ASSETS	**17,151**	**—**		**—**		**17,151**
Inventories	614	—		—		614
Receivables from finance leases	—	1	[b]	—		1
Trade receivables	—	1,675	[b]	—		1,675
Contract assets	—	—		—		—
Other receivables and other assets	—	320	[b] [c]	—		320
Other financial assets	—	—		—		—
Income tax receivables	—	58	[c]	—		58
Accounts receivable - net	1,804	(1,804)	[b]	—		—
Prepaid and other current assets	250	(250)	[c]	—		—
Cash and cash equivalents	617	—		—		617
Non-current assets classified as held for sale	—	—		—		—
CURRENT ASSETS	**3,285**	**—**		**—**		**3,285**
TOTAL ASSETS	**$ 20,436**	**$ —**		**$ —**		**$ 20,436**

Millions of Dollars	U.S. GAAP 31/12/2017	Reclassification Adjustments	Notes below	U.S. GAAP to IFRS Adjustments	Notes below	IFRS 31/12/2017
Equity and liabilities						
Called-up share capital presented as equity	$ 4	$ —		$ —		$ 4
Retained earnings	13,224	(747)	[d]	(3,870)	[m] [n] [o]	8,607
Share premium	4,084	—		123	[p]	4,207
Treasury shares	(7,196)	—		—		(7,196)
Other reserves	(4,098)	747	[d]	3,852	[o]	501
TOTAL EQUITY ATTRIBUTABLE TO LINDE PLC SHAREHOLDERS	**$ 6,018**	**$ —**		**$ 105**		**$ 6,123**
Noncontrolling interests	493	—				493
TOTAL EQUITY	**$ 6,511**	**$ —**		**$ 105**		**$ 6,616**
REDEEMABLE NONCONTROLLING INTEREST	11	—		(11)	[l]	—
Long-term pensions and similar obligations	—	851	[f]	17	[n]	868
Other non-current provisions	—	136	[e]	—		136
Deferred credits	1,236	(1,236)	[e] [f]	—		—
Deferred tax liabilities	—	1,167	[e]	(87)	[p] [o]	1,080
Financial liabilities	7,783	(3)	[g]	—		7,780
Liabilities from finance leases	—	3	[g]	—		3
Trade payables	—	—		—		—
Contract liabilities	—	—		—		—
Non-current tax liability	—	430	[f]	(42)	[k]	388
Other non-current liabilities	1,588	(1,348)	[f]	(11)	[l] [m]	229
NON-CURRENT LIABILITIES	**$ 10,607**	**$ —**		**$ (123)**		**$ 10,484**
Current pensions and similar obligations	—	30	[i]	—		30
Current provisions	—	54	[i]	—		54
Financial liabilities	—	1,216	[h]	—		1,216
Short-term debt	238	(238)	[h]	—		—
Current portion of long term debt	979	(979)	[h]	—		—
Liabilities from finance leases	—	1	[h]	—		1
Trade payables	972	(50)	[i]	—		922
Contract liabilities	—	—		—		—
Other current liabilities	876	(34)	[i]	(13)	[m]	829
Income tax liabilities	242	—		42	[k]	284
Liabilities in connection with non-current assets classified as held for sale	—	—		—		—
CURRENT LIABILITIES	**$ 3,307**	**$ —**		**$ 29**		**$ 3,336**
TOTAL EQUITY AND LIABILITIES	**$ 20,436**	**$ —**		**$ —**		**$ 20,436**

Notes to the reconciliation of equity at 1 January 2017 and 31 December 2017

Reclassification adjustments:

a. **Other Long-term Assets**
Other long-term assets are reclassified to other receivables and other assets. Receivables from finance leases, and deferred tax assets have been historically included in Other long-term assets and have been reclassified to each of their respective captions, consistent with Linde plc presentation.

b. **Accounts Receivables**
Accounts receivables is reclassified to trade receivables. Receivables from finance leases and other receivables and other assets has been historically included in Accounts receivable and have been reclassified to each of their respective captions, consistent with Linde plc presentation.

c. **Prepaid and Other Current Assets**

Prepaid and other current assets are reclassified to other receivables and other assets. Income tax receivables have been historically included in prepaid and other current assets and has been reclassified to its respective caption, consistent with Linde plc.

d. **Accumulated Deferred Gains and Losses**
Accumulated deferred gains and losses related to pensions and other post employee plans included in other reserves are reclassified to retained earnings, consistent with Linde plc presentation.

e. **Deferred Credits**
Deferred credits are reclassified to deferred tax liabilities. Other non-current liabilities have been historically included in deferred charges and have been reclassified to its respective caption, consistent with Linde plc presentation.

f. **Provisions for Pensions**
Provisions for pensions and similar obligations and Other non-current provisions have been historically included in other non-current liabilities and are reclassified to each of their respective captions, consistent with Linde plc presentation.

g. **Non-current Liabilities from Finance Leases**
Liabilities from finance leases (non-current) have been historically included in financial debt (non-current) and are reclassified to its caption, consistent with Linde plc presentation.

h. **Current Liabilities from Finance Leases and Debt**
Liabilities from finance leases (current) and the portion of financial debt (current) that is due within one year which had an original maturity date greater than one year have been historically included within current portion of long-term debt and are reclassified to their respective captions, consistent with Linde plc presentation.

i. **Current Provisions**
Current provisions is reclassified from other current liabilities to current provisions, consistent with Linde plc presentation.

IFRS reclassifications and remeasurements:

j. **Intangible Assets**
Under U.S. GAAP, software is classified as property, plant and equipment. Under IFRS, software is presented in other intangible assets and as such software is reclassified to other intangible assets.

k. **Taxes**
Under U.S. GAAP, the uncertain tax positions are classified as other non-current liabilities. Under IFRS, income tax reserves for uncertain tax positions are classified as current and as such uncertain tax positions are reclassified to current.

l. **Mezzanine Equity**
IFRS does not allow for a mezzanine-equity presentation and accordingly, redeemable noncontrolling has been reclassified to Other non-current liabilities.

m. **Severance Accrual**
Linde recognizes severance accruals based on expected employee termination under U.S. GAAP. The obligation is recognized before the employee formally accepts the severance offer and therefore is derecognized under IFRS. Accordingly, other current liabilities and other non-current liabilities decreased under IFRS.

n. **Pension Adjustment**
IFRS requires the discount rate selected to measure pensions to be the best estimate of unbiased actuarial assumptions. Therefore, under IFRS Linde derives the discount rate from corporate bonds that represent the "universe" of bonds in the denominated currency's market. This population of the bonds does not exclude outliers. The actuarial method used to determine the discount rate under U.S. GAAP is the 90/40 method. In a range of bond interest rates, the bottom 40% and top 10% of bond interest rates are removed from the population used to estimate the discount rate. The resulting adjustment was recognized against retained earnings.

o. **Foreign Currency**
Under U.S. GAAP, the company recognized translation differences on foreign operations in a separate component of equity. Cumulative currency translation differences for all foreign operations are set to zero as at 1 January 2017. The resulting adjustment was recognized against retained earnings.

p. **Deferred Taxes**

Under U.S. GAAP, the company recognized deferred taxes on share-based compensation expense to the extent of the amount of underlying expense, however, under IFRS the associated deferred tax assets are recognized at fair value. The deferred tax impact on the other transition adjustments were not material.

q. **Classification of Long-term Debt Due Within One Year**
Under U.S. GAAP, a company may recognize the current portion of long-term debt as long-term if the company has the ability and intent to refinance this debt through an existing credit facility on a long-term basis. This is not allowed under IFRS and as such the portion of this debt was reclassified as current.

Reconciliation of total comprehensive income for the year ended 31 December 2017

(Millions of dollars	*U.S. GAAP* *12/31/2017*	*Reclassificati on Adjustments*	*Notes*	*U.S. GAAP to IFRS Adjustments*	*Notes*	*IFRS* *12/31/2017*
Revenue	$ 11,437					$ 11,437
Cost of sales	6,455	987	[e]	8	[h]	7,450
GROSS PROFIT	$ 4,982	$ (987)		$ (8)		$ 3,987
Marketing and selling expenses	—	608	[a] [e]	—		608
Administration expense	—	810	[a] [e] [f]	4	[h]	814
Selling, general, and administrative	1,207	(1,207)	[a]	—		—
Research and development costs	93	7	[e]	—		100
Depreciation and amortization	1,184	(1,184)	[e]	—		—
Impairment losses on receivables and contract assets	—	33	[e]	—		33
Transaction costs and other charges	54	(54)	[f]	—		—
Other operating income	4	63	[b]	—		67
Other operating expenses	—	63	[b]	—		63
OPERATING PROFIT FROM CONTINUING OPERATIONS	$ 2,448	$ —		$ (12)		$ 2,436
Financial income	—	70	[c]	—		70
Financial expenses	161	70	[c]	$ 34	[h]	265
Share of profit and loss from associates and joint ventures (at equity)	—	47	[d]	—		47
PROFIT BEFORE TAX FROM CONTINUING OPERATIONS	$ 2,287	$ 47		$ (46)		$ 2,288
Income tax expense	1,026	—		(72)	[g] [h]	954
Income from equity investments	47	(47)	[d]	—		
PROFIT FOR THE YEAR FROM CONTINUING OPERATIONS	$ 1,308	$ —		$ 26		$ 1,334
LOSS FOR THE YEAR FROM DISCONTINUED OPERATIONS	—	—		—		—
PROFIT FOR THE YEAR	$ 1,308	$ —		$ 26		$ 1,334
OTHER COMPREHENSIVE INCOME (NET OF TAX)	536	—		(60)		476
ITEMS THAT WILL BE RECLASSIFIED SUBSEQUENTLY TO PROFIT AND LOSS	**525**	**—**		**11**		536
Unrealized gains/losses on available-for-sale financial assets		—		—		—
Unrealized gains/losses on hedging instruments		—		—		—
Currency translation differences from continuing operations	525	—		11	[g]	536
ITEMS THAT WILL NOT BE RECLASSIFIED SUBSEQUENTLY TO PROFIT AND LOSS	**11**	**—**		**(71)**		(60)
Remeasurement of defined benefit plans from continuing operations	11	—		34	[h]	(60)
				(105)	[g]	
TOTAL COMPREHENSIVE INCOME	$ 1,844	$ —		$ (34)		$ 1,810

Notes to the reconciliation of total comprehensive income for the year ended 31 December 2017

Reclassification adjustments:

a. **SG&A**
Selling, general and administrative expenses have been historically classified as a single caption and are reclassified to marketing and selling expenses and administration expenses.

b. **Other Income (Expenses)**
Other income (expenses) - net has been historically classified as a single caption and is reclassified to other operating income and Other operating expenses.

c. **Interest Expense**
Interest expense - net has been historically classified as a single caption and is reclassified to financial income and financial expenses.

d. **Income from Equity Investments**
Income from equity investments are reclassified to share of profit and loss from associates and joint ventures (at equity).

e. **Depreciation and Amortization**
Depreciation and amortization has been historically presented as a single caption versus a component of each functional line item within the statement of income by Praxair.

f. **Transaction Cost**
Transaction cost and other charges have been historically presented as a single caption versus a component of each functional line item within the statement of income by Praxair. The Cost reduction program and other charges have been reclassified to each respective functional line item, consistent with the Linde plc presentation.

