
Consolidated financial statements (IFRS)

As a result of rounding it is possible that individual figures in these consolidated financial statements do not add up to the totals shown and that the percentages shown do not reflect the absolute values to which they relate.

Consolidated statement of comprehensive income

for the period from January 1 to December 31, 2019 and 2018

STATEMENT OF COMPREHENSIVE INCOME

Thousands of €	2019	2018	[Notes]
Revenues	556,879	461,299	[1]
Other operating income	6,216	5,478	[2]
Operating income	563,095	466,777	
Cost of goods and services	-20,246	-14,283	[3]
Personnel expenses	-239,427	-200,562	[4]
Depreciation of property, plant and equipment and amortization of intangible assets	-42,052	-23,460	[5]
<i>thereof amortization of intangible assets due to purchase price allocation</i>	-17,062	-14,713	
Other operating expenses	-137,757	-130,677	[6]
Operating expenses	-439,483	-368,982	
Operating result (EBIT)	123,612	97,795	
Interest income	858	470	[7]
Interest expenses	-3,165	-1,124	[7]
Share of net profit of associates	531	536	[18]
Gain on disposal of shares in associates	29,927	0	[8]
Other financial expenses/income	1,907	2,131	[9]
Earnings before taxes (EBT)	153,669	99,808	
Income taxes	-26,415	-23,248	[10]
Net income for the year	127,254	76,560	
Other comprehensive income:			
Difference from currency translation	3,173	5,032	
Items of other comprehensive income that are reclassified subsequently to profit or loss	3,173	5,032	
Gains/losses from the revaluation of defined benefit pension plans	-184	98	
Tax effect	55	-28	
Items of other comprehensive income that will not be reclassified to profit or loss	-129	70	
Subtotal other comprehensive income	3,045	5,102	
Total comprehensive income for the year	130,299	81,662	
Net profit or loss for the period attributable to:			
Equity holders of the parent	127,155	76,467	
Non-controlling interests	99	93	
Net income for the year	127,254	76,560	
Total comprehensive income for the year attributable to:			
Equity holders of the parent	130,195	81,481	
Non-controlling interests	102	181	
Total comprehensive income for the year	130,297	81,662	
Earnings per share (undiluted) in euros	1.10	0.66*	[11]
Earnings per share (diluted) in euros	1.10	0.66*	[11]
Average number of shares outstanding (undiluted)	115,500,000	115,500,000*	[25]
Average number of shares outstanding (diluted)	115,500,000	115,500,000*	[25]

* Prior year adjusted due to the stock split.

Consolidated statement of financial position

as at December 31, 2019 and December 31, 2018

STATEMENT OF FINANCIAL POSITION

ASSETS	Thousands of €	December 31, 2019	December 31, 2018	[Notes]
Current Assets				
Cash and cash equivalents		209,143	120,747	[12]
Trade receivables		62,046	55,758	[13]
Inventories		1,012	811	[14]
Income tax receivables		3,945	4,239	[10]
Other financial assets		1,089	4,209	[14], [24]
Other non-financial assets		18,267	16,485	[14]
Current assets, total		295,503	202,249	
Non-current assets				
Property, plant and equipment		27,620	17,574	[15]
Intangible assets		127,660	102,085	[16]
Goodwill		325,041	244,349	[16]
Right-of-use assets		66,163	0	[17]
Investments in associates		1,101	3,964	[18]
Deferred tax assets		6,250	3,157	[10]
Other financial assets		5,613	5,315	[14], [24]
Other non-financial assets		2,251	1,865	[14]
Non-current assets, total		561,700	378,309	
Total assets		857,204	580,558	

