CLARIANT

Financial Report 2018

what is precious to you?

Index

CONSOLIDATED BALANCE SHEETS

at 31 December 2018 and 2017

	Notes[1]	31.12.2018 in CHF m	in %	31.12.2017 in CHF m	in %
Assets					
Non-current assets					
Property, plant and equipment	5	2 081		2 250	
Intangible assets	6	1 682		1 775	
Investments in associates and joint ventures	7	368		508	
Financial assets	8	211		50	
Prepaid pension assets	19	30		67	
Deferred tax assets	9	269		267	
Total non-current assets		**4 641**	**58.1**	**4 917**	**59.7**
Current assets					
Inventories	10	1 018		952	
Trade receivables	11	1 017		1 146	
Other current assets	12	366		388	
Current income tax receivables		65		56	
Short-term deposits	13	26		47	
Cash and cash equivalents	14	833		701	
Total current assets		**3 325**	**41.7**	**3 290**	**40.0**
Assets held for sale	**24**	**15**	**0.2**	**22**	**0.3**
Total assets		**7 981**	**100.0**	**8 229**	**100.0**
Equity and liabilities					
Equity					
Share capital	16	1 228		1 228	
Treasury shares (par value)	16	–8		–10	
Other reserves		–189		83	
Retained earnings		1 767		1 459	
Total capital and reserves attributable to Clariant shareholders		**2 798**		**2 760**	
Non-controlling interests		172		179	
Total equity		**2 970**	**37.2**	**2 939**	**35.7**
Liabilities					
Non-current liabilities					
Financial debts	17	1 711		1 727	
Deferred tax liabilities	9	47		65	
Retirement benefit obligations	19	778		849	
Other liabilities	21	72		79	
Provision for non-current liabilities	20	125		166	
Total non-current liabilities		**2 733**	**34.2**	**2 886**	**35.1**
Current liabilities					
Trade payables and other liabilities	21	1 266		1 216	
Financial debts	22	529		567	
Current income tax liabilities		212		301	
Provision for current liabilities	20	271		320	
Total current liabilities		**2 278**	**28.6**	**2 404**	**29.2**
Total liabilities		**5 011**	**62.8**	**5 290**	**64.3**
Total equity and liabilities		**7 981**	**100.0**	**8 229**	**100.0**

[1] The notes form an integral part of the consolidated financial statements.

CONSOLIDATED INCOME STATEMENTS

for the years ended 31 December 2018 and 2017

	Notes[1]	**2018** in CHF m	in %	2017 in CHF m	in %
Sales	23	6 623	100.0	6 377	100.0
Costs of goods sold		–4 690		–4 475	
Gross profit		**1 933**	**29.2**	**1 902**	**29.8**
Selling, general and administrative costs		–1 308		–1 298	
Research and development costs		–209		–211	
Income from associates and joint ventures		130		103	
Operating income		**546**	**8.2**	**496**	**7.8**
Finance income	27	19		35	
Finance costs	27	–100		–94	
Income before taxes		**465**	**7.0**	**437**	**6.8**
Taxes	9	–109		–135	
Net income		**356**	**5.4**	**302**	**4.7**
Attributable to:					
Shareholders of Clariant Ltd		337		277	
Non-controlling interests		19		25	
Basic earnings per share attributable to the shareholders of Clariant Ltd (CHF/share)	**28**	**1.02**		**0.84**	
Diluted earnings per share attributable to the shareholders of Clariant Ltd (CHF/share)	**28**	**1.02**		**0.84**	

[1] The notes form an integral part of the consolidated financial statements.

CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME

for the years ended 31 December 2018 and 2017	Notes[1]	**2018** in CHF m	2017 in CHF m
Net income		**356**	**302**
Other comprehensive income:			
Remeasurements:			
Actuarial gain/loss on retirement benefit obligations	19	126	7
Return on retirement benefit plan assets, excluding amount included in interest expense	19	–149	111
Fair value adjustment on financial assets	8	2	–
Total items that will not be reclassified subsequently to the income statement, gross		**–21**	**118**
Deferred tax effect	9	1	–36
Total items that will not be reclassified subsequently to the income statement, net		**–20**	**82**
Net investment hedge	29	28	–55
Cash flow hedge		–1	–
Currency translation differences		–146	54
Share in other comprehensive income of associates and joint ventures	7	–	–3
Effect of the reclassification of foreign exchange differences on previously held net investments in foreign entities		2	2
Total items that may be reclassified subsequently to the income statement, gross		**–117**	**–2**
Deferred tax effect		0	0
Total items that may be reclassified subsequently to the income statement, net		**–117**	**–2**
Other comprehensive income/loss for the period, net of tax		**–137**	**80**
Total comprehensive income for the period		**219**	**382**
Attributable to:			
Shareholders of Clariant Ltd		210	358
Non-controlling interests		9	24
Total comprehensive income for the period		**219**	**382**

[1] The notes form an integral part of the consolidated financial statements.

CONSOLIDATED STATEMENTS OF CHANGES IN EQUITY in CHF m

at 31 December 2018 and 2017

			Other reserves							
	Total share capital	Treasury shares (par value)	Share premium reserve	Hedging reserves	Cumulative translation reserves	Total other reserves	Retained earnings	Total attributable to equity holders	Non-controlling interests	Total equity
Balance 31 December 2016	**1 228**	**–29**	**1 319**	**5**	**–1 095**	**229**	**1 033**	**2 461**	**85**	**2 546**
Net income						–	277	277	25	302
Net investment hedge					–55	–55		–55		–55
Remeasurements:										
Actuarial gain/loss on retirement benefit obligations (see note 19)						–	7	7		7
Return on retirement benefit plan assets, excluding amount included in interest expense (see note 19)						–	111	111		111
Deferred tax on remeasurements (see note 9)						–	–36	–36		–36
Currency translation differences					55	55		55	–1	54
Share in other comprehensive income of associates and joint ventures (see note 7)						–	–3	–3		–3
Effect of the reclassification of foreign exchange differences on previously held net investments in foreign entities					2	2		2		2
Total comprehensive income for the period	**–**	**–**	**–**	**–**	**2**	**2**	**356**	**358**	**24**	**382**
Distributions			–148			–148		–148		–148
Dividends to non-controlling interests						–		–	–29	–29
Transaction with non-controlling interests (see note 16)						–		–	99	99
Employee share & option scheme:										
Effect of employee services						–	–2	–2		–2
Treasury share transactions		19				–	72	91		91
Balance 31 December 2017	**1 228**	**–10**	**1 171**	**5**	**–1 093**	**83**	**1 459**	**2 760**	**179**	**2 939**
Changes in accounting policies [1]						–	–4	–4		–4
Balance 1 January 2018	**1 228**	**–10**	**1 171**	**5**	**–1 093**	**83**	**1 455**	**2 756**	**179**	**2 935**
Net income						–	337	337	19	356
Cash flow hedge				–1		–1		–1		–1
Net investment hedge					28	28		28		28
Remeasurements:										
Actuarial gain/loss on retirement benefit obligations (see note 19)						–	126	126		126
Return on retirement benefit plan assets, excluding amount included in interest expense (see note 19)						–	–149	–149		–149
Deferred tax on remeasurements (see note 9)						–	1	1		1
Currency translation differences					–136	–136		–136	–10	–146
Fair value adjustment on financial assets						–	2	2		2
Effect of the reclassification of foreign exchange differences on previously held net investments in foreign entities					2	2		2		2
Total comprehensive income for the period	**–**	**–**	**–**	**–1**	**–106**	**–107**	**317**	**210**	**9**	**219**
Distributions			–165			–165		–165		–165
Dividends to non-controlling interests						–		–	–16	–16
Employee share & option scheme:										
Effect of employee services						–	–12	–12		–12
Treasury share transactions		2				–	7	9		9
Balance 31 December 2018	**1 228**	**–8**	**1 006**	**4**	**–1 199**	**–189**	**1 767**	**2 798**	**172**	**2 970**

[1] The impact of the changes in accounting policies include CHF 4 million (net of tax) related to the implementation of IFRS 9 (see note 1.03).

The notes form an integral part of the consolidated financial statements.

CONSOLIDATED STATEMENTS OF CASH FLOWS

for the years ended 31 December 2018 and 2017

	Notes[1]	**2018** in CHF m		2017 in CHF m	
Net cash generated from operating activities	**15**		**530**		**428**
Cash flows from investing activities:					
Investments in property, plant and equipment	5	–237		–248	
Investments in financial assets, associates and joint ventures		–4		–10	
Investments in intangible assets	6	–20		–31	
Changes in current financial assets and short-term deposits		15		238	
Sale of property, plant and equipment and intangible assets		14		6	
Business combinations	25	—		58	
Proceeds from the disposal of associates and financial assets		62		35	
Proceeds/payments associated to disposals of activities not qualifying as discontinued operations	24	38		17	
Net cash provided by/used in investing activities			**–132**		**65**
Cash flows from financing activities:					
Sale of treasury shares		—		82	
Distribution from the reserves to the shareholders of Clariant Ltd	16	–165		–148	
Dividends paid to non-controlling interests		–16		–29	
Proceeds from financial debts		350		78	
Repayments of financial debts		–354		–718	
Interest paid		–79		–109	
Interest received		18		18	
Net cash provided by/used in financing activities			**–246**		**–826**
Currency translation effect on cash and cash equivalents			–20		–9
Net change in cash and cash equivalents			**132**		**–342**
Cash and cash equivalents at the beginning of the period	**14**		**701**		**1 043**
Cash and cash equivalents at the end of the period	**14**		**833**		**701**

[1] The notes form an integral part of the consolidated financial statements.

Notes to the consolidated financial statements

1. Accounting policies

1.01 – General information

Clariant Ltd (the »Company«) and its consolidated subsidiaries (together the »Group«) are a global leader in the field of specialty chemicals. The Group develops, manufactures, distributes and sells a broad range of specialty chemicals which play a key role in its customers' manufacturing and treatment processes or add value to their end products. The Group has manufacturing plants around the world and sells mainly in countries within Europe, the Americas and Asia.

Clariant Ltd is a limited liability company incorporated and domiciled in Switzerland. The address of its registered office is Rothausstrasse 61, CH-4132 Muttenz, Switzerland. The Company is listed on the SIX Swiss Exchange.

The Board of Directors approved the consolidated financial statements for issue on 11 February 2019. They will be subject to approval by the Annual General Meeting of Shareholders scheduled for 1 April 2019.

1.02 – Basis of preparation

The consolidated financial statements of the Clariant Group have been prepared in accordance with the International Financial Reporting Standards (IFRS) and the IFRIC interpretations applicable to companies reporting under IFRS, and with the significant accounting policies set out below.

The consolidated financial statements have been prepared under the historical cost convention as modified by the revaluation of certain financial assets and liabilities (including derivative instruments) at fair value through profit or loss.

The preparation of financial statements in conformity with the IFRS requires the use of certain critical accounting estimates. It also requires management to exercise its judgment in the process of aplying the Group's accounting policies.

These estimates and judgments affect the reported amounts of assets and liabilities and the disclosure of contingent assets and liabilities at the date of the financial statements as well as the reported amounts of revenues and expenses during the reporting period.

Although these are based on management's best knowledge of current events and circumstances, actual outcomes may ultimately differ from those estimates. The areas involving a higher degree of judgment or complexity, or areas where estimates are significant to the consolidated financial statements, are disclosed under note 4.

1.03 – Standards, interpretations and amendments effective in 2018

The Group has applied the following standards and amendments for the first time:

- IFRS 9 Financial Instruments
- IFRS 15 Revenue from Contracts with Customers
- Classification and Measurement of Share-based Payment Transactions – Amendments to IFRS2
- Annual improvements 2014 – 2016 Cycle
- Transfers to Investment Property – Amendments to IAS 40
- Interpretation 22 Foreign Currency Transactions and Advance Consideration

The Group had to change its accounting policies and made certain adjustments as of 1 January 2018 following the adoption of IFRS 9 and IFRS 15. The other amendments listed above did not have any impact on the amounts recognized in prior periods and are not expected to significantly affect the current or future periods.

IFRS 9, Financial Instruments, addresses the classification, measurement and derecognition of financial assets and financial liabilities and introduces new rules for hedge accounting and a new impairment model. The Group's financial assets are made up to a large extent of trade receivables measured at amortized costs and other current assets which are measured at fair value. The rules for the determination of any need for impairment of trade receivables are such that they did not result in any material difference under IFRS 9 compared to the accounting rules under IAS 39. The Group only held a small amount of equity investments as of 1 January 2018 and their measurement at fair value had only a moderate impact on the financial statement. Short-term deposits consist of money market funds of a duration between three and twelve months placed with banks of high quality. Fair value fluctuations of these instruments are only minimal. The Group continues to measure all financial liabilities at amortized cost, thus no change in measurement has taken place.

Overview of financial assets and liabilities as of 31 December 2018 (under IFRS 9) and 31 December 2017 (under IAS 39)

CHF m		
Financial assets	**2018**	2017
Non-current		
Loans at amortized cost	13	20
Participations at cost	–	30
Participations at fair value through OCI	198	–
Total non-current financial assets	**211**	**50**
Current		
Trade receivables at amortized cost	1 017	1 146
Other receivables at amortized cost	248	264
Current financial assets at amortized cost	66	62
Interest rate swaps at fair value	6	5
Forward foreign exchange rate contracts at fair value	1	2
Short-term deposits at amortized cost	26	47
Cash and cash equivalents	833	701
Total current financial assets	**2 197**	**2 227**
Total financial assets	**2 408**	**2 277**
Financial liabilities		
Non-current		
Straight bonds, certificates of indebtedness and others at amortized cost	1 711	1 727
Total non-current financial liabilities	**1 711**	**1 727**
Current		
Banks and other financial institutions at amortized cost	244	317
Current portion of non-current financial debts at amortized costs	285	250
Total current financial liabilities	**529**	**567**
Total financial liabilities	**2 240**	**2 294**

The Group has designed its hedging activities in a way that the change in accounting rules from IAS 39 to IFRS 9 did not result in any changes in hedge accounting. Also, the Group does not to engage in additional hedge accounting as a result of the introduction of the new rules regarding hedge accounting. The impact of the new standard amounted to a total of CHF 5 million which resulted from the measurement at fair value of some participations in other companies, which were previously measured at cost and which was recognized in the opening balance of 2018.

IFRS 15, Revenue from contracts with customers, deals with revenue recognition and establishes principles for disclosing useful information about revenue and cash flows arising from these contracts. This standard replaces IAS 18, Revenue, and IAS 11, Construction Contracts, and related interpretations. It is effective for accounting periods beginning on or after 1 January 2018.

Clariant as a manufacturer and seller of industrial goods is engaged to the largest extent in transactions that are accounted for in the same manner under IFRS 15 as under the previous standards. Administrative procedures are such that contracts with customers are readily identifiable once they are agreed upon. Performance obligations for products and services can be identified by individual product numbers, which are also invoiced individually, allowing for the determination and allocation of the transaction price. Revenues from the sale of goods are recognized at a point in time. Services are normally invoiced separately and commensurate with the services rendered and thus recognized over time. As an industrial company with a large number of customers placing relatively small orders at a time, the Company does not incur substantial contract-related costs.

As a consequence the recognition and valuation rules required by IFRS 15 did not have any material impact on the financial statements of the Group.

1.04 – Standards, interpretations and amendments not yet effective

The following standards, interpretations and amendments already issued but not yet effective will be adopted by the Group as they become effective.

In January 2016, the IASB published the new lease standard. IFRS 16, Leases, introduces a new lessee accounting approach by which the lessee will be required to recognize its leases on the balance sheet, by way of the recognition of a »right of use« asset and a lease liability. It also provides new guidance on sale and lease-back accounting and requires new and different disclosures. This new standard will replace the guidance of IAS 17, Leases, and is effective for accounting periods beginning on or after 1 January 2019. It is expected that the application of IFRS 16 will entail a substantial increase of Clariant's total assets and liabilities as well as an increase of its operating result and a decrease of its financial result, as operating lease obligations (and assets leased under them) will have to be recognized on the balance sheet. Instead of the leasing expenses currently fully recognized as part of the operating result under the new standard the depreciation of the leased assets will be recognized in the operating result, while interest expense arising on the lease contracts will be reported as part of finance costs. It is estimated that if the standard had been introduced in 2018, at the end of the year about CHF 251 million of right of use asset would have been reported. It is also estimated that the operating result would have been CHF 10 million higher and the financial result would have been CHF 10 million lower. Estimated depreciation on right of use asset would have been CHF 55 million.

The Group will apply the standard from its mandatory adoption date of 1 January 2019 and intends to apply the simplified transition approach not restating comparative amounts for the year prior to first adoption.

1.05 – Scope of consolidation

- **Subsidiaries:** Subsidiaries are those entities over which the Group has control. This is the case when it is exposed to, or has rights to, variable returns from its involvement with the entity and has the ability to affect those returns through its power over the entity. Subsidiaries are fully consolidated from the date on which control is transferred to the Group and they are deconsolidated from the date the control ceases.

- **Associates:** Associates are entities over which the Group has significant influence but not control, generally accompanying a shareholding of between 20% and 50% of the voting rights. Investments in associates are accounted for using the equity method.

- **Joint arrangements:** The Group applies IFRS 11, Joint Arrangements, to all joint arrangements. Under IFRS 11, investments in joint arrangements are classified as either joint operations or joint ventures, depending on the contractual rights and obligations of each investor. Clariant has assessed the nature of its joint arrangements and determined them to be joint ventures. Joint ventures are accounted for using the equity method.

All associates and joint ventures apply the same accounting principles as the Group.

1.06 – Principles and methods of consolidation

The annual closing date of the individual financial statements is 31 December. The consolidated financial statements are prepared applying uniform presentation and valuation principles.
The results of non-controlling interests are separately disclosed in the income statement and in the balance sheet.

1.07 – Recognition of revenue from contracts with customers

Sales of goods and services are recognized in line with the requirements of IFRS 15, Revenue from contracts with customers. Revenue is measured based on the consideration the Group expects to receive in exchange for the goods or services. Revenue from sales of goods is recognized in the income statement when control has been transferred to the buyer, which is usually upon delivery, at a fixed or determinable price, and when collectability is reasonably assured. Delivery is defined based on the terms of the sale contract. Revenue from services is recognized when the respective services have been rendered.
Revenue is reported net of sales taxes, returns, discounts and rebates. Rebates to customers are provided for in the same period that the related sales are recorded based on the contract terms.
Where third parties hold Clariant inventories on a consignment basis, revenue is recognized in the period that inventories are withdrawn from consignment and delivered to customers. Clariant periodically enters into prepayment contracts with customers whereby it receives contract liabilities for products to be delivered in a future period. These contract liabilities are recorded as liabilities and presented as part of Other liabilities. Advance payment liabilities are released and revenues associated with such advance payment transactions are recognized upon delivery of and transfer of title, ownership, and risk of loss of the related products to the customer. Cash rebates and discounts granted to customers are classified as a reduction of revenue.

1.08 – Recognition of revenues from interest and dividends

Interest income is recognized on a time proportion basis, taking into account the principal outstanding and the effective rate over the period to maturity when it is determined that such income will accrue to the Group. Dividends are recognized when the right to receive the payment is established.

1.09 – Exchange rate differences

Exchange rate differences are recognized in line with the requirements of IAS 21, The Effect of Changes in Foreign Exchange Rates. The consolidated financial statements are presented in Swiss francs, which is the functional and presentation currency of the parent company.
Transactions and balances: Foreign currency transactions are translated into the functional currency using the exchange rates prevailing 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 are recognized in the line »Finance costs« in the income statement, except when deferred in »Other comprehensive income« as qualifying cash flow hedges and net investment hedges.

Translation differences on debt securities and on other monetary financial assets measured at fair value are included in foreign exchange gains and losses in the line »Finance costs« in the income statement.

Group companies: Income statements and cash flow statements of foreign entities are translated into the Group's presentation currency at sales-weighted average exchange rates for the year and their balance sheets are translated at the exchange rates prevailing on 31 December.

All resulting exchange rate differences are recognized in Other comprehensive income in the line »Currency translation differences«.
Exchange rate differences arising on the translation of the net investment in foreign entities and on borrowings and other currency instruments designated as hedges of such investments are recognized in »Other comprehensive income« in the line »Net investment hedge«. Net investments also include loans for which the settlement is neither planned nor likely to occur in the foreseeable future.

When a foreign operation is disposed of and as a consequence control, significant influence or joint control is lost, the cumulative amount in the translation reserve related to that foreign operation is reclassified to profit or loss as a part of the gain or loss on disposal.

When the Group's interest in a subsidiary that includes a foreign operation changes, while retaining control in the subsidiary, a proportionate part of the cumulative amount of the translation difference that was recognized in other comprehensive income is reclassified to non-controlling interests.

1.10 – Property, plant and equipment

Property, plant and equipment, except for the ones pertaining to mining activities, are valued at historical acquisition or production costs and depreciated on a straight-line basis to the income statement, using the following estimated useful lives in accordance with the Group guidelines:

· Buildings	15 to 40 years
· Machinery and equipment	10 to 16 years
· Furniture, vehicles, computer hardware	3 to 10 years
· Land is not depreciated	

Property, plant and equipment pertaining to mining activities are valued at historical costs and depreciated over their useful lives to the income statement using the units of production method.

When the entity has a present legal or constructive obligation to dismantle an item of property, plant and equipment or restore a site, its initial costs include an estimate of the costs of dismantling and removing the item and restoring the site on which it is located. A corresponding provision is recorded for the amount of the asset component.

Financing costs directly associated with the acquisition, construction or production of qualifying property, plant and equipment are capitalized as a part of the costs of these assets. Investment property is valued at cost less depreciation. As all investment property held by Clariant consists of industrial and administrative sites which have been in use for several decades, there is no active market which would give information on possible market prices, if such property were sold to a third party. The fair values of the investment properties are therefore determined by way of external appraisals and value-in-use calculations.

1.11 – Intangible assets

Goodwill is recognized as per the requirements of IFRS 3, Business Combinations, IAS 38, Intangible Assets, and IFRS 11, Joint arrangements. Goodwill is not amortized, but tested annually for impairment as required by IAS 36, Impairment of Assets.

Trademarks and licenses are capitalized at historical costs and amortized on a straight-line basis to the income statement over their estimated useful lives, with a maximum of ten years.

Acquired computer software licenses are capitalized on the basis of the costs incurred to acquire and bring to use the specific software. They are amortized on a straight-line basis to the income statement over their estimated useful lives (three to five years).

Costs directly associated with the production of identifiable and unique software and other intangible products controlled by the Group, that will probably generate economic benefits beyond one year, are recognized as intangible assets and depreciated over their useful life of three years. Direct costs include software development costs, personnel costs and advisory costs directly related to the software or product development and an appropriate portion of the relevant overheads. Costs associated with developing and maintaining common software programs are recognized as an expense when incurred.

Intangibles acquired in a business combination with the exception of mining rights are amortized using a straight-line method over their remaining useful lives as follows:

· Technology	3 to 15 years
· Customer relationships	6 to 20 years
· Tradenames	10 years
· Order backlog	2 years

Mining rights are depreciated over their useful lives using the units of production method.

On 1 June 2007, a European Union regulation on chemicals and their safe use came into effect. It deals with the Registration, Evaluation, Authorization and Restriction of Chemical Substances (REACH). REACH applies to all substances manufactured, placed on the market and used in the European Union, either on their own, in mixtures or in products. REACH requires the registration of certain substances, with annual volumes exceeding a consumption of 1 000 metric tons, by 2010 and various other substances depending on their category by 2018.

As a company active in the chemical industry, Clariant has incurred costs in connection with REACH. Due to their nature, these costs are considered within the context of IAS 38, Intangible Assets, and those qualifying for capitalization are reported as intangible assets. As the initial two phases of the registration were completed in 2010 and 2013 respectively, the corresponding costs capitalized as intangible assets are amortized since 2011 for the first phase and since January 2014 for the second phase on a straight-line basis to the income statement over their estimated useful lives of twelve years.

1.12 – Impairment of assets

Impairment of assets is recognized and disclosed as per the requirements of IAS 36, Impairment of Assets.

1.13 – Non-current assets and disposal groups held for sale

Non-current assets and disposal groups are classified as held for sale when their carrying amount is to be recovered through a sale transaction and a sale is considered highly probable. They are stated at the lower of the carrying amount and fair value less costs of disposal, as per the requirements of IFRS 5, Non-current Assets Held for Sale and Discontinued Operations.

1.14 – Inventories

Purchased goods are valued at acquisition costs, while self-manufactured products are valued at manufacturing costs including related production overhead costs. Inventory held at the balance sheet date is primarily valued at standard costs, which approximates actual costs on a weighted average basis. This valuation method is also used for valuing the costs of goods sold in the income statement. Adjustments are made for inventories with a lower net realizable value. Unsaleable inventories are fully written off. These adjustments are recorded as valuation allowances, which are deducted directly from the inventory value in the balance sheet. The allowances are reversed when the inventories concerned are either sold or destroyed and as a consequence are removed from the balance sheet.

1.15 – Trade receivables

Trade receivables are amounts due from customers for goods sold or services rendered in the ordinary course of business and are recognized in accordance with IFRS 9, Financial Instruments. They are generally due within 40 days and therefore classified as current. Trade receivables are recognized initially at the amount of considerations that is unconditional. The Group holds trade receivables with the objective to collect the contractual cash flows and therefore measures them subsequently at amortized cost. Details about the Group's impairment policies and the calculation of the loss allowance are provided in note 11.

1.16 – Cash and cash equivalents, short-term deposits

Cash and cash equivalents comprise cash in hand, deposits and calls with banks, as well as short-term investment instruments with an initial lifetime of 90 days or less. Bank overdrafts are reported within financial debt in current liabilities on the balance sheet. Short-term deposits are disclosed separately in the balance sheet if they have an original maturity between 90 and 365 days. They are valued at their nominal value, which is close to their fair market value.

1.17 – Derivative financial instruments and hedging

Derivative financial instruments and hedges are recognized in accordance with IFRS 9, Financial Instruments. Qualifying hedge instruments are derivatives and non-derivative financial assets and liabilities that are fully measured at fair value through profit and loss. Hedged items are assets or liabilities, unrecognized firm commitments, forecast transactions or net investments in foreign entities. They are reliably measurable and if not recognized they are highly probable. The hedges are accounted for either as fair value hedges in the case of exposures in fair value of recognized assets and liabilities or unrecognized firm commitments, as cash flow hedges in the case of exposures in cash flows arising from recognized assets or liabilities or forecast transactions that could affect profit or loss, or as hedges of a net investment in a foreign entity.

1.18 – Leasing

The Group classifies leases into finance and operating leases and recognizes them based on the requirements of IAS 17, Leases.

1.19 – Current income tax

The taxable profits (losses) of Group companies are calculated in accordance with the rules established by the taxation authorities of the countries in which they operate. They are the basis for the determination of income tax payments (reimbursements) for the reporting period in accordance with the prevailing local income tax rates. Current income tax is accounted for in accordance with the requirements of IAS 12, Income Taxes.

1.20 – Deferred income tax

Deferred income tax is calculated using the comprehensive liability method as per the requirements of IAS 12, Income Taxes.
No deferred income tax is calculated for the temporary differences on investments in Group companies, provided that the investor (parent company) is able to control the timing of the reversal of the temporary differences and it is probable that the temporary differences will not reverse in the foreseeable future.
Deferred income tax assets are recognized on tax losses incurred, if based on the business plans of the respective subsidiaries it is deemed probable that the tax losses are recoverable in the foreseeable future. The recoverability of these tax losses is assessed by Management on a regular basis.