IFRS reclassifications and remeasurements:

g. **Taxes**
Under IFRS, deferred taxes that were originally recorded through other comprehensive income are adjusted back in other comprehensive income for the effect of the tax rate change. Under U.S. GAAP, such tax rate change adjustments are required to be recorded as an adjustment to profit and loss. Accordingly, an adjustment was recorded to eliminate the amount recorded through profit and loss statement for U.S. GAAP purposes.

h. **Pensions**
Linde accounts for its pensions under IFRS, and as such, there are several differences compared to U. S. GAAP.

- Under U.S. GAAP the expected return on plan assets is recognized as income in the period whereas under IFRS the interest income is calculated as the product of the discount rate used to measure the benefit obligation each as of the beginning of the annual period and the fair value of the plan asset.
- Actuarial gains and losses recorded in OCI are recognized in net income in subsequent reporting periods under U.S. GAAP whereas under IFRS remeasurement gains and losses, including actuarial gains and losses are not subsequently recognized into net income.
- Prior service costs are initially recognized through OCI and are recognized in net income in subsequent periods under U.S. GAAP versus immediately recognized in net income under IFRS.
- Under IFRS, only the change in the benefit obligation will be recognized as a result of a curtailment, since there are no unrecognized prior service costs or gains and losses. Under U.S. GAAP, unrecognized prior service costs or credits relating to previous plan amendments are recognized in a curtailment together with the portion, if any, of the decrease or increase in the benefit obligation that exceeds unrecognized actuarial losses or gains, respectively. Further, the timing for recognizing the effects of a curtailment under U.S. GAAP differs depending on whether a curtailment gain or loss has occurred (curtailment losses may be recognized in an earlier period than curtailment gains). The timing for recognizing the effects of a curtailment under IFRS is the same for both an increase and a decrease in the defined benefit obligation. In addition, the elimination of the accrual of defined benefits for some or all of the future services of a significant number of employees is accounted for as a curtailment under U.S. GAAP. Under IFRS, the elimination of benefits is accounted for as a plan amendment, i.e. immediately recognized in net income under IFRS.
- Under IFRS, the settlement gain or loss is measured as the difference between the benefit obligation being settled and the settlement price. Under U.S. GAAP, the settlement gain or loss includes a portion of unrecognized actuarial gains or losses. In addition, under ASC 715, an employer can elect to not account for settlement gains or losses, as long as payments made do not exceed the sum of the plan's total service cost and interest cost for that year (known as the "settlement threshold"). Such payments will be treated as normal benefit payments. Settlement accounting also may be applied if the amount of lump-sum payments is below the threshold, if this approach is applied consistently from year to year. IFRS does not have a minimum threshold for recognizing settlements. However, if an existing benefit plan provides plan participants with an option to choose a lump-sum payment at retirement, instead of ongoing annuity

payments, participants' decisions to receive those lump-sum payments are accounted for as benefit payments, rather than as settlements.

- The expected return on plan assets and the interest expenses is presented in cost of sales under U.S. GAAP whereas under IFRS the interest on the net liability is presented as interest expense.

Statement of Cash-flows

There were no material adjustments as a result of the transition to IFRS as it relates to the statement of cash flows.

[30] Directors' Remuneration and Key Management Personnel Compensation

Directors Remuneration under Irish Companies Act

The following table discloses the remuneration for members of the board of directors of Linde plc for the current and preceding year as required under Irish Companies Act 2014. Prior to consummation of the merger on 31 October 2018 (see Notes 1 and 2), an interim board of directors of Linde plc was established, all four members of which resigned with effect from 22 October 2018. The interim Board members did not receive incremental compensation for their services in this capacity and, as such, no amounts for that period are included below.

(Millions of dollars)	2018	2017
Emoluments in respect of qualifying services (1)	$ 1	$ —
Gain on exercise of stock options (2)	18	—
Defined benefit and contribution payments (3)	—	—
TOTAL EMOLUMENTS	**$ 19**	**$ —**

(1) Represents the aggregate emoluments (including salary, fees, bonuses, expenses and estimated money value of other benefits received) for the financial year 2018, from the date of appointment to the board of directors 31 October 2018 to 31 December 2018 in respect of qualifying services.
(2) Represents gain on exercise of stock options during the calendar year ended 31 December 2018.
(3) Retirement benefits in respect of qualifying services are accruing to one director (2017: Nil) under a defined benefit scheme.

Key Management Personnel Compensation under IFRS

For the period up to the consummation of the merger the Board of Directors of Praxair, Inc, and members of the Praxair, Inc.'s Office Of the Chairman ("OOC") were deemed to be Key Management Personnel ("KMP"). Post the merger the Board of Directors of Linde Plc and members of the Linde Management Committee ("MC") are deemed the KMP.

The following table discloses the compensation in relation to the KMP for the current and prior year.

(Millions of dollars)	2018	2017
Short-term employee benefits (1)	$ 9	$ 12
Post-employment benefits (2)	1	12
Other long-term benefits (3)	5	—
Termination benefits (4)	3	—
Share based compensation benefits (5)	20	22
Total benefits	**$ 38**	**$ 46**

(1) Primarily includes short-term cash compensation, including salary and bonuses, which were not deferred by the participant.
(2) Represents the increase in pension obligation to the plan participant. Reductions in obligations are not reflected within the table above.
(3) Primarily relates to short-term compensation which has which was elected to be deferred by the participant.
(4) Primarily relates to cash compensation and acceleration of share based compensation benefits for a member of key management which departed the company during calendar year 2018.
(5) Represents share-based compensation benefits accrued during the respective periods.

[31] Contingent liabilities and other financial commitments

Contingent Liabilities

(Millions of dollars)	**31/12/2018**	**31/12/2017**
Guarantees	$ 240	$ 572
Other contingent liabilities	33	—
TOTAL	**$ 273**	**$ 572**

Guarantee agreements

Contingent liabilities arise at Linde from guarantees, among other things. See litigation section below for more information regarding the guarantees.

Other contingent liabilities mainly include penalties and interest for a potential subsequent tax payment in India. Judicial proceedings have been ongoing in this matter for some years now. It is not possible to reliably pinpoint the timing of potential cash outflows. There is no entitlement to reimbursement.

Other contingencies

The Engineering Division regularly enters into contracts with consortium partners to build turnkey industrial plants, under which the consortium partners assume joint and several liability to the customer for the total volume of the contract. There are clear internal rules here as to how the liability should be split between the partners. At present, there are plant construction orders with one of our consortium partners totaling $16 million (2017: $0 million).

Other financial commitments

Other financial commitments include lease commitments relating to operating leases and commitments relating to orders. Commitments relating to orders are in respect of open orders for which a contractual payment obligation has already been agreed.

Other Financial Commitments

(Millions of dollars)	**31/12/2018**	**31/12/2017**
Obligations under non-cancellable operating leases	$ 1,300	$ 583
Capital expenditure commitment (tangible fixed assets)	3,255	1,065
Capital expenditure commitment (intangible assets)	—	—
TOTAL	**$ 4,555**	**$ 1,648**

Procurement Leases

(Millions of dollars)	**31/12/2018**	**31/12/2017**
Total future minimum lease payments (gross investment)		
due within one year	$ 305	$ 131
due in one to five years	669	345
due in more than five years	326	107
TOTAL	**$ 1,300**	**$ 583**

The minimum lease payments relate to leased buildings, technical equipment, fixtures, furniture and equipment (procurement leases). Some of the lease agreements contain extension clauses, purchase options or price adjustment clauses customary in the market.

They are in respect of a large number of individual contracts. In the 2018 financial year, costs arising from operating leases of $193 million (2017: $146 million) were recognised.

Litigation

Linde is subject to various lawsuits and government investigations that arise from time to time in the ordinary course of business. These actions are based upon alleged environmental, tax, antitrust and personal injury claims, among others. Linde has strong defenses in these cases and intends to defend itself vigorously. It is possible that the company may incur losses in connection with some of these actions in excess of accrued liabilities. Management does not anticipate that in the aggregate such losses would have a material adverse effect on the company's consolidated financial position or liquidity; however, it is possible that the final outcomes could have a significant impact on the company's reported results of operations in any given period.Significant matters are:

- During May 2009, the Brazilian government published Law 11941/2009 instituting a new voluntary amnesty program ("Refis Program") which allowed Brazilian companies to settle certain federal tax disputes at reduced amounts. During the 2009 third quarter, Praxair decided that it was economically beneficial to settle many of its outstanding federal tax disputes and such disputes were enrolled in the Refis Program, subject to final calculation and review by the Brazilian federal government. The company recorded estimated liabilities based on the terms of the Refis Program. Since 2009, Praxair has been unable to reach final agreement on the calculations and initiated litigation against the government in an attempt to resolve certain items. Open issues relate to the following matters: (i) application of cash deposits and net operating loss carryforwards to satisfy obligations and (ii) the amount of tax reductions available under the Refis Program. It is difficult to estimate the timing of resolution of legal matters in Brazil.