EQUITY AND LIABILITIES	Thousands of €	December 31, 2019	December 31, 2018	[Notes]
Current liabilities				
Short-term borrowings and current portion of long-term loans		58,623	56,348	[19], [24]
Trade payables		12,404	12,878	[19], [24]
Provisions and accrued liabilities		43,999	40,647	[20]
Deferred revenue		118,474	95,113	[21]
Income tax liabilities		10,967	5,441	[10]
Other financial liabilities		2,131	1,698	[19], [24]
Lease liabilities		12,589	0	[19], [24]
Other non-financial liabilities		12,455	10,180	[22]
Current liabilities, total		271,642	222,305	
Non-current liabilities				
Long-term borrowings without current portion		129,500	74,280	[19], [24]
Deferred tax liabilities		23,342	17,198	[10]
Pensions and related obligations		1,940	1,677	[23]
Provisions		3,235	2,128	[20]
Deferred revenue		3,711	262	[21]
Income tax liabilities		3,103	2,410	[10]
Other financial liabilities		7,085	4,115	[19], [24]
Lease liabilities		57,738	0	[19], [24]
Other non-financial liabilities		7,292	6,586	[22]
Non-current liabilities, total		236,947	108,656	
Equity				[25]
Subscribed capital		115,500	38,500	
Capital reserve		12,485	12,485	
Retained earnings		230,924	212,084	
Other comprehensive income		- 10,396	- 13,566	
Equity (Group shares)		348,513	249,503	
Non-controlling interests		103	94	
Equity, total		348,616	249,597	
Total equity and liabilities		857,204	580,558	

Consolidated cash flow statement

for the period from January 1 to December 31, 2019 and 2018

CONSOLIDATED STATEMENT OF CASH FLOWS

Thousands of €	2019	2018	[Notes]
Profit (before Tax)	153,669	99,808	
Depreciation and amortization of fixed assets	42,052	23,460	
Change in pension provision	80	72	
Other non-cash transactions	-684	-1,575	
Share of net profit of associates	-531	-536	
Gain on disposal of shares in associates	-29,927	0	
Result from disposal of fixed assets	84	72	
Cash flow for the period	164,743	121,301	[27]
Interest income	-858	-470	
Interest expenses	3,165	1,124	
Change in other provisions	3,032	3,313	
Change in trade receivables	-4,202	-10,459	
Change in other assets	1,221	-15,096	
Change in trade payables	-826	4,553	
Change in other liabilities	19,734	25,522	
Dividends received from associates	22	28	
Interests received	829	278	
Income taxes received	1,527	1,067	
Income taxes paid	-28,010	-31,414	
Cash flow from operating activities	160,376	99,747	[27]
Capital expenditure	-19,273	-11,295	
Cash received from disposal of shares in associate	33,345	0	
Changes in liabilities from acquisitions	0	-40	
Cash received from disposal of fixed assets	67	39	
Cash paid for acquisition of subsidiaries, net of cash acquired	-97,921	-63,092	
Cash flow from investing activities	-83,781	-74,388	[27]
Dividend payments	-31,185	-28,875	
Dividend payments to non-controlling interests	-93	-1,711	
Repayment of borrowings	-72,480	-38,000	
Changes in bank liabilities due to company acquisitions	130,000	86,000	
Principal elements of lease payments	-11,255	0	
Interests paid	-2,811	-846	
Payments for acquisitions of non-controlling interests	-1,500	-26,962	
Cash flow from financing activities	10,676	-10,394	[27]
Changes in cash and cash equivalents	87,270	14,965	
Effect of exchange rate differences on cash and cash equivalents	1,126	1,825	
Cash and cash equivalents at the beginning of the period	120,747	103,957	
Cash and cash equivalents at the end of the period	209,143	120,747	[12]

Consolidated statement of changes in equity

for the period from January 1, 2018 to December 31, 2019

OPERATING RESULT (EBIT)