1.21 – Employee benefits

Group companies operate various post-employment schemes, including both defined benefit and defined contribution pension plans, post-employment health care plans and other benefits. Obligations for employee benefits are determined and recorded in line with the requirements of IAS 19, Employee Benefits.

Defined contribution plans: Contributions to defined contribution plans are recorded in the income statement in the period to which they relate.

Defined benefit plans: For defined benefit plans, the amount to be recognized in the provision is determined using the Projected Unit Credit method. Independent actuaries perform the actuarial valuations for the defined benefit plans on a regular basis. For the larger plans these valuations take place annually. For the smaller ones valuations are performed at least every three years, with systematic roll-forwards in the years in between.
The retirement benefit obligations recognized in the balance sheet represent the present value of the obligations at the end of the reporting period less the fair value of the plan assets.
The prepaid pension assets recognized in the balance sheet are capitalized only to the extent of their recoverability, that is when a cash refund or a reduction in the future payments is available. The return on plan assets, except for amounts reflected in net interest income, are reported under other comprehensive income.

Actuarial gains and losses are charged or credited to equity in other comprehensive income in the period in which they arise. Past service costs are recognized immediately in the income statement.

Some Group companies **provide post-employment health care benefits** to their retirees. The entitlement to these benefits is usually conditional on the employee remaining in service up to retirement age and the completion of a minimum service period. The expected costs of these benefits are accrued over the period of employment using an accounting method similar to that for the defined benefit pension plans. Actuarial gains and losses arising from experience adjustments and changes in actuarial assumptions are charged or credited to equity in other comprehensive income in the period in which they arise.

The charges for defined benefit plans, defined contribution plans and termination benefits are included in personnel expenses and reported in the income statement under the corresponding functions of the related employees or in restructuring expenses.

Other **long-term employee benefits** are employee benefits (other than post-employment benefits and termination benefits) which do not fall wholly due within twelve months after the end of the period in which the employees render the related service. These include long-term compensated absences such as long-service or sabbatical leave and jubilee or other long-service benefits. The accounting policy for other long-term employee benefits is equal to that for post-employment benefits, with the exception that actuarial gains and losses are recognized immediately in the income statement.

Short-term employee benefits are employee benefits (other than termination benefits) which fall due wholly within twelve months after the end of the period in which the employees render the related service.

1.22 – Provisions

Provisions are recognized as per the requirements of IAS 37, Provisions, Contingent Liabilities and Contingent Assets.

1.23 – Research and development

Development expenses are capitalized to the extent that the recognition criteria set up by IAS 38, Intangible Assets, are met. Considering the uncertainties inherent to the development of new key products, Clariant does not capitalize the associated development costs. Experience has proven that the structure of research and development in the industries that Clariant engages in makes it difficult to demonstrate how single intangible assets (patents) will generate probable future economic benefits.

Laboratory buildings and equipment included in property, plant and equipment are depreciated over their estimated useful lives in accordance with the Group guidelines of note 1.10.

1.24 – Segment reporting

Segment information is presented in the same manner as in the internal reporting to the chief operating decision maker. The chief operating decision maker, responsible for strategic decisions, for the assessment of the segments' performance and for the allocation of resources to the segments, is the Executive Committee.

Clariant has seven Business Units (BU) for external reporting purposes, grouped into four Business Areas (BA) (reportable segments), in accordance with IFRS 8, Operating Segments:
- Care Chemicals (BU ICS)
- Catalysis (BU Catalysts)
- Natural Resources (BU Oil & Mining Services, BU Functional Minerals)
- Plastics & Coatings (BU Additives, BU Masterbatches, BU Pigments)

The seven Business Units were grouped into Business Areas in a manner that they reflect, in Management's opinion, the similar economic characteristics of certain BU's and common traits regarding products, markets, technologies and cyclicality.
These four Business Areas have full responsibility for their operating results.

The Business Area **Care Chemicals** comprises the BU Industrial & Consumer Specialties (ICS), food additives as well as the future Industrial Biotechnology business. It demonstrates a clear focus on highly attractive, high-margin, and low-cyclicality segments. The BA follows a lifestyle-driven megatrend and strengthens Clariant's image of being a supplier of green and sustainable products.

The Business Area **Catalysis** develops, manufactures, and sells a wide range of catalyst products for the chemical, fuel and automotive industries. This BA is the smallest within Clariant but is highly profitable with a cyclicality in line with the investment cycle of the petrochemical industry.

The Business Area **Natural Resources** comprising BUs Oil & Mining Services and Functional Minerals, is characterized by high growth and low cyclicality as well as a strong megatrend orientation. Main drivers are the rising demand for high-value added specialty chemicals used in the oil, mining, food and packaging industries, and increased consumption of oil, gas and base metals, driven by the fast-growing economies.

The Business Area **Plastics & Coatings** comprises the BUs Additives, Pigments and Masterbatches. The Business Area has a large exposure to Europe and, as such, is subject to lower growth and to economic cycles. Main drivers are the increasing use of plastics with tailor-made properties in applications such as mobile phones, cars, construction, as well as the rising consumption of plastics in line with increasing wealth.

Corporate: Income and expenses relating to Corporate include the costs of the Corporate headquarters and some of corporate coordination functions in major countries. In addition, Corporate includes certain items of income and expenses, which are not directly attributable to specific Business Areas, like central R&D costs.

The Group's Business Areas are segments offering different products. The segments are managed separately because they manufacture, distribute and sell distinct products, which require differing technologies and marketing strategies. These products are also subject to risks and returns that are different from those of other segments.

Segment sales are sales reported in the Group's income statement directly attributable to a segment and the relevant portion of the company income that can be allocated on a reasonable basis to a segment, whether from sales to external customers or from transactions with other segments.

Segment operating expenses are expenses resulting from the operating activities of a segment directly attributable to the segment and the relevant portion of an expense that can be allocated on a reasonable basis, including expenses relating to sales to external customers and expenses relating to transactions with other segments. Inter-segment transactions are entered into under the normal circumstances and terms and conditions that would also be available to unrelated third parties.
The segment net assets consist of segment assets, primarily property, plant and equipment, intangible assets, inventories and receivables, less segment liabilities. Usually no allocation of Corporate items is made to the segments. Corporate assets and liabilities principally consist of net liquidity (cash, cash equivalents and other current financial assets less financial debts) and deferred and current income taxes.

The Executive Committee assesses the performance of the operating segments based on income statement parameters like third-party sales, EBITDA, operating result and cashflow. Interest income, interest expense and taxes are not allocated to the segments.
The return on the capital invested in each segment is measured by the Return on Invested Capital (ROIC).

1.25 – Share capital and other reserves

All issued shares are ordinary shares and as such are classified as equity. Incremental costs, directly attributable to the issue of new shares or options, are shown in equity as a deduction, net of tax, from the proceeds.

Written put options, where Clariant Ltd shares are the underlying, are reported as obligations to purchase Clariant Ltd shares if the number of shares is fixed and physical settlement for a fixed amount of cash is required, in case the option is exercised.

At inception, the obligation is recorded at the present value of the settlement amount of the option and the corresponding effect is recognized in shareholders' equity.

The liability is measured subsequently at amortized costs using the effective interest method. Upon settlement of such written put options, the liability is extinguished and the charge to equity is reclassified to the treasury shares.

Clariant Ltd shares, subject to such put options, are not considered to be outstanding for the purpose of basic earnings per share calculations, but are considered for the dilutive earnings per share calculations to the extent that they are dilutive.

Other reserves comprise the following items:

- **Share premium:** The share premium comprises the excess price paid over the par value of the share at the time of issuance of the share capital.

- **Cumulative translation reserves:** The translation reserves comprise the foreign exchange differences arising on the translation of the financial statements of the foreign subsidiaries stated in a currency other than the Group's functional currency. In addition, the cumulative translation reserves comprise the foreign exchange differences arising on the translation of financial liabilities denominated in a currency other than the functional currency of the parent company Clariant Ltd, which are at the same time designated as a hedge of a net investment in a foreign entity.

1.26 – Treasury shares

Treasury shares are deducted from equity at their par value of CHF 3.70 per share. Differences between this amount and the amount paid for acquiring, or received for disposing of treasury shares are recorded in retained earnings.

1.27 – Financial debt

Financial debt is recognized based on the requirements of IFRS 9, Financial Instruments: Recognition and Measurement.

All financial liabilities are valued at amortized cost.

1.28 – Financial assets

Financial assets are classified, recognized, measured and if necessary, impaired based on the requirements of IFRS 9, Financial Instruments.

Financial assets are valued at amortized cost if there is the intention to hold them in order to collect the contractual cash flow and this cash flow is only for the principal and interest.

Financial assets are valued at fair value through Other comprehensive income when they are held with the intention of getting the contractual cash flow, but also with the intention of eventually selling the asset.

Equity investments are measured at fair value through Other comprehensive income based on the Group's irrevocable election at initial recognition.
There are currently no financial assets at fair value though profit and loss.

Loss allowances are recognized for expected credit losses. If at the reporting date the credit risk on a financial instrument has not significantly increased since the initial recognition the loss allowance is measured at an amount equal to the 12-month-expected credit loss. If at the reporting date the credit risk on a financial asset has increased significantly since initial recognition the loss allowance is measured at an amount equal to the lifetime-expected credit loss. If in the previous period the loss allowance was measured at the lifetime-expected credit loss but at the reporting date it is determined that the credit risk is no longer significantly higher than at initial recognition then at the reporting date the loss allowance is again measured at an amount equal to the 12-month expected credit loss. Changes in the measurement of the loss allowance are recognized in profit and loss.

Purchases and sales of financial assets are recognized on settlement date, which is the date on which the Group receives or delivers the assets.

1.29 – Business combinations

The Group applies the acquisition method to account for business combinations in accordance with IFRS 3, Business Combinations, and recognizes any non-controlling interests in the acquiree at fair value (full goodwill method).

Acquisition-related costs are expensed as incurred.

2. Enterprise Risk Management Identification, Assessment and Management

Under the Enterprise Risk Management Policy, based on the standard of »The Institute of Risk Management«, risk assessments are prepared by Business Units, Service Units, Corporate Functions and Regions to assess threats that will impact the achievement of the objectives set for Clariant overall. These objectives are a result of the overall strategy of the Group as set by the Board of Directors and implemented by the Executive Committee.

The Executive Committee is responsible for monitoring the risk assessments for relevance and consistency. The Executive Committee has formed a Subcommittee »Ethics and Risk Management« subcommittee, which maintains an up-to-date understanding of areas where Clariant is, or may be, exposed to risk issues and seeks to ensure that management is effectively addressing those issues. The Ethics and Risk Management Committee meets on a quarterly basis.

The short- and long-term objectives are set in the fourth quarter of the year. These objectives, threats and opportunities are subject to scrutiny by the Executive Committee during meetings with each Business Unit. Also reviewed and discussed are the proposed measures to reduce or contain threats. In that context, mitigation measures are defined and responsibilities are assigned.
All stakeholders are required to report significant changes to existing identified risks and new threats and opportunities as they arise.

Risk registers are maintained using financial and reputational impact and probability assessments to score and rank all identified risks. The assessment also addresses the measures in place to manage the risk identified with dates for completion of the measures. Effectiveness of the measures is also assessed.

When threats have been identified and quantified, they are delegated to qualified individuals who are required to deliver effective risk management. Depending on the nature of the risks identified, specific skill sets may be required for the management of those particular risks. The assessments are shared between the stakeholders on a regular basis.

A consolidated risk assessment is submitted to the Executive Committee, the Audit Committee and the Board of Directors for review. In the case of new or changed risks, the reporting procedure is accelerated.

Summaries of risk assessments from the Business Units, Regions, and Service Units are shared with key managers of Clariant.

To support functional responsibility, certain functions have access to risk assessments to assist them in their roles. Examples of such functions are Environmental Safety & Health Affairs (ESHA) to identify key sites for their property risk survey program, or Group Procurement to ensure reliable and compliant supply of raw materials.

Examples of identified risks included in the Risk Register:

2.1 – Regulation & Compliance:

Clariant is subject to many rules and regulations as well as compliance standards. These include chemical industry, country, government and customer requirements as well as the European Union's (EU) Regulations on Registration, Evaluation, Authorization and Restriction of Chemicals (REACH) or similar regulations in other countries. Clariant Product Stewardship is responsible to ensure that all relevant legal requirements are met. Certain specific matters are delegated to Legal, ESHA and logistics functions.

2.2 – Sites and locations

This includes manufacturing plants and equipment important for the production of Clariant products for sale to customers. Also addressed are country and culture issues that could create threats to and opportunities for business objectives. The aim is to maintain high-quality production facilities. ESHA and Regional Services are responsible for the management of the associated risks.

Examples of emerging risks included in the risk register:

2.3 – Economic development

The achievement of corporate targets depends on the economic development, which is therefore continuously monitored in all markets. Should a market not develop in line with expectations, the organization will be adjusted accordingly. The global trade uncertainty arising from the currently looming conflicts around trade and tariffs could adversely affect economic development.

2.4 – Consolidation of Customers

Consolidations in certain markets of Clariant result in increasing pressure on prices. As a consequence, Clariant is further developing key account pricing strategies and speeding up the value proposition claim.

3. Financial risk management

3.1 – Financial risk factors

The Group's activities expose it to a variety of financial risks: market risk (including foreign exchange risk, interest rate risk and price risk), credit risk, liquidity risk, counterparty risk, (re-)financing and funding risk, and also settlement risk. The Group's overall risk management program focuses on the unpredictability of financial markets and seeks to reduce potential adverse effects on the Group's financial performance at reasonable hedging costs. The Group uses derivative financial instruments, non-derivative financial instruments and operating strategies to hedge certain risks.

Financial risk management is carried out by the central treasury department (Corporate Treasury) under policies approved by the Executive Committee and the Board of Directors. Corporate Treasury identifies, evaluates and hedges financial risks in close cooperation with the Group's operating units and functions. Written principles for the management of overall foreign exchange risk, credit risk for the use of derivative financial instruments, non-derivative financial instruments and investing excess liquidity (counterparty risk) are in place.

3.1.1 – Market risk

3.1.1.1 – Foreign exchange risk

- **Exposure to foreign exchange risk:** The Group operates internationally and is exposed to foreign exchange risks arising from various currency exposures, primarily with respect to the euro and the US-dollar and to some extent the currencies of emerging countries. Foreign exchange risks arise from future commercial transactions, recognized assets and liabilities and net investments in foreign operations, when they are denominated in a currency that is not the respective subsidiary's functional currency.

- **Foreign exchange risk management:** To manage the foreign exchange risk arising from future commercial transactions and recognized assets and liabilities, entities in the Group use spot transactions, FX forward contracts, FX options and FX swaps according to the Group's foreign exchange risk policy. Corporate Treasury is responsible, in close coordination with the Group's operating units, for managing the net position in each foreign currency and for putting in place the appropriate hedging actions.

  The Group's foreign exchange risk management policy is to selectively hedge net transaction exposures in major foreign currencies.

  Currency exposures arising from the net assets of the Group's foreign operations are managed primarily through borrowings denominated in the relevant foreign currency.

  Detailed information regarding foreign exchange management is provided in note 29.

- **Foreign exchange risk sensitivity:** The estimated percentage change of the following foreign exchange rates used in this calculation is based on the historical foreign exchange rate volatility for a term of 360 days.

  At 31 December 2018, if the euro had strengthened/weakened by 5% (2017: 5%) against the Swiss franc with all other variables held constant, pre-tax profit for the year would have been CHF 7 million higher/lower (2017: CHF 7 million higher/lower), mainly as a result of foreign exchange gains/losses on translation of the euro-denominated financing, cash and cash equivalents, intragroup financing and third-party trade receivables and payables. Equity would have been CHF 57 million lower/higher (2017: CHF 42 million lower/higher), arising mainly from foreign exchange gains/losses on translation of the euro-denominated hedging instruments.

  At 31 December 2018, if the US-dollar had strengthened/weakened by 7% (2017: 7%) against the Swiss franc with all other variables held constant, pre-tax profit for the year would have been CHF 19 million higher/lower (2017: CHF 27 million higher/lower) mainly as a result of foreign exchange gains/losses on translation of US-dollar-denominated cash and cash equivalents, intragroup financing and trade receivables. Equity would have been CHF 18 million lower/higher (2017: CHF 19 million lower/higher), arising mainly from foreign exchange gains/losses on the translation of the US-dollar-denominated hedging instruments.

3.1.1.2 – Interest rate risk

- **Exposure to interest rate risk:** Financial debt issued at variable rates and cash and cash equivalents expose the Group to cash flow interest rate risk; the net exposure as per 31 December 2018 was not significant. Financial debt issued at fixed rates does not expose the Group to fair value interest rate risk because it is recorded at amortized costs. At the end of 2018 and 2017, 100% of the net financial debt was at fixed rates.

- **Interest rate risk management:** It is the Group's policy to manage the costs of interest using fixed and variable rate debt and interest-related derivatives. Corporate Treasury monitors the net debt fix-to-float mix on an ongoing basis.

- **Interest rate risk sensitivity:** To calculate the impact of a potential interest rate shift on profit and loss, a weighted average interest rate change was determined, based on the terms of the financial debt issued at variable rates, fix-term deposits and the movements of the corresponding interest rates (interest rates comparison between end of 2018 and end of 2017).

  At 31 December 2018, if the euro interest rates on net current financial debt issued at variable interest rates had been 1 basis point higher/lower with all other variables held constant, pre-tax profit for the year would have been below CHF 0.001 million higher/lower (2017: CHF 0.1 million higher/lower for a euro interest rate shift of 9 basis points).

3.1.2 – Other price risks

With regard to the financial statements as per 31 December 2018 and 2017, the Group was not exposed to other price risks in the sense of IFRS 7, Financial Instruments: Disclosures.

3.1.2.1 – Credit risk

- **Exposures to credit risk:** Credit risk arises from deposits of cash and cash equivalents, from entering into derivative financial instruments and from deposits with banks and financial institutions, as well as from credit exposures to wholesale and retail customers, including outstanding receivables and committed transactions with suppliers. Customer credit risk exposure is triggered by customer default risk and country risk. As per 31 December 2018, the Group had a diversified portfolio with more than 31 500 active credit accounts (2017: more than 32 000), with no significant concentration neither due to size of customers nor due to country risk.

- **Credit risk management:** Clariant has a Group credit risk policy in place to ensure that sales are made to customers only after an appropriate credit risk rating and credit line allocation process. Procedures are standardized within a customer credit risk policy and supported by the IT system with respective credit management tools. Credit lines are partially backed by credit risk insurance.

Ageing balance of trade receivables	31.12.2018	31.12.2017
Not due yet	90%	88%
Total overdue	10%	12%
– less than 30 days	7%	10%
– more than 30 days	3%	2%

Net trade receivables per Group internal risk category	31.12.2018	31.12.2017
A – low credit risk	24%	27%
B – low to medium credit risk	33%	31%
C – medium to above-average risk	30%	30%
D – high credit risk	13%	12%
N – customers awaiting rating	0%	0%

Financial instruments contain an element of risk that the counterparty may be unable to either issue securities or to fulfill the settlement terms of a contract. Clariant therefore – whenever possible – only cooperates with counterparties or issuers that are at least rated »BB-« when it comes to entering into deposits with such counterparties. The cumulative exposure to these counterparties is constantly monitored by Corporate Treasury. There is no expectation of a material loss due to counterparty risk.
The Group maintains a large cash pooling structure with a leading European bank, over which most European subsidiaries execute their cash transactions denominated in euro. As a result of this cash pool the Group at certain times has substantial current financial assets and at other times substantial current financial liabilities.

In view of the bank being rated »BBB+« (2017: A-) by the most important rating agencies, Clariant does not consider this to pose any particular counterparty risk.

At the balance sheet date 75% (2017: 72%) of the total cash and cash equivalents and short-term deposits were held with five banks (2017: five banks), each with a position between CHF 49 million and CHF 312 million (2017: between CHF 37 million and CHF 224 million). All of these banks are rated »BBB+« (2017: »A-«) and better.

The table below shows in percentage of total cash and cash equivalents the share deposited with each of the three major counterparties at the balance sheet date (excluding the bank managing the euro cash pool):

Counterparty	Rating	31.12.2018
Bank 1	A	8%
Bank 2	A+	19%
Bank 3	A+	11%

Counterparty	Rating	31.12.2017
Bank A	AA	5%
Bank B	A+	22%
Bank C	A+	7%

3.1.3 – Liquidity risk

- **Liquidity risk management:** Cash flow forecasting is performed in the subsidiaries of the Group and in aggregate by Corporate Treasury. Corporate Treasury monitors the forecasts of the Group's liquidity requirements to ensure it has sufficient cash to meet its operational needs while maintaining sufficient headroom on its undrawn borrowing facilities. At all times the Group aims to meet the requirements set by the covenants of any of its borrowing facilities. Corporate Management therefore takes into consideration the Group's debt financing plans and financing options.

Cash which is not needed in the operating activities of the Group is invested in short-term money market deposits or marketable securities, if an interest income higher than the one on a regular bank deposit can be achieved. At 31 December 2018, the Group held money market funds of CHF 142 million (2017: CHF 154 million), thereof CHF 26 million with an initial tenor of more than 90 days (2017: CHF 47 million).

The following table analyzes the maturity profile of the Group's financial liabilities. The amounts disclosed are the contractual undiscounted cash flows and therefore do not reconcile with the financial liabilities presented in the consolidated balance sheets.

At 31 December 2018 CHF m	Less than 1 year	Between 1 and 2 years	Between 2 and 5 years	Over 5 years
Borrowings	529	410	816	485
Interest on borrowings	76	27	43	4
Finance lease liabilities	3	3	8	16
Trade payables and other liabilities	1 266	7	18	47
Derivative financial instruments	–	–	–4	–

At 31 December 2017 CHF m	Less than 1 year	Between 1 and 2 years	Between 2 and 5 years	Over 5 years
Borrowings	566	287	675	480
Interest on borrowings	42	36	63	2
Finance lease liabilities	3	3	9	17
Trade payables and other liabilities	1 216	1	23	55
Derivative financial instruments	1	–	– 7	–

The Group covers its liabilities out of generated operating cash flow, liquidity reserves in form of cash and cash equivalents including money market deposits (31 December 2018: CHF 859 million vs. 31 December 2017: CHF 748 million), out of uncommitted open cash pool limits and bank credit lines (31 December 2018: CHF 104 million vs. 31 December 2017: CHF 107 million), as well as out of additional uncommitted net working capital facilities and through issuance of capital market instruments.

Since 16 December 2016, Clariant Ltd has an agreement for a CHF 500 million five-year multi-currency revolving credit facility (RCF) with two one-year extension options. The RCF is structured as a club deal with ten key relationship banks with equal stakes and contains an accordion option for an increase up to CHF 600 million. The RCF is structured as a »back-stop« facility for rating purposes to maintain Clariant's liquidity headroom. It contains customary covenants such as negative pledge, cross default, ownership change and restriction on disposals, mergers and subsidiary debt. The Group is required to maintain one financial covenant (debt leverage) that is tested at the end of each financial half year. The RCF has been extended one more year until 16 December 2023.

3.2 – Fair value measurement

IFRS 13, Fair Value Measurement, requires the disclosure of fair value measurements for financial instruments measured at fair value in the balance sheets in accordance with the fair value measurement hierarchy.

The fair value hierarchies are defined as follows:

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

3.2.1 – Valuation methods

As per 31 December 2018, the open derivative financial instruments held were valued using the following valuation methods:

Forward exchange rate contracts: The valuation of forward exchange rate contracts are based on the discounted cash flow model, using observable inputs such as interest curves and spot rates.

Exchange rate options: FX options are valued based on a Black-Scholes model, using major observable inputs such as volatility and exercise prices.

Equity investments valued at fair value through OCI: These are usually classified at Level 3. Their valuation is based on multiples of projected earnings and discounted cash flows. The value of one important financial asset is based on a recent transaction.

The financial instruments measured at fair value through profit or loss were all classified as Level 2 (see note 29). There were no transfers between the levels in 2018 and 2017.

3.3 – Hedge Accounting

Derivatives are initially recognized at fair value on the date a derivative contract is entered into and are subsequently remeasured to their fair value at the end of each reporting period. The accounting for subsequent changes in fair value depends on whether the derivative is designated as a hedging instrument, and if so, the nature of the item being hedged. The Group designates certain derivatives as either:

- Hedges of a particular risk associated with the cash flows of recognized assets and liabilities and highly probable forecast transactions (cash flow hedges)
- Hedges of a net investment in a foreign operation (net investment hedges).

At the inception of the hedge relationship, the Group documents the economic relationship between hedging instruments and hedged items including whether changes in the cash flows of the hedging instruments are expected to offset changes in the cash flows of hedged items. The group documents its risk management objective and strategy for undertaking its hedge transactions.

The fair values of derivative financial instruments designated in hedge relationships are disclosed in note 29. Movements in the hedging reserve in shareholders' equity are shown in note 16. The full fair value of a hedging derivative is classified as a non-current asset or liability when the remaining maturity of the hedged item is more than 12 months; it is classified as a current asset or liability when the remaining maturity of the hedged item is less than 12 months. Trading derivatives are classified as a current asset or liability.

- **Cash flow hedges:** The effective portion of changes in the fair value of derivatives that are designated and qualify as cash flow hedges is recognized within equity. The gain or loss relating to the ineffective portion is recognized immediately in profit or loss. As long as the hedged cash flow item is probable the cumulative gain or loss on the respective hedge remains in equity and does not get recycled.

Amounts accumulated in equity are reclassified in the periods when the hedged item affects profit or loss, as follows:

- The gain or loss relating to the effective portion of the interest rate/cross currency swaps hedging variable rate or fixed rate borrowings is recognized in profit or loss within finance cost at the same time as the interest expense on the hedged borrowings.

When a hedging instrument expires, or is sold or terminated, or when a hedge no longer meets the criteria for hedge accounting, the cumulative gain or loss that was reported in equity is immediately reclassified to profit or loss.

- **Hedges of net investments** in foreign operations are accounted for similarly to cash flow hedges. Any gain or loss on the hedging instrument relating to the effective portion of the hedge is recognized in other comprehensive income and accumulated within equity. The gain or loss relating to the ineffective portion is recognized immediately in profit or loss.

Gains and losses accumulated in equity are reclassified to profit or loss when the foreign operation is partially disposed of or sold.

3.4 – Capital risk management

The Group's objectives when managing capital are to safeguard the ability to continue as a going concern in order to provide returns for the shareholders and benefits for other stakeholders and to maintain a capital structure suitable to optimize the cost of capital. This includes aspects of the credit rating.

In order to maintain or adjust the capital structure, the Group may adjust the amount of payouts to the shareholders, return capital to the shareholders, issue new shares, or sell assets to reduce debt.

The Group monitors capital on the basis of invested capital as part of the return on invested capital concept. Invested capital is calculated as the sum of total equity as reported in the consolidated balance sheets plus current and non-current financial liabilities as reported in the consolidated balance sheets plus estimated liabilities from operating leases, plus estimated cash needed for operating purposes, less cash and cash equivalents and short-term deposits not needed for operating purposes.