- 31 December 2018 the most significant non-income and income tax claims in Brazil, after enrollment in the Refis Program, relate to state VAT tax matters and a federal income tax matter where the taxing authorities are challenging the tax rate that should be applied to income generated by a subsidiary company. The total estimated exposure relating to such claims, including interest and penalties, as appropriate, is approximately $205 million. Linde has not recorded any liabilities related to such claims based on management judgments, after considering judgments and opinions of outside counsel. Because litigation in Brazil historically takes many years to resolve, it is very difficult to estimate the timing of resolution of these matters; however, it is possible that certain of these matters may be resolved within the near term. The company is vigorously defending against the proceedings.

- On 1 September 2010, CADE ("Brazilian Administrative Council for Economic Defense") announced alleged anticompetitive activity on the part of five industrial gas companies in Brazil and imposed fines on all five companies. Originally, CADE imposed a civil fine of R$2.2 billion Brazilian reais ($568 million) against White Martins, the Brazil-based subsidiary of Praxair. In response to a motion for clarification, the fine was reduced to R$1.7 billion Brazilian reais ($439 million) due to a calculation error made by CADE. The amount of the fine is subject to indexation using SELIC. On 2 September 2010, Praxair issued a press release and filed a report on Form 8-K rejecting all claims and stating that the fine represents a gross and arbitrary disregard of Brazilian law.

  On 19 October 2010, White Martins filed an annulment petition ("appeal") with the Federal Court in Brasilia seeking to have the fine against White Martins entirely overturned. In order to suspend payment of the fine pending the completion of the appeal process, Brazilian law required that the company tender a form of guarantee in the amount of the fine as security. Initially, 50% of the guarantee was satisfied by letters of credit with a financial institution and 50% by equity of a Brazilian subsidiary. On 15 April 2016, the Ninth Federal Court in Brasilia allowed White Martins to withdraw and cancel the letters of credit. Accordingly, the guarantee is currently satisfied solely by equity of a Brazilian subsidiary.

  On September 14, 2015, the Ninth Federal Court of Brasilia overturned the fine against White Martins and declared the original CADE administrative proceeding to be null and void. On 30 June 2016, CADE filed an appeal against this decision with the Federal Circuit Court in Brasilia. Praxair strongly believes that the allegations are without merit and that the fine will be entirely overturned during the appeal process. The company further believes that it has strong defenses and will vigorously defend against the allegations and related fine up to such levels of the Federal Courts in Brazil as may be necessary. Because appeals in Brazil historically take many years to resolve, it is very difficult to estimate when the appeal will be finally decided. Based on management judgments, after considering judgments and opinions of outside counsel, no reserve has been recorded for this proceeding as management does not believe that a loss is probable.

- As stated above, in 2010, the Brazilian competition authority CADE imposed fines on a number of gases companies, including Linde AG's Brazilian subsidiary, on the grounds of alleged anti-competitive business conduct. CADE imposed a fine of approximately R$188 million Brazilian reais ($49 million) on Linde AG's Brazilian subsidiary. Based on the fact that the fine has been overturned by a federal court in the first instance and on a subsequent appeal by CADE, Linde believes that this decision will not stand up to judicial review in the third instance either, and deems the possibility of cash outflows to be extremely unlikely. As a result, no reserve has been recorded for this proceeding as management does not believe that a loss is probable.

[32] Auditors' fees and services

(Millions of dollars)	2018 PwC Ireland	2018 Other PwC network firms	2018 Total	2017 PwC Ireland	2017 Other PwC network firms	2017 Total
Audit (including expenses)	$ 0.8	$ 15.4	$ 16.2	$ —	$ 7.8	$ 7.8
Other assurance services	0.4	1.6	2	—	0.3	0.3
Tax advisory services	—	2.3	2.3	—	—	—
Other services	0.3	0.2	0.5	—	—	—
TOTAL	**$ 1.5**	**$ 19.5**	**$ 21.0**	**$ —**	**$ 8.1**	**$ 8.1**

[33] Interest in other entities

The information below contains information on the principal subsidiaries, associates and joint ventures in which the company has an interest at 31 December 2018. A full list of subsidiaries, associates and joint ventures will be annexed to the Annual Return to be filed with the Irish Registrar of Companies.

Principal subsidiaries included in the consolidated financial statements in accordance with IFRS 10:

Company Name	Registered Office	Country	Business Activity	Participating Interest in Percent	Share Class
Commercium Immobilien- und Beteiligungs-GmbH	Klosterhofstrasse 1, Munich, 80331, Germany	Germany	Holding Company	100	Ordinary shares
Linde Aktiengesellschaft	Klosterhofstrasse 1, Munich, 80331, Germany	Germany	Gases and Engineering Company	92	Ordinary shares
Linde Finance B.V.	Buitenveldertselaan 106, Amsterdam, 1081AB, Netherlands	Netherlands	Financial Services	100	Ordinary shares
Linde Holdings Netherlands B.V.	Havenstraat 1, Schiedam, 3115HC, Netherlands	Netherlands	Holding Company	100	Ordinary shares
AGA Aktiebolag	Lidingö, 181 81, Sweden	Sweden	Industrial and specialty gases	100	Ordinary shares
LindeGas Holding Sweden AB	Lidingö, 181 81, Sweden	Sweden	Holding Company	100	Ordinary shares
BOC HELEX	The Priestley Centre, 10 Priestley Road, The Surrey Research Park, Guildford, Surrey, GU2 7XY, England, United Kingdom	United Kingdom	Finance and Administrative Services	100	Ordinary shares
BOC HOLDINGS	The Priestley Centre, 10 Priestley Road, The Surrey Research Park, Guildford, Surrey, GU2 7XY, England, United Kingdom	United Kingdom	Holding Company	100	Ordinary shares

LINDE INVESTMENTS No.1 LIMITED	The Priestley Centre, 10 Priestley Road, The Surrey Research Park, Guildford, Surrey, GU2 7XY, England, United Kingdom	United Kingdom	Holding Company	100	Ordinary shares
LINDE NORTH AMERICA HOLDINGS LIMITED	The Priestley Centre, 10 Priestley Road, The Surrey Research Park, Guildford, Surrey, GU2 7XY, England, United Kingdom	United Kingdom	Holding Company	100	Ordinary shares
LINDE UK HOLDINGS LIMITED	The Priestley Centre, 10 Priestley Road, The Surrey Research Park, Guildford, Surrey, GU2 7XY, England, United Kingdom	United Kingdom	Holding Company	100	Ordinary shares
The BOC GROUP LIMITED	The Priestley Centre, 10 Priestley Road, The Surrey Research Park, Guildford, Surrey, GU2 7XY, England, United Kingdom	United Kingdom	Holding Company	100	Ordinary & preference shares
Linde Delaware Investments Inc.	c/o Corporation Service Company, 251 Little Falls Drive, Wilmington, DE, 19808, United States	United States	Holding Company	100	Ordinary shares
Linde Gas North America LLC	c/o Corporation Service Company, 251 Little Falls Drive, Wilmington, DE, 19808, United States	United States	Industrial and specialty gases	100	Ordinary shares
Linde North America Inc.	c/o Corporation Service Company, 251 Little Falls Drive, Wilmington, DE, 19808, United States	United States	Industrial, specialty and medical gases	100	Ordinary shares
NuCO2 Inc.	251 Little Falls Drive, Wilmington, Delaware 19808	United States	Industrial and specialty gases	100	Ordinary shares
Praxair Distribution Inc.	251 Little Falls Drive, Wilmington, Delaware 19808	United States	Industrial and specialty gases	100	Ordinary shares
Praxair, Inc.	521 Little Falls Drive, Wilmington, Delaware 19808	United States	Industrial and specialty gases	100	Ordinary shares
White Martins Gases Industriais Ltda.	Rau Mayrink Veiga, 9 Rio de Janerio RJ	Brazil	Industrial and specialty gases	100	Ordinary shares
Praxair India Private Ltd	Mercury 2B Block, 6th Floor, Prestige Technology Park, Outer Ring Road, Marthahalli, Bangalore 560 103	India	Industrial and specialty gases	100	Ordinary shares
Praxair Mexico S. de R.L. de C.V.	Oficinas en el Parque, Torre II, Piso 10, Blvd. Diaz Ordaz No. 140, Col. Santa Maria, Monterrey, N.L., C.P. 64650	Mexico	Industrial and specialty gases	100	Ordinary shares
Praxair Korea Company Limited	16F, Shinan Bldg., 512, Teheran-ro, Gangnam-gu, Seoul 06179,	Republic of Korea	Industrial and specialty gases	100	Ordinary shares

Praxair Surface Technologies Inc	521 Little Falls Drive, Wilmington, Delaware 19808	United States	Surface coatings	100	Ordinary shares
Praxair Canada Inc.	40 Gurholt Drive Dartmouth, Nova Scotia B3B 1J9	Canada	Industrial and specialty gases	100	Ordinary shares

Noncontrolling Interests

The total noncontrolling interest as at 31 December 2018, 31 December 2017 and 1 January 2017 was $6,094 million, $493 million and $420 million respectively. The NCI that is material to the company at the end of 2018 relates to 8% NCI in Linde AG. Summary financial information for Linde AG is disclosed in Note 2. On 8 April 2019 Linde AG competed the merger squeeze-out of the NCI for a cash consideration of €189.46 per share. The total payment for the squeeze out was $3.2 billion (€2.8 billion).

Principal investments accounted for using the equity method in accordance with IAS 28

There are no individually material investments accounted for using the equity method in accordance with IAS 28 that require disclosure.

[34] Events after the reporting date

Treasury Shares

On 22 January 2019 the company's board of directors approved the repurchase of $6.0 billion of its ordinary shares ("2019 program") which could take place from time to time on the open market (which could include the use of 10b5-1 trading plans), subject to market and business conditions. The 2019 program has a maximum repurchase amount of 15% of outstanding shares and a stated expiration date of 1 February 2021.

Dividends After Year End

On 26 February 2019, the directors of Linde plc declared an interim dividend of $0.875 per share ($477 million total) for the first quarter of 2019 (the "Q1 Dividend"). The Q1 Dividend was payable on 22 March 2019 to shareholders of record on 8 March 2019.