Thousands of €	Equity attributable to the parent company's shareholders					Non-controlling interests	Total equity
	Subscribed capital	Capital reserve	Retained earnings	Translation reserve	Total		
As at January 1, 2018	38,500	12,485	193,179	- 18,691	225,473	2,472	227,945
Differences from currency translation	-	-	-	5,125	5,125	-93	5,032
Gains/losses from the revaluation of defined benefit pension plans	-	-	- 111	-	- 111	181	70
Net income for the year	-	-	76,467	-	76,467	93	76,560
Total comprehensive income for the year	0	0	76,356	5,125	81,481	181	81,662
Transition effects of IFRS 15	-	-	538	-	538	-	538
Transactions with non-controlling interests	-	-	-29,114	-	-29,114	-848	-29,962
Dividend payments to non-controlling interests	-	-	-	-	0	-1,711	-1,711
Dividend payment	-	-	-28,875	-	-28,875	-	-28,875
As at December 31, 2018	38,500	12,485	212,084	- 13,566	249,503	94	249,597
As at January 1, 2019	38,500	12,485	212,084	- 13,566	249,503	94	249,597
Differences from currency translation	-	-	-	3,170	3,170	3	3,173
Gains/losses from the revaluation of defined benefit pension plans	-	-	- 130	-	- 130	-	- 130
Net income for the year	-	-	127,155	-	127,155	99	127,254
Total comprehensive income for the year	0	0	127,025	3,170	130,195	102	130,297
Capital increase from the company's funds	77,000	-	-77,000	-	0	-	0
Dividend payments to non-controlling interests	-	-	-	-	0	-93	-93
Dividend payment	-	-	-31,185	-	-31,185	-	-31,185
As at December 31, 2019	115,500	12,485	230,924	- 10,396	348,513	103	348,616

Seebühne Bregenz

Bregenz, Austria

ENGINEERING OFFICE: ZT-Büro Lener

PARTICIPATING BRAND: SCIA





Notes to the consolidated financial statements for the financial year 2019

General information

Nemetschek SE is the ultimate parent company of Nemetschek Group. Its headquarters are located at Konrad-Zuse-Platz 1, 81829 Munich, Germany, and is entered into the commercial register at the Local Court of Munich (HRB 224638). Nemetschek SE and its subsidiaries (collectively "Nemetschek Group") provide software for the AEC (Architecture, Engineering, Construction) industry.

Nemetschek SE, as the ultimate parent has been quoted on the German stock exchange in Frankfurt am Main since March 10, 1999. Nemetschek is listed on the TecDAX and MDAX.

The consolidated financial statements of Nemetschek SE as at December 31, 2019 comprise Nemetschek SE and its subsidiaries and are prepared in compliance with International Financial Reporting Standards and the relevant interpretations (IFRS) as to be applied in the European Union (EU) as at December 31, 2019, and the additional requirements pursuant to § 315e HGB German Commercial Code (HGB).

Nemetschek SE prepares and publishes the consolidated financial statements in euros. Information is shown in the consolidated financial statements in EUR k (€ k) unless otherwise specified. The presentation of certain prior-year information has been reclassified to conform the current year presentation.

Accounting standards applied for the first time in 2019

The following new standards, interpretations and amendments to existing standards and interpretations are effective for financial years beginning on January 1, 2019 and have been applied for the first time to these consolidated financial statements:

IFRS 16 Leases

The Group applied IFRS 16 using the modified retrospective approach, under which the cumulative effect of initial application is recognized in retained earnings at January 1, 2019. Accordingly, the comparative information presented for 2018 is not restated – i.e. it is presented, as previously reported, under IAS 17 and related interpretations. As part of the initial application of IFRS 16, the Group exercised the following exemptions:

- » No reassessment whether a contract is, or contains a lease at January 1, 2019
- » There is no recognition in the balance sheet for leases with a remaining term of less than 12 months as at January 1, 2019. The practical expedient was exercised in accordance with the transitional provisions on the basis of the individual lease.

- » No recognition in the balance sheet of leases for which the underlying asset is of low value
- » Initial direct costs are not taken into account in the valuation of the right-of-use assets
- » Used hindsight when determining the lease term

The following reconciliation to the opening balance for lease liabilities as at January 1, 2019 is based upon the operating lease obligations as at December 31, 2018:

RECONCILIATION

Thousands of €	Balance Sheet as at January 1, 2019
Operating lease obligations at December 31, 2018	78,435
Relief option for short-term leases	–462
Relief option for leases of low-value assets	–104
FX-Effects	178
Lease obligations arising from contracts for which the commencement date is after January 1, 2019	–2,284
Other	820
Gross lease liabilities at January 1, 2019	76,583
Discounting	–6,832
Lease liabilities at January 1, 2019	69,751

The lease liabilities were discounted using the incremental borrowing rate as at January 1, 2019. The weighted average discount rate was 2.16%. Right-of-use assets were recognized at the amount of the lease liability, adjusted for lease payments made or accrued in advance.