Invested capital for the Group was as follows on 31 December 2018 and 2017 respectively:

CHF m	**2018**	2017
Total equity	2 970	2 939
Total current and non-current financial liabilities	2 240	2 294
Estimated operating lease liabilities	251	500
Less cash and cash equivalents and short-term deposits*	–859	–748
Cash needed for operating purposes	132	128
Invested capital	**4 734**	**5 113**

* Short-term deposits represent deposits over 90 days.

At the end of 2018, Clariant considers the invested capital to be adequate.

4. Critical accounting estimates and judgments
Estimates and judgments are continually evaluated and are based on historical experience and other factors, including expectations on future events that are believed to be reasonable under the circumstances.

The Group makes estimates and takes assumptions concerning the future. The resulting accounting estimates will, by definition, seldom equal the related actual results. The estimates and assumptions that have a significant risk of causing a material adjustment to the carrying amounts of assets and liabilities within the next financial year are discussed below.

4.1 – Estimated impairment of goodwill, intangibles, and property, plant and equipment
The Group tests annually whether goodwill has suffered any impairment in accordance with the requirements of IAS 36, Impairment of Assets. The recoverable amounts of all cash generating units have been determined based on value-in-use calculations.

The recoverable value of intangibles and property, plant and equipment is also assessed applying value-in-use calculations. These calculations require the use of estimates, in particular in relation to the expected growth of sales, the discount rates, the development of raw material prices and the success of restructuring measures implemented (see notes 5 and 6).

4.2 – Environmental liabilities
The Group is exposed to environmental regulations in numerous jurisdictions. Significant judgment is required in determining the worldwide provision for environmental remediation. The Group constantly monitors its sites to ensure compliance with legislative requirements and to assess the liability arising from the need to adapt to changing legal demands. The Group recognizes liabilities for environmental remediation based on the latest assessment of the environmental situation of the individual sites and the most recent requirements of the respective legislation. Where the final remediation results in expenses that differ from the amounts previously recorded, such differences impact the income statement in the period in which such determination is made (see notes 20 and 33).

4.3 – Income tax and other taxes
The Group is subject to income tax and other taxes in numerous jurisdictions. Significant judgment is required in determining the worldwide provision for income tax and other taxes. There are many transactions and calculations for which the ultimate tax determination is uncertain at the time a liability must be recorded. The Group recognizes liabilities for anticipated tax audit issues based on estimates of whether additional taxes will be due. Where the final tax outcome of these matters is different from the amounts initially recorded, such differences impact the income tax and deferred tax provisions in the period in which such determination is made (see note 9).
As a substantial part of Clariant's activities are based in Germany, this is where the largest tax risks arise.
Some subsidiaries generate tax losses. Often these can be used to offset taxable gains of subsequent periods. The Group constantly monitors the development of such tax loss situations. Based on the business plans for the subsidiaries concerned, the recoverability of such tax losses is determined. In the case that a tax loss is deemed to be recoverable, the capitalization of a deferred tax asset for such a tax loss is then decided.

4.4 – Estimates for the accounting for employee benefits
IAS 19, Employee Benefits, requires that certain assumptions are made in order to determine the amount to be recorded for retirement benefit obligations and pension plan assets, in particular for defined benefit plans. These are mainly actuarial assumptions such as expected future salary increases, long-term increase in health care costs, average life expectancy and discount rates. Substantial changes in the assumed development of any of these variables may significantly change the Group's retirement benefit obligation and pension assets (see note 19).

4.5 – Contingencies
Clariant is regularly confronted with situations where possible obligations arising from past events will only be confirmed by the occurrence or non-occurrence of future events not wholly within the control of the Group or where the amount of the obligation cannot be reliably estimated.
Clariant reviews such situations at each balance sheet and makes judgments based on all information available on it if an outflow of resources can be reliably estimated or not. If this is not possible, a contingency is reported for each material case.

5. Property, plant and equipment

in CHF m	Land	Buildings	Machinery and equipment	Furniture, vehicles, computer hardware	Assets under construction	**Total 2018**
Cost						
As per 1 January	421	1 945	3 121	429	234	6 150
Additions	2	15	54	21	145	237
Disposals	–4	–446	–254	–38	–8	–750
Reclassifications	1	42	102	12	–157	—
Exchange rate differences	–15	–63	–99	–14	–7	–198
At 31 December	**405**	**1 493**	**2 924**	**410**	**207**	**5 439**
Accumulated depreciation and impairment						
As per 1 January	–116	–1 256	–2 207	–321	—	–3 900
Disposals	1	404	219	32	—	656
Depreciation	—	–51	–157	–37	—	–245
Exchange rate differences	4	40	75	12	—	131
At 31 December	**–111**	**–863**	**–2 070**	**–314**	**—**	**–3 358**
Net book value	**294**	**630**	**854**	**96**	**207**	**2 081**

No impairment losses were recorded in 2018. Impairments recognized in 2017 arose as a result of restructuring measures entailing site closures.

As at 31 December 2018, commitments for the purchase of property, plant and equipment concerned various projects mainly in Germany, the Unites States and in China and totalled CHF 73 million (2017: CHF 50 million).

As per 31 December 2018, property, plant and equipment acquired by way of finance lease, with costs of CHF 27 million (2017: CHF 30 million) and a net book value of CHF 15 million (2017: CHF 17 million) were recorded.

Disposals of 2018 include CHF 85 million of the assets (net book value) which are part of the sale of Infrapark Baselland AG (see note 24).

in CHF m	Land	Buildings	Machinery and equipment	Furniture, vehicles, computer hardware	Assets under construction	**Total 2017**
Cost						
As per 1 January	404	1 785	2 746	396	427	5 758
Additions	1	17	59	25	146	248
Acquired in business combinations	–	3	6	–5	5	9
Reclassified to held for sale (see note 24)	–8	–8	–3	–	–	–19
Disposals	–1	–7	–20	–12	–	–40
Reclassifications	3	104	215	11	–333	–
Exchange rate differences	22	51	118	14	–11	194
At 31 December	**421**	**1 945**	**3 121**	**429**	**234**	**6 150**
Accumulated depreciation and impairment						
As per 1 January	–105	–1 180	–1 988	–280	–	–3 553
Reclassified to held for sale (see note 24)	–	2	2	–	–	4
Disposals	–	6	19	9	–	34
Depreciation	–	–51	–145	–35	–	–231
Impairment (see note 26)	–	–1	–2	–2	–	–5
Exchange rate differences	–11	–32	–93	–13	–	–149
At 31 December	**–116**	**–1 256**	**–2 207**	**–321**	**–**	**–3 900**
Net book value	**305**	**689**	**914**	**108**	**234**	**2 250**

Investment properties (Clariant as a lessor in operating leases)
As a result of the continuous efforts to increase efficiency and to optimize the structure of its facilities Clariant sometimes vacates certain production or adminstrative sites. In order to minimize expenses Clariant seeks to find tenants for these facilities.

As a consequence such facilities, which generate income exclusively from rental contracts, are considered as investment property in line with the requirements of IAS40, Investment Property. All investment property is valued at cost less depreciation.

Investment property in Clariant is almost entirely located in Switzerland and Germany. The gross book value of investment property amounted to CHF 627 million on 31 December 2018 (CHF 721 million on 31 December 2017).

Accumulated depreciation on investment property amounted to CHF 457 million on 31 December 2018 (CHF 541 million on 31 December 2017).

The net book value amounted to CHF 170 million on 31 December 2018 (CHF 180 million on 31 December 2017).

Depreciation amounted to CHF 1 million in 2018 (CHF 2 million in 2017).

Income from investment properties amounted to CHF 11 million in 2018 (CHF 16 million in 2017) and is recorded in SG&A in the segment Corporate.

Expected minimum lease income varies between CHF 8 million and CHF 10 million (2017: CHF 7 million and CHF 13 million) per annum for the next five years and amounts to CHF 144 million for later periods (2017: CHF 105 million).

Since all investment property consists of industrial and administrative sites which have been in use for several decades there is no active market which would give information on possible market prices, if such sites were to be sold to a third party. The fair values of the investment properties were therefore determined by way of external appraisals and value-in-use calculations. As of 31 December 2018, the estimated fair value of investment property amounted to CHF 211 million (CHF 223 million on 31 December 2017).

6. Intangible assets

in CHF m	Goodwill	Technology	Customer relationships	Trade names	Other	**Total 2018**
Cost						
As per 1 January	1 512	256	404	111	379	2 662
Additions	—	—	—	—	20	20
Disposals	—	—	—	—	–4	–4
Exchange rate differences	–19	–4	–4	–1	–13	–41
At 31 December	**1 493**	**252**	**400**	**110**	**382**	**2 637**
Accumulated amortization and impairment						
As per 1 January	–232	–161	–204	–86	–204	–887
Disposals	—	—	—	—	3	3
Amortization	—	–16	–17	–8	–39	–80
Exchange rate differences	—	2	1	—	6	9
At 31 December	**–232**	**–175**	**–220**	**–94**	**–234**	**–955**
Net book value	**1 261**	**77**	**180**	**16**	**148**	**1 682**

in CHF m	Goodwill	Technology	Customer relationships	Trade names	Other	**Total 2017**
Cost						
As per 1 January	1 437	223	389	110	379	2 538
Additions	—	4	—	—	27	31
Acquired in business combinations	59	16	17	—	2	94
Disposals	—	—	—	—	–42	–42
Reclassifications	—	6	—	—	–6	—
Exchange rate differences	16	7	–2	1	19	41
At 31 December	**1 512**	**256**	**404**	**111**	**379**	**2 662**
Accumulated amortization and impairment						
As per 1 January	–227	–136	–184	–78	–213	–838
Disposals	—	—	—	—	42	42
Amortization	—	–19	–18	–9	–24	–70
Impairment (see note 26)	–5	–4	–2	—	—	–11
Exchange rate differences	—	–2	—	1	–9	–10
At 31 December	**–232**	**–161**	**–204**	**–86**	**–204**	**–887**
Net book value	**1 280**	**95**	**200**	**25**	**175**	**1 775**

Amortization is allocated to the line in the income statement, which represents the function to which the intangible asset pertains.

In 2018, no impairment losses were recognized. In 2017 impairment losses were recognized for site closures in China.

As per end of 2018, other intangible assets include the carrying value of CHF 57 million (2017: CHF 57 million) capitalized in connection with the REACH regulation and CHF 37 million (2017: CHF 59 million) of capitalized internally generated intangibles.

Impairment test for goodwill. Goodwill is allocated to the Group's cash generating units (CGU). Cash generating units consist of Business Units which are for external reporting purposes reported under the corresponding Business Areas (reportable segments, see note 1.24).

Goodwill is allocated to the following CGUs:

in CHF m	**31.12.2018**	31.12.2017
Industrial & Consumer Specialties	67	69
Masterbatches	176	178
Pigments	12	13
Functional Minerals	146	150
Catalysts	694	704
Oil & Mining Services	166	166
Total net book value	**1 261**	**1 280**

The recoverable amount for all CGUs is determined based on their value-in-use. The value-in-use calculations use cash flow projections based on financial budgets approved by the Board of Directors covering period up to 2021. Beyond this period, growth assumptions of the CGU management are applied for 2022 and 2023. For the terminal value market growth (2.25 %) is assumed. The main assumptions used for cash flow projections are EBITDA in percent of sales and sales growth. The assumptions regarding these two variables are based on Management's past experience and future expectations of business performance. The pre-tax discount rates used are based on the Group's weighted average cost of capital. The assumed pre-tax discount rate was 11.57 % for all cash generating units (2017: 10.78 %). As all CGUs operate in similar geographic areas, have the same source of funds and a similar risk pattern a uniform discount rate is applied to all of them.

For all CGUs it was assumed that they achieve sales growth in line with or higher than market-growth, based on the specific strategic plans for the respective CGUs. It was also assumed that the EBITDA in percent of sales will improve over present performance as a result of the continuous improvement measures implemented. The conclusion was that the net present value of the expected cash flows exceeds the carrying amount of the net assets allocated on a value-in-use basis of all CGUs.

The estimated recoverable amount of the CGU Catalysts exceeds its carrying amount including goodwill by CHF 467 million (2017: CHF 324 million). The recoverable amount would be equal to the carrying amount if the assumed average annual sales growth rate during the planning period were reduced by 2.8 % (2017: 1.9 %), or alternatively, if the operating margin was reduced by 4.3 % of sales (2017: 3.0 %).

7. Investments in associates and joint ventures

in CHF m	2018	2017
As per 1 January	**508**	**516**
Change in the scope of consolidation	23	–104
Additions	2	10
Disposals	–43	–6
Share in profit	71	81
Dilution gain from capital increase	—	22
Revaluation to fair value	45	—
Share in other comprehensive income of associates and joint ventures	—	–3
Dividends received	–50	–45
Reclassified to Financial assets (see note 8)	–173	—
Exchange rate differences	–15	37
At 31 December	**368**	**508**
Thereof joint ventures	108	112

The key financial data of the Group's principal associates is as follows:

INVESTMENTS IN ASSOCIATES:

	Stahl Lux 2 SA		Infraserv GmbH & Co. Höchst KG		Infraserv GmbH & Co. Gendorf KG		Infraserv GmbH & Co. Knapsack KG		Others	
	Luxembourg		Germany		Germany		Germany			
in CHF m	**2018**	2017	**2018**	2017	**2018**	2017	**2018**	2017	**2018**	2017
Summarized financial information										
Interest held %	15%	20%	33%	33%	50%	50%	21%	21%	–	–
Revenue	1 008	744	1 200	1 078	254	253	248	218	417	351
Total comprehensive income	71	107	72	62	25	21	13	15	37	16
Net income	71	107	72	71	25	20	13	15	37	16
Other comprehensive income	–	–	–	–9	–	1	–	–	–	–
Current assets	–	434	334	311	87	80	64	69	246	273
Non-current assets	–	527	628	660	184	188	121	120	110	122
Current liabilities	–	–173	–232	–250	–86	–86	–58	–59	–172	–205
Non-current liabilities	–	–607	–437	–419	–65	–65	–35	–34	–53	–60
Net assets	**–**	**181**	**293**	**302**	**120**	**117**	**92**	**96**	**131**	**130**
Reconciliation of book value										
Book value beginning of period	**159**	**100**	**98**	**98**	**59**	**50**	**20**	**18**	**60**	**65**
Additions		–	–	–	–	–	–	–	2	10
Disposals	–43	–	–	–	–	–	–	–	–	–6
Change in the scope of consolidation	–	–	–	–	–	–	–	–	23	–5
Share in profit for the period	16	26	24	23	13	10	3	3	8	1
Dilution gain from capital increase	–	22	–	–	–	–	–	–	–	–
Revaluation to fair value	45	–	–	–	–	–	–	–	–	–
Share in other comprehensive income	–	–	–	–3	–	–	–	–	–	–
Dividends received	–	–	–24	–28	–9	–6	–3	–3	–6	–8
Reclassified to Financial assets (see note 8)	–173	–	–	–	–	–	–	–	–	–
Foreign exchange rate differences	–4	11	–3	8	–3	5	–1	2	–1	3
Book value end of the period	**0**	**159**	**95**	**98**	**60**	**59**	**19**	**20**	**86**	**60**
Group's Share in net assets	**–**	**36**	**97**	**100**	**60**	**58**	**19**	**20**	**86**	**60**
Fair value adjustment/Goodwill	–	124	–	–	–	–	–	–	–	–
Taxes, Minorities and other adjustments	–	–1	–2	–2	–	1	–	–	–	–
Book value at the end of the period	**–**	**159**	**95**	**98**	**60**	**59**	**19**	**20**	**86**	**60**

In 2014, Clariant sold its Leather Service Business to the Netherlands-based Stahl group for a cash consideration and a 24 % stake in the acquiring group. Stahl is a producer of high-quality chemicals, dyes, and coatings for leather and other applications and has about 1 700 employees.

In 2017, Stahl engaged in a share capital increase, in which Clariant did not participate. As a result Clariant's stake decreased from 24 % to 19.7 % and a dilution gain amounting to CHF 22 million was recognized in the income statement as a part of »Income from associates and joint ventures«.

In December 2018 Clariant sold 5 % of it's 19.7 % participation in Stahl Lux 2 SA at a profit of CHF 14 million, which was classified as an associate until this point in time. Subsequently the remaining stake in Stahl Lux 2 was revaluated to the fair value of CHF 173 million and reclassified to Financial Assets.

The Infraserv companies were set up by the former Hoechst group to cater to the infrastructure needs of its subsidiaries in Germany prior to 1997. The shareholdings in associates summarized under »Others« concern mainly companies specializing in selling Clariant products.

On 31 December 2018, accumulated unrecognized losses amounted to CHF 4 million (2017: CHF 6 million).

The key financial data of the Group's principal joint ventures is as follows:

INVESTMENTS IN JOINT VENTURES:

	Scientific Design Company Inc.		Süd-Chemie India Pvt Ltd.	
	USA		India	
in CHF m	**2018**	2017	2018	2017
Summarized financial information				
Interest held %	50%	50%	–	50%
Revenue	73	78	–	23
Total comprehensive income	14	5	–	5
Net income	14	5	–	5
Current assets	87	81	–	–
Non-current assets	30	29	–	–
Current liabilities	–20	–20	–	–
Non-current liabilities	–7	–7	–	–
Net assets	**90**	**83**	**–**	**–**
Reconciliation of book value				
Book value beginning of period	**112**	**100**	–	**85**
Change in scope of consolidation	–	–	–	–99
Share in profit for the period	7	3	–	15
Dividends	–8	–	–	–
Foreign exchange rate differences	–3	9	–	–1
Book value end of the period	**108**	**112**	**–**	**–**
Group's Share in net assets at the end of the period	**45**	**43**	–	–
Fair value adjustment/Goodwill	66	66	–	–
Taxes, Minorities and other adjustments	–3	3	–	–
Book value at the end of the period	**108**	**112**	**–**	**–**

Scientific Design Company Inc. is a producer of ethylene and oxide catalysts headquartered in the United States and has around 140 employees. Co-owner is the Saudi Arabia-based Sabic group.

Süd-Chemie India Pvt Ltd (SCIL) is a producer of syngas, air purification and refinery catalysts. It has around 400 employees and is headquartered in India. It is co-owned by private investors based in India.

As of 1 April 2017, this company became a fully consolidated subsidiary of the Clariant Group, see note 25, Acquisitions. The table shows the activities of SCIL for the first three months of 2017.

8. Financial assets

in CHF m	2018	2017
As per 1 January	50	71
Changes in accounting policies (IFRS 9)	–5	–
Additions	2	–
Fair value adjustment	2	–
Reclassified from Investments in associates and joint ventures (see note 7)	173	–
Repayments and disposals	–6	–27
Exchange rate differences	–5	6
At 31 December	**211**	**50**

Financial assets include loans to joint ventures and a number of small-scale participations in companies, mostly in Germany and in Switzerland, engaged in activities closely related to the ones of Clariant.

In December 2018, Clariant sold 5 % of it's 19.7 % stake in the company Stahl Lux 2 SA, which was classified as an associate until this time. Subsequent to the transaction the remaining shareholdings were reclassified to Financial Assets.

In 2018, the repayment of loans in the amount of USD 5 million (2017: USD 10 million and EUR 12 million) from associates took place.

While loans are carried at amortized cost participations are valued at fair value through OCI. In the prior financial year the group had designated the equity participations as available for sale, as management intends to hold them for the medium or long term.

In 2018 loans extended amounted to CHF 13 million (2017: CHF 20 million). Participations amounted to CHF 198 in 2018 (CHF 30 million in 2017).

9. Taxes

in CHF m	2018	2017
Current income taxes	–133	–96
Deferred income taxes	24	–39
Total taxes	**–109**	**–135**

The main elements contributing to the difference between the Group's overall expected tax expense/rate and the effective tax expense/rate are:

	2018 in CHF m	in %	2017 in CHF m	in %
Income before taxes total	**465**		**437**	
Expected tax expense/rate[1]	**–113**	**24.3**	**–117**	**26.8**
Effect of taxes on items not tax-deductible	–34	7.3	–66	15.1
Effect of utilization and changes in recognition of tax losses and tax credits	1	–0.2	23	–5.3
Effect of tax losses and tax credits of current year not recognized	–6	1.3	–10	2.3
Effect of adjustments to taxes recognized in prior periods	–3	0.6	25	–5.7
Effect of tax exempt income	50	–10.8	62	–14.2
Effect of other items	–4	0.9	–52	11.9
Effective tax expense/rate	**–109**	**23.4**	**–135**	**30.9**

[1] Calculated based on the income before tax of each subsidiary (weighted average).

The 2018 tax rate was helped by transactions with shareholdings of non-consolidated companies and by the recognition of deferred tax assets on losses generated in previous years in France. Additionally the tax rate compares favorably to the one of the prior year, where part of the US tax asset had to be written down as a result of the US tax reform.

The movement of the net deferred income tax balance is as follows:

in CHF m	PPE and intangible assets	Retirement benefit obligations	Tax losses and tax credits	Other accruals and provisions	**Total**	Thereof offset within the same jurisdiction	**Total**
Deferred tax assets at 31 December 2016	156	163	111	6	436	–138	298
Deferred tax liabilities at 31 December 2016	–163	—	—	–8	–171	138	–33
Net deferred tax balance at 1 January 2017	**–7**	**163**	**111**	**–2**	**265**	**—**	**265**
Charged/credited to income	27	–13	5	–58	–39		
Total charged/credited to income statement	**27**	**–13**	**5**	**–58**	**–39**		
Charged/credited to other comprehensive income	—	–36	—	—	–36		
Effect of business combinations	–8	—	9	5	6		
Exchange rate differences	11	6	–2	–9	6		
Net deferred tax balance at 31 December 2017	**23**	**120**	**123**	**–64**	**202**	**—**	**202**
Deferred tax assets at 31 December 2017	192	131	123	108	554	–287	267
Deferred tax liabilities at 31 December 2017	–169	–11	—	–172	–352	287	–65
Net deferred tax balance at 1 January 2018	**23**	**120**	**123**	**–64**	**202**	**—**	**202**
Change in accounting policies (IFRS 9)	—	—	—	1	1	—	1
Net deferred tax balance at 1 January 2018 (adjusted)	**23**	**120**	**123**	**–63**	**203**	**—**	**203**
Charged/credited to income statement	–35	–1	-13	62	13		
Effect of disposals	11	—	—	—	11		
Total charged/credited to income statement	**–24**	**–1**	**-13**	**62**	**24**		
Charged/credited to other comprehensive income	—	—	—	–1	–1		
Exchange rate differences	—	–4	–2	2	–4		
Net deferred tax balance at 31 December 2018	**–1**	**115**	**108**	**—**	**222**	**—**	**222**
Deferred tax assets at 31 December 2018	187	118	108	20	433	–164	269
Deferred tax liabilities at 31 December 2018	–188	–3	—	–20	–211	164	–47
Net deferred tax balance at 31 December 2018	**–1**	**115**	**108**	**—**	**222**	**—**	**222**

Of the deferred tax assets capitalized on tax losses, CHF 53 million refer to tax losses of the US-subsidiaries (2017: CHF 68 million), CHF 7 million to tax losses of the Spanish subsidiaries (2017: CHF 9 million), CHF 6 million to tax losses of the Canadian subsidiaries (2017: CHF 6 million), CHF 10 million to tax losses of the Indian subsidiaries (2017: CHF 7 million), and CHF 3 million to tax losses of the Italian subsidiaries (2017: CHF 6 million). Clariant considers it probable that these tax losses can be recovered.

Deferred income tax liabilities have not been established for withholding tax and other taxes that would be payable on the unremitted earnings of certain foreign subsidiaries, as such amounts are currently regarded as permanently reinvested. These unremitted earnings totaled CHF 2 559 million at the end of 2018 (2017: CHF 2 193 million).

The change compared to the prior year is primarily the result of Group-internal transactions.

The tax losses on which no deferred tax assets are recognized are reviewed for recoverability at each balance sheet date. The largest part of these tax losses arose in France (with a tax rate of 33.3 %), in China (with a tax rate of 25 %) and in Luxembourg (with a tax rate of 26.3 %). At present their recoverability is not considered probable.

Tax losses on which no deferred tax assets were recognized are as follows:

in CHF m	31.12.2018	31.12.2017
EXPIRY BY:		
2018	–	27
2019	9	18
2020	25	31
2021	26	33
2022	14	–
after 2022 (2017: after 2021)	333	308
Total	**407**	**417**

Tax credits amounting to CHF 10 million were recognized in 2018. They expire in and after 2023.

Temporary differences on which no deferred tax was recognized amount to CHF 672 million in 2018 (2017: CHF 1 005 million).

10. Inventories

in CHF m	31.12.2018	31.12.2017
Raw material, consumables, work in progress	404	402
Finished products	614	550
Total	**1 018**	**952**

in CHF m	2018	2017
Movements in write-downs of inventories		
As per 1 January	–41	–37
Additions	–18	–19
Reversals	10	15
Exchange rate differences	2	–
At 31 December	**–47**	**–41**

As at 31 December 2018 and 2017, no inventories were pledged as collateral for liabilities.

The costs for raw materials and consumables recognized as an expense and included in »Costs of goods sold« amounted to CHF 2 935 million (2017: CHF 2 784 million).

11. Trade receivables

in CHF m	31.12.2018	31.12.2017
Gross accounts receivable – trade	996	1 144
Gross accounts receivable – associates and joint ventures	26	18
Less: provision for doubtful accounts receivable	–5	–16
Total	**1 017**	**1 146**

The following summarizes the movement in the provision for doubtful accounts receivable:

in CHF m	2018	2017
As per 1 January	–16	–30
Charged to the income statement	–13	–18
Amounts used	4	4
Acquired in business combinations	–	–1
Unused amounts reversed	18	29
Exchange rate differences	2	–
At 31 December	**–5**	**–16**

There is no concentration of credit risk with respect to trade receivables, as the Group has a large number of internationally dispersed customers.

The Group applies the IFRS 9 simplified approach to measuring expected credit losses, which uses a lifetime expected loss allowance for all trade receivables within stage 1 and 2. The estimated expected loss rates are based on historical credit losses and are adjusted to reflect current and forward-looking information on macroeconomic factors affecting the ability of the customers to settle the receivables. The Group recognizes impairment of trade receivables in »Selling, general and administrative costs« in the income statement.

The maximum credit risk on trade receivables is equal to their fair value.

Collaterals are only required in rare cases (2018: CHF 2 million, 2017: CHF 2 million).

The loss allowance for trade receivables as at 31 December 2018 and 1 January 2018 (on adoption of IFRS9) was determined as follows:

in CHF m	Current	30–60 days overdue	61–90 days overdue	More than 90 days overdue	Individually Impaired	Total
31 December 2018						
Expected loss rate (in %)	0.34	1.64	1.77	2.66		
Gross carrying amount trade receivables	947	12	6	57	–	1 022
Loss allowance	**3**	**–**	**–**	**2**	**–**	**5**

in CHF m	Current	30–60 days overdue	61–90 days overdue	More than 90 days overdue	Individually Impaired	Total
1 January 2018						
Expected loss rate (in %)	0.47	2.00	2.16	2.18		
Gross carrying amount trade receivables	1 060	19	7	67	9	1 162
Loss allowance	**5**	**–**	**–**	**2**	**9**	**16**

The carrying amounts of the Group's trade receivables are denominated in the following currencies:

in CHF m	31.12.2018	31.12.2017
EUR	384	410
USD	300	391
CNY	64	89
BRL	45	55
JPY	35	39
INR	39	28
Other	150	134
Total	**1 017**	**1 146**

As of 31 December 2018, »Total trade receivables – net« include an amount of CHF 145 million (2017: CHF 141 million) past due, but not impaired. These relate to a number of customers for whom there is no recent history of default.