Divestitures

On 1 March 2019, Linde AG completed the sale of the majority of its industrial gases business in North America and certain industrial gases business activities in South America to a consortium comprising companies of the German industrial gases manufacturer Messer Group and CVC Capital Partners Fund VII, pursuant to a Sale and Purchase Agreement, dated 16 July 2018, as amended on 22 September 2018, 19 October 2018 and 20 February 2019, by and among the company, Linde AG, Praxair, Inc., Messer Group and CVC Capital Partners Fund VII (the "SPA"). Messer Group and CVC Capital Partners Fund VII paid $2.97 billion in cash consideration after purchase price adjustments for certain items relating to assets and liabilities of the sold businesses. The SPA was entered into as part of the commitments in connection with the merger control review by the U.S. Federal Trade Commission of the previously completed combination of the businesses of Praxair, Inc. and Linde AG under the company (the "business combination" - see Note 1).

As part of the company's, Praxair's and Linde AG's further commitments in connection with the merger control review by the FTC, Linde AG divested additional assets within the Americas for aggregate net proceeds of $531 million (i) to Matheson Tri-Gas, Inc., five of Linde AG's HyCO facilities outside the Gulf Coast region, along with Linde AG's hydrogen pipeline in the Gulf Coast, intellectual property, customer contracts, and other assets, (ii) to Celanese Corporation, Linde AG's Clear Lake, Texas plant, and (iii) to LyondellBasell Industries N.V., Linde AG's La Porte, Texas plant.

Hold Separate Order

Additionally, concurrent with the sale of the required merger-related divestitures in the United States, on March 1, 2019, the hold separate order restrictions described in Note 1 were lifted and the company was able to commence integration activities.

Credit Agreement

On 26 March 2019, Linde plc and certain of its subsidiaries have entered into an unsecured revolving credit agreement (the "Credit Agreement") with Bank of America, N.A., as administrative agent (the "Administrative Agent") and a syndicate of banking institutions as lenders. The Credit Agreement became effective on 29 March 2019 and provides for total commitments of $5,000,000,000, which may be increased to up to $6,500,000,000 subject to receipt of additional commitments and satisfaction of customary conditions. The commitments will expire on 26 March 2024, however, the company has the option to request two one-year extensions of the expiration date. Any such extension will be subject to approval by the extending lenders.

The Credit Agreement is available for general corporate purposes of the company and its subsidiaries. Revolving loans may be borrowed in U.S. Dollars, Pounds Sterling, Euros and other currencies agreed to by the Administrative Agent and the lenders. The Credit Agreement also includes commitments for swingline loans of $200,000,000 (for U.S. Dollar-denominated swingline loans) and €100,000,000 (for Euro-denominated swingline loans) and for letters of credit, letters of indemnity and bank guarantees in approved currencies of $600,000,000. Any usage of the commitments for swingline loans, letters of credit, letters of indemnity and bank guarantees will reduce availability for revolving loans.

Any revolving loans and swingline loans outstanding under the Credit Agreement will bear interest based on LIBOR, EURIBOR or the base rate, as applicable, plus, in each case, an interest margin that is subject to a ratings-based pricing grid. Commitment fees and other customary fees will be payable in connection with the Credit Agreement.

The Credit Agreement contains customary representations and warranties, conditions to credit extension, affirmative covenants, negative covenants and events of default. The Credit Agreement does not contain a financial maintenance covenant.

In connection with the effectiveness of the Credit Agreement, each of Praxair and Linde AG terminated their respective existing revolving credit agreements. As of the date of this Report, the Credit Agreement has no usage outstanding.

Squeeze-out Transaction

On 8 April 2019 Linde plc's subsidiary Linde AG completed the merger squeeze-out of all its minority shares for cash consideration of €189.46 per share. The total payment for the squeeze-out was $3.2 billion (€2.8 billion) (see Note 2).

Additionally, the trading of Linde AG (FWB: LNA) shares on the Frankfurt Stock Exchange and other German exchanges was discontinued.

[35] Date of approval of the financial statements

The financial statements of Linde plc for the year ended 31 December 2018 were authorized for issue by the Board of Directors on 30 April 2019.

Company Statement of Financial Position of Linde plc

As of 31 December 2018

(In millions of USD)

	Note	31 December 2018	31 December 2017
Assets			
Fixed assets			
Financial assets			
Shares in group undertakings	4	$ 89,832	$ —
		89,832	**—**
Current assets			
Debtors			
Other debtors	5	—	9
Cash at bank and in hand		2	—
		2	**9**
Total assets		**$ 89,834**	**$ 9**
Capital, reserves and liabilities			
Capital and reserves			
Called up share capital as presented as equity	6	$ 1	$ —
Share premium account	6	—	—
Other reserves	7	(615)	—
Profit and loss account	7	89,326	(2)
		88,712	**(2)**
Creditors - amounts falling due within one year			
Accruals	8	48	2
Amounts owed to group undertakings	9	19	9
Creditors - amounts falling due beyond one year			
Amounts owed to group undertakings	9	1,055	—
		1,122	**11**
Total equity and liabilities		**$ 89,834**	**$ 9**

The company's loss for the years ended 31 December 2018 and 2017 determined in accordance with Irish GAAP was $25 million (loss) and $2 million (loss), respectively.

The accompanying notes are an integral part of these financial statements.

On behalf of the board

[Signature]	[Signature]	[Signature]
Prof. Dr. Wolfgang Reitzle	Stephen F. Angel	Prof. Dr. Clemens Börsig
Chairman	*Chief Executive Officer and Director*	*Director*

30 April 2019

Company Statement of Changes in Equity of Linde plc

For the year ended 31 December 2018

(In millions of USD)

	Called up share capital	Share premium	Other reserves	Profit and loss account	Total equity
Total contributions by and transactions with owners recognized directly within equity - at incorporation 18 April 2017	$ —	$ —	$ —	$ —	$ —
Loss for the period	—	—	—	(2)	(2)
Other comprehensive loss for the period - currency translation	—	—	—	—	—
Total comprehensive loss for the period	—	—	—	(2)	(2)
31 December 2017	**$ —**	**$ —**	**$ —**	**$ (2)**	**$ (2)**
Loss for the year	—	—		(25)	(25)
Other comprehensive loss for the year - currency translation	—	—	—	—	—
Total comprehensive loss for the year	—	—	—	(25)	(25)
Transactions with equity owners recognised directly in equity					
Equity dividends paid	—	—	—	(454)	(454)
Reclassification of SEC registration fees	—	—	—	(9)	(9)
Issuance of shares in relation to Praxair, inc. (Note 1)	—	47,360	—	—	47,361
Issuance of shares in relation to Linde AG (Note 1)	—	—	42,455	—	42,456
Issuance of bonus preferred share (Note 1)	—	42,455	(42,455)	—	—
Capital reduction approved by the Irish High Court (Note 1)	—	(89,816)	—	89,816	—
Share-based compensation (Note 7)	—	—	14	—	14
Treasury shares (Note 7)	—	—	(629)	—	(629)
31 December 2018 [1]	**$ 1**	**$ —**	**$ (615)**	**$ 89,326**	**$ 88,712**

1. Balances may not sum due to rounding to the nearest million USD.

The accompanying notes are an integral part of these financial statements.

Notes to the Company Financial Statements

1. Organization and Basis of Presentation

Linde plc, formerly known as Zamalight plc ("Linde plc" or the "company"), was incorporated as a public limited company under the laws of Ireland on 18 April 2017, by Enceladus Holding Limited ("Enceladus") and Cumberland Corporate Services Limited ("Cumberland"), with an issued share capital of €25,000 ($26,827), comprised of 25,000 A ordinary shares with a nominal value of €1.00 each, and additional paid in capital of €25,000 ($26,827). The A ordinary shares of €1.00 each were initially issued on Linde plc's incorporation as ordinary shares. These shares were subsequently re-designated as A ordinary shares on 25 July 2017. Zamalight plc was renamed "Linde plc" on 20 July 2017.

The company is registered in Ireland under the registration number 602527 and with its registered office located at Ten Earlsfort Terrace, Dublin 2, D02 T380 Ireland and principal executive offices at The Priestley Centre, 10 Priestley Road, Surrey Research Park, Guildford, Surrey GU2 7XY, United Kingdom.

The company was formed in accordance with the requirements of the business combination agreement, dated as of 1 June 2017, as amended (the "business combination agreement"), pursuant to which, among other things, Praxair, Inc., a Delaware corporation (together with its subsidiaries, "Praxair") and Linde AG, a German stock corporation (together with its subsidiaries, "Linde") agreed to combine their respective businesses through an all-stock transaction, and become subsidiaries of the company.

During the period Linde plc made an offer to exchange each issued and outstanding no-par value bearer share of Linde AG for 1.540 ordinary shares of Linde plc (the "exchange offer"). In addition, Zamalight Subco, Inc., an indirect wholly-owned Delaware subsidiary of Linde plc, merged with and into Praxair, Inc., with Praxair, Inc. surviving the merger (the "merger", and together with the exchange offer, the "business combination"). In the merger, each share of Praxair, Inc. common stock converted into the right to receive one Linde plc ordinary share. Praxair, Inc.'s stockholders approved the merger at Praxair, Inc.'s special meeting held on 27 September 2017 and on 24 November 2017, the tender period for the exchange offer expired with approximately 92% of all Linde AG shares entitled to voting rights being tendered.

The merger completed on 31 October 2018, following which US$47.360 billion was added to the company's share premium account in accordance with section 71(5) of the Companies Act 2014. In accordance with section 72 of the Companies Act 2014 (which applies to a scenario where a company acquires 90% of the equity share capital in another company (including any body corporate for the purpose of the Companies Act 2014) in consideration for the allotment of shares to the selling shareholders of that other company), the value received by the company in excess of the nominal value of the ordinary shares issued by it as consideration for the exchange offer, being $42.455 billion, was credited to a "merger reserve".

Linde plc listed its ordinary shares on the New York Stock Exchange and the Frankfurt Stock Exchange, and is included in the S&P 500 and DAX 30 indices.