In the Group, as at December 31, 2018, there were no finance leases as per IAS 17.

Disclosures regarding right-of-use assets and lease liabilities can be found under the relevant balance sheet items.

IFRIC 23 Uncertainty over Income Tax Treatment

The interpretation clarifies the recognition and measurement requirements when there is uncertainty over income tax treatments. In assessing the uncertainty, an entity shall consider whether it is probable that a taxation authority will accept the uncertain tax treatment.

Upon adoption of the interpretation, the Group considered whether it has any uncertain tax positions, particularly those relating to transfer pricing and R&D tax credits. The Company's and the subsidiaries' tax filings in different jurisdictions include deductions related to both items. The tax authorities may challenge those tax treatments. The Group determined that its previously applied accounting policy is in line with the regulations of IFRIC 23. Therefore, the interpretation did not have an impact on the consolidated financial statements of the Group.

The following amendments and interpretations have no, or no material, effect on the consolidated financial statements:

» **Amendments to IFRS 9: prepayment features with negative compensation**

The amendments clarify that a financial asset passes the SPPI criterion regardless of the event or circumstance that causes the early termination of the contract and irrespective of which party pays or receives reasonable compensation for the early termination of the contract.

» **Amendments to IAS 28: long-term interests in associates and joint ventures**

The amendments clarify that an entity applies IFRS 9 to long-term interests in an associate or joint venture to which the equity method is not applied but that, in substance, form part of the net investment in the associate or joint venture.

» **Amendments to IAS 19: plan amendment, curtailment or settlement**

The amendments specify that current service cost and net interest for the remainder of the annual reporting period after a plan amendment, curtailment or settlement are determined based on updated actuarial assumptions.

» **Annual improvements 2015 – 2017 cycle**

The amendments to **IFRS 3** clarify that when an entity obtains control of a business that is a joint operation, it remeasures previously held interests in that business. The amendments to **IFRS 11** clarify that when an entity obtains joint control of a business that is a joint operation, the entity does not remeasure previously held interests in that business. The amendments to **IAS 12** clarify that the former IAS 12.52B applies to all income tax consequences of dividends by moving the paragraph away from IAS 12.52A that only deals with situations where there are different tax rates for distributed and undistributed profits. The amendments to **IAS 23** clarify that if any specific borrowing remains outstanding after the related asset is ready for its intended use or sale, that borrowing becomes part of the funds that an entity borrows generally when calculating the capitalization rate on general borrowings.

Accounting standards that are not yet effective

The following IFRS were issued at the balance sheet date by the IASB but are not mandatorily applicable until later reporting periods or have not yet been adopted into EU law. The Nemetschek Group has decided not to exercise the possible option of early application of standards and interpretations which are not mandatorily applicable until later reporting periods.

PUBLISHED FINANCIAL REPORTING STANDARDS THAT HAVE NOT YET BEEN APPLIED

Amendments to standards/interpretations		Mandatory application	Anticipated effects
IFRS 3	Amendment to IFRS 3 Business Combinations	Jan. 1, 2020	No material effects expected
IFRS 17	Insurance Contracts	Jan. 1, 2021	No effects expected
IAS 1, IAS 8	Amendments to IAS 1 and IAS 8: Definition of Material	Jan. 1, 2020	No material effects expected
IFRS 9, IAS 39, IFRS 7	Interest Rate Benchmark Reform	Jan. 1, 2020	No material effects expected

Summary of significant accounting policies

The consolidated financial statements are prepared in accordance with the consolidation accounting and valuation principles described below.

Consolidation principles

The consolidated financial statements include subsidiaries and associates. The financial statements of the individual consolidated companies are prepared as of the closing date of the Group financial statements.