12. Other current assets

Other current assets include the following:

in CHF m	31.12.2018	31.12.2017
Other receivables	248	264
Current financial assets	66	62
Prepaid expenses and accrued income	52	62
Total	**366**	**388**

Other receivables include, among others, staff loans, deposits and advances, VAT and sales tax receivable.

Other receivables are recognized at amortized cost in the balance sheet.

Current financial assets are mainly made up of notes receivables and short-term loans. These are recognized at amortized cost in the balance sheet. The book value of current financial assets equals their fair value.

Other receivables and other current financial assets are also subject to the impairment requirements of IFRS 9. The identified impairment loss for other receivables was immaterial.

There was no impairment of current financial assets in 2018 and 2017.

Other receivables are denominated in the following currencies:

in CHF m	31.12.2018	31.12.2017
CHF	11	26
EUR	92	93
USD	13	15
JPY	3	4
BRL	17	24
CNY	11	21
INR	32	19
Other	69	62
Total	**248**	**264**

Current financial assets are denominated in the following currencies:

in CHF m	31.12.2018	31.12.2017
CHF	38	32
USD	11	12
CNY	15	16
EUR	1	2
Other	1	–
Total	**66**	**62**

The maximum exposure to credit risk of other current assets at the reporting date is their fair value.

13. Short-term deposits

Short-term deposits have an original maturity between 90 and 365 days.

They are denominated in the following currencies:

in CHF m	31.12.2018	31.12.2017
USD	15	–
GBP	–	37
INR	11	10
Total	**26**	**47**

14. Cash and cash equivalents

in CHF m	31.12.2018	31.12.2017
Cash at bank and on hand	716	594
Short-term bank deposits	117	107
Total	**833**	**701**

Cash and cash equivalents are denominated in the following currencies:

in CHF m	31.12.2018	31.12.2017
EUR	336	204
USD	171	122
CHF	159	188
GBP	15	22
CNY	3	4
JPY	5	12
INR	50	57
BRL	9	15
Other	85	77
Total	**833**	**701**

The effective average annual interest rate on short-term bank deposits in Swiss francs was –0.38 % (2017: 0.00 %), these deposits have an average maturity of 36 days (2017: 34 days).

The effective average annual interest rate on short-term bank deposits in US-dollars was 2.32 % (2017: 1.43 %), these deposits have an average maturity of 32 days (2017: 30 days).

There were no material short-term bank deposits denominated in currencies other than the Swiss franc and the US-dollar at the end of the reporting period.

The maximum exposure to credit risk on cash and cash equivalents is equal to their book value.

15. Cash flow from operating activities

for the years ended 31 December 2018 and 2017	Notes		**2018** in CHF m		2017 in CHF m
Net income			**356**		**302**
Adjustment for:					
Depreciation of property, plant and equipment	5	245		231	
Impairment	26	—		16	
Amortization of intangible assets	6	80		70	
Impairment of working capital		23		4	
Income from associates and joint ventures		–130		–103	
Tax expense	9	109		135	
Net financial income and costs	27	81		65	
Gain/loss from disposals not qualifying as discontinued operations	24	54		–3	
Other non-cash items		–24		37	
Total reversal of non-cash items			**438**		**452**
Dividends received from associates and joint ventures	7		50		45
Payments for restructuring	26		–42		–40
Cash flow before changes in net working capital and provisions			**802**		**759**
Changes in inventories			–156		–125
Changes in trade receivables			71		–101
Changes in trade payables			121		38
Changes in other current assets and liabilities			–39		–46
Changes in provisions (excluding payments for restructuring)			–52		4
Cash generated from operating activities			**747**		**529**
Income taxes paid			–217		–101
Net cash generated from operating activities			**530**		**428**

16. Changes in share capital and treasury shares and changes in non-controlling interests

Registered shares each with a par value of CHF 3.70 (2017: CHF 3.70)	Number of shares 2018	Par value 2018 in CHF m	Number of shares 2017	Par value 2017 in CHF m
Share capital as per 1 January	**331 939 199**	**1 228**	**331 939 199**	**1 228**
Share capital at 31 December	**331 939 199**	**1 228**	**331 939 199**	**1 228**
Treasury shares	–2 250 664	–8	–2 641 579	–10
Outstanding share capital at 31 December	**329 688 535**	**1 220**	**329 297 620**	**1 218**

Treasury shares (number of shares)	2018	2017
Holdings as per 1 January	2 641 579	7 887 728
Shares sold on exercise of put options	—	–800 000
Shares sold to counterparty out of options	—	–3 729 500
Shares sold at market value	—	–200 000
Shares transferred to employees	–390 915	–516 649
Holdings at 31 December	**2 250 664**	**2 641 579**

All shares are duly authorized and fully paid in.

Dividends are paid out as and when declared equally on all shares, excluding treasury shares. The information concerning payments per share to the shareholders are disclosed in the notes to the financial statements of Clariant Ltd.

In accordance with article 5 of the company's Articles of Incorporation, no limitations exist with regard to the registration of shares which are acquired in one's own name and on one's own account. Special rules exist for nominees.

In accordance with article 13 of the company's Articles of Incorporation, each share has the right to one vote.

Significant shareholdings of 3 % or more of total share capital

Based on the notifications received by Clariant and published by SIX Exchange Regulation, as at 31 December 2018 the following shareholders held more than 3 % of voting rights in Clariant Ltd:

Shareholders	Voting rights
SABIC International Holdings B.V., Sittard, The Netherlands, controlled by the Public Investment Fund of Saudi Arabia (PIF), Riyadh, Kingdom of Saudi Arabia[1]	25.67 %[2]
APG Asset Management N.V., Amsterdam, Netherlands	5.01 %
Blue Beteiligungsgesellschaft mbH, Am Holzmaierfeld, 82064 Strasslach-Dingharting (Germany) and Maple Beteiligungsgesellschaft mbH, Am Holzmaierfeld, 82057 Icking (Germany)[3]	3.49 %

[1] As of 31 December 2017, White Tale Holdings LP/40 North Latitude Master Fund Ltd. held 20.00% and subsequently increased their shareholding to 25.15%. On 25 January 2018, SABIC International Holdings B.V., Sittard, The Netherlands, controlled by the Public Investment Fund of Saudi Arabia (PIF) Riyadh, Kingdom of Saudi Arabia, acquired, subject to the necessary regulatory approvals, a 24.99% stake in Clariant Ltd previously held by White Tale Holdings LP, resp. Corvex Holdings LLC, resp. 40 North Latitude Master Fund Ltd. On 17 September 2018, this transaction was closed and thus SABIC has become Clariant Ltd's largest shareholder.

[2] SABIC acquired 24.99% of the shares of Clariant Ltd on 17 September 2018. The difference corresponds to the amount of treasury shares held by Clariant Ltd which have to be aggregated to the shares held by SABIC solely for regulatory disclosure purposes due to the Governance Agreement entered into by SABIC and Clariant on 17 September 2018.

[3] According to a disclosure notification published on 18 December 2018, a group consisting of Konstantin Winterstein, 80333 Munich, Germany and Elisabeth Prinzessin zu Sayn-Wittgenstein, 80333 Munich, Germany – initially formed on 14 December 2013 and holding 3.73% partially through Blue Beteiligungsgesellschaft mbH, Strasslach-Dingharting (Germany) and partially through Maple Beteiligungsgesellschaft mbH Icking (Germany) – was dissolved on 12 December 2018 and formed again according to said disclosure notification of 18 December 2018. The 3.73% previously held by this group was included in the 13.96% mentioned under footnote 4.

Former shareholders of Süd-Chemie AG[4], who had exchanged their shares against Clariant shares in April 2011 and are related to each other for family or other reasons (especially the Wamsler, Winterstein, Schweighart and Stockhausen families), held a total of 13.96 % of the share capital of Clariant Ltd until this group of shareholders was dissolved according to a discloure notification published on 18 December 2018.

[4] The following former shareholders of Süd-Chemie AG, holding 13.96 % of Clariant's shares, formed a group that was dissolved according to a disclosure notification published on 18 December 2018:

Wilhelm, Dr. Winterstein, Germany
Dolf, Dr. Stockhausen, Switzerland
Axel, Dr. Schweighart, Germany
Rosemarie Schweighart, Germany
Dominique Kraus, Germany
Irene W. Banning, United States
Susanne Wamsler-Singer, Austria
Caroline A., Dr. Wamsler, United States
Amelie Ratjen, Germany
Christof Ratjen, Germany
Christopher Weithauer, Germany
Johanna Bechtle, Germany
Kaspar Bechtle, Germany
Luisa Redetzki, Germany
Karl T. Banning, USA
Schuyler H. Joerger, Unites States
Sophie Isabel Schweighart, Germany
Heidrun Schweighart, Germany
Adriane Hartner, Austria
Konstantin Alfred Winterstein, Germany
Max-Theodor, Dr. Schweighart, Germany
Peter, Dr. Schweighart, Germany
Moritz Ostenrieder, Germany
Christian Ratjen, Germany
Bettina Wamsler, Germany
Pauline Joerger, United States
Marianne Kunisch, Germany
Maximilian Ratjen, Germany
Julius Ratjen, Germany
Elisabeth Prinzessin zu Sayn-Wittgenstein, Germany
Georg A. Weithauer, Germany
Charlotte Bechtle, Germany
Clara Redetzki, Germany
Marie Redetzki, Germany
Sophia P. Joerger, United States
Susanna Maria Schweighart, Germany
Maria Stockhausen, Switzerland

Disclosure notifications during the financial year 2018 reported to the Stock Exchange Disclosure Office pursuant to Art. 120 of the Financial Markets Infrastructure Act (FMIA) as well as further information in relation to disclosure notifications can be found on the SIX Swiss Exchange reporting platform: www.six-exchange-regulation.com/en/home/publications/significant-shareholders.html

On 31 December 2017, the following shareholders held a participation of 3 % or more of the total share capital: White Tale, White Tale Holdings LP, Cayman Islands (Keith Meister; David J. Millstone; David S. Winter), Corvex Holdings LLC, Cayman lslands (Keith Meister), 40 North Latitude Master Fund Ltd., New York, (David J. Millstone; David S. Winter) 20.00 %; Group of former shareholders of Süd-Chemie AG: 13.96 %, thereof (as a separate sub-group): Blue Beteiligungsgesellschaft mbH, Am Holzmaierfeld, 82064 Grossdingharting (Germany), and Maple Beteiligungsgesellschaft mbH, Am Holzmaierfeld, 82064 Grossdingharting (Germany): 3.73 %); APG Asset Management N.V., Amsterdam, Netherlands: 5.01 %; Black Rock Inc., New York: 3.80 %.

On 31 December 2018, Clariant AG itself held 2 250 664 shares in treasury, corresponding to 0.68 % of the share capital.

Distribution to shareholders

On 19 March 2018, the Annual General Meeting of Clariant Ltd approved a distribution from the confirmed capital contribution reserves of CHF 0.50 per share. This was paid out on 26 March 2018 reducing the capital contribution reserves by CHF 165 million.

Non-controlling interests

Effective as of 1 April 2017 Clariant re-negotiated the terms of the joint venture agreement of Süd-Chemie India Ltd (SCIL) with the joint venture partner. As a result the company is now a fully consolidated subsidiary of the Clariant Group and the co-owners' stake of 50 % in the company is reported as a non-controlling interest (see note 25).

At 31 December 2018, non-controlling interests reported are primarily made up of those of the four following companies. They amount to more than 84 % of the minority shares reported:

Clariant Huajin Catalysts (Panjin) Ltd, reported sales in the amount of CHF 31 million in the reporting period and total assets in the amount of CHF 45 million as per 31 December 2018. The non-controlling interests of 40 % of the shares outstanding is held by Northern Huajin Chemical Industry Group Co. Ltd.

Clariant Chemicals (India) Ltd reported sales in the amount of CHF 141 million in the reporting period and CHF 122 million of total assets as per 31 December 2018. The non-controlling interests of 49 % of the shares outstanding is traded on the Bombay Stock Exchange (BSE) in Mumbai.

Clariant Catalysts (Japan) K.K. reported sales in the amount of CHF 158 million in the reporting period and CHF 93 million of total assets as per 31 December 2018. The non-controlling interests of 38.6 % of the shares outstanding are held by Nissan Chemicals Industries Ltd.

In the reporting period, Süd-Chemie India Ltd (SCIL) reported sales in the amount of CHF 140 million and as per 31 December 2018 total assets of CHF 224 million, thereof current assets of CHF 125 million and non-currents assets of CHF 99 million. Total liabilities amounted to CHF 35 million, thereof current liabilities of CHF 24 million and non-current liabilities of CHF 11 million.

As per 31 December 2018, total equity amounted to CHF 189 million. The non-controlling interests of 50 % of the shares outstanding are owned by private shareholders in India.

17. Non-current financial debts

in CHF m	Interest rate in %	Term	**Notional amount**	**Net amount 31.12.2018**	Net amount 31.12.2017
Straight bond	2.500	2012-2018	250 CHF m	–	250
Straight bond	3.250	2012-2019	285 CHF m	285	285
Certificate of indebtedness	mixed	2015–2020	150 EUR m	169	175
Certificate of indebtedness	1.012	2016-2020	157 EUR m	176	183
Certificate of indebtedness	6 m EURIBOR + 1.05	2016-2020	55 EUR m	63	65
Certificate of indebtedness	0.779	2016-2021	55 EUR m	63	65
Certificate of indebtedness	3 m LIBOR +1.5	2016-2021	166 USD m	163	162
Certificate of indebtedness	2.618	2016-2021	111 USD m	109	108
Straight bond	3.500	2012-2022	175 CHF m	174	174
Certificate of indebtedness	mixed	2015-2023	150 EUR m	169	175
Certificate of indebtedness	6 m EURIBOR +1.1	2016-2023	13 EUR m	15	15
Certificate of indebtedness	1.137	2016-2023	27 EUR m	30	31
Certificate of indebtedness	1.501	2016-2023	73 EUR m	83	86
Straight bond	2.125	2014-2024	160 CHF m	160	160
Certificate of indebtedness	2.010	2016-2026	15 EUR m	16	17
Certificate of indebtedness	1.194	2018-2024	92 EUR m	104	–
Certificate of indebtedness	1.548	2018-2025	102 EUR m	115	–
Certificate of indebtedness	6 m EURIBOR + 0.95	2018-2025	54 EUR m	60	–
Certificate of indebtedness	2.087	2018-2028	17 EUR m	19	–
Total straight bonds and certificates of indebtedness				**1 973**	**1 951**
Liabilities to banks and other financial institutions				**6**	**7**
Obligations under finance leases				**17**	**19**
Subtotal				**1 996**	**1 977**
Less: current portion (see note 22)				**–285**	**–250**
Total				**1 711**	**1 727**
Breakdown by maturity					
			2019		287
			2020	410	434
			2021	344	337
			2022	174	174
			after 2022 (2017: after 2021)	783	495
Total				**1 711**	**1 727**
Breakdown by currency			EUR	1 092	824
			CHF	336	619
			USD	279	278
			Others	4	6
Total				**1 711**	**1 727**
Fair value comparison (including current portion)					
Straight bonds				651	919
Certificates of indebtedness				1 354	1 082
Others				23	26
Total				**2 028**	**2 027**

On 25 September 2018, Clariant issued four certificates of indebtedness with a total amount of EUR 265 million (CHF 299 million). These certificates have the following terms: EUR 92 million for 5.5 years at a fixed interest rate of 1.194 % p.a., EUR 102 million for 7 years at a fixed interest rate of 1.548 % p.a., EUR 54 million for 7 years at a variable interest rate (6-months-Euribor + 0.95 % p.a.), EUR 17 million for 10 years at a fixed interest rate of 2.087 % p.a..

On 26 September 2018, a bond issued in 2012 in the amount of CHF 250 million reached maturity and was repaid.

On 24 January 2017, a bond issued in 2012 in the amount of EUR 500 million (CHF 537 million) reached maturity and was repaid.

On 9 June 2017, a bond issued in 2011 in the amount of CHF 100 million reached maturity and was repaid.

Valuation. Non-current financial debt is recognized initially at fair value, net of transaction costs incurred. Financial debt is subsequently stated at amortized cost. There are no long-term financial liabilities valued at fair value through profit and loss.

Fair values of straight bonds are determined by quoted market prices (Level 1 in the fair value hierarchy).

Certificates of indebtedness and other financial debts are recorded at notional amounts, which are a reasonable approximation of the fair values.

Covenants. For the covenants please refer to note 3.1 Financial risk factors.

Exposure of the Group's borrowings to interest rate changes
- Bonds: the interest rates of all bonds are fixed.
- Certificates of indebtedness: the major part of the existing certificates of indebtedness has a fixed coupon.
- Liabilities to banks and other financial institutions consist of bank loans with fixed interest rates mainly.

Collateral. In 2018 and 2017, no assets were pledged as collateral.

18. Reconciliation of net debt

CHF m	**31.12.2017**	Movements in Cash flow	Effect of Business Combinations	Exchange rate differences	Other non-cash movements	**31.12.2018**
Cash and cash equivalents	701	152	—	–20	—	833
Short-term deposits	47	–20	—	–1	—	26
Financial instruments with positive fair values	7	—	—	—	—	7
Total cash and liquid investments	**755**	**132**	**—**	**–21**	**—**	**866**
Non-current financial debt	–1 727	–299	—	30	285	–1 711
Current financial debt	–567	303	—	20	–285	–529
Borrowings and other financial liabilities	**–2 294**	**4**	**—**	**50**	**—**	**–2 240**
Net debt	**–1 539**	**136**	**—**	**29**	**—**	**–1 374**

CHF m	**31.12.2016**	Movements in Cash flow	Effect of Business Combinations	Exchange rate differences	Other non-cash movements	**31.12.2017**
Cash and cash equivalents	1 043	–391	58	–9	—	701
Short-term deposits	277	–242	5	7	—	47
Financial instruments with positive fair values	5	2	—	—	—	7
Total cash and cash equivalent	**1 325**	**–631**	**63**	**–2**	**—**	**755**
Non-current financial debt	–1 908	–8	—	–61	250	–1 727
Current financial debt	–957	648	–1	–7	–250	–567
Borrowings and other financial liabilities	**–2 865**	**640**	**–1**	**–68**	**—**	**–2 294**
Net debt	**–1 540**	**9**	**62**	**–70**	**—**	**–1 539**

19. Retirement benefit obligations

Apart from the legally required social security schemes, the Group has numerous independent pension plans. The assets are principally held externally. For certain Group companies however, no independent assets exist for the pension and other non-current employee benefit obligations. In these cases the related liability is included in the balance sheet as part of the non-current liabilities.

Defined benefit post-employment plans. Defined benefit pensions and termination plans cover the majority of the Group's employees. Future obligations and the corresponding assets of those plans considered as defined benefit plans under IAS 19 (revised) are reappraised annually and reassessed at least every three years by independent actuaries. Assets are valued at fair value.

Pension assets for funded defined benefit pension plans are managed according to local rules and legislation in each country.

The actual asset allocation is determined by current and expected economic and market conditions and in consideration of specific asset class risks in the risk profile. For this purpose Asset Liability Matching studies are conducted by third-party experts on a regular basis to ensure that investment strategies for pension assets are in line with the structure of the plan members of the pension plan concerned.

In all countries with funded defined benefit plans the body governing the investment policy is constituted in accordance with local legal requirements. To the extent legally permitted Clariant Corporate exercises influence to ensure that the investment policy is set in a way to serve best the needs of the pension plan and its members.

The largest defined benefit plans are operated in Switzerland, the United Kingdom, the United States and Germany. These plans make up more than 90 % of the total defined benefit obligation.

The most important German plan is unfunded and covers the supplementary pension liabilities for plan members whose salaries exceed the level of the German mandatory social security coverage. Contributions are made primarily by the employer and vary depending on the salary level of the plan members. Benefits are paid out as annual pensions amounting to 20 % of total contributions. Lump sum payments to employees are possible to the extent of the voluntary contributions. For employees having joined or joining in 2011 and later there exists a funded pension plan. Contributions are primarily paid into the plan by the employer and vary depending on the income of the individual plan member. Employees contribute to the plan up to 2 % of pensionable earnings on a voluntary basis, to which the employer contributes an equal amount on top of the regular contributions. Pensions paid by this plan are principally based on the return on plan assets (contributions paid in plus interest), apart from a minimal interest. In addition there exists a smaller, similarly structured funded defined benefit plan for former employees of the Süd-Chemie group, acquired in 2011. All other pension liabilities regarding German staff members are covered by a funded multi-employer plan which is accounted for as a defined contribution plan.

The defined benefit obligation in the United Kingdom is a funded plan covering the pension liabilities of UK employees who joined the company before 31 December 2001 and was closed to further accruals in April 2016. All staff members are now covered by a defined contribution plan. The defined benefit pension plan is fully funded according to legal requirements. Yet, in view of the high number of non-active plan members, additional contributions may be necessary in future years.

In the United States Clariant operates a funded defined benefit pension plan covering the pension liabilities of employees who joined the company before 31 December 2000. Contributions are paid by the employer exclusively. Benefits are paid out as lifetime pensions determined on the basis of a final/career average calculation. Staff members who joined on 1 January 2001 or later are covered by a defined contribution plan. For members of Management whose annual salaries exceed the amount of CHF 275 000 an additional pension scheme is in place in the form of an unfunded defined benefit obligation, which covers the part exceeding this amount. The US pension plan is currently underfunded according to local legal requirements. Additional funding measures in the amount of up to CHF 21 million are scheduled over the next four years.
US-employees transferred to Clariant with the Hoechst Specialty Chemicals business remain insured with Hoechst for their pension claims incurred prior to 30 June 1997.

In Switzerland, Clariant operates a funded defined benefit pension plan that covers the pension liabilities of all employees of the Swiss Clariant companies up to a salary level of CHF 200 000. Both the employer and the employees contribute to the plan, the employer paying two thirds of the total contributions. The pension plan provides lifetime pensions determined based on cumulative savings of the individual plan member and converted into an annual pension at a fixed conversion rate. Lump sum payments are possible up to 40 % of the total individual cumulative savings. The Swiss pension plan is marked by a shrinking operating basis, and as a result, an increasing share of retired members. Additional funding measures in the amount of CHF 34 million are therefore scheduled over the next seven years.
For members of Management whose annual salaries exceed the amount of CHF 200 000, an additional pension scheme is in place in the form of a funded defined benefit obligation.

Mortality tables

The following mortality tables were used to determine the defined pension obligation of the most important pension plans:

Switzerland	BVG 2015 generation table
Germany	Richttafeln 2018G by Prof. Dr. Klaus Heubeck
UK	SAPS S2 series amount tables (base table) CMI Model (2017) (future improvements)
USA	RP 2014 mortality table with projection scale MP-2017

Post-employment medical benefits. The Group operates a number of post-employment medical benefit schemes in the United States, Canada and France. The method of accounting for the liabilities associated with these plans is largely equal to the one used for defined benefit pension schemes. These plans are not externally funded, but are recognized as provisions in the balance sheets of the Group companies concerned.

Expenses for net benefits are recorded in the same line and function in which the personnel costs are recorded.

Changes in the present value of defined benefit obligations are as follows:

in CHF m	Pension plans (funded and unfunded)		Post-employment medical benefits (unfunded)	
	2018	2017	**2018**	2017
As per 1 January	2 767	2 729	87	87
Current service cost	40	41	1	1
Past service cost/gain including curtailments	–16	5	–	–
Gain/loss on settlements	–	–2	–	–
Interest costs on obligation	47	47	3	3
Contributions to plan by employees	11	11	–	–
Benefits paid out to personnel in reporting period	–126	–117	–5	–5
Remeasurements:				
Actuarial gain/loss arising from changes in demographic assumptions	7	–16	–	–
Actuarial gain/loss arising from changes in financial assumptions	–108	6	–5	4
Actuarial gain/loss due to experience adjustments	–19	–	–1	–1
Liabilities acquired in a business combination	–	1	–	–
Effect of disposals	–138	–	–	–
Effect of liabilities extinguished on settlements	1	–	–	–
Exchange rate differences	–27	62	–	–2
At 31 December	**2 439**	**2 767**	**80**	**87**

Changes in the fair value of plan assets are as follows:

in CHF m	**2018**	2017
As per 1 January	2 073	1 934
Assets acquired in business combinations	–	1
Interest income on plan assets	35	33
Contributions to plan by employees	11	11
Contributions to plan by employer	44	55
Benefits paid out to personnel in reporting period	–100	–92
Remeasurements:		
Return on plan assets (excluding amount included in interest expense)	–149	111
Effect of disposals	–128	–
Exchange rate differences	–15	20
At 31 December	**1 771**	**2 073**

As at 31 December 2018 and 2017, the pension plan assets did not include any directly held registered shares or bonds issued by Clariant Ltd.

The amounts recognized in the balance sheets are as follows:

in CHF m	Defined benefit pension plans		Post-employment medical benefits		Total	
	31.12.2018	31.12.2017	**31.12.2018**	31.12.2017	**31.12.2018**	31.12.2017
Present value of funded obligations	–1 848	–2 117	—	—	–1 848	–2 117
Fair value of plan assets	1 771	2 073	—	—	1 771	2 073
Overfunding/Deficit	**–77**	**–44**	**—**	**—**	**–77**	**–44**
Present value of unfunded obligations	–591	–651	–80	–87	–671	–738
Net liabilities in the balance sheet	**–668**	**–695**	**–80**	**–87**	**–748**	**–782**

Thereof recognized in:

in CHF m	**31.12.2018**	31.12.2017	**31.12.2018**	31.12.2017	**31.12.2018**	31.12.2017
Retirement benefit obligations	–698	–762	–80	–87	–778	–849
Prepaid pension assets	30	67	—	—	30	67
Net liabilities in the balance sheet for defined benefit plans	**–668**	**–695**	**–80**	**–87**	**–748**	**–782**

The amounts recognized in the income statement and in other comprehensive income are as follows:

in CHF m	Defined benefit pension plans		Post-employment medical benefits		Total	
	2018	2017	**2018**	2017	**2018**	2017
Current service cost	–40	–41	–1	–1	–41	–42
Net interest cost	–12	–14	–3	–3	–15	–17
Past service cost/gain including curtailments	16	–5	—	—	16	–5
Gain/loss on settlements	—	2	—	—	—	2
Components of defined benefit expense reported in the income statement	**–36**	**–58**	**–4**	**–4**	**–40**	**–62**

in CHF m						
Actuarial gain/loss arising from changes in demographic assumptions	–7	16	—	—	–7	16
Actuarial gain/loss arising from changes in financial assumptions	108	–6	5	–4	113	–10
Actuarial gain/loss due to experience adjustments	19	—	1	1	20	1
Return on plan assets (excluding amount included in net interest expense)	–149	111	—	—	–149	111
Components of defined benefit expense reported in other comprehensive income	**–29**	**121**	**6**	**–3**	**–23**	**118**
Total defined benefit expense	**–65**	**63**	**2**	**–7**	**–63**	**56**

The fair value of the plan assets is split into the major assets categories as follows:

in CHF m	**31.12.2018**	31.12.2017
Equities	310	551
thereof based on quoted market prices	*291*	*536*
Bonds	586	690
thereof based on quoted market prices	*406*	*657*
Cash	102	75
thereof based on quoted market prices	*102*	*75*
Property	242	302
thereof based on quoted market prices	*176*	*235*
Alternative investments	531	455
thereof based on quoted market prices	*160*	*272*
Total fair value of plan assets	**1 771**	**2 073**

The principal actuarial assumptions at the balance sheet dates in percent are as follows:

						2018 in %					2017 in %
		Group				**Most important countries**	**Group**				**Most important countries**
		Weighted average	Switzerland	United Kingdom	United States	Germany	Weighted average	Switzerland	United Kingdom	United States	Germany
Discount rate		2.0	0.8	2.9	4.4	2.1	1.7	0.6	2.7	3.7	1.8
Future salary increases		1.9	1.5	–	3.5	2.5	1.8	1.5	–	3.0	2.5
Long-term increase in health care costs		6.9	–	–	8.0	–	5.1	–	–	5.9	–
Current average life expectancy for a 65 year old male	in years	18	22	22	21	19	18	22	22	21	19
Current average life expectancy for a 65 year old female	in years	21	23	24	23	24	21	23	24	23	23

A one percentage-point change in health care cost trend rates would have the following effects on the obligation for post-employment medical benefits:

2018 in CHF m	**One percentage point increase**	**One percentage point decrease**
Effect on the aggregate of the service cost and interest cost	1	–1
Effect on defined benefit obligation	6	–5

2017 in CHF m	**One percentage point increase**	**One percentage point decrease**
Effect on the aggregate of the service cost and interest cost	1	–1
Effect on defined benefit obligation	7	–6

A 25 basis-point change in discount rate would have the following effects on the obligation for pension plans:

in CHF m	25 basis point increase		25 basis point decrease	
	2018	2017	**2018**	2017
Effect on defined benefit obligation	–80	–96	83	101

If life expectancy increased by one year, the defined benefit obligation would increase by CHF 98 million (2017: CHF 110 million).