On 1 November 2018, the company implemented a multiple step process to covert the "merger reserve" to share premium as follows:

1. Designated a series of preferred shares of €0.001 each in the capital of the company (the "Series A Preferred Shares") in accordance with Article 6 of the Articles of Association of the Company carrying the rights and subject to the limitations set out in that designation (the "Designation");
2. Allotted and issued in accordance with Section 1021 of the Act of one Series A Preferred Share for an aggregate cash consideration of €1.00 (the "Share Issue") to Enceladus Holding Limited, a nominee entity (the "Subscriber");
3. Capitalised the entire amount standing to the credit of the merger reserve by making a bonus issue in accordance with Section 1021 of the Act and Article 95 of the Articles of Association of the Company of one Series A Preferred Share to the Subscriber paid up to the entire amount of the merger reserve (the "Bonus Issue"); and
4. Acquired for nil consideration and cancelled the two Series A Preferred Shares in issue immediately after completion of the Bonus Issue in accordance with the terms of the Designation and Section 102 of the Act (the "Acquisition and Cancellation" and, together with the Designation, the Share Issue, the Bonus Issue and the Acquisition and Cancellation, the "Capital Conversion").

Following completion of the Capital Conversion, the entire amount standing to the credit of the company's share premium account was $89.816 billion.

On 30 November 2018, the Irish High Court approved the creation of distributable reserves of the company, Linde plc through the reduction of the share premium account by $89.816 billion. This resulted in a transfer of reserves from the share premium account to the profit and loss account of the same amount.

The principal activity of Linde plc, the legal entity, is to act an investment holding company.

2. Statement of compliance

The company's financial statements have been prepared in accordance with applicable accounting standards issued by the Financial Reporting Council and promulgated by the Institute of Chartered Accountants in Ireland, including FRS 102, 'The Financial Reporting Standard applicable in the UK and Republic of Ireland' and the Irish Companies Act 2014.

3. Summary of significant accounting policies

The preparation of these financial statements requires the use of certain critical accounting estimates. It also requires management to exercise its judgment in the process of applying the company's accounting policies. The significant accounting policies used in the preparation of the entity financial statements are set out below. These policies have been consistently applied to all financial years presented, unless otherwise stated.

Basis of preparation

The financial statements are prepared under the historical cost convention, in USD which is the functional currency of the company and rounded to the nearest million USD.

The preparation of the financial statements requires management to make judgments, estimates and assumptions that affect the amounts reported for assets and liabilities as at the statement of financial position date and the amounts reported for revenues and expenses during the year. However, the nature of estimation means that actual outcomes could differ from those estimates.

The financial statements present the entity financial position for the year ended 31 December 2018. Comparative information is for the period from the date of incorporation, 18 April 2017 to 31 December 2017.

Transition for FRS 102

This is the first financial year that the company has presented its results under FRS 102. The last financial statements under International Financial Reporting Standards as adopted by the EU ("IFRS") were for the financial period ended 31 December 2017. The date of transition to FRS 102 was 19 April 2017. There were no measurement adjustments arising from the company's transition to FRS 102 at 19 April 2017 or at the comparative date 31 December 2017.

In accordance with section 304 of the Companies Act 2014, the company is availing of the exemption from presenting its individual profit and loss account to the annual general meeting and from filing it with the Registrar of Companies.

Disclosure exemptions

FRS 102 allows a qualifying entity certain disclosure exemptions. The company is a qualifying entity and has availed of the following disclosure exemptions:

i. Exemption from the requirements of Section 7 of FRS 102 and FRS 102 paragraph 3.17(d) to present a statement of cash flows.
ii. Exemption from the financial instrument disclosure requirements of Section 11 paragraphs 11.39 to 11.48A and Section 12 paragraphs 12.26 to 12.29A of FRS 102 as the equivalent disclosures are included in the consolidated financial statements of the company in which the entity is consolidated.
iii. Exemption from certain disclosure requirements of Section 26 of FRS 102 (paragraphs 26.18(b), 26.19 to 26.21 and 26.23), in respect of share-based payments as the share-based payment concerns its own equity instruments and its separate financial statements are presented alongside the consolidated financial statements of the company; and the equivalent disclosures are included in the consolidated financial statements of the company in which the entity is consolidated.
iv. Exemption from the requirement of FRS 102 paragraph 33.7 to disclose key management personnel compensation in total.
v. Exemption from the requirement of FRS 102 paragraph 4.12(a)(iv) to disclose a reconciliation of the number of shares outstanding at the beginning and end of the year.

Critical accounting judgments and estimation uncertainty

Estimates and judgments made in the process of preparing the entity financial statements are continually evaluated and are based on historical experience and other factors, including expectations of future events that are believed to be reasonable under the circumstances.

Critical accounting estimates and assumptions

The estimation process required to prepare the company's financial statements requires assumptions to be made about future events and conditions, and as such, is inherently subjective and uncertain. The company's actual results could differ materially from those estimates.

Carrying value of investment in subsidiary

The company is a holding company and at the statement of financial position has an investment in subsidiary carried at cost of $ 89.8 billion. The investment is reviewed for impairment indicators. Recoverability of the investment is dependent on the financial condition of the subsidiaries of the company. As of 31 December 2018, no impairments were noted.

Foreign currency translation

Items included in these financial statements are measured using the currency of the primary economic environment in which the entity operates ('the functional currency'). The financial information is presented in U.S. Dollars ("USD").

Foreign currency transactions are translated into the functional currency using the exchange rates at the dates of the transactions. Foreign exchange gains and losses resulting from the settlement of such transactions and from the translation of monetary assets and liabilities denominated in foreign currencies at year end exchange rates are generally recognised in profit and loss.

Shares in group undertakings

Shares in group undertakings are stated in the company's statement of financial position at cost less any return of capital, unless it has been impaired in which case it is carried at net of any impairment loss recognized.

Cash at bank and in-hand

Cash and cash equivalents consist of cash at banks or other highly liquid securities with original maturities of three months or less.

Financial instruments

The company has chosen to apply the provisions of Sections 11 and 12 of FRS 102 to account for all of its financial instruments.

Financial assets

Basic financial assets, including trade and other receivables, cash and cash equivalents are initially recognized at transaction price (including transaction costs), unless the arrangement constitutes a financing transaction. Where the arrangement constitutes a financing transaction the resulting financial asset is initially measured at the present value of the future receipts discounted at a market rate of interest for a similar debt instrument.

At the end of each financial year, financial assets measured at amortized cost are assessed for objective evidence of impairment. If there is objective evidence that a financial asset measured at amortized cost is impaired an impairment loss is recognized in profit and loss. The impairment loss is the difference between the financial asset's carrying amount and the present value of the financial asset's estimated cash inflows discounted at the asset's original effective interest rate. No impairments were recognized in the periods ended 31 December 2018 or 31 December 2017.

Financial assets are derecognized when (a) the contractual rights to the cash flows from the asset expire or are settled, or (b) substantially all the risks and rewards of ownership of the financial asset are transferred to another party or (c) control of the financial asset has been transferred to another party who has the practical ability to unilaterally sell the financial asset to an unrelated third party without imposing additional restrictions.

Financial liabilities

Basic financial liabilities, including accrued liabilities, and amounts due to related parties, are initially recognized at transaction price, unless the arrangement constitutes a financing transaction. Where the arrangement constitutes a financing transaction the resulting financial liability is initially measured at the present value of the future payments discounted at a market rate of interest for a similar debt instrument. Amounts due to related parties, and financial liability from arrangements which constitute financing transactions are subsequently carried at amortized cost, using the effective interest method.

Financial liabilities are derecognized when the liability is extinguished, that is when the contractual obligation is discharged, cancelled or expires.

Share capital

Ordinary shares are classified as equity. Incremental costs directly attributable to the issue of new shares are capitalized and upon the closing of the associated equity transaction are reclassified to equity as a deduction, net of tax, from the proceeds.

Treasury shares

Treasury shares comprise the company's ordinary shares that have been purchased under the company's approved share buyback programs which allow for the the repurchase of ordinary shares from time to time in the open market subject to market and business conditions. Subsequent sales, transfers or cancellations of treasury shares held by the company are accounted for within equity.

Income taxes

The company establishes provisions based on reasonable estimates, for possible consequences of audits by the tax authorities of the respective countries in which it operates. The amount of such provisions is based on various factors, such as experience with previous tax audits and differing interpretations of tax regulations by the taxable entity and the responsible tax authority.

Management estimation is required to determine the amount of deferred tax assets that can be recognised, based upon likely timing and level of future taxable profits together with an assessment of the effect of future tax planning strategies.

The income tax expense or credit for the period is the tax payable on the current period's taxable income based on the applicable income tax rate for each jurisdiction adjusted by changes in deferred tax assets and liabilities attributable to temporary differences and to unused tax losses. Current tax is the amount of income tax payable in respect of the taxable profit for the financial year or past financial years. Current tax is measured at the amount of current tax that is expected to be paid using tax rates and laws that have been enacted or substantively enacted by the end of the financial year.

Deferred tax assets are recognized only if it is probable that future taxable amounts will be available to utilize those temporary differences and losses. No deferred tax has been recognized as at the dates of the statement of financial position, as the company has recently been incorporated and therefore does not have any history of income.

Dividends

Dividends and other distributions to company's equity shareholders are recognized as a liability in the financial statements in the financial year in which the dividends and other distributions are approved by the company's shareholders.

Other debtors

Other receivables are non-derivative financial assets with fixed or determinable payments that are not quoted in an active market. Other receivables are stated at the lower of amortized cost or recoverable amount. If collection of the amounts is expected in one year or less they are classified as current assets.

Share-based compensation

The company and its subsidiaries operate various share based payment plans. See Note 23 to the consolidated financial statements for details on the share based payment plans.

The share based payment expense associated with the share plans is recognized as an expense by the entity which receives services in exchange for the share based compensation. In these company only financial statements, the expense related to the options vested is recorded in other reserves and recorded as a capital contribution to the appropriate entity that receives the services of the employees.