Subsidiaries

Subsidiaries are companies over which Nemetschek is currently able to exercise power by virtue of existing rights. Power means the ability to direct the relevant activities that significantly affect a company's profitability. Control is therefore only deemed to exist if Nemetschek is exposed, or has rights, to variable returns from its involvement with a company and has the ability to use its power over that company to affect the amount of that company's returns. Inclusion of an entity's accounts in the consolidated financial statements begins when the Nemetschek Group is able to exercise control over the entity and ceases when it is no longer able to do so.

Acquired businesses are accounted for using the acquisition method, which requires that the assets acquired and liabilities assumed be recorded at their respective fair values on the date Nemetschek obtains control. For significant acquisitions, the purchase price allocation is carried out with assistance from independent third-party valuation specialists. The related valuations are based on the information available at the acquisition date. Ancillary acquisition costs are recognized as expenses in the periods in which they occur. The initial value recognized includes the fair value of any asset or liability resulting from a contingent consideration arrangement. On the acquisition date, the fair value of the contingent consideration is recognized as part of the consideration transferred in exchange for the acquiree. According to IFRS 3, for each business combination, the acquirer shall measure any non-controlling interest in the acquiree either at fair value (full goodwill method) or at the non-controlling interest's proportionate share of the acquiree's net assets (partial goodwill method).

The excess of the consideration transferred, the amount of any non-controlling interest in the acquiree and the acquisition date fair value of any previous equity interest in the acquiree over the fair value of the Group's share of the identifiable net assets acquired, is recorded as goodwill. If this is less than the fair value of the net assets of the subsidiary acquired in the case of a bargain purchase, the difference is recognized immediately in the consolidated statement of comprehensive income.

In a business combination achieved in stages, the Group remeasures its previously held equity interest in the acquiree at its acquisition date fair value and recognizes the resulting gain or loss, if any, in profit or loss.

Non-controlling interests

Non-controlling interests have a share in the earnings of the reporting period. Their interests in the shareholders' equity of subsidiaries are reported separately from the equity of the Group.

The Group treats transactions with non-controlling interests that do not result in a loss of control as transactions with equity owners of the Group. For purchases from non-controlling interests, the difference between any consideration paid and the relevant share acquired of the carrying amount of net assets of the subsidiary is recorded in equity.

Under the purchase agreement of June 28, 2018, the shares in MAXON GmbH were increased from 70% to 100%. The transfer of benefits and encumbrances was completed with the purchase price payment in the amount of EUR 25,500k on July 9, 2018. Dependent on the revenue targets agreed upon for the 2018 and 2019 financial years, subsequent purchase price payments of EUR 3,000k fall due. As the revenue targets for 2018 were met, an additional purchase price of EUR 1,500k was paid in 2019.

In November 2018, shares of MAXON GmbH in Maxon Inc. were increased from 90% to 100%. The purchase price amounted to USD 1,757k.

From the acquisition of shares without controlling interests, a total of EUR 29,114k was offset with retained earnings in the 2018 financial year.

Associates

Associates are companies over which Nemetschek SE exerts significant influence, generally through an ownership interest between 20% and 50%. They are accounted for using the equity method. The carrying amounts of companies accounted for using the equity method are adjusted annually to reflect the share of earnings, dividends distributed and other changes in the equity of the associates attributable to the investments of Nemetschek.

An impairment loss is recognized on investments accounted for using the equity method, including goodwill in the carrying amount of the investment, if the recoverable amount falls below the carrying amount. Impairment losses and their reversals are recognized in the line item "share of net profit of associates." Gains or losses from the disposal are recognized in financial income or expenses.

Unless stated otherwise, the financial statements of the associates are prepared as of the same balance sheet date as Nemetschek SE. Where necessary, adjustments are made to comply with the Group's accounting policies.

Valuation methods

The following table shows the most important valuation principles:

VALUATION METHODS

Item	Valuation Methods
Assets	
Cash and cash equivalents	Nominal amount
Trade receivables	Amortized costs
Inventories	Lower of cost and net realizable value
Other financial assets	See separate table
Other non-financial assets	Amortized costs
Non-current assets held for sale	Lower of carrying amount and fair value less costs to sell