Defined contribution post-employment plans. In 2018, CHF 26 million were charged to the income statement as contributions to defined contribution plans (2017: CHF 26 million).

In Germany, approximately 4 900 Clariant employees are insured in a defined benefit plan which is a multi-employer plan and as such is accounted for as a defined contribution plan. The reason for this accounting practice is that the plan exposes the participating Clariant companies to actuarial risks associated with the current and former employees of other companies which are members of the same pension plan. There is no consistent or reliable basis for allocating the obligation, plan assets and cost to individual companies participating in the plan.

Based on the statutory actuarial calculation of 2017, the pension fund's obligations are fully funded. Also for 2018, it is anticipated that the pension plan liabilities are covered by the respective assets.

In the case where the multi-employer plan faces a situation in which the pension plan liabilities exceed the assets, this can be remedied either by increasing the employer's contributions to the pension plan or by reducing the benefits paid out to the entitled parties. In the case of a reduction of the benefits this must be compensated by the employer according to German legislation. If the pension plan were unwound the remaining funds would be distributed among the plan members. In case there are no plan members left, the remaining funds would be transferred to social institutions.

If Clariant withdrew from the pension fund, all rights and obligations of the employer against the pension plan would remain in force as long as the pension plan continues to render pension services to the group's plan members. Based on the number of plan members (active and passive) Clariant's share in the pension plan amounts to approximately 8 percent.

Clariant's contribution to this pension plan amounted to CHF 16 million in 2018 (CHF 16 million in 2017) and is expected to be CHF 19 million in 2019.

The multi-employer plan originates in the pension plan scheme of the German companies of the former Hoechst group, to which a part of the activities of Clariant pertained until 1997. Several of the companies which were formerly part of the Hoechst Group continue to participate in this multi-employer plan.

in CHF m	Pension plans		Post-employment medical benefits	
	2018	2017	**2018**	2017
Clariant Group regular and supplemental contributions (employer's contributions):				
Actual contributions in 2017		55	–	–
Actual contributions in 2018 (2017: estimated)	44	56	–	–
Estimated contributions in 2019	36	40	–	–
Estimated contributions in 2020	36	49	–	–
Estimated contributions in 2021	37	39	–	–
Estimated contributions in 2022	37	38	–	–
Estimated contributions in 2023	32	–	–	–
Payments to beneficiaries:				
Actual payments in 2017		–117	–	–4
Actual payments in 2018 (2017: estimated)	–126	–124	–4	–6
Estimated payments in 2019	–121	–118	–6	–6
Estimated payments in 2020	–114	–121	–6	–6
Estimated payments in 2021	–117	–123	–6	–6
Estimated payments in 2022	–118	–125	–6	–6
Estimated payments in 2023	–119	–	–6	–
Allocation of defined benefit obligation to plan members (in CHF m):				
Active members	670	848	32	39
Deferred members	287	355	8	6
Retired members	1 482	1 564	40	42
Total funded and unfunded obligations at 31 December	**2 439**	**2 767**	**80**	**87**
Weighted average duration of the defined benefit obligation at the end of reporting period (in years):				
At 31 December	13.6	14.6	10.5	11.3

20. Movements in provisions

in CHF m	Environmental provisions	Personnel provisions	Restructuring provisions	Other provisions	**Total provisions 2018**	Total provisions 2017
As per 1 January	134	170	70	112	486	470
Additions	11	195	15	24	245	363
Effect of business combinations	–	–	–	–	–	1
Disposals	–	–2	–	–	–2	–
Amounts used	–13	–145	–42	–45	–245	–299
Unused amounts reversed	–13	–36	–3	–18	–70	–65
Changes due to the passage of time and changes in discount rates	3	–	–	–	3	5
Exchange rate differences	–8	–8	–1	–4	–21	11
At 31 December	**114**	**174**	**39**	**69**	**396**	**486**
Of which						
– Current portion	34	150	34	53	271	320
– Non-current portion	80	24	5	16	125	166
Total provisions	**114**	**174**	**39**	**69**	**396**	**486**
Expected outflow of resources						
Within 1 year	34	150	34	53	271	320
Between 1 and 3 years	26	15	4	8	53	74
Between 3 and 5 years	17	2	1	4	24	25
Over 5 years	37	7	–	4	48	67
Total provisions	**114**	**174**	**39**	**69**	**396**	**486**

Environmental provisions. Provisions for environmental liabilities are made when there is a legal or constructive obligation for the Group which will result in an outflow of economic resources. It is difficult to estimate the action required by Clariant in the future to correct the effects on the environment of prior disposal or release of chemical substances by Clariant or other parties and the associated costs, pursuant to environmental laws and regulations.

The material components of the environmental provisions consist of the costs to fully clean and refurbish contaminated sites and to treat and contain contamination at sites where the environmental exposure is less severe. The Group's future remediation expenses are affected by a number of uncertainties which include, but are not limited to, the method and extent of remediation and the percentage of material attributable to Clariant at the remediation sites relative to that attributable to other parties.

The environmental provisions reported in the balance sheet concern a number of different obligations, mainly in Germany, Brazil, the United States, Switzerland and Italy.

Provisions are made for remedial work where there is an obligation to remedy environmental damage, as well as for containment work where required by environmental regulations. All provisions relate to environmental liabilities arising in connection with activities that occurred prior to the date when Clariant took control of the relevant site. At each balance sheet date, Clariant critically reviews all provisions and makes adjustments where required.

Personnel provisions. Personnel provisions include holiday entitlements, compensated absences such as sabbatical leave, jubilee, annual leave or other long-service benefits, profit sharing and bonuses. Such provisions are established in proportion to the services rendered by the employee concerned.

Restructuring provisions. Restructuring provisions are established where there is a legal or constructive obligation for the Group that will result in the outflow of economic resources. The term restructuring refers to the activities that have as a consquence staff redundancies and the shutdown of production lines or entire sites. When the Group has approved a formal plan and has either started to implement the plan or announced its main features to the public, a restructuring provision is created.

The restructuring provisions newly added in 2018 concern site closures and headcount reductions in various countries with the largest amounts incurred in the United States, Switzerland, France and Germany.

For further information regarding restructuring measures refer to note 26.

Other provisions. Other provisions include provisions for obligations relating to tax (other than income tax) and legal cases and other items in various countries for which the amount can be reliably estimated.

All non-current provisions are discounted to reflect the time value of money where material. Discount rates reflect current market assessments of the time value of money and the risk specific to the provisions in the respective countries.

21. Trade payables and other liabilities

in CHF m	**31.12.2018**	31.12.2017
Trade payables	750	729
Contract liabilities	65	27
Payables to associates and joint ventures	74	61
Accruals	203	229
Other liabilities	246	249
Total trade payables and other liabilities	**1 338**	**1 295**
Reclassified to non-current liabilities	–72	–79
Total current trade payables and other liabilities	**1 266**	**1 216**

The amount recognized for trade payables is equal to their fair value. Contract liabilities are short term and will be recognized as revenues in the next reporting period.

22. Current financial debts

in CHF m	**31.12.2018**	31.12.2017
Banks and other financial institutions	244	317
Current portion of non-current financial debts (see note 17)	285	250
Total	**529**	**567**
Breakdown by maturity:		
in CHF m	**31.12.2018**	31.12.2017
Up to three months after the balance sheet date	227	255
Three to six months after the balance sheet date	297	57
Six to twelve months after the balance sheet date	5	255
Total	**529**	**567**

On 26 September 2018, a bond issued in 2012 in the amount of CHF 250 million reached maturity and was repaid.

A bond issued in 2012 with a nominal value of CHF 285 million will fall due in 2019 and was therefore reclassified to current financial debts.

Current financial debt is recognized initially at fair value, net of transaction costs incurred. Financial debt is subsequently stated at amortized cost. Except for the derivatives, there are no current financial liabilities valued at fair value through profit and loss.

The fair value of financial debt at banks and other financial institutions approximates its carrying amount due to the short-term nature of these instruments.

23. Segment information

Clariant has grouped its activities into four Business Areas (reportable segments): Care Chemicals (BU ICS), Catalysis (BU Catalysts), Natural Resources (BU Oil & Mining Services, BU Functional Minerals) and Plastics & Coatings (BU Additives, BU Masterbatches, BU Pigments).

Intersegment transactions are entered into under the normal circumstances and terms and conditions that would also be available to unrelated third parties.

Segment assets consist of property, plant and equipment, goodwill, intangible assets, inventories, receivables and investments in associates. They exclude deferred tax assets, financial assets and operating cash. Segment liabilities comprise trade payables. They exclude items such as tax liabilities, provisions, pension liabilities and corporate borrowings. Capital expenditure comprises additions to property, plant and equipment and intangibles.

SEGMENTS in CHF m	Care Chemicals		Catalysis		Natural Resources		Plastics & Coatings		Corporate		Total Group	
	2018	2017	**2018**	2017	**2018**	2017	**2018**	2017	**2018**	2017	**2018**	2017
Segment sales	1 681	1 589	862	767	1 403	1 364	2 736	2 709	–	–	6 682	6 429
Sales to other segments	–16	–14	–1	–	–9	–7	–33	–31	–	–	–59	–52
Total sales	**1 665**	**1 575**	**861**	**767**	**1 394**	**1 357**	**2 703**	**2 678**	**–**	**–**	**6 623**	**6 377**
Operating expenses	–1 414	–1 375	–750	–639	–1 298	–1 223	–2 375	–2 381	–240	–263	–6 077	–5 881
Thereof:												
Income from associates and joint ventures[3]	29	10	17	11	16	5	54	30	14	47	130	103
Gain/loss from disposals not qualifying as discontinued operations	–	–	–	–	–	–	–	1	–54	2	–54	3
Restructuring, impairment and transaction-related costs	–2	–30	–14	–7	–22	–14	–4	–14	–51	–115	–93	–180
Operating income	**251**	**200**	**111**	**128**	**96**	**134**	**328**	**297**	**–240**	**–263**	**546**	**496**
Net financial expenses and taxes											–190	–194
Net income											**356**	**302**
Segment assets	1 158	1 160	1 724	1 780	1 228	1 298	1 746	1 798			5 856	6 036
Segment liabilities	–252	–244	–159	–90	–159	–150	–282	–273			–852	–757
Net operating assets	**906**	**916**	**1 565**	**1 690**	**1 069**	**1 148**	**1 464**	**1 525**	**–**	**–**	**5 004**	**5 279**
Net assets held for sale	**7**	**10**	**5**	**5**	**–**	**4**	**2**	**2**	**1**	**1**	**15**	**22**
Corporate assets without cash									1 244	1 416	1 244	1 416
Corporate liabilities without financial liabilities									–1 919	–2 239	–1 919	–2 239
Net debt (see note 18)									–1 374	–1 539	–1 374	–1 539
Total net assets	**913**	**926**	**1 570**	**1 695**	**1 069**	**1 152**	**1 466**	**1 527**	**–2 048**	**–2 361**	**2 970**	**2 939**
Thereof:												
Investments in PPE and intangibles for the period	61	61	56	36	42	49	75	86	23	47	257	279
Investments in associates and joint ventures at the end of the period	87	64	118	121	9	9	151	154	3	160	368	508
Reconciliation of key figures												
Operating income	251	200	111	128	96	134	328	297	–240	–263	546	496
Add: systematic depreciation of PPE	56	54	55	41	38	36	66	68	30	32	245	231
Add: impairment	–	–	–	1	–	1	–	12	–	2	–	16
Add: amortization of intangible assets	7	6	19	22	23	23	14	10	17	9	80	70
EBITDA[1]	**314**	**260**	**185**	**192**	**157**	**194**	**408**	**387**	**–193**	**–220**	**871**	**813**
Add: restructuring, impairment and transaction-related costs	2	30	14	7	22	14	4	14	51	115	93	180
Less: impairment	–	–	–	–1	–	–1	–	–12	–	–2	–	–16
Less: gain/loss from disposals not qualifying as discontinued operations[2]	–	–	–	–	–	–	–	–1	54	–2	54	–3
Adjusted EBITDA	**316**	**290**	**199**	**198**	**179**	**207**	**412**	**388**	**–88**	**–109**	**1 018**	**974**
Operating income	251	200	111	128	96	134	328	297	–240	–263	546	496
Add: restructuring, impairment and transaction-related costs	2	30	14	7	22	14	4	14	51	115	93	180
Less: gain/loss from disposals not qualifying as discontinued operations	–	–	–	–	–	–	–	–1	54	–2	54	–3
Adjusted operating income	**253**	**230**	**125**	**135**	**118**	**148**	**332**	**310**	**–135**	**–150**	**693**	**673**

[1] EBITDA is earning before interest, tax, depreciation and amortization.

[2] Not including the result of the partial disposal and revaluation of the participation in Stahl.

[3] Includes the effect of the partial disposal and revaluation of the participation in Stahl in the amount of CHF 59 million. The allocation to the Business Areas is as follows: CHF 15 million to Care Chemicals, CHF 8 million to Catalysis, CHF 13 million to Natural Resources and CHF 23 million to Plastics & Coatings.

Reconciliation of segment assets to total assets in CHF m	**31.12.2018**	31.12.2017
Segment assets	5 856	6 036
Segment assets reported as assets held for sale	14	21
Corporate assets reported as assets held for sale	1	1
Corporate assets without cash	1 244	1 416
Cash	833	701
Short-term deposits	26	47
Financial instruments with positive fair values	7	7
Total Assets	**7 981**	**8 229**

in CHF m		Sales[1]		Non-current assets[2]
	2018	2017	**31.12.2018**	31.12.2017
EMEA	2 803	2 674	2 275	2 438
of which Germany	*778*	*757*	*1 391*	*1 458*
of which Switzerland	*39*	*34*	*490*	*585*
of which MEA	*481*	*480*	*55*	*62*
North America	1 295	1 241	1 205	1 234
of which USA	*1 206*	*1 143*	*1 187*	*1 213*
Latin America	775	830	226	248
of which Brazil	*321*	*355*	*124*	*146*
Asia/Pacific	1 750	1 632	636	663
of which China	*624*	*534*	*177*	*182*
of which India	*237*	*209*	*200*	*217*
Total	**6 623**	**6 377**	**4 342**	**4 583**

[1] Allocated by region of third-party sale's destination.
[2] Non-current assets exclude deferred tax assets and pension plan assets.

All of the Group's segments generate their revenues to the largest extent from the sale of products. These come in such a great variety that a meaningful grouping below the segment information is not possible.

Revenue from services recognized in 2018 amounted to CHF 89 million and mostly were incurred in Business Area Natural Resources.

For a description of the Business Units see note 1.24.

24. Disposals

Activities not qualifying as discontinued operations

In this section, disposals of subsidiaries, associates and activities are reported that do not qualify as discontinued operations in the sense of IFRS 5. The following disposals took place in 2018 and 2017:

On 27 December 2018, Clariant sold its 100 % shares in Infrapark Baselland AG to GETEC heat & power GmbH for a net consideration of CHF 38 million. The loss recorded on the transaction in 2018 amounted to CHF 54 million gross and to CHF 43 million net of tax.

On 30 November 2017, Clariant sold its shares (36.03 %) in New Zealand based Chemcolour Industries (NZ) Ltd. to Azelis Australia PTY Ltd. for a total consideration of CHF 8 million. The profit recorded on the transaction in 2017 amounted to CHF 3 million.

The result from disposals not qualifying as discontinued operations is reported under »Selling, general and administrative costs« in the income statement.

Other assets held for sale

An amount of CHF 15 million relates to property, plant and equipment held for sale in Turkey, Italy and in China (2017: CHF 22 million).

25. Acquisitions

Full consolidation of Süd-Chemie India Ltd. (SCIL)

As of 1 April 2017 Clariant fully consolidated the company SCIL, which was until that time accounted for as a joint venture and as such was valued at equity. Clariant's share in SCIL is 50 %, while the other 50 % are owned by private investors in India.

In view of SCIL's significance for Clariant's Catalysis activities in Asia, management successfully renegotiated the joint venture contracts. The new terms introduced a casting vote for Clariant to direct the relevant activities. The contractual change and the 50 % voting rights resulted in Clariant obtaining control over SCIL. As no consideration was paid, nor any shares were purchased or sold, this transaction is treated as an acquisition without consideration. Prior to the full consolidation Clariant already owned 50 % of SCIL. In a first step this participation was revalued to fair value resulting in an income of CHF 10 million recognized in »Income from associates and joint ventures« in the income statement.

In a second step assets and liabilities of the company as per 1 April 2017 were included in the balance sheet, while the participation in the joint venture was derecognized. The co-owners' share in SCIL is recognized in non-controlling interests. Goodwill, included in non-current assets, amounted to CHF 63 million.

Acquisition of Kel-Tech Inc.

On 1 October 2016, Clariant acquired from Arsenal Capital Partners 100 % of the shares of Kel-Tech Inc. for a total consideration of CHF 223 million, out of which CHF 202 million were paid in 2016 and CHF 21 million were considered as contingent consideration. As the sales goals that would have triggered an earn-out up to a maximum of CHF 35 million were not met in 2017 the respective provision in the amount of CHF 21 million was reversed in the line Sales, General & Administration in the income statement in 2017.

The acquired company is based in Midland, Texas, USA, and is a manufacturer and supplier of specialty chemicals for production, field stimulation and drilling applications in the oil-service business throughout onshore United States. This acquisition pertains to the Business Unit Oil & Mining Services.

Acquisition of X-Chem LLC

On 1 October 2016, Clariant acquired from NCH Corporation the activities of X-Chem LLC in a combined asset and share deal for a total consideration of CHF 140 million. The acquired company is based in Irving, Texas, USA and is a provider of specialty oilfield chemicals for the production, completion and stimulation of oil wells, gas wells and pipelines focused on land and offshore United States. This acquisition pertains to the Business Unit Oil & Mining Services.

In 2017, the provisional fair values of the acquired net assets of X-Chem LLC were adjusted within the measurement period following the acquisition. As a result goodwill increased by CHF 8 million to CHF 22 million compared to CHF 14 million at the acquisition date, mainly as a correction of the value of inventories and property, plant and equipment taken over.

26. Restructuring, impairment and transaction-related costs

in CHF m	2018	2017
Restructuring expenses	**–14**	**–37**
Payments for restructuring	–42	–40
Impairment loss	**–**	**–16**
thereof charged to PPE (see note 5)	*–*	*–5*
thereof charged to intangible assets (see note 6)	*–*	*–11*
Transaction-related costs	**–79**	**–127**
Total restructuring, impairment and transaction-related costs	**–93**	**–180**

In order to increase profitability over a sustained period, Clariant implements measures designed to improve the Group's performance. The aim of these efforts is to increase the Group's operating result and to reduce net working capital. The changes made to the processes and structures result in a reduction of headcount across the Group.

Restructuring. In 2018, Clariant recorded expenses for restructuring in the amount of CHF 14 million (2017: CHF 37 million). This concerned restructuring measures mainly in the Unites States, Switzerland, France and in Germany.

Impairment. No impairment losses were recorded in 2018. The one recognized in 2017 relates to site closures in China.

Transaction-related costs comprise expenses incurred in connection with acquisition or disposal projects and also costs incurred in connection with the implementation of internal reorganizational measures.

The total amount of CHF 93 million of Restructuring, impairment and transaction-related costs (2017: CHF 180 million) is reported in the income statement as follows: CHF 11 million in Costs of goods sold (2017: CHF 10 million), CHF 81 million in Selling, general and administrative costs (2017: CHF 158 million), CHF 1 million in Research & Development costs (2017: CHF 8 million) and nil in Income from associates and joint ventures (2017: CHF 4 million expense).

27. Finance income and costs

FINANCE INCOME

in CHF m	**2018**	2017
Interest income	12	12
thereof interest on loans, receivables and deposits	*12*	*12*
Other financial income	7	23
Total finance income	**19**	**35**

FINANCE COSTS

in CHF m	**2018**	2017
Interest expense	–88	–93
thereof effect of discounting of non-current provisions	*–3*	*–5*
thereof net interest component of pension provisions	*–15*	*–17*
Other financial expenses	–12	–7
Total finance costs before currency result	**–100**	**–100**
Currency result, net	—	6
Total finance costs	**–100**	**–94**

Other financial expenses include bank charges and miscellaneous financial expenses.

In 2018 and 2017, no foreign exchange gains pertaining to the ineffective part of hedges on net investments were recognized in the income statement.

Interest expense, other than the effect of discounting non-current provisions and the interest component of pension provisions, pertain to financial debts measured at amortized cost.

Interest costs capitalized on qualifying assets for 2018 were less than CHF 1 million (2017: CHF 4 million).

28. Earnings per share (EPS)

Earnings per share are calculated by dividing the Group net income by the average number of outstanding shares (issued shares less treasury shares).

	2018	2017
Total net income attributable to shareholders of Clariant Ltd undiluted and diluted (CHF m)	**337**	**277**
Weighted average number of shares outstanding		
As per 1 January	328 310 895	323 712 538
Effect of transactions with treasury shares on weighted average number of shares outstanding	1 303 080	4 598 357
Weighted average number of shares outstanding at 31 December	**329 613 975**	**328 310 895**
Adjustment for granted Clariant shares	833 033	1 704 035
Weighted average diluted number of shares outstanding at 31 December	**330 447 008**	**330 014 930**
Basic earnings per share attributable to shareholders of Clariant Ltd (CHF/share)	**1.02**	**0.84**
Diluted earnings per share attributable to shareholders of Clariant Ltd (CHF/share)	**1.02**	**0.84**

The dilution effect is triggered by the effect of Clariant shares granted as part of the share-based payment plan, which have not yet vested. To calculate this dilutive potential it is assumed that they vested on 1 January of the respective period.

The effect of the services still to be rendered during the vesting period were taken into consideration.

Diluted earnings per share are calculated adjusting the weighted average number of ordinary shares outstanding to assume conversion of all dilutive potential ordinary shares.

In 2018, a payout of CHF 0.50 per share was made out of the capital contribution reserves (see note 16).

29. Derivative financial instruments

Risk management (hedging) instruments and off-balance sheet risks. Clariant uses forward foreign exchange rate and option contracts, currency options as well as other financial instruments to hedge the Group's risk exposure to volatility in interest rates, currencies and prices and to manage the return on cash and cash equivalents. Risk exposures from existing assets and liabilities as well as anticipated transactions are managed centrally.

Interest rate management. It is the Group's policy to manage the costs of interest using fixed and variable rate debt and interest-related derivatives.

Foreign exchange management. To manage the exposure to the fluctuations in foreign currency exchange rates, the Group follows a strategy of hedging both balance sheet and revenue risk, partially through the use of forward contracts and currency swaps in various currencies. In order to contain costs, the Group does not hedge the entire exposure.

The following tables show the contract or underlying principal amounts and the respective fair value of derivative financial instruments by type at the year-end.

The contract or underlying principal amounts indicate the volume of business outstanding at the balance sheet date and do not represent the amount at risk.

DERIVATIVE FINANCIAL INSTRUMENTS

in CHF m	Contract or underlying principal amount		Positive fair values		Negative fair values	
	31.12.2018	31.12.2017	**31.12.2018**	31.12.2017	**31.12.2018**	31.12.2017
Interest-rate related instruments						
Interest-rate swaps	163	162	6	5	–	–
Cross-currency swaps	172	–	–	–	-1	–
Currency related instruments						
Forward foreign exchange rate contracts	112	111	1	2	–1	–1
Total derivative financial instruments	**447**	**273**	**7**	**7**	**–2**	**–1**

The fair value of these derivative financial instruments is recorded in Other current assets in the balance sheet in the case of a positive value or in Current financial debts in the case of a negative value and if the instruments expire within the next twelve months.

If the remaining lifetime exceeds twelve months, the value is recorded in Financial assets in case it is positive and in Non-current financial debts in case it is negative.

DERIVATIVE FINANCIAL INSTRUMENTS BY MATURITY

in CHF m	**31.12.2018**	31.12.2017
Breakdown by maturity:		
Up to one month after the balance sheet date	34	27
More than one and up to three months after the balance sheet date	61	75
More than three and up to twelve months after the balance sheet date	16	9
More than one and up to five years after the balance sheet date	336	162
Total derivative financial instruments	**447**	**273**

DERIVATIVE FINANCIAL INSTRUMENTS BY CURRENCY

in CHF m	**31.12.2018**	31.12.2017
USD	266	265
EUR	172	–
JPY	9	8
Total derivative financial instruments	**447**	**273**

FINANCIAL INSTRUMENTS EFFECTIVE FOR HEDGE-ACCOUNTING PURPOSES

in CHF m	**31.12.2018**	31.12.2017
Interest-rate swaps	**6**	**5**
Notional amount (USD)	163	162
Maturity date	05.08.2021	05.08.2021
Hedge ratio	1:1	1:1
Change in fair value of hedging instruments since 1 January	1	–
Change in fair value of hedged item	–1	–
Cross-Currency Swaps	0	–
Notional amount (EUR)	56	–
Maturity date	25.03.2024	–
Hedge ratio	1:1	–
Change in fair value since 1 January	–	–
Change in fair value of hedged item	–	–
Cross-Currency Swaps	**–1**	–
Notional amount (EUR)	116	–
Maturity date	25.09.2025	–
Hedge ratio	1:1	–
Change in fair value since 1 January	–1	–
Change in fair value of hedged item	1	–
Notional amount of hedges of net investments in foreign entities:		
Borrowings denominated in foreign currencies	–1 354	–1 083
EUR amount	–1 082	–813
USD amount	–272	–270
Hedge ratio	1:1	1:1

In 2015, Clariant issued four certificates of indebtedness amounting to EUR 300 million (see note 17). They were designated as a hedge of a net investment in some of Clariant's European subsidiaries. The unrealized foreign exchange rate gain resulting from the translation of these certificates of indebtedness into Swiss francs amounted to CHF 13 million for 2018 (2017: CHF 29 million gain) and is recorded in the cumulative translation difference in shareholders' equity.