4. Shares in group undertakings

The directly held subsidiaries of the company include the following:

Name	Nature of Business	Registered office, Country of Incorporation and Principal Place of Business	Proportion of Ownership (Ordinary Shares) Interest at 31 December 2018
Zamalight Holdco LLC	Holding Company	10 Riverview Dr, Danbury, CT 06810 USA	100%
Linde Holding GmbH	Holding Company	Klosterhofstr. 1 80331 Munich Germany	100%

Company's investment in subsidiaries - shares (in millions of USD)		
At 31 December 2017	$	—
Additions during the year		89,832
At 31 December 2018	$	89,832

Refer to Note 33 of the consolidated financial statements of the company for a listing of all principal subsidiaries of the company.

5. Other Debtors

Other debtors as at 31 December 2017 related to the costs to issue equity securities (SEC registration fee). When the business combination completed, these costs were reclassified to equity.

6. Share capital and premium

Authorised

As set out in the Constitution of the company, the authorised share capital of the company is €1,825,000 divided into 1,750,000,000 Ordinary Shares of €0.001 each ("Ordinary shares"), 25,000 A ordinary shares of €1.00 each ("A Ordinary Shares"), 25,000 deferred shares of €1.00 each ("Deferred Shares") and 25,000,000 preferred shares of €0.001 each ("Preferred Shares").

Allotted, called up and fully paid (in millions of USD)

	31 December 2018	31 December 2017
25,000 A ordinary shares of €0.001 each (31 December 2017 only)	$ —	$ —
551,310,272 Ordinary shares of €0.001 each (31 December 2018 only)	1	—
	$ 1	$ —

On 24 October 2018 the A ordinary shares were converted into deferred shares, acquired for no consideration and cancelled.

Share Premium

Share premium represents proceeds received from the issuance of share capital in excess of par value.

7. Other reserves and profit and loss account

Other reserves

Other reserves includes treasury stock, the impact of share-based compensation, currency translation adjustment and other undenominated capital as a result of the cancellation of some of the company's shares during the period since incorporation.

Treasury stock

As of 1 January 2018 Linde plc had no own shares.

As of 31 December 2018 4,069 thousand ordinary shares were purchased by the company for total consideration of $629 million, or an average price of $154.48 per share (€0.001 nominal value). The consideration includes stamp duty, commission and all customary fees. The ordinary shares acquired represented less than 1% of the called-up ordinary share capital immediately prior to the acquisition and at the date of the statement of financial position.

These shares were acquired in order to reduce the shares in issue or to meet obligations under Linde plc equity awards.

On 10 December 2018 the company's board of directors approved the repurchase of $1.0 billion of its ordinary shares ("2018 program") which could take place from time to time on the open market (which could include the use of 10b5-1 trading plans), subject to market and business conditions. The 2018 program has a maximum repurchase amount of 5% of outstanding shares and a stated expiration date of 30 April 2019.

As of 31 December 2018, the company had purchased ordinary shares for consideration of $629 million pursuant to the 2018 program, leaving an additional $371 million remaining authorized under the 2018 program.

Share-based compensation

Refer to Note 23 of the consolidated financial statements of the company for further information regarding share-based compensation plans.

Profit and loss account
Retained profit/loss represents accumulated comprehensive profit/loss for the period since incorporation, less dividends paid to shareholders.

Dividends
On 10 December 2018, the directors of Linde plc declared an interim dividend of $0.825 per share for the fourth quarter of 2018 (the "Q4 Dividend"). The Q4 Dividend was payable on 27 December 2018 to shareholders of record on 18 December 2018.

8. Accruals
Accrued liabilities in 2017 consist of expenses incurred in connection with the business combination and mainly relate to fees for accounting and advisory services.

Accrued liabilities in 2018 consist primarily of share repurchases not yet settled at 31 December 2018 due to the two day settlement period and accruals for accounting and advisory services incurred in connection with the business combination.

9. Amounts owed to group undertakings
On 24 July 2017 the company entered into a cash management agreement with Praxair International Finance UC to finance the company's working capital obligations. The total available amount under the facility was €30,000,000. The cash management agreement was Euro denominated and had a variable interest rate of one month EUR LIBOR plus a 0% spread. The cash management agreement was extended and converted to USD denominated immediately following the closing date of the business combination. The total available amount under the facility is $40,000,000 with a variable interest rate of one month LIBOR. The facility expires 29 October 2019.

On 17 December 2018 the company entered into a USD denominated loan facility agreement with Praxair Inc. for up to a maximum principal amount of $1,000,000,000 with a variable interest rate of three month LIBOR. The facility expires 31 March 2020.

On 27 December 2018, the company entered into a loan with BOC Helex over a principal amount of $456,000,000, and an interest rate of LIBOR plus a 0.25% spread. The loan is repayable on 30 June 2020.

As of 31 December 2018 the total amount (notional and accrued interest) owed to group undertakings under the above facilities was $1,074 million, of which $19 million is due within one year and $1,055 million is due outside of one year.

Subsequent to year end, on 1 March 2019, the company entered into a USD denominated loan facility agreement with BOC Helex for up to a maximum principal amount of $2,000,000,000 with a variable interest rate of three month LIBOR plus a 0.875% spread. The facility expires 28 February 2021.

10. Related party transactions
The company is exempt from disclosing related party transactions with entities that are wholly owned within the company it heads.

The disclosure of directors' remuneration is in Note 30 of the consolidated financial statements of the company.

11. Contingent liabilities and other financial commitments
There were no additional commitments or contingencies required to be disclosed for the company. See Note 31 in the consolidated financial statements.

12. Auditors' remuneration
In the years ended 31 December 2018 and 2017, $59,000 and $20,000, respectively, was payable for the statutory audit of the company financial statements in 2018 and other assurance services in 2017 to its auditors, PricewaterhouseCoopers, Ireland.

13. Subsequent events
On 22 January 2019 the company's board of directors approved the additional repurchase of its ordinary shares for consideration up to $6.0 billion.

On 26 February 2019, the directors of Linde plc declared an interim dividend of $0.875 per share for the first quarter of 2019 (the "Q1 Dividend"). The Q1 Dividend of $477 million was payable on 22 March 2019 to shareholders of record on 8 March 2019.

From the period 1 January 2019 through 31 March 2019, an additional 4,258 thousand ordinary shares were purchased by the company for total consideration of $704 million, or an average price of $165.40 per share.

Refer to Note 34 of the consolidated financial statements of the company for subsequent events impacting the consolidated company.

14. Date of approval of the financial statements

The financial statements of Linde plc for the year ended 31 December 2018 were authorized for issue by the Board of Directors on 30 April 2019.

COMBINED NON-FINANCIAL REPORT

Linde plc ("Linde" or the "company") publishes non-financial indicators and qualitative information in this combined non-financial report in accordance with the Irish implementation of the European Directives 2014/95/EU and 2013/34/EU as set out in the European Union (Disclosure of Non-Financial and Diversity Information by certain large undertakings and groups) Regulations 2017, as amended (the “Irish Regulations”).

This combined non-financial report forms part of the 2018 Directors' Report. It includes reportable information on Board of Directors (the "Board") diversity and on company social and employee matters; environmental matters; combating bribery and corruption and respect for human rights. Reportable information includes governance, policies, due diligence in implementing these policies and the outcomes of these actions, risk identification and management, and key performance indicators ("KPIs").

Linde plc was created to effect the merger of two companies, Praxair, Inc. ("Praxair") and Linde Aktiengesellschaft ("Linde AG"), which was consummated on 31 October 2018. Divestitures were required on both sides. After the merger both companies operated under a Hold Separate Order until 1 March 2019 with rules restricting information exchange or collaboration. In this context, Board and management decisions have not yet been made on a combined sustainable development strategy or related KPIs and targets. Those management decisions are expected during 2019. Where possible and relevant, these will be provided in Linde’s voluntary sustainability report which will be published in July 2019. Nevertheless, Linde’s corporate governance structure, core values, key policies and non-financial compensation incentives are in place and are the focus of this report.

2018 data provided in this report follow the scope of Linde's 2018 financial reporting. Where full year 2018 numbers are provided, Linde reports a full calendar year for legacy Praxair as a successor in interest and two months for legacy Linde AG. Data provided for 2017 reflects results for Praxair.

Business model and strategy

The business model of Linde is described in the "Principal Activities" section of the Directors' Report.

Risk management

Main risks are reported in sections relating to environmental matters; social and employee matters; human rights; and bribery and corruption; as well as action towards their mitigation. In addition, the section “Principal Risks and Uncertainties” describes further risks related to the above matters which could have an adverse financial impact on Linde as well as connected non-financial risks.

Issues relating to non-financial matters are included in the company-wide enterprise risk management system. The company assesses potential risks on a regular basis and defines and implements mitigation actions. This process also incorporates relevant conclusions from its regular dialog with stakeholders, including customers, investors and suppliers.

Governance of non-financial matters

Linde has established five core values: safety, inclusion, accountability, integrity and community. These are the basis of what the company stands for and how it behaves. A code of ethics has been adopted that provides clear instructions on expected behavior and for reporting of concerns about potential non-conformance. This code has been approved by the Linde Board of Directors and is named the “Code of Business Integrity”. This document is made widely available to employees and third parties and is posted on the company’s public website.

It is the view of Linde’s Board that non-financial issues are a component of the company's values, culture and performance expectations, and are a basis on which employees drive financial results. The Board has confirmed the importance of setting non-financial objectives as part of variable compensation to reinforce leadership’s focus on maintaining a culture that supports both short- and long-term sustainable results. It has established non-financial goals with respect to elements such as safety, environmental responsibility, global compliance, productivity and talent management. These measures are described in Linde’s April 2019 Proxy Statement. Annual payout of executive variable compensation will depend on performance in several strategic non-financial areas, including compliance.

Linde’s Board monitors the implementation of its Code of Business Integrity which includes commitments to adhere to high standards for diversity and inclusion; safety, health, care for the environment and quality; human rights, corporate citizenship and the prevention of bribery and corruption. The Audit Committee oversees the company’s compliance with legal and regulatory requirements. The Compensation Committee oversees diversity and inclusion policies, objectives and programs to achieve those objectives. The Nomination & Governance Committee has responsibility to periodically review the company's guidelines and policies governing its response to important broad public policy issues in the areas of corporate social responsibility and corporate citizenship. Linde leadership develops policies and processes to reinforce these non-financial elements.