In 2016, Clariant issued seven certificates of indebtedness amounting to EUR 395 million and two certificates of indebtedness amounting to USD 277 million (see note 17). These certificates were also designated as a hedge of a net investment in some of Clariant's European and US-American subsidiaries. The unrealized foreign exchange rate result calculated from the translation of these certificates of indebtedness into Swiss francs amounted to a gain of CHF 17 million (2017: CHF 38 million gain) for the EUR positions and to a loss of CHF 2 million (2017: CHF 12 million loss) for the USD positions and is recorded in the cumulative translation difference in shareholders' equity.

In 2018, Clariant issued four certificates of indebtedness amounting to EUR 265 million (see note 17). EUR 112.5 million of these certificates were designated as a hedge of a net investment in some of Clariant's European subsidiaries. The rest of EUR 152.5 million were exchange with cross currency swap into Swiss francs. The unrealized foreign exchange rate result calculated from the translation of the certificates of indebtedness into Swiss francs amounted to a gain of CHF 0.2 million and is recorded in the cumulative translation difference in shareholders' equity.

Clariant is hedging the interest rate risk resulting from the certificates of indebtedness in the amount of USD 277 million issued at a variable interest rate. For this purpose interest rate swaps amounting to USD 166 million have been established in 2016. Their clean price amounted to a positive CHF 6 million for 2018 (2017: positive CHF 5 million). They are accounted for as a cash flow hedge and as a consequence the result was recorded in other comprehensive income.

The hedge effectiveness is assessed at the beginning of the hedging relationship, and by recurring prospective effectiveness tests. Thus it is ensured, that there exists an economic relationship between the underlying transaction and the hedging instrument.

The group enters into interest rate and cross currency swaps that have identical critical terms as the hedged item, such as reference rate, reset dates, payment dates, maturities and notional amount. The group does not hedge 100% of its loans, therefore the hedged item is identified as a proportion of the outstanding loans up to the notional amount of the swaps. As all critical terms matched during the year, the economic relationship was 100% effective.

Hedge ineffectiveness for interest rate/cross currency swaps is assessed using the following principles:
The focus is on the credit value/debit value adjustment on the interest rate/cross currency swaps which is not matched by the loan, and differences in critical terms between the interest rate/cross currency swaps and loans. The Cross-Currency basis spread as per end of December 2018 was CHF 1 173 002. There was no ineffectiveness during 2018 in relation to the interest rate/cross currency swaps. Clariant has chosen the cost of hedging approach for the newly entered cash flow hedging relationship. The cross-currency basis spread is not part of the hedging relationship.

30. Employee participation plans

Under the Group Senior Management – Long-Term Incentive Plan (GSM-LTIP) a certain percentage of the actual bonus is granted to the plan participants in the form of registered shares of Clariant Ltd (investment shares). These shares vest immediately upon grant, but are subject to a three-year blocking period. The plan participants receive an additional share free of cost (matching share) for each investment share held at the end of the blocking period.

These shares were granted for the first time in 2011, based on the performance achieved in the base year 2010. Similar plans were launched in all subsequent years. The number of shares not yet vested and thus disclosed are the matching shares already granted.

For the first time in 2013, the Performance Share Unit (PSU) Plan was introduced for all senior managers to replace the former Tradable Option Plan. The term of Clariant's Performance Share Unit Plan is a three-year vesting period. The vesting is conditional upon achievement of the performance targets at the end of the vesting period. If the performance targets are achieved, each PSU will be converted into one Clariant share.

A new grant took place in September 2018. The review of the target achievements (vesting criteria) for this plan will be held in summer 2021 and vesting is scheduled to take place in September 2021.

The expense recorded in the income statement spreads the costs of each grant over the measurement period and the vesting period. Assumptions are made concerning the forfeiture rate which is adjusted during the vesting period so that at the end of the vesting period there is only a charge for the vested amounts.

In 2018, CHF 3 million were credited to the income statement for equity-settled share-based payments (2017: expense of CHF 9 million). Some accruals in equity for share based payments were reversed, as the key performance indicators were not met.

As of 31 December 2018, the total carrying value of liabilities arising from equity-settled share-based payments, entirely recognized in equity, is CHF 14 million (2017: CHF 25 million).

As per 31 December 2017 and 2018, no further options were outstanding for members of the management and the executive committee.

SHARES FOR MEMBERS OF MANAGEMENT AND THE EXECUTIVE COMMITTEE

Base year	Granted	Vesting in		Share price at grant date	**Number 31.12.2018**	Number 31.12.2017
2014	2015	2018		19.71	–	171 123
2015	2015	2018		19.70	–	5 000
2015	2015	2018		17.39	–	13 813
2015	2015	2018		19.10	–	409 521
2015	2016	2019		16.98	192 237	227 725
2016	2016	2019		16.84	469 603	533 997
2016	2016	2019		16.87	5 000	5 000
2016	2017	2020		18.67	186 293	230 379
2017	2017	2020		22.11	376 974	432 613
2017	2017	2020		18.74	12 831	12 831
2017	2017	2020		19.15	11 799	11 799
2017	2018	2021		22.82	136 409	–
2018	2018	2021		23.58	369 349	–
2018	2018	2021		21.47	3 960	–
2018	2018	2021		24.11	2 074	–
2018	2018	2022		20.38	8 587	–
2018	2018	2020		20.38	8 587	
Total					**1 783 703**	**2 053 801**

	Weighted average exercise price	**Shares 2018**	Weighted average exercise price	Options 2017	Shares 2017
Shares/options outstanding at 1 January	16.50	2 053 801	16.50	660 243	2 173 777
Granted		801 436		—	996 690
Exercised/distributed*		–390 915	18.67	–646 843	–516 649
Cancelled/forfeited		–680 619		–13 400	–600 017
Outstanding at 31 December	**18.09**	**1 783 703**	**16.50**	**—**	**2 053 801**
Exercisable at 31 December					
Fair value of shares/options outstanding in CHF		32 267 178			55 966 064

* Options exercised in 2017 included 355 800 options pertaining to the 2011 and 2012 option plans, which were sold by the plan participants in the market. In the meantime all option plans have expired.

The fair value of shares granted during 2018 is CHF 10 million (2017: CHF 20 million) calculated based on market value of shares at grant date.

No options were granted in 2018 and 2017.

31. Personnel expenses

in CHF m	**2018**	**2017**
Wages and salaries	–1 114	–1 116
Social welfare costs	–295	–264
Shares and options granted to directors and employees	3	–9
Pension costs – defined contribution plans	–26	–26
Pension costs – defined benefit plans	–24	–44
Other post-employment benefits	–1	–1
Total personnel expenses	**–1 457**	**–1 460**

32. Related party transactions

Clariant maintains business relationships with related parties. One group consists of the associates and joint ventures, of which the most important ones are described in note 7. The most important business with these companies is the purchase of services by Clariant (e.g. energy and rental of land and buildings) in Germany, the rendering of services to the Stahl group following the disposal of the Leather Business and the rendering of services to Global Amines.

The second group of related parties is key management comprising the Board of Directors and the Executive Committee. The information required by the ordinance against excessive compensation in stock exchange-listed companies regarding the emoluments for the members of the Board of Directors and the Executive Committee is disclosed in the Compensation Report.

More information on the relationship with the Board of Directors is given in the chapter **Corporate Governance** (non-audited).

The third group of related parties are the pension plans of major subsidiaries. Clariant provides services to its pension plans in Switzerland, the United Kingdom, and the United States. These services comprise mainly administrative and trustee services. The total costs in 2018 of these services is CHF 1 million (2017: CHF 1 million), of which approximately half is charged back to the pension plans. The number of full-time employees corresponding to these is approximately four (2017: approximately four).

The fourth group of related parties are all companies pertaining to the SABIC group, who is a 24.99 % shareholder of Clariant (see note 16). The most important business done with these companies is the sale and purchase of chemical products.

TRANSACTIONS WITH RELATED PARTIES

in CHF m	**2018**	2017
Income from the sale of goods to related parties	88	47
thereof to joint ventures	*1*	*1*
thereof to associates	*37*	*46*
thereof to SABIC companies	*50*	*—*
Income from the rendering of services to related parties	41	40
thereof to associates	*41*	*40*
Expenses from the purchase of goods from related parties	–34	–29
thereof from joint ventures	*—*	*–2*
thereof from associates	*–22*	*–27*
thereof from SABIC companies	*–12*	*—*
Expenses from services rendered by related parties	–220	–210
thereof by associates	*–220*	*–210*
Expense from the purchase of property, plant and equipment from related parties	–6	–5
thereof from associates	*–6*	*–5*
Expense from lease contracts with related parties	–7	–7
thereof with associates	*–7*	*–7*

PAYABLES AND RECEIVABLES WITH RELATED PARTIES

in CHF m	**31.12.2018**	31.12.2017
Receivables from related parties	26	18
thereof from associates	*14*	*18*
thereof from SABIC companies	*12*	*—*
Allowance for amounts overdue from joint ventures	—	–2
Payables to related parties	70	61
thereof to associates	*65*	*61*
thereof to SABIC companies	*5*	*—*
Loans to related parties	12	17
thereof to associates	*12*	*17*
Guarantees to third parties on behalf of related parties[1]	74	74
thereof on behalf of joint ventures	*74*	*74*

[1] The guarantee extended on behalf of a related party concerns a bank loan to a US joint venture.

TRANSACTIONS WITH KEY MANAGEMENT

in CHF m	**2018**	2017
Salaries and other short-term benefits	11	9
Post-employment benefits	3	3
Share-based payments	2	3
Total	**16**	**15**

There are no outstanding loans by the Group to any members of the Board of Directors or Executive Committee.

33. Commitments and contingencies

Leasing commitments. The Group leases land, buildings, machinery and equipment, furniture and vehicles under fixed-term agreements. The leases have varying terms, escalation clauses, and renewal rights.

Commitments arising from fixed-term operating leases mainly concern buildings in Germany and in the United States. The most important partners for operating leases of buildings in Germany are the Infraserv companies. There exist no particular renewal options other than annual prolongations in case there is no explicit termination of the lease contract.

Expected expenses for operating leases breakdown by maturities as follows:

in CHF m	**31.12.2018**	31.12.2017[1]
2018	—	63
2019	61	45
2020	48	30
2021	37	23
2022	33	18
2023	27	—
After 2023 (2017:after 2022)	54	34
Total	**260**	**213**

[1] adjusted

Expenses for operating leases were CHF 90 million in 2018 (2017: CHF 88 million, adjusted).

Guarantees. No guarantees on behalf of third parties were issued in 2018 and 2017.

Purchase commitments. In the regular course of business, Clariant enters into relationships with suppliers whereby the Group commits itself to purchase certain minimum quantities of materials in order to benefit from better pricing conditions. These commitments are not in excess of current market prices and reflect normal business operations.

Clariant is engaged in contracts to buy a minimum quantity of ethylene for the next seven years and in contracts to buy a minimum quantity of propylenoxide in the years 2019 – 2020, and other materials in the following two years. This implies a total purchase commitment of about CHF 1.20 billion (2017: CHF 1.12 billion).

Contingencies. Clariant operates in countries where political, economic, social, legal, and regulatory developments can have an impact on the operational activities. The effects of such risks on the Company's results, which arise during the normal course of business, are not foreseeable and are therefore not included in the accompanying financial statements.

In the aftermath of the procedure to acquire subsequent to the acquisition of Süd-Chemie, the 1.36 % of shares still in possession of third parties (squeeze-out) at the time, several minority shareholders initiated appraisal proceedings to reassess the adequacy of the cash compensation paid to the minority shareholders. Clariant opines that the cash compensation agreed is fair and complies with all legal and economic requirements. The court of first instance has decided on an increase of the cash compensation from EUR 125.26 by EUR 7.04 to EUR 132.30 EUR per share. Clariant and several plaintiffs have contested this court decision. The appraisal proceedings is currently pending in the second instance. At this time it cannot be determined to what extent these proceedings will lead to additional liabilities.

In 2017, the European Commission (Antitrust) initiated an investigation on Clariant and some of its competitors active in the ethylene purchasing sector in some member states. The investigation is ongoing; should antitrust violations be brought up against Clariant by the European Commission, it can impose significant fines that may affect the Group's result and cash flow with an amount that may be material.
Given the ongoing nature of the investigation and the uncertainties associated with them, management has concluded that the amount of such fine cannot be determined as of 31 December 2018 as a reliable estimate is dependent on numerous factors which have not been defined as of the approval day of the financial statements.
This assessment is supported by external advisors.

In the ordinary course of business, Clariant is involved in lawsuits, claims, investigations and proceedings, including product liability, intellectual property, commercial, environmental, and health and safety matters. Although the outcome of any legal proceedings cannot be predicted with certainty, management is of the opinion that, apart from those cases where a provision has already been recognized, there are no such matters pending which would likely have any material adverse effect in relation to its business, financial position, or results of operations.

Environmental risks. Clariant is exposed to environmental liabilities and risks relating to its past operations, principally in respect of remediation costs. Provisions for non-recurring remediation costs are made when there is a legal or constructive obligation and the costs can be reliably estimated. It is difficult to estimate the action required by Clariant in the future to correct the effects on the environment of prior disposal or release of chemical substances by Clariant or other parties, and the associated costs, pursuant to environmental laws and regulations. The material components of the environmental provisions consist of costs to fully clean and refurbish contaminated sites and to treat and contain contamination at sites where the environmental exposure is less severe.

34. Exchange rates of principal currencies

Rates used to translate the consolidated balance sheets (closing rate):

	31.12.2018	31.12.2017
1 USD	0.98	0.98
1 EUR	1.13	1.17
1 BRL	0.25	0.29
1 CNY	0.14	0.15
100 INR	1.41	1.53
100 JPY	0.90	0.87

Sales-weighted average exchange rates used to translate the consolidated income statements and consolidated statements of cash flows:

	2018	2017
1 USD	0.98	0.99
1 EUR	1.15	1.11
1 BRL	0.27	0.31
1 CNY	0.15	0.15
100 INR	1.43	1.52
100 JPY	0.89	0.88

35. Important subsidiaries

Country	Company name	Currency	Share-/paid in capital (in thousands)	Partici-pation in %	Holding/ Finance/ Service	Sales	Production	Research
Argentina	Clariant (Argentina) SA, Lomas de Zamora	ARS	54 605	100.0		■	■	
	Clariant Plastics & Coatings (Argentina), Lomas de Zamora	ARS	1 090	100.0		■	■	
Australia	Clariant (Australia) Pty Ltd, Notting Hill	AUD	1 902	100.0	■	■	■	
	Clariant Plastics & Coatings Australia Pty Ltd, Notting Hill	AUD	2 500	100.0	■	■		
Austria	Clariant Plastics & Coatings (Österreich) GmbH, Vienna	EUR	1 000	100.0		■		
Belgium	Clariant Plastics & Coatings Belgium SA, Louvain-La-Neuve	EUR	1 000	100.0		■	■	
Brazil	Clariant S.A., São Paulo	BRL	184 863	100.0	■	■	■	
	Clariant Administração de Bens Ltda., São Paulo	BRL	7 696	100.0	■	■	■	
	Companhia Brasileira de Bentonita Ltda, São Paulo	BRL	17 470	100.0		■	■	
	Consórcio CCPN, Rio de Janeiro	BRL	26 113	100.0		■	■	
	Clariant Plastics & Coatings Brasil Indústria Química Ltda., São Paulo	BRL	100 850	100.0		■	■	■
British Virgin Islands	Clariant Clearwater Technologies Ltd, Tortola	USD	6	100.0	■			
Canada	Clariant (Canada) Inc., Toronto	CAD	10 415	100.0		■	■	
	Clariant Plastics & Coatings Canada Inc., Toronto	CAD	1	100.0		■	■	
Chile	Clariant (Chile) Ltda., Maipú-Santiago de Chile	CLP	15	100.0		■	■	
	Clariant Plastics & Coatings (Chile) Ltda. Maipú-Santiago de Chile	CLP	3 842	100.0		■	■	
China	Clariant (China) Ltd., Hong Kong	HKD	93 250	100.0	■			
	Clariant Bohai Pigments Preparations (Tianjin) Ltd., Tianjin	CNY	49 176	90.0		■	■	■
	Clariant Chemicals (China) Ltd., Shanghai	CNY	210 014	100.0		■	■	■
	Clariant Chemicals (Guangzhou) Ltd., Guangzhou	CNY	70 345	100.0		■	■	
	Clariant Chemicals (Huizhou) Ltd., Daya Bay, Huizhou	CNY	183 039	100.0		■	■	
	Clariant China Holding Limited, Hong Kong	HKD	67 251	100.0	■			
	Clariant Huajin Catalysts (Panjin) Ltd., Panjin City	CNY	69 511	60.0		■	■	
	Clariant Masterbatches (Beijing) Ltd., Beijing	CNY	55 059	100.0			■	
	Clariant Masterbatches (Shanghai) Ltd., Shanghai	CNY	26 087	100.0		■	■	
	Clariant Redhill Bentonite (Liaoning) Ltd., Jianping	CNY	28 525	100.0		■	■	
	Clariant Specialty Chemicals (Zhenjiang) Co., Ltd., Zhenjiang	CNY	149 503	100.0		■	■	
	Clariant Bentonite (Jiangsu) Co., Ltd., Zhenjiang	CNY	79 058	100.0		■	■	
	Jiangsu Süd-Chemie Performance Packaging Material Co., Ltd., Changshu	CNY	44 266	100.0		■	■	
	Clariant Coatings (Shanghai) Ltd., Shanghai	CNY	104 260	100.0		■	■	
	Clariant Chemicals Technology (Shanghai) Ltd., Shanghai	CNY	13 810	100.0	■			
Colombia	Clariant Colombia S.A., Cota (Cundinamarca)	COP	2 265	100.0		■	■	
	Clariant Plastics & Coatings (Colombia), S.A.S., Cota (Cundinamarca)	COP	21 506	100.0		■	■	
Finland	Clariant Masterbatches (Finland) Oy, Vantaa	EUR	169	100.0		■		
France	Clariant Plastics & Coatings (France), Choisy-le-Roi	EUR	1 561	100.0		■	■	
	Clariant Production (France), Choisy-le-Roi	EUR	6 273	100.0	■	■	■	■
	Clariant Services (France), Choisy-le-Roi	EUR	21 200	100.0	■			
	CRM International S.A.S., Puget-sur-Argens	EUR	650	100.0		■		
	Clariant Healthcare Packaging, Choisy-le-Roi	EUR	5 570	100.0		■	■	■
Germany	Navigance GmbH, Frankfurt a.M.	EUR	102	100.0		■	■	■
	Clariant Plastics & Coatings (Deutschland) GmbH, Frankfurt a.M.	EUR	149	100.0	■	■	■	■
	Clariant Produkte (Deutschland) GmbH, Frankfurt a.M.	EUR	9 348	100.0	■	■	■	■
	Clariant SE, Frankfurt a.M.	EUR	916	100.0	■	■	■	
	Clariant Verwaltungsgesellschaft mbH, Frankfurt a.M.	EUR	2 560	100.0	■			
	Süd-Chemie IP GmbH & Co. KG, Munich	EUR	803	100.0	■			
Great Britain	Clariant Distribution UK Limited, Yeadon, Leeds	GBP	500	100.0	■			
	Clariant Plastics & Coatings (UK) Ltd, Yeadon, Leeds	GBP	500	100.0		■		

Country	Company name	Currency	Share-/paid in capital (in thousands)	Partici-pation[1] in %	Holding/ Finance/ Service	Sales	Production	Research
	Clariant Oil Services UK Ltd, Yeadon, Leeds	GBP	400	100.0		■	■	■
	Clariant Production UK Ltd, Yeadon, Leeds	GBP	500	100.0	■	■	■	
	Clariant Services UK Ltd, Yeadon, Leeds	GBP	500	100.0	■			
Greece	Süd-Chemie Hellas Monoprosopi EPE, Adamas, Milos	EUR	548	100.0		■	■	
Guatemala	Clariant (Guatemala) S.A., Guatemala City	GTQ	14 000	100.0		■	■	
	Clariant Specialties (Guatemala), S.A., Guatemala City	GTQ	100	100.0		■		
India	Clariant Chemicals (India) Ltd, Thane	INR	230 818	51.0		■	■	
	Clariant India Private Limited, New Delhi	INR	1 700	100.0	■	■	■	
	Süd-Chemie India Pvt. Ltd, Binanipuram	INR	9 623	50.0		■		■
	Clariant Medical Specialties India Limited, Mumbai	INR	282 697	100.0		■	■	
Indonesia	PT. Clariant Indonesia, Tangerang	IDR	267 577	100.0	■	■	■	
	PT. Clariant Kujang Süd-Chemie Catalysts, Cikampek	USD	3 447	53.9		■	■	
	PT. Clariant Plastics & Coatings Indonesia, Cibodas	USD	96 220	100.0		■	■	
	PT. Clariant Plastics & Coatings, Cibodas	USD	10 282	100.0		■		
	PT. Clariant Specialties Indonesia, Tangerang	IDR	4 803	100.0		■		
	PT. Clariant Adsorbents Indonesia, Cileungsi, Bogor	IDR	12 375	100.0		■	■	
Ireland	Clariant Plastics & Coatings (Ireland) Limited, Naas	EUR	411	100.0		■	■	
Italy	Clariant (Italia) S.p.A., Milano	EUR	36 000	100.0	■			
	Clariant Plastics & Coatings (Italia) S.p.A., Milano	EUR	3 000	100.0		■	■	■
	Clariant Prodotti (Italia) S.p.A., Milano	EUR	1 000	100.0		■	■	■
	Società Sarda di Bentonite S.r.l., Santa Giusta	EUR	2 050	100.0		■	■	
	SQE Olivene S.r.l., Milano	EUR	10	100.0		■		
Japan	Clariant (Japan) K.K., Tokyo	JPY	450	100.0		■	■	■
	Clariant Catalysts (Japan) K.K., Tokyo	JPY	544	61.5	■	■	■	■
	Clariant Plastics & Coatings (Japan) K.K., Tokyo	JPY	250	100.0		■	■	■
Korea	Clariant Plastics & Coatings (Korea) Ltd., Pohang, Gyeongbuk	KRW	707	100.0		■	■	
	Clariant (Korea) Ltd., Pohang, Gyeongbuk	KRW	6 361	100.0		■	■	
Luxemburg	Clariant Finance (Luxembourg) S.A., Luxemburg	EUR	82 030	100.0	■			
Malaysia	Clariant (Malaysia) Sdn Bhd, Kuala Lumpur	MYR	12 347	100.0		■		
	Clariant Masterbatches (Malaysia) Sdn Bhd, Petaling Jaya	MYR	2 000	60.0		■	■	
	Clariant Oil Services (Malaysia) Sdn Bhd, Selangor	MYR	137	48.9		■		
	Clariant Specialty Chemical (M) Sdn Bhd, Shah Alam	MYR	3 300	100.0	■	■		
Mexico	Clariant (Mexico) S.A. de C.V., Ecatepec de Morelos	MXN	22 189	100.0	■	■	■	■
	Clariant Productos Químicos, S.A. de C.V., Ecatepec de Morelos	MXN	2 475	100.0	■			
	Clariant Plastics & Coatings México, S.A. de C.V., Ecatepec de Morelos	MXN	916	100.0	■	■	■	■
	Clariant Servicios Integrales México, S.A. de C.V., Ecatepec de Morelos	MXN	3	100.0	■			
Morocco	Clariant (Maroc) S.A., Casablanca	MAD	107 669	100.0		■		
Netherlands	Clariant Participations (The Netherlands) B.V., Maastricht	EUR	20	100.0		■		
New Zealand	Clariant (New Zealand) Limited, Auckland	NZD	1 000	100.0		■	■	
Norway	Clariant Oil Services Scandinavia AS, Bergen	NOK	4 725	100.0		■		
Pakistan	Clariant Chemical Pakistan (Pvt) Ltd, Karachi-Korangi	PKR	1 130 226	100.0		■	■	
Peru	Clariant (Perú) S.A., Lima	PEN	20 454	100.0	■	■	■	
	Clariant Plastics & Coatings (Perú) S.A.C., Lima	PEN	2 010	100.0		■		
Poland	Clariant Plastics & Coatings (Polska) Spolka z o.o., Konstantynów Łódzki	PLN	29 000	100.0		■	■	
	Clariant Poland Spolka z.o.o., Konstantynów Łódzki	PLN	3 000	100.0		■		
	Clariant Services (Poland) SP. z o.o., Łódź	PLN	10 000	100.0	■			
Qatar	Clariant Qatar W.L.L., Mesaieed	QAR	60 000	65.0		■	■	
Romania	Clariant Products Ro Srl, Bucarest	RON	105 261	100.0	■	■		
Russia	Clariant (RUS) LLC, Moscow	RUB	16 200	100.0		■		
Saudi Arabia	Clariant Masterbatches (Saudi Arabia) Ltd, Riyadh	SAR	50 000	53.0		■	■	
Singapore	Clariant (Singapore) Pte. Ltd., Singapore	SGD	3 500	100.0	■	■	■	■

Country	Company name	Currency	Share-/paid in capital (in thousands)	Partici-pation[1] in %	Holding/ Finance/ Service	Sales	Production	Research
	Clariant South East Asia Pte. Ltd., Singapore	SGD	1 560	100.0	■	■		
South Africa	Clariant Sasol Catalysts Ltd., Chloorkop, Gauteng	ZAR	1 417	80.0		■		
	Clariant Southern Africa (Pty) Ltd. Chloorkop, Gauteng	ZAR	6	100.0	■	■	■	
	Clariant Plastics & Coatings Southern Africa (Pty) Ltd., Chloorkop, Gauteng	ZAR	70 000	100.0		■	■	
Spain	Clariant Ibérica Producción S.A., El Prat de Llobregat	EUR	6 023	100.0	■	■	■	■
	Clariant Ibérica Servicios S.L., El Prat de Llobregat	EUR	358	100.0	■			
	Clariant Masterbatch Ibérica S.A., Sant Andreu de la Barca	EUR	2 525	100.0		■	■	■
Sweden	Clariant Plastics & Coatings Nordic AB, Malmö	SEK	3 200	100.0		■	■	
	Clariant Production Sweden AB, Mölndal	SEK	500	100.0		■		
Switzerland	Clariant Consulting AG, Muttenz	CHF	200	100.0	■			
	Clariant Chemical Consulting AG, Muttenz	CHF	100	100.0	■			
	Clariant International AG, Muttenz	EUR	92 181	100.0	■	■	■	
	Clariant Oil Services AG, Muttenz	CHF	300	100.0	■			
	Clariant Reinsurance AG, Muttenz	CHF	3 000	100.0	■			
	EBITO Chemiebeteiligungen AG, Muttenz	CHF	202	100.0	■			
	Clariant Produkte (Schweiz) AG, Muttenz	CHF	5 000	100.0	■	■	■	
	Clariant Additives AG, Muttenz	CHF	5 000	100.0		■	■	
	Clariant Plastics & Coatings AG, Muttenz	EUR	18 961	100.0	■	■	■	
Taiwan	Clariant Chemicals (Taiwan) Co., Ltd., Taipei	TWD	23 888	100.0		■		
	Clariant Specialty Chemicals (Taiwan) Co., Ltd., Taipei	TWD	36 000	100.0		■		
Thailand	Clariant (Thailand) Ltd., Bangkok	THB	250 000	100.0		■		
	Clariant Masterbatches (Thailand) Ltd., Chonburi	THB	325 000	100.0		■	■	■
Turkey	Clariant (Türkiye) A.S., Gebze	TRY	17 538	100.0		■	■	
	Clariant (Türkiye) Boya Ve Kimyevi Sanayi Ve Ticaret A.S., Gebze	TRY	8 562	100.0		■	■	
UAE	Clariant (Gulf) FZE, Jebel Ali, Dubai	AED	1 000	100.0		■		
	Clariant Plastics & Coatings (UAE) FZE, Jebel Ali, Dubai	AED	45 000	100.0	■	■		
Ukraine	Clariant Ukraine LLC, Severodonetsk	UAH	28 688	100.0		■	■	
USA	Clariant Corporation, Charlotte, NC	USD	749 500	100.0	■	■	■	■
	Clariant Plastics & Coating USA Inc., Charlotte, NC	USD	50	100.0		■	■	■
	Kel-Tech, Inc., Midland	USD	273 192	100.0		■	■	
Venezuela	Clariant Venezuela, S.A., Maracay	VES	1	100.0		■	■	
	Clariant Plastics & Coatings Venezuela, S.A., Maracay	VES	1	100.0		■	■	

[1] The participation in % reflects the capital and voting rights in %.

36. Events subsequent to the balance sheet date

There were no major events subsequent to the balance sheet date.

Report of the statutory auditor

to the General Meeting of Clariant Ltd

Muttenz

Report on the audit of the consolidated financial statements

Opinion

We have audited the consolidated financial statements of Clariant Ltd and its subsidiaries (the Group), which comprise the consolidated balance sheet as at 31 December 2018 and the consolidated income statement, consolidated statement of comprehensive income, consolidated statement of changes in equity and consolidated statement of cash flows for the year then ended, and notes to the consolidated financial statements, including a summary of significant accounting policies.

In our opinion, the consolidated financial statements (pages 1 to 64) give a true and fair view of the consolidated financial position of the Group as at 31 December 2018 and its consolidated financial performance and its consolidated cash flows for the year then ended in accordance with the International Financial Reporting Standards (IFRS) and comply with Swiss law.

Basis for opinion

We conducted our audit in accordance with Swiss law, International Standards on Auditing (ISAs) and Swiss Auditing Standards. Our responsibilities under those provisions and standards are further described in the "Auditor's responsibilities for the audit of the consolidated financial statements" section of our report.

We are independent of the Group in accordance with the provisions of Swiss law and the requirements of the Swiss audit profession, as well as the IESBA Code of Ethics for Professional Accountants, and we have fulfilled our other ethical responsibilities in accordance with these requirements. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinion.

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Our audit approach

Overview

Overall Group materiality: CHF 30 million

We concluded full scope audit work at 18 reporting units in nine countries. Our audit scope addressed over 67% of the Group's revenue. In addition, specified procedures were performed on a further two reporting units in two countries representing a further 1% of the Group's revenue.

We performed analytical procedures on the remaining components.

As key audit matters the following areas of focus have been identified:

- Management's assumptions and estimates used in the impairment test for goodwill
- Cut-off for revenue recognition
- Investigation by the European Commission in the ethylene purchasing market

Materiality

The scope of our audit was influenced by our application of materiality. Our audit opinion aims to provide reasonable assurance that the consolidated financial statements are free from material misstatement. Misstatements may arise due to fraud or error. They are considered material if, individually or in aggregate, they could reasonably be expected to influence the economic decisions of users taken on the basis of the consolidated financial statements.

Based on our professional judgement, we determined certain quantitative thresholds for materiality, including the overall Group materiality for the consolidated financial statements as a whole as set out in the table below. These, together with qualitative considerations, helped us to determine the scope of our audit and the nature, timing and extent of our audit procedures and to evaluate the effect of misstatements, both individually and in aggregate, on the consolidated financial statements as a whole.

Overall Group materiality	CHF 30 million
How we determined it	2.5% of the Group's EBITDA weighted at 75%, and 1% of the Group's total assets weighted at 25%
Rationale for the materiality benchmark applied	We chose EBITDA as the benchmark because management assesses its profitability mainly based on this measure of profit and we took the Group's assets into consideration since the chemical industry is highly capital intensive, operating at a lower net profit margin compared with other industries.

We agreed with the Audit Committee that we would report to them misstatements above CHF 1.5 million identified during our audit as well as any misstatements below that amount which, in our view, warranted reporting for qualitative reasons.

Audit scope

We tailored the scope of our audit in order to perform sufficient work to enable us to provide an opinion on the consolidated 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.

From 142 reporting units, we identified 18 reporting units (components) to be the largest contributors to the Group's financial statements (amounting to 67% of the Group's revenue, addressing all geographical areas of the Group's business). These reporting units were subject to a full scope audit by local PwC network firms. In addition to in-person meetings, we held regular calls during all audit phases to discuss material audit topics with the component auditors of the most significant reporting units. Further audit procedures were performed by the central Group audit team on certain Group functions (including taxation, treasury, ongoing investigations and litigation, and information technology) and the Group consolidation. Of the Group's revenue, 1% was addressed through specified audit procedures. In addition, two PwC network firms performed specific audit procedures related to sales and procurement and to the financial closing cycle at the Group's shared service centres on behalf of PwC Switzerland, and assisted other PwC network firms.

Key audit matters

Key audit matters are those matters that, in our professional judgement, were of most significance in our audit of the consolidated financial statements of the current period. These matters were addressed in the context of our audit of the consolidated financial statements as a whole, and in forming our opinion thereon, and we do not provide a separate opinion on these matters.

Management's assumptions and estimates used in the impairment test for goodwill

Key audit matter	*How our audit addressed the key audit matter*
We consider the valuation of goodwill to be a key audit matter because of the significant scope for judgement with respect to assumptions concerning the future results of the businesses and the discount rates applied to future cash flow forecasts. Specifically, we focused on goodwill relating to the Catalysts business unit, which amounts to CHF 694 million, as the risk of impairment is higher for this unit compared with other business units. Please refer to page 19 (Critical accounting estimates and judgments, 4.1 Estimated impairment of goodwill, intangibles, and property, plant and equipment), and page 24 (Goodwill allocation) in the notes.	We evaluated and challenged management's assumptions as described on page 19 (Critical accounting estimates and judgments, 4.1 Estimated impairment of goodwill and property, plant and equipment) in the notes to the consolidated financial statements. Management followed a clearly documented process for forecasting future cash flows, which was subject to timely oversight and challenges by the Board of Directors and which was consistent with the business plans as approved by the Board of Directors. We compared the actual results of the year under review with the figures used to make the forecasts in the prior year in order to assess with hindsight whether any of the assumptions underlying the forecasts might have been too optimistic. In some cases, actual performance was found to be lower than forecast. Management analysed the underlying drivers and considered actual revenue growth rates and operating margins against those in the business plans prepared in the year under review and included them in the new business plans. We discussed with the business unit leaders management's assumptions regarding revenue, long-

	term growth rates and profit margins. We involved PwC's own valuation specialists to assess the model and the weighted average cost of capital (WACC) used. The WACC was assessed using comparable industry peers and data available from external sources. In addition, we assessed for reasonableness the expectations of movements in working capital and of investments in property, plant and equipment. We found the assumptions to be balanced and reasonable. We re-performed thorough sensitivity analyses on the key assumptions to ascertain the extent of change in those assumptions that either individually or collectively would be required for the goodwill to be impaired. We discussed the results of our audit work as well as the headroom of the sensitivity analyses with management, the Audit Committee and the Board of Directors. On the basis of the procedures performed and the evidence obtained, we identified no significant issues with respect to the assumptions used in the impairment test for goodwill.

Cut-off for revenue recognition

Key audit matter	*How our audit addressed the key audit matter*
There is a risk that revenue is not recognised in accordance with the requirements of IFRS, mainly with regard to the timing of revenue recognition, which depends on the transfer of control of the goods. Invoices are usually raised by the systems when the goods are shipped, which may not be in line with the detailed contractual terms for the transfer of control. Management has a standardised process in place to identify sales transactions where control is transferred after the balance sheet date. This process allowed management to recognise revenue in the appropriate period. We consider this to be a key audit matter due to the number of large transactions that occur close to year-end and the potential impact of the cut-off date of these transactions on the consolidated financial statements.	We tested management's approach for recognising revenue in the appropriate period. We tested revenue transactions and the timing of these transactions by examining third party documents and the contractual delivery terms. We tested the system and the related inputs that support management's approach to ensuring that revenue transactions are recorded in the appropriate period. On the basis of the procedures performed and the evidence obtained, we identified no significant issues with respect to revenue cut-off.

Investigation by the European Commission in the ethylene purchasing market

Key audit matter	*How our audit addressed the key audit matter*
Since July 2017, Clariant has been part of an ongoing investigation by the European Commission into alleged infringements of competition law in the ethylene purchasing market. Clariant is cooperating fully with the authorities. The eventual outcome of the investigation is uncertain both in terms of the further course of the proceedings and the magnitude of fines, if any, which might be imposed. The investigation is ongoing and it has not been possible for the Group to make a reliable estimate of the amount of any liability that could arise from these proceedings; therefore, no provision has been recorded by management. Accordingly, unexpected adverse outcomes could significantly impact the Group's reported profit, cash flow and balance sheet position. Please refer to page 19 (Critical accounting estimates and judgments, 4.5 Contingencies), and pages 60 to 61 (Commitments and contingencies) in the notes.	We discussed the status of the ongoing investigation with in-house and external legal counsel and evaluated the relevant correspondence and minutes of the Board of Directors' and management meetings. We obtained independent letters and procedural documents from external legal counsel to confirm our understanding of the status and their assessment of the investigation. We also used internal PwC legal specialists to assist us in evaluating the status of the investigation and the appropriateness of the assumptions taken and in assessing the position taken by management and the Board of Directors. We discussed this assessment with management, the Audit Committee and the Board of Directors and we obtained written representations from the company in relation to the case. As set out in the notes to the consolidated financial statements, the outcome of the pending investigation is dependent on the outcome of future developments and therefore the exposure of Clariant Ltd, as assessed by management and the Board of Directors, is subject to inherent uncertainty. On the basis of the procedures performed and the information obtained, we are satisfied that the approach taken by management and the Board of Directors was appropriate.

Other information in the integrated report

The Board of Directors is responsible for the other information in the integrated report. The other information comprises all information included in the integrated report, but does not include the consolidated financial statements, the stand-alone financial statements and the remuneration report of Clariant Ltd and our auditor's reports thereon.

Our opinion on the consolidated financial statements does not cover the other information in the integrated report and we do not express any form of assurance conclusion thereon.

In connection with our audit of the consolidated financial statements, our responsibility is to read the other information in the integrated report and, in doing so, consider whether the other information is materially inconsistent with the consolidated financial statements or our knowledge obtained in the audit, or otherwise appears to be materially misstated. 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 in this regard.

Responsibilities of the Board of Directors for the consolidated financial statements

The Board of Directors is responsible for the preparation of the consolidated financial statements that give a true and fair view in accordance with IFRS and the provisions of Swiss law, and for such internal control as the Board of Directors determines is necessary to enable the preparation of consolidated financial statements that are free from material misstatement, whether due to fraud or error.

In preparing the consolidated financial statements, the Board of Directors is responsible for assessing the Group'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 Board of Directors either intends to liquidate the Group or to cease operations, or has no realistic alternative but to do so.

Auditor's responsibilities for the audit of the consolidated financial statements

Our objectives are to obtain reasonable assurance about whether the consolidated financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditor's report that includes our opinion. Reasonable assurance is a high level of assurance, but is not a guarantee that an audit conducted in accordance with Swiss law, ISAs and Swiss Auditing Standards 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 consolidated financial statements.

A further description of our responsibilities for the audit of the consolidated financial statements is located at the website of EXPERTsuisse: http://expertsuisse.ch/en/audit-report-for-public-companies. This description forms part of our auditor's report.

Report on other legal and regulatory requirements

In accordance with article 728a paragraph 1 item 3 CO and Swiss Auditing Standard 890, we confirm that an internal control system exists which has been designed for the preparation of consolidated financial statements according to the instructions of the Board of Directors.

We recommend that the consolidated financial statements submitted to you be approved.

PricewaterhouseCoopers AG

Rolf Johner	Michael Scheibli
Audit expert Auditor in charge	Audit expert

Basel, 11 February 2019

Review of trends

FIVE-YEAR GROUP OVERVIEW 2014–2018

		2018	2017	2016	2015	2014
Segment sales	CHF m	**6 682**	**6 429**	**5 883**	**5 827**	**6 142**
Change relative to preceding year						
in Swiss francs	%	4	9	1	–5	1
in local currency	%	5	9	2	3	5
Group sales[1]	CHF m	**6 623**	**6 377**	**5 847**	**5 807**	**6 116**
Change relative to preceding year						
in Swiss francs	%	4	9	1	–5	1
in local currency	%	5	9	2	3	5
Operating income before exceptionals	CHF m	**693**	**673**	**622**	**596**	**585**
Change relative to preceding year	%	3	8	4	2	2
as a % of sales		10.5	10.6	10.6	10.3	9.6
Operating income	CHF m	**546**	**496**	**512**	**496**	**525**
Change relative to preceding year	%	10	–3	3	–6	12
as a % of sales		8.2	7.8	8.8	8.5	8.6
EBITDA	CHF m	**871**	**813**	**785**	**767**	**923**
Change relative to preceding year	%	7	4	2	–17	16
as a % of sales		13.2	12.7	13.4	13.2	15.1
Adjusted EBITDA	CHF m	**1 018**	**974**	**887**	**853**	**867**
Change relative to preceding year	%	5	10	4	–2	1
as a % of sales		15.4	15.3	15.2	14.7	14.2
Net income	CHF m	**356**	**302**	**263**	**239**	**217**
Change relative to preceding year	%	18	15	10	10	—
as a % of sales		5.4	4.7	4.5	4.1	3.5
Investment in property, plant and equipment	CHF m	**237**	**248**	**297**	**374**	**310**
Change relative to preceding year	%	–4	–16	–21	21	6
as a % of sales		4	4	5	6	5
Personnel costs	CHF m	**1 457**	**1 460**	**1 383**	**1 345**	**1 435**
Change relative to preceding year	%	*0*	6	3	–6	2
as a % of sales		22	23	24	23	23
Employees at year-end	number	17 901	18 135	17 442	17 213	17 003
Change relative to preceding year	%	–1	4	1	1	–6

[1] Including trading.

Financial statements of Clariant Ltd, Muttenz

FINANCIAL STATEMENTS OF CLARIANT LTD, MUTTENZ

Clariant Ltd balance sheets at 31 December 2018 and 2017	Notes	**31.12.2018** in CHF	in %	31.12.2017 in CHF	in %
Assets					
Current assets					
Cash and cash equivalents	3	430 800 195		336 563 078	
Short-term deposits	3	14 760 000		–	
Other short-term receivables	4	94 393 774		42 517 548	
Accrued income and prepaid expenses		4 133 901		2 108 929	
Total current assets		**544 087 870**	**9.4**	**381 189 555**	**6.8**
Non-current assets					
Loans to Group companies		3 317 144 872		3 393 215 108	
Other financial assets		783 840		763 089	
Shareholdings in Group companies	5	1 918 488 220		1 813 746 020	
Intangible assets		11 925 337		14 822 458	
Total non-current assets		**5 248 342 269**	**90.6**	**5 222 546 675**	**93.2**
Total assets		**5 792 430 139**	**100.0**	**5 603 736 230**	**100.0**
Liabilities and Equity					
Liabilities					
Current liabilities					
Other current non-interest bearing liabilities	6	157 549 349		74 254 368	
Other current interest bearing liabilities	7	358 706 814		251 960 656	
Current provision		105 766 882		106 293 620	
Accrued expenses		5 240 846		4 580 963	
Total current liabilities		**627 263 891**	**10.8**	**437 089 607**	**7.8**
Non-current liabilities					
Non-current interest bearing liabilities to third parties	12	1 689 219 203		1 713 692 662	
Non-current interest bearing liabilities to Group companies	12	588		319 112	
Total non-current interest bearing liabilities	**12**	**1 689 219 791**	**29.2**	**1 714 011 774**	**30.6**
Total liabilities		**2 316 483 682**		**2 151 101 381**	
Equity					
Share capital	**8,11**	**1 228 175 036**		**1 228 175 036**	
Reserves from capital contribution[1]	9,11	2 275 558 464		2 440 230 643	
Reserves from retained earnings[2]	9,11	–1 264 297 991		–1 264 297 991	
Total statutory capital reserves	**11**	**1 011 260 473**		**1 175 932 652**	
Voluntary retained earnings	11	1 096 660 186		924 527 225	
Total reserves	**9,11**	**2 107 920 659**		**2 100 459 877**	
Profit for the financial year		180 640 353		172 132 961	
Treasury shares	**10,11**	**–40 789 591**		**–48 133 025**	
Total equity		**3 475 946 457**	**60.0**	**3 452 634 849**	**61.6**
Total equity and liabilities		**5 792 430 139**	**100.0**	**5 603 736 230**	**100.0**

[1] In 2012, the Swiss Federal Tax Administration confirmed qualifying capital contribution reserves of approximately CHF 1.7 billion (as per 31 December 2018 due to distributions still amounting of approximately CHF 1.1 billion). For further information see also note 9 to the financial statements of Clariant Ltd.

[2] This amount corresponds to capital contribution reserves formerly offset with losses. For further information see also note 9 of the financial statements of Clariant Ltd.

CLARIANT LTD INCOME STATEMENTS

for the years 2018 and 2017

	Notes	**2018** in CHF	2017[1] in CHF
Income			
Income from shareholdings in Group companies		255 470 345	126 203 482
Income from interest on loans to Group companies		70 189 485	66 079 573
Other financial income		9 307 141	31 753 971
Reversal of devaluations on shareholdings and other income related to Group Companies	5	170 399 000	108 600 000
Other income		15 057 211	12 767 386
Total income		**520 423 182**	**345 404 412**
Expenses			
Financial expenses		50 479 234	50 276 996
Administrative expenses		59 804 521	56 485 096
Devaluations of shareholdings and other expenses related to Group companies	5	224 935 908	101 600 000
Exchange rate differences net		471 720	-39 703 891
Other expenses		3 078 337	3 305 026
Taxes		1 013 109	1 308 224
Total expenses		**339 782 829**	**173 271 451**
Profit for the financial year		**180 640 353**	**172 132 961**

[1] adjusted (see note 2)

Notes to the financial statements of Clariant Ltd

1. Accounting policies

Introduction. The statutory financial statements of Clariant Ltd comply with the regulations on financial accounting of the Swiss Code of Obligations.

Revenue recognition. Interest income is recognized on a time proportion basis, taking into account the principal outstanding and the effective rate over the period to maturity, when it is determined that such income will accrue to the company. Dividends are recognized when the right to receive payment is established.

Exchange rate differences. Balance sheet items denominated in foreign currencies are converted at year-end exchange rates. Realized exchange gains and losses as well as unrealized exchange losses are recorded in the income statement.

Intangible assets. Patents are capitalized at cost and amortized on a straight-line basis to the income statement over their estimated useful lives with a maximum of 20 years. Capital increase costs are directly charged to the income statement.

The Board of Directors approved the stand-alone financial statements of Clariant Ltd for issue on 11 February 2019. It will be subject to approval by the Annual General Meeting of Shareholders scheduled for 1 April 2019.

2. Basis of preparation

The statutory financial statements of Clariant Ltd have been prepared according to the provisions of the Swiss Law on Accounting and Financial Reporting (32nd title of the Swiss Code of Obligations).

The result of exchange rate gains and losses are presented net in the line «exchange rate differences net». Exchange rate losses were previously reported under financial expenses. The prior year amounts were adjusted accordingly.

Clariant Ltd has no employees, except the members of the Board of Directors of the Clariant Group.

3. Cash and cash equivalents and short-term deposits

Cash and cash equivalents amounts to CHF 430 800 195 at the end of 2018 compared with CHF 336 563 078 at the end of 2017 and comprise cash in hand denominated mainly in euro and in Swiss francs and to a lesser extent in other currencies.
Short-term deposits amount to CHF 14 760 000 at the end of 2018 compared to nil at the end of 2017 and include short-term deposits with an original maturity between 90 and 365 days.

4. Other short-term receivables

Other short-term receivables amount to CHF 94 393 774 at the end of 2018 compared to CHF 42 517 548 at the end of 2017. They comprise third-party receivables of CHF 294 570 (compared to CHF 390 432 at the end of 2017) and intragroup receivables for CHF 94 099 204 (compared with CHF 42 127 116 at the end of 2017).

5. Shareholdings in Group companies

Shareholdings in Group companies are reviewed on a yearly basis to assess their cash generating capabilities by applying either a mixed calculation method based on the equity value and the net result or, alternatively, the discounted cash flow model. In that review, the investments are classified and grouped in terms of sales and Business Areas.

The following shareholdings in Group companies were valued using the discounted cash flow method: Clariant S.A. (Brazil) and Clariant Finance (Luxembourg) S.A.

At the end of 2018, shareholdings in Group companies amount to CHF 1 918 488 220 compared to CHF 1 813 746 020 at the end of 2017. After this review, the following was recorded in the income statement: A reversal of devaluation of CHF 170 399 000 (2017: CHF 108 600 000) in »Reversal of devaluations on shareholdings and other income related to Group Companies« and a devaluation of CHF 224 935 908 (2017: CHF 101 600 000) in »Devaluations of shareholdings and other expenses related to Group Companies«.

On 14 December 2018 Clariant Ltd received as a distribution in kind from capital contribution reserves from its' subsidiary Clariant Plastics & Coatings Ltd the 100% participation in Clariant Plastics & Coatings USA Inc. in the amount of CHF 156 883 039. The shareholdings were subsequently invested in Clariant Corporation as a capital contribution in kind.

In the year 2018, CHF 82 million of hidden reserves were reversed (2017: CHF 58 million).

The table below shows the shareholdings directly held by Clariant Ltd.

Country	Company name		Capital interest (%) 2018	Voting rights (%) 2018	Capital interest (%) 2017	Voting rights (%) 2017
Brazil	Clariant S.A.	São Paulo	46.32%	46.32%	46.32%	46.32%
Canada	Clariant (Canada) Inc.	Toronto	100.00%	100.00%	100.00%	100.00%
China	Clariant (China) Ltd.	Hong Kong	100.00%	100.00%	100.00%	100.00%
Colombia	Clariant (Colombia) S.A.	Cota (Cundinamarca)	5.13%	5.13%	5.13%	5.13%
Ecuador	Clariant (Ecuador) S.A.	Quito	0.03%	0.03%	0.03%	0.03%
France	Clariant Services (France)	Choisy-le-Roi	43.00%	43.00%	43.00%	43.00%
Germany	Clariant Verwaltungsgesellschaft mbH	Frankfurt a.M.	100.00%	100.00%	100.00%	100.00%
Great Britain	Clariant Services UK Ltd	Yeadon, Leeds	100.00%	100.00%	100.00%	100.00%
Guatemala	Clariant Specialties (Guatemala) S.A.	Guatemala City	10.00%	10.00%	10.00%	10.00%
Japan	Clariant (Japan) K.K.	Tokyo	100.00%	100.00%	100.00%	100.00%
	Clariant Catalysts (Japan) K.K.	Tokyo	61.45%	61.45%	61.45%	61.45%
Korea	Clariant Plastics & Coatings (Korea) Ltd.	Pohang, Gyeongbuk	17.50%	17.50%	17.50%	17.50%
	Clariant (Korea) Ltd.	Pohang, Gyeongbuk	17.50%	17.50%	17.50%	17.50%
Luxembourg	Clariant Finance (Luxembourg) S.A.	Luxembourg	100.00%	100.00%	100.00%	100.00%
Morocco	Clariant (Maroc) S.A.	Casablanca	0.05%	0.05%	0.05%	0.05%
Mexico	Clariant (Mexico) S.A. de C.V.	Ecatepec de Morelos	99.99%	99.99%	99.99%	99.99%
	Clariant Plastics & Coatings Mexico S.A. de C.V.	Ecatepec de Morelos	99.99%	99.99%	99.99%	99.99%
Norway	Clariant Oil Services Scandinavia AS	Bergen	100.00%	100.00%	100.00%	100.00%
Peru	Clariant (Perú) S.A.	Lima	0.23%	0.23%	0.23%	0.23%
Singapore	Clariant South East Asia Pte. Ltd.	Singapore	100.00%	100.00%	100.00%	100.00%
South Africa	Clariant Southern Africa (Pty) Ltd.	Chloorkop, Gauteng	100.00%	100.00%	100.00%	100.00%
Spain	Clariant Ibérica Servicios S.L.	El Prat de Llobregat	85.03%	85.03%	85.03%	85.03%
	Clariant Ibérica Produccion S.A.	El Prat de Llobregat	35.00%	35.00%	–	–
Sweden	Clariant Production Sweden AB	Mölndal	100.00%	100.00%	100.00%	100.00%
Switzerland	Clariant Plastics & Coatings AG	Muttenz	100.00%	100.00%	100.00%	100.00%
	Clariant Reinsurance AG	Muttenz	100.00%	100.00%	100.00%	100.00%
	Clariant International AG	Muttenz	100.00%	100.00%	100.00%	100.00%
	Clariant Oil Services AG	Muttenz	80.00%	80.00%	80.00%	80.00%
	Clariant Chemical Consulting AG	Muttenz	100.00%	100.00%	100.00%	100.00%
	Clariant Prime AG	Muttenz	100.00%	100.00%	–	–
Thailand	Clariant (Thailand) Ltd.	Bangkok	100.00%	100.00%	100.00%	100.00%
Turkey	Clariant (Türkiye) A.S.	Gebze	100.00%	100.00%	100.00%	100.00%
UAE	Clariant (Gulf) FZE	Dubai	100.00%	100.00%	100.00%	100.00%
USA	Clariant Corporation	Charlotte	100.00%	100.00%	100.00%	100.00%

For further details on shareholdings indirectly held by Clariant Ltd, see note 35, Important subsidiaries on pages 62–64 of this report.

6. Other current non-interest-bearing liabilities

Other current non-interest-bearing liabilities amount to CHF 157 549 349 at the end of 2018 compared to CHF 74 254 368 at the end of 2017. They comprise third-party liabilities of CHF 29 081 357 (compared to CHF 20 900 445 at the end of 2017) and intragroup liabilities of CHF 128 467 992 (compared with CHF 53 353 923 at the end of 2017).

Liabilities to other Group companies mainly comprise shareholder costs payable to Clariant International Ltd.

7. Other current interest-bearing liabilities

Other current interest bearing liabilities amount to CHF 358 706 814 at the end of 2018 compared to CHF 251 960 656 at the end of 2017. They comprise third-party liabilities of CHF 285 000 000 (compared to CHF 250 000 000 at the end of 2017) and intragroup liabilities of CHF 73 706 814 (compared with CHF 1 960 656 at the end of 2017).