For purposes of external reporting, Linde consolidates and reports non-financial issues from its sustainable development function, which is also the central point of contact for stakeholders interested in sustainability-related matters. Sustainability is managed by the global head of Sustainable Development, reporting to the Executive Vice President for Global Functions.

Board diversity

The Board acknowledges the importance of ensuring that it has the mix of perspectives, skills, experience, qualities and competencies that is appropriate to the company's strategies, and its business, market, geographic, and regulatory environments. The Board also recognizes that its effectiveness is dependent on having directors who have the time to focus on the company's issues and who contribute to an open Board culture that encourages frank discussion and the free exchange of information.

In considering its corporate governance structure, Linde reviewed the standards of recognized governance organizations and of peer firms. Among the elements deemed relevant was Board diversity. Consistent with the Board's Corporate Governance Guidelines, the Nominating and Governance Committee seeks to build and maintain a Board that contains a range of experiences, competencies, and perspectives that is well-suited for advice and counsel to, and oversight of, the company's business and operations. In doing so, the Committee takes into account a variety of factors, including the mix of experiences, competencies, and perspectives (including gender, ethnic and cultural diversity) currently represented on the Board.

The Nomination & Governance Committee assists the Board in its oversight of the selection, qualifications, compensation and performance of Linde's directors and is responsible for evaluating the mix of Board member skills required in connection with filling any vacancy on the Board. It maintains a process to establish and periodically reevaluate criteria for Board membership and selection of new directors including independence standards; and determines as necessary the portfolio of skills, experience, perspective and background required for the effective functioning of the Board considering the company's strategy and its regulatory, geographic and market environments.

On 31 December 2018, the Board of Directors of Linde was 75 percent male and 25 percent female, representing a balanced mix of skills, professional and educational backgrounds, including among others mechanical/industrial engineering, economics, law, natural sciences and business administration. See the table at the end of this section: "Indicators Relating to Board Diversity and Employee-Related Matters". Each of the directors has experience as a senior executive of a public company or comparable business organization. Each is serving or has served as a director of one or more public companies and on a variety of board committees. Each has executive management and director oversight experience in most, if not all of the following areas considered critical to the conduct of the company's business. These include: strategy development and implementation; risk assessment and management; financial accounting and reporting; internal controls; corporate finance; capital project evaluation; the evaluation, compensation, motivation and retention of senior executive talent; public policies as they affect global industrial corporations; compliance; corporate governance; productivity management; safety management; project management; sustainable development; and, in most cases, global operations. Many of the directors also bring particular insights into specific end markets and foreign markets that are important to the company. These nominees collectively provide a range of perspectives, experiences and competencies well suited to providing advice and counsel to management and to overseeing the company's business and operations.

Social and Employee-related matters

Occupational Health and Safety

There is inherent operational risk in the management of Linde's production facilities and delivery systems, including storage, vehicle transportation and pipelines. Material operating failures at production, storage facilities or pipelines, including fire, toxic release and explosions, or the occurrence of vehicle transportation accidents could result in loss of life or present safety risks to employees, business partners, communities and the environment.

Safety is a core value for Linde and is always a first priority. Linde continuously works to improve its safety culture and performance worldwide. Linde's worldwide Health, Safety & Environment ("HSE") policy reinforces its ambition of zero incidents causing harm to people, communities or the environment. It asserts that all incidents and injuries are preventable and that each Linde employee is responsible for their own safety and that of others around them. The policy is widely communicated to employees and third parties and is made available on Linde's public website. Linde is also a signatory of the global chemical industry Responsible

Care Global Charter®. Global operations adhere to the guidelines of the Responsible Care® program and to Linde's global safety management system, which is based on best industry standards and practice.

Linde's full Board of Directors has responsibility to review safety and environmental risk at each Board meeting. The Board has established a strategic business objective to maintain best-in-class performance in safety. Annual payout of executive variable compensation will depend on performance in several strategic non-financial areas, including safety. Safety and health issues are managed by the global head of the Safety, Health, Environment & Quality ("SHEQ") function reporting to the Executive Vice President for Global Functions.

Linde's safety culture is embedded into all operational processes and in transport and distribution. Linde's strong worldwide safety and health management system ensures that measures are in place to enable process, personnel, product and distribution safety. These measures are communicated to all employees and relevant business partners and contractors, who are regularly trained in the safe handling of Linde's products and are expected to adhere to the same high standards. Safety performance is monitored continuously in all businesses and reported monthly and on a major event basis to leadership.

Linde is in the process of aligning the respective programs of the Linde and Praxair legacy companies into comprehensive safety, security and environmental standards and procedures for work processes as well as product handling, to enable employees around the world to execute their jobs safely and prevent safety incidents relating to operational processes or products.

Due to the hold separate period management decisions have not yet been made on joint KPIs. These will be reported in Linde's voluntary sustainability report in July 2019.

Employees

On 31 December 2018, Linde had 80,946 employees in diverse occupations working in more than 100 countries (Praxair 2017: 26,461 employees). Personnel expenses in 2018 totaled $2,793 million (2017: $2,059 million), of which $1,872 million (2017: $1,353 million) related to salaries (including social security contributions) and $153 million (2017: $93 million) to pensions.

The company sources talent from an ever-changing and competitive environment. The ability to source and retain qualified and committed employees is a prerequisite for the company's success, and represents a general risk for Linde, including in the context of the business combination.

Inclusion is a Linde core value. The company embraces diversity and inclusion in order to attract, develop and retain the best talent and build high-performing teams. By hearing all voices and benefiting from diverse opinions, thoughts and perspectives, the company can achieve its full promise and potential. Its Code of Business Integrity states that employees must not be discriminated against on the basis of their race, color, religion, gender, gender identity, national origin, age, disability, veteran status, pregnancy, sexual orientation or other protected characteristic.

The Board has established a strategic business objective to maintain world-class standards in talent management. Executive variable compensation will be assessed annually based on performance in several strategic non-financial areas, including talent management. The Compensation Committee assists the Board in its oversight of Linde's compensation and incentive policies and programs, and management development and succession, particularly in regard to reviewing executive compensation for Linde's executive officers. The Committee also periodically reviews the company's diversity policies and objectives, and programs to achieve those objectives. The global head of Human Resources reports to the Chief Executive Officer ("CEO"). A global leader of Diversity and Inclusion reports to the head of Human Resources.

Linde has aligned diversity and inclusion with its business strategies and implemented diversity action planning into business process and performance management. Diversity and inclusion are line management responsibilities and Linde seeks competitive advantage through proactive management of its talent pipeline, procurement and recruiting processes. Linde provides equal employment opportunity, and recruits, hires, promotes and compensates people based solely on their merit and ability.

Employees receive a competitive salary and variable remuneration components based on merit and depending on their position. Linde has collective bargaining agreements with unions at numerous locations throughout the world. Additional benefits are offered such as occupational pensions and contributions towards health insurance or medical screening, reflecting regional conditions and local competition. Managers' compensation is based on performance. Senior managers participate directly in the company's growth in value through the Long Term Incentive Plan of Linde plc. Work-life balance is promoted by providing a range of opportunities that are based on the overall local conditions. Linde also invests in professional development of its employees through formal and on-the-job training.

On 31 December 2018, the total workforce was 28 percent women and 72 percent men. The table at the end of this section provides 2017 data for Praxair as a predecessor in interest and 2018 data for Linde plc.

Due to the hold separate period management decisions on additional employee-related KPIs have not yet been made. These will be reported in Linde's voluntary sustainability report in July 2019.

Indicators Relating to Board Diversity and Employee-Related Matters	**Units**	**2018**	**2017***
Employees of Linde	FTE	80,571	26,461
Proportion of Females			
Board of Directors	%	25	11
Leadership	%	14	17
First management tier below Leadership	%	15	n/a
Total employees	%	28	19

** All 2017 numbers are provided for legacy Praxair, Inc. only. The proportion of females at first management tier below leadership of Linde plc in 2018 is not considered comparable to the Praxair value in 2017 because of significantly different organizational structures, therefore the 2017 value is shown as "not applicable".*

Community engagement

Community is a core value. Linde is committed to improving the communities where employees live and work. Its charitable contributions, along with employee voluntarism, support initiatives that make important and sustainable contributions to the world. This includes educational investments and research projects related to core business areas and supporting charitable projects in communities and neighborhoods. Charitable contributions are mainly made through the Global Giving Program.

Employee community engagement in all businesses and functions is promoted from the sustainable development department. In 2018, Linde employee volunteers carried out more than 100 community engagement projects benefiting around 100,000 children and students in our communities around the world.

Environmental matters

Linde's business is resource transformation through resource productivity. Principal operations relate to the production and distribution of atmospheric, process and other industrial gases. Linde's operations are energy intensive. Energy use is mostly electricity for air separation, and natural gas for energy and as a feedstock for making hydrogen. Where Linde's energy is sourced from fossil fuels, these cause direct Scope 1 Greenhouse Gas ("GHG") emissions (principally from steam methane reforming in hydrogen production and from vehicle fuel use in distribution) and indirect Scope 2 GHG emissions (principally from air separation). See "Climate Change" below. Other environmental impacts from waste generation or air emissions are minimal and do not present significant business or social risks. Most water is used for cooling processes and is returned to its source with little change in water quality.

Linde's core value of Community includes a commitment to minimize Linde's environmental impact. Linde's Code of Business Integrity emphasizes that care for the environment is a pre-requisite for business success. In addition to its focus on safety, Linde's worldwide HSE Policy includes a focus on environmental responsibility. Employees are responsible to comply with laws and to strive to ensure that no harm comes from their actions to the environment in which they operate. The policy reiterates that environmental responsibility is a core value at Linde and integral in all activities. Linde's participation in Responsible Care® provides additional policy direction on environmental stewardship.

Linde's full Board of Directors has responsibility to review safety and environmental risk at each Board meeting. The Board has established a strategic business objective to maintain best-in-class performance in environmental responsibility. Annual payout of executive variable compensation will partly depend on performance in this area. Environmental issues are managed by the head of global SHEQ, reporting to the Executive Vice President of Linde's Global Functions.

In addition to its global HSE policy, Linde is in the process of aligning the programs of the Linde and Praxair legacy companies into unified and comprehensive environmental standards and work procedures. Linde's strong worldwide environmental management system ensures that measures are in place to enable pollution prevention and control, the responsible management of direct and indirect atmospheric emissions and waste, the protection of natural resources and biodiversity and the management of environmental impacts from transportation or from the use and disposal of products and services. Linde assesses water availability based on local sources and the latest Water Risk Atlas of the World Resource Institute and focuses management effort in areas of high water use that are also considered areas of water stress.

Due to the hold separate period management decisions on joint KPIs for the new Linde have not yet been made. These will be reported in Linde's voluntary sustainability report in July 2019.

In 2018, Linde received no substantial environmental claims for environmental violations. Environmental protection costs were not significant, amounting to approximately $29 million of environmental expenses and $11 million of environmental investments. Linde anticipates that future annual environmental protection expenditures will be proportionally similar to 2018, subject to any significant changes in existing laws and regulations. Based on historical results and current estimates, management does not believe that environmental expenditures will have a material adverse effect on the consolidated financial position, the consolidated results of operations or cash flows in any given year. However, worldwide costs relating to environmental protection may continue to grow due to increasingly stringent laws and regulations, and Linde's ongoing commitment to rigorous internal standards. In addition, Linde may face physical risks from climate change and extreme weather.

Risks and Opportunities from Climate Change

Linde operates in jurisdictions that have, or are developing, laws and/or regulations to reduce or mitigate the perceived adverse effects of greenhouse gas emissions and faces a highly uncertain regulatory environment in this area. For example, the U.S. Environmental Protection Agency ("EPA") has promulgated rules requiring reporting of GHG emissions, and Linde and many of its suppliers and customers are subject to these rules. EPA has also promulgated regulations to restrict GHG emissions, including final rules regulating GHG emissions from light-duty vehicles and certain large manufacturing facilities, many of which are Linde suppliers or customers. In addition to these developments in the United States, GHGs are regulated in the European Union under the Emissions Trading System, which has wide implications for the company's customers and may impact certain operations of Linde in Europe. There are also requirements for mandatory reporting in Canada, which apply to certain Linde operations and will be used in developing cap-and-trade regulations on GHG emissions. These regulations are expected to impact certain Linde facilities in Canada. Climate change and energy efficiency laws and policies are also being widely introduced in jurisdictions throughout South America, Mexico and parts of Asia. China has announced plans to launch a national carbon emissions trading system, though it does not appear the regulations will have a direct impact on GHG emissions from Linde facilities. Among other impacts, such regulations are expected to raise the costs of energy, which is a significant cost for Linde. Nevertheless, Linde's long-term customer contracts routinely provide rights to recover increased electricity, natural gas, and other costs that are incurred by the company as a result of Climate Change regulation.

Linde anticipates continued growth in its hydrogen business, as hydrogen is essential to refineries that use it to remove sulfur from transportation fuels in order to meet ambient air quality standards in the United States and fuel standards in other regions. Hydrogen production plants and a large number of other manufacturing and electricity-generating plants are regulated in California and the European Union as a source of carbon dioxide emissions, and these plants are subject to cap-and-trade regulations in those jurisdictions. Linde believes it will be able to mitigate the costs of these regulations through the terms of its product supply contracts. However, legislation that limits GHG emissions may impact growth by increasing capital, compliance, operating and maintenance costs and/or decreasing demand.

To manage business risks from current and potential GHG emission regulation as well as physical consequences of climate change, Linde actively monitors current developments, evaluates the direct and indirect business risks, and takes appropriate actions. Among others, actions include: increasing relevant resources and training; maintaining contingency plans; obtaining advice and counsel from expert vendors, insurance providers and industry experts; incorporating GHG provisions in commercial agreements; and conducting regular reviews of the business risks with management. Although there are considerable uncertainties, Linde believes that the business risk from potential regulations can be effectively managed through its commercial contracts. Additionally, Linde does not anticipate any material effects regarding its plant operations or business arising from potential physical risks of climate change.

Linde continuously seeks opportunities to optimize its own energy use and GHG footprint through rigorous energy efficiency, investment in renewable energy, and the purchase of hydrogen as a chemical byproduct where feasible. Linde maintains related performance improvement targets and reports progress against these targets regularly to business management and annually to Linde's Board of Directors.

At the same time, Linde may benefit from business opportunities arising from governmental regulation of GHG and other emissions; uncertain costs of energy and certain natural resources; the development of renewable energy alternatives; and new technologies that help extract natural gas, improve air quality, increase energy efficiency and mitigate the impacts of climate change. Linde continues to develop new applications that can lower emissions, including GHG emissions, in Linde's processes and help customers lower energy consumption and increase product throughput. Stricter regulation of water quality in emerging economies such as China provide a growing market for a number of gases, e.g., oxygen for wastewater treatment. Increased concern about drought in areas such as California may create a market for carbon dioxide for desalination. Renewable fuel standards in the European Union and U.S. create a market for second-generation biofuels which use industrial gases such as oxygen, carbon dioxide, and hydrogen.

Products that offer environmental and social advantages

Linde innovation provides a competitive advantage to its customers by continuously developing new products and applications, which allow them to improve their productivity, energy efficiency and environmental performance. Linde's products help the company's customers to develop more sustainable processes in many ways - for example by boosting energy efficiency or reducing emissions. Linde's products also contribute positively to the health and wellbeing of our customers. Homecare patients worldwide benefit from our medical gases, devices, services and therapies especially in respiratory care.

In 2018, Linde spent a total of $139 million on research and development (2017: $100 million).

Ethics and Integrity

Responsible corporate governance is a key prerequisite for Linde's business success. This means ensuring compliance with the law, rules and regulations and voluntary commitments. Integrity is a company core value. Linde strives continuously to achieve its goals ethically and with the highest integrity. Interaction between management, employees and Linde's business partners is expected to be transparent and respectful, consistent with our Code of Business Integrity.

The Linde Board believes that a strong integrity, ethics and compliance culture is a social obligation to those impacted by the company, necessary for maintaining investor trust and a necessary condition for effective corporate governance. The Board believes further that such culture must be driven by example and emphasis at the top of the organization.

Ethical values and performance are significant factors in the selection of directors, the CEO and members of the leadership team. The Board has established financial incentives for the achievement of compliance results as a key non-financial element in executive variable compensation.

Linde has appointed a Chief Compliance Officer ("CCO") within the department of global Legal and Compliance who reports to the General Counsel, who reports to the CEO. The Audit Committee reviews the company's key compliance risks and compliance program, including that program's design, implementation and effectiveness, with the CCO and the General Counsel.

Linde's Code of Business Integrity affirms its commitment to fairness, transparency and trust as the basis for growth and prosperity for employees, customers, suppliers, markets and our communities. The Board is responsible for monitoring the implementation of the Code of Business Integrity. Its responsibilities include the periodic review of the policy and overseeing management's preventative, reporting, investigation and resolution programs for implementing this policy.

The Code is posted on the company website and is communicated to employees. It provides clear instructions on expected behavior to conform with the Code and for reporting of concerns about potential non-conformance. Subcontractors and other stakeholders are expected to follow this standard.

Linde follows the law and is governed by all local laws wherever it is located. In the event of a conflict between local law and the Code of Business Integrity or company policy, Linde will follow the stricter standard within the framework of the applicable laws.

*Combating corruption and bribe*ry

Linde does not tolerate the use of kickbacks or bribery in any form. Third parties acting on behalf of Linde are prohibited from giving or accepting bribes, directly or indirectly. Linde's Code of Business Integrity prohibits activities that are or may be seen to be corrupt and prohibits any form of bribery. A global compliance program designed to prevent possible policy breaches focuses on information, training sessions and management advice. The global compliance organization helps to identify potential compliance-related risks and to develop measures to mitigate them. Concerns are reported to the Leadership and the Board's Audit Committee.

Linde's commitment to anti-corruption is communicated to employees using different internal channels, including mandatory compliance training using face-to-face and e-learning tools. Employees use the Integrity Hotline to report potential non-compliance issues. Third parties can also use the Integrity Hotline to report potential concerns.

Human rights

Human rights are basic rights inherent to all human beings, regardless of differences such as in race, color, religion, gender, gender identity, national origin, sexual orientation. These include the right to life and freedom, the right to work and education and the right to well-being, among others. Linde has an obligation to comply with the law and be responsible to protect its employees, business operations, the environment, the communities in which it works, its business relationships and its company reputation.

Linde's Code of Business Integrity and corporate HSE Policy, as well as other corporate and country-level policies, make clear the company's commitment and management processes to address relevant areas of potential Human Rights concern. These include:

- Safety and health protection; a safe work environment
- The prevention of discrimination and harassment of employees
- Equal opportunity and equal treatment
- Merit-based decisions on recruitment, hiring, promotion and compensation
- Compliance with regulations including on working hours
- The right to privacy
- Freedom of association and freedom of peaceful assembly, including freedom to choose whether to engage in collective bargaining and employees' participation in works agreements in various countries

In addition, human rights policies from legacy Linde AG and legacy Praxair prohibit any form of child labor or forced labor, including human trafficking. These policies are provided on the legacy company websites and remain current until replaced by a corporate Linde policy.

Specifically, the Linde Code of Business Integrity makes clear Linde's commitment to human rights. Linde recognizes every person's innate humanity and treats everyone with dignity and respect. In supporting the protection and promotion of human rights worldwide, Linde abides by the principles of the International Bill of Human Rights enacted by the United Nations, and does not condone nor engage in discrimination, harassment, violations of privacy, slavery or servitude, restrictions on free assembly or unfair employment practices. Linde commits to adhering to these human rights principles and expect similar standards to be observed by all with whom we conduct business.

Suppliers and other third parties play a critical role in Linde's ability to operate and provide products and services to its customers. Their actions and practices also reflect on Linde. Therefore, the company chooses suppliers carefully based on merit and a due diligence process. Linde expects suppliers to comply with legal requirements and to act in a manner that is consistent with Linde's values and the principles outlined in its Code of Business Integrity.