On 26 September 2018, a bond issued in 2012 with a nominal value of CHF 250 million fell due and was repaid.

On 9 June 2017 a bond issued in 2011 in the amount of CHF 100 million reached maturity and was repaid.

A bond issued in 2012 with a nominal value of CHF 285 million will fall due in 2019 and was therefore reclassified to current financial debts.

Since 16 December 2016, Clariant Ltd has an agreement for a CHF 500 million five-year multi-currency revolving credit facility (RCF) with two one-year extension options. The RCF is structured as a club deal with ten key relationship banks with equal stakes and contains an accordion option for an increase up to CHF 600 million. The RCF is structured as a »back-stop« facility for rating purposes to maintain Clariant's liquidity headroom. It contains customary covenants such as negative pledge, cross default, ownership change and restriction on disposals, mergers and subsidiary debt. The Group is required to maintain one financial covenant (debt leverage) that is tested at the end of each financial half year. The RCF has been extended one more year until 16 December 2023.

The intragroup liabilities comprise the cash pool accounts and current accounts between Group companies.

8. Share capital

Capital issued	**31.12.2018**	**31.12.2017**
Number of registered shares each with a par value of CHF 3.70 (2017: CHF 3.70)	331 939 199	331 939 199
In CHF	1 228 175 036	1 228 175 036

Conditional capital	**31.12.2018**	**31.12.2017**
Number of registered shares each with a par value of CHF 3.70 (2017: CHF 3.70)	3 811 886	3 811 886
In CHF	14 103 978	14 103 978

9. Reserves

General reserves must be at least 20 % of the share capital of Clariant Ltd as this is the minimum amount required by the Swiss Code of Obligations. As from 2011, if certain conditions are met, qualifying capital contributions made to Clariant Ltd by its shareholders since 1997 can be distributed without being subject to Swiss withholding tax. Qualifying capital contribution reserves of approximately CHF 1.7 billion are confirmed by the Swiss Federal Tax Administration (SFTA).

The SFTA is of the opinion that capital contribution reserves which were formerly offset with losses of CHF 1.26 billion will not qualify as capital contribution reserves anymore (even if compensated with newly generated retained earnings). The Swiss Administrative Court confirmed the SFTA's view in a particular case (decision of 4 June 2015, A-6072/2013), whilst the Swiss Supreme Court (as the highest Swiss court level) has up to now not dealt with this question. Clariant Ltd does not unconditionally share the above mentioned opinion. This is why potential capital contribution reserves are also documented as capital contribution reserves in the balance sheet.

10. Treasury shares

	2018	2017
Holdings at 1 January	**2 641 579**	**7 887 728**
Shares sold on exercise of put options	–	–800 000
Shares sold to counterparty out of options	–	–3 729 500
Shares sold at fair market value	–	–200 000
Shares transferred to employees and Board of Directors	–390 915	–516 649
Holdings on 31 December	**2 250 664**	**2 641 579**

Each registered share has a par value of CHF 3.70 (2017: CHF 3.70).

In 2018 and 2017 no shares were bought.

In 2018 no shares were sold. The average price of shares sold in 2017 was CHF 17.32.

The profit or loss from the sale of own shares is recorded in the income statement as other finance income or other expenses.

11. Reconciliation of equity

in CHF	Share capital	Statutory capital reserves		Voluntary retained earnings	Treasury shares	Net income	**Total**
		from capital contribution[1]	from retained earnings[2]				
Balance 31 December 2017	**1 228 175 036**	**2 440 230 643**	**–1 264 297 991**	**924 527 225**	**–48 133 025**	**172 132 961**	**3 452 634 849**
Reclassification of profit carryforward to voluntary retained earnings				172 132 961		–172 132 961	–
Reclassification		–164 672 179		164 672 179			–
Distribution				–164 672 179			–164 672 179
Changes in treasury shares					7 343 434		7 343 434
Profit for the financial year						180 640 353	180 640 353
Balance 31 December 2018	**1 228 175 036**	**2 275 558 464**	**–1 264 297 991**	**1 096 660 186**	**–40 789 591**	**180 640 353**	**3 475 946 457**

[1] In 2012, the Swiss Federal Tax Administration confirmed qualifying capital contribution reserves of approximately CHF 1.7 billion (as per 31 December 2018 due to distributions still amounting of approximately CHF 1.1 billion). For further information see also note 9 to the financial statements of Clariant Ltd.

[2] This amount corresponds to capital contribution reserves formerly offset with losses. For further information see also note 9 to the financial statements of Clariant Ltd.

12. Financial liabilities

in CHF	Interest rate	Term	**Amount 31.12.2018**	Amount 31.12.2017
Non-current interest-bearing liabilities to third parties				
Certificate of indebtedness	mixed	2015–2020	169 083 496	175 350 264
Certificate of indebtedness	mixed	2015–2023	169 080 925	175 276 977
Certificate of indebtedness	2.010	2016–2026	16 344 289	16 936 684
Certificate of indebtedness	1.137	2016–2023	29 871 285	30 981 205
Certificate of indebtedness	6 m EURIBOR + 1.1	2016–2023	14 653 856	15 198 847
Certificate of indebtedness	0.779	2016–2021	62 560 872	64 891 252
Certificate of indebtedness	1.501	2016–2023	82 849 245	85 866 895
Certificate of indebtedness	1.012	2016–2020	176 409 004	182 884 804
Certificate of indebtedness	6 m EURIBOR + 1.05	2016–2020	62 560 476	64 859 731
Certificate of indebtedness	2.618	2016–2021	108 740 800	112 469 944
Certificate of indebtedness	3 m LIBOR + 1.5	2016–2021	163 354 136	168 976 059
Certificate of indebtedness	1.194	2018–2024	103 703 407	—
Certificate of indebtedness	1.548	2018–2025	115 539 055	—
Certificate of indebtedness	6 m EURIBOR + 0.95	2018–2025	60 305 799	—
Certificate of indebtedness	2.087	2018–2028	19 162 558	—
Straight bond	3.250	2012–2019	285 000 000	285 000 000
Straight bond	2.500	2012–2018	—	250 000 000
Straight bond	3.500	2012–2022	175 000 000	175 000 000
Straight bond	2.125	2014–2024	160 000 000	160 000 000
Total straight bonds and certificates of indebtedness			**1 974 219 203**	**1 963 692 662**
Other current interest-bearing liabilities to Group companies			—	1 960 656
Total interest-bearing liabilities			**1 974 219 203**	**1 965 653 318**
Less: Other current interest bearing liabilities			–285 000 000	–251 960 656
Total non-current interest bearing liabilities to third parties			**1 689 219 203**	**1 713 692 662**
Non-current interest–bearing liabilities to Group companies				
Financial liabilities to Clariant Oil Service Ltd	0.750	—	588	319 112
Non-current interest–bearing liabilities to Group companies			**588**	**319 112**
Total non-current interest bearing liabilities			**1 689 219 791**	**1 714 011 774**
Breakdown by maturity				
one to five years			1 214 164 683	1 229 751 166
more than five years			475 055 108	484 260 608
Total non-current interest–bearing liabilities			**1 689 219 791**	**1 714 011 774**

On 25 September 2018 Clariant issued four certificates of indebtedness with a total amount of EUR 265 million (CHF 299 million). These certificates have the following terms: EUR 92 million for 5.5 years at a fixed interest rate of 1.194 % p.a., EUR 102 million for 7 years at a fixed interest rate of 1.548 % p.a., EUR 54 million for 7 years at a variable interest rate (6-months Euribor + 0.95 % p.a.), EUR 17 million for 10 years at a fixed interest rate of 2.087 % p.a..

On 26 September 2018 a bond issued in 2012 in the amount of CHF 250 million reached maturity and was repaid.

On 9 June 2017, a bond issued in 2011 in the amount of CHF 100 million reached maturity and was repaid.

A bond issued in 2012 with a nominal value of CHF 285 million will fall due in 2019 and was therefore reclassified to current financial debts.

13. Contingent liabilities

in CHF m	**Outstanding liabilities 31.12.2018**	Outstanding liabilities 31.12.2017
Outstanding liabilities as guarantees in favor of Group companies	379	404

Clariant Ltd belongs to the Swiss value-added tax (VAT) group of Clariant, and thus carries joint liability to the Swiss federal tax authority for value-added tax.

In 2017, the European Commission (Antitrust) initiated an investigation on Clariant and some of its competitors active in the ethylene purchasing sector in some member states. The investigation is ongoing; should antitrust violations be brought up against Clariant by the European Commission, it can impose significant fines that may affect the Group's, and thus of Clariant AG as the ultimate parent company's result and cash flow with an amount that may be material.

Given the ongoing nature of the investigation and the uncertainties associated with them, management has concluded that the amount of such fine cannot be determined as of 31 December 2018 as a reliable estimate is dependent on numerous factors which have not been defined as of the approval date of the financial statements. This assessment is supported by external advisors.

14. Shareholdings of members of the Board of Directors and the Executive Committee

1. Board of Directors

SHARES HELD

Name	**Number of shares granted[1]**	**Value of shares granted[1]**	Number of shares granted	Value of shares granted	**Number of privately held shares**	Number of privately held shares
	for 2018	**for 2018**	for 2017	for 2017	**31.12.2018**	31.12.2017
Hariolf Kottmann[2]	6 875[4]	137 500	See EC Overview		404 267[5]	See EC Overview
Günter von Au	6 354	127 080	5 962	150 004	58 507	52 212
Evelin Saupper	5 000	100 000	3 975	100 011	15 309	11 334
Carlo G. Soave	5 000	100 000	3 975	100 011	36 063	32 088
Peter Steiner	5 000	100 000	3 975	100 011	9 309	5 334
Claudia Suessmuth Dyckerhoff	5 000	100 000	3 975	100 011	10 409	6 434
Susanne Wamsler	5 000	100 000	3 975	100 011	976 741	969 516[3]
Konstantin Winterstein	5 000	100 000	3 975	100 011	6 077 824	6 019 849
Abdullah Mohammed Alissa	2 292	45 840	–	–	–	–
Dr. Khaled Homza Nahas	2 750	55 000	–	–	–	–
Calum MacLean	2 292	45 840	–	–	–	–
Geoffery Merszei	2 292	45 840	–	–	–	–
former BoD members[6]	–	175 000	11 925	300 033	–	107 414
Total	**52 855**	**1 232 100**	**41 737**	**1 050 103**	**7 588 429**	**7 204 181**

[1] The number of shares granted for the period from annual general meeting to annual general meeting (April to March) as part of the BoD share program will be determined after the balance sheet date. The number disclosed is based on the amount of an estimated fair value of the shares at the grant date. Therefore corrections for the prior-year period were necessary.

[2] Board of Directors' compensations is extended only since retirement as CEO and appointment as Chairman of the Board of Directors.

[3] Thereof: 240 271 held by »The Honoré T. Wamsler Trust«

[4] Pro rata as of 16 October 2018 in his function as Chairman of the BoD.

[5] This amounts includes corrections from non-transaction related internal calculation errors in previous years. Additional 29 295 PSUs still in vesting from grants received as CEO.

[6] Former BoD members include Rudolf Wehrli and Peter Chen who left 16 October 2018. Pro rata cash payment for 2018 instead of shares.

No options were granted to members of the Board of Directors for the years 2018 and 2017, nor did any member of the Board of Directors hold any options in those years.

For detailed information regarding emoluments of the Board of Directors and the Executive Committee, please refer to the Compensation Report.

2. Executive Committee

SHARES HELD

Name	**Number of shares granted**	**Value of shares granted**	Number of shares granted[1]	Value of shares granted[1]	**Number of shares within vesting period**	Number of shares within vesting period	**Number of privately held shares**	Number of privately held shares
	for 2018	**for 2018**	for 2017	for 2017	**31.12.2018**	31.12.2017	**31.12.2018**	31.12.2017
Hariolf Kottmann	542[3]	13 648	51 965	1 168 858	29 295	143 171	—[2]	447 421
Ernesto Occhiello	—	—	—	—	—	—	—	—
Britta Fuenfstueck[5]	—	—	28 592	644 004	—	44 020	—	7 406
Hans Bohnen[4]	—	—	—	—	25 084	—	87 247	—
Patrick Jany	14 844	373 772	28 592	644 004	79 368	80 569	394 713	378 996
Christian Kohlpaintner	14 844	373 772	28 594	644 049	79 368	80 569	320 853	305 135
Total	**30 230**	**761 192**	**137 743**	**3 100 915**	**213 115**	**348 329**	**802 813**	**1 138 958**

[1] Correction needed due to adjustments of the final share price at grant date.

[2] No EC member at 31 December 2018 any longer, please refer to BoD overview.

[3] Pro rata grant due to retirement as CEO.

[4] Hans Bohnen became EC member in October 2018, therefore no shares granted as EC member for 2018. Number of shares within vesting period result from prior LTIP grants in senior leadership roles at Clariant.

[5] All unvested grants forfeited upon termination.

No options were granted to members of the Executive Committee for the years 2018 and 2017, nor did any member of the Executive Committee hold any options in those years.

For detailed information regarding emoluments of the Board of Directors and the Executive Committee, please refer to the Compensation Report.

15. Voting and legal registration limitations

In accordance with article 5 of the Articles of Incorporation, no limitations exist with regard to registration of shares which are acquired in one's own name and on one's own account. Special rules exist for nominees.

In accordance with article 13 of the Articles of Incorporation, each share has the right to one vote.

16. Significant shareholdings of 3 % or more of total share capital

Based on the notifications received by Clariant and published by SIX Exchange Regulation, as at 31 December 2018 the following shareholders held more than 3 % of voting rights in Clariant Ltd:

Shareholders	Voting rights
SABIC International Holdings B.V., Sittard, The Netherlands, controlled by the Public Investment Fund of Saudi Arabia (PIF), Riyadh, Kingdom of Saudi Arabia[1]	25.67 %[2]
APG Asset Management N.V., Amsterdam, Netherlands	5.01 %
Blue Beteiligungsgesellschaft mbH, Am Holzmaierfeld, 82064 Strasslach-Dingharting (Germany) and Maple Beteiligungsgesellschaft mbH, Am Holzmaierfeld, 82057 Icking (Germany)[3]	3.49 %

[1] As of 31 December 2017, White Tale Holdings LP/40 North Latitude Master Fund Ltd. held 20.00 % and subsequently increased their shareholdings to 25.15 %. On 25 January 2018, SABIC International Holdings B.V., Sittard, The Netherlands, controlled by the Public Investment Fund of Saudi Arabia (PIF) Riyadh, Kingdom of Saudi Arabia, acquired, subject to the necessary regulatory approvals, a 24.99 % stake in Clariant Ltd previously held by White Tale Holdings LP, resp. Corvex Holdings LLC, resp. 40 North Latitude Master Fund Ltd. On 17 September 2018, this transaction was closed and thus SABIC has become Clariant Ltd's largest shareholder.

[2] SABIC acquired 24.99 % of the shares of Clariant Ltd on 17 September 2018. The difference corresponds to the amount of treasury shares held by Clariant Ltd which have to be aggregated to the shares held by SABIC solely for regulatory disclosure purposes due to the Governance Agreement entered into by SABIC and Clariant on 17 September 2018.

[3] According to a disclosure notification published on 18 December 2018, a group consisting of Konstantin Winterstein, 80333 Munich, Germany and Elisabeth Prinzessin zu Sayn-Wittgenstein, 80333 Munich, Germany – initially formed on 14 December 2013 and holding 3.73 % partially through Blue Beteiligungsgesellschaft mbH, Strasslach-Dingharting (Germany) and partially through Maple Beteiligungsgesellschaft mbH Icking (Germany) – was dissolved on 12 December 2018 and formed again according to said disclosure notification of 18 December 2018. The 3.73 % previously held by this group was included in the 13.96 % mentioned under footnote 4.

Former shareholders of Süd-Chemie AG[4], who had exchanged their shares against Clariant shares in April 2011 and are related to each other for family or other reasons (especially the Wamsler, Winterstein, Schweighart and Stockhausen families), held a total of 13.96 % of the share capital of Clariant Ltd until this group of shareholders was dissolved according to a disclosure notification published on 18 December 2018.

[4] The following former shareholders of Süd-Chemie AG, holding 13.96 % of Clariant's shares, formed a group that was dissolved according to a disclosure notification published on 18 December 2018:

Wilhelm, Dr. Winterstein, Germany
Dolf, Dr. Stockhausen, Switzerland
Axel, Dr. Schweighart, Germany
Rosemarie Schweighart, Germany
Dominique Kraus, Germany
Irene W. Banning, United States
Susanne Wamsler-Singer, Austria
Caroline A., Dr. Wamsler, United States
Amelie Ratjen, Germany
Christof Ratjen, Germany
Konstantin Alfred Winterstein, Germany
Max-Theodor, Dr. Schweighart, Germany
Peter, Dr. Schweighart, Germany
Moritz Ostenrieder, Germany
Christian Ratjen, Germany
Bettina Wamsler, Germany
Pauline Joerger, United States
Marianne Kunisch, Germany
Maximilian Ratjen, Germany
Julius Ratjen, Germany
Christopher Weithauer, Germany
Johanna Bechtle, Germany
Kaspar Bechtle, Germany
Luisa Redetzki, Germany
Karl T. Banning, USA
Schuyler H. Joerger, Unites States
Sophie Isabel Schweighart, Germany
Heidrun Schweighart, Germany
Maria Stockhausen, Switzerland
Elisabeth Prinzessin zu Sayn-Wittgenstein, Germany
Georg A. Weithauer, Germany
Charlotte Bechtle, Germany
Clara Redetzki, Germany
Marie Redetzki, Germany
Sophia P. Joerger, United States
Susanna Maria Schweighart, Germany
Adriane Hartner, Austria

Disclosure notifications during the financial year 2018 reported to the Stock Exchange Disclosure Office pursuant to Art. 120 of the Financial Markets Infrastructure Act (FMIA) as well as further information in relation to disclosure notifications can be found on the SIX Swiss Exchange reporting platform: www.six-exchange-regulation.com/en/home/publications/significant-shareholders.html

On 31 December 2017, the following shareholders held a participation of 3 % or more of the total share capital: White Tale, White Tale Holdings LP, Cayman Islands (Keith Meister; David J. Millstone; David S. Winter), Corvex Holdings LLC, Cayman lslands (Keith Meister), 40 North Latitude Master Fund Ltd., New York, (David J. Millstone; David S. Winter) 20.00 %; Group of former shareholders of Süd-Chemie AG: 13.96 %, thereof (as a separate sub-group): Blue Beteiligungsgesellschaft mbH, Am Holzmaierfeld, 82064 Grossdingharting (Germany), and Maple Beteiligungsgesellschaft mbH, Am Holzmaierfeld, 82064 Grossdingharting (Germany): 3.73 %); APG Asset Management N.V., Amsterdam, Netherlands: 5.01 %; Black Rock Inc., New York: 3.80 %.

At 31 December 2018, Clariant AG itself held 2 250 664 shares in treasury, corresponding to 0.68 % of the share capital.

17. Events subsequent to the balance sheet date

There were no major events subsequent to the balance sheet date.

Appropriation of available earnings

The Board of Directors proposes to appropriate the profit of 2018 of Clariant Ltd in the amount of CHF 180 640 353 as follows.

Annual result	in CHF
Carried forward from previous year	0
Profit for the year 2018	180 640 353
Total available earnings	**180 640 353**

Appropriation	in CHF
Voluntary retained earnings as at 31 December 2018	1 096 660 186
Transfer to voluntary retained earnings	180 640 353
Voluntary retained earnings as at 1 January 2019	1 277 300 539
Balance to be carried forward	0
Distribution of CHF 0.55 per share from reserves from capital contribution[1]	**181 500 000**

[1] Depending on the number of issued shares on the date of the distribution. Shares held by Clariant Ltd or its subsidiaries are not entitled to a distribution and are not taken into account. The distribution amount is therefore expected to be in the region of CHF 181500000.

Distribution of reserves from capital contribution

The Board of Directors proposes a distribution from the confirmed capital contribution reserves of CHF 0.55 per share (following reclassification of the full distribution amount from reserves from capital contribution to voluntary retained earnings).

Report of the statutory auditor

to the General Meeting of Clariant Ltd

Muttenz

Report on the audit of the financial statements

Opinion

We have audited the financial statements of Clariant Ltd, which comprise the balance sheet as at 31 December 2018, income statement and notes for the year then ended, including a summary of significant accounting policies.

In our opinion, the financial statements (pages 72 to 82) as at 31 December 2018 comply with Swiss law and the company's articles of incorporation.

Basis for opinion

We conducted our audit in accordance with Swiss law and Swiss Auditing Standards. Our responsibilities under those provisions and standards are further described in the "Auditor's responsibilities for the audit of the financial statements" section of our report.

We are independent of the entity in accordance with the provisions of Swiss law and the requirements of the Swiss audit profession and we have fulfilled our other ethical responsibilities in accordance with these requirements. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinion.

Our audit approach

Overview

Overall materiality: CHF 23 million

We tailored the scope of our audit in order to perform sufficient work to enable us to provide an opinion on the financial statements as a whole, taking into account the structure of the entity, the accounting processes and controls, and the industry in which the entity operates.

As key audit matters the following areas of focus have been identified:

- Investigation by the European Commission in the ethylene purchasing market
- Valuation of shareholdings in Group companies

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Materiality

The scope of our audit was influenced by our application of materiality. Our audit opinion aims to provide reasonable assurance that the financial statements are free from material misstatement. Misstatements may arise due to fraud or error. They are considered material if, individually or in aggregate, they could reasonably be expected to influence the economic decisions of users taken on the basis of the financial statements.

Based on our professional judgement, we determined certain quantitative thresholds for materiality, including the overall materiality for the financial statements as a whole as set out in the table below. These, together with qualitative considerations, helped us to determine the scope of our audit and the nature, timing and extent of our audit procedures and to evaluate the effect of misstatements, both individually and in aggregate, on the financial statements as a whole.

Overall materiality	CHF 23 million
How we determined it	0.4% of total assets
Rationale for the materiality benchmark applied	We chose total assets as the benchmark because, in our view, it is the most relevant measure for the activities of Clariant Ltd as a holding company.

We agreed with the Audit Committee that we would report to them misstatements above CHF 1 million identified during our audit as well as any misstatements below that amount which, in our view, warranted reporting for qualitative reasons.

Audit scope

We designed our audit by determining materiality and assessing the risks of material misstatement in the financial statements. In particular, we considered where subjective judgements were made; 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 among other matters consideration of whether there was evidence of bias that represented a risk of material misstatement due to fraud.

Report on key audit matters based on the circular 1/2015 of the Federal Audit Oversight Authority

Key audit matters are those matters that, in our professional judgement, were of most significance in our audit of the financial statements of the current period. These matters were addressed in the context of our audit of the financial statements as a whole, and in forming our opinion thereon, and we do not provide a separate opinion on these matters.

Investigation by the European Commission in the ethylene purchasing market

Key audit matter	*How our audit addressed the key audit matter*
Since July 2017, Clariant has been part of an ongoing investigation by the European Commission into alleged infringements of competition law in the ethylene purchasing market. Clariant is cooperating fully with the authorities. The eventual outcome of the investigation is uncertain both in terms of the further course of the	We discussed the status of the ongoing investigation with in-house and external legal counsel and evaluated the relevant correspondence and minutes of the Board of Directors' and management meetings. We obtained independent letters and procedural documents from external legal counsel to confirm our understanding of the status and their assessment of the investigation. We also used internal PwC legal specialists to assist us in evaluating the status of the investigation and the

proceedings and the magnitude of fines, if any, which might be imposed. The investigation is ongoing and it has not been possible for Clariant Ltd to make a reliable estimate of the amount of any liability that could arise from these proceedings; therefore, no provision has been recorded by management. Accordingly, unexpected adverse outcomes could significantly impact Clariant Ltd's reported profit and balance sheet position. Please refer to pages 79 (Contingent liabilities, note 13) in the notes.	appropriateness of the assumptions taken and in assessing the position taken by management and the Board of Directors. We discussed this assessment with management, the Audit Committee and the Board of Directors and we obtained written representations from the company in relation to the case. As set out in the notes to the financial statements, the outcome of the pending investigation is dependent on the outcome of future developments and therefore the exposure of Clariant Ltd, as assessed by management and the Board of Directors, is subject to inherent uncertainty. On the basis of the procedures performed and the information obtained, we are satisfied that the approach taken by management and the Board of Directors was appropriate.

Valuation of shareholdings in Group companies

Key audit matter	*How our audit addressed the key audit matter*
We consider the valuation of shareholdings in Group companies to be a key audit matter due both to the significant scope for judgement involved with respect to the assumptions and the discount rates applied for the valuations, and to the significance of these investments on the balance sheet. Please refer to pages 74 to 75 (Shareholdings in Group companies, note 5).	We evaluated and challenged management's assumptions and the discount rates applied for valuation purposes. We assessed management's process in grouping together certain investments and the application of generally accepted valuation methods to calculate their value. We tested the calculation method and we compared the input figures used with the Group's accounting records. We also compared the actual results of the year under review with the figures included in the forecasts in the prior year in order to assess with hindsight whether any of the assumptions underlying the forecasts might have been too optimistic. We assessed the assumptions relating to the forecasts and found them to be consistent with actual developments and reasonable. We involved PwC valuation specialists to assess the discount rate by comparing the rates with market information. We found the assumptions and the discount rates to be appropriate and reasonable.

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Responsibilities of the Board of Directors for the financial statements

The Board of Directors is responsible for the preparation of the financial statements in accordance with the provisions of Swiss law and the company's articles of incorporation, and for such internal control as the Board of Directors determines 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 Board of Directors is responsible for assessing the entity'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 Board of Directors either intends to liquidate the entity or to cease operations, or has no realistic alternative but to do so.

Auditor's responsibilities for the audit of the financial statements

Our objectives are to obtain reasonable assurance about whether the financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditor's report that includes our opinion. Reasonable assurance is a high level of assurance, but is not a guarantee that an audit conducted in accordance with Swiss law and Swiss Auditing Standards 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 at the website of EXPERTsuisse: http://expertsuisse.ch/en/audit-report-for-public-companies. This description forms part of our auditor's report.

Report on other legal and regulatory requirements

In accordance with article 728a paragraph 1 item 3 CO and Swiss Auditing Standard 890, we confirm that an internal control system exists which has been designed for the preparation of financial statements according to the instructions of the Board of Directors.

We further confirm that the proposed appropriation of reserves complies with Swiss law and the company's articles of incorporation. We recommend that the financial statements submitted to you be approved.

PricewaterhouseCoopers AG

Rolf Johner	Michael Scheibli
Audit expert Auditor in charge	Audit expert

Basel, 11 February 2019

Forward-looking statements

Forward-looking statements contained herein are qualified in their entirety as there are certain factors that could cause results to differ materially from those anticipated. Investors are cautioned that all forward-looking statements involve risks and uncertainty. In addition to the factors discussed above, among the factors that could cause actual results to differ materially are the following: the timing and strength of new product offerings; pricing strategies of competitors; the company's ability to continue to receive adequate products from its vendors on acceptable terms, or at all, and to continue to obtain sufficient financing to meet its liquidity needs; and changes in the political, social and regulatory framework in which the company operates or in economic or technological trends or conditions, including currency fluctuations, inflation and consumer confidence, on a global, regional, or national basis.

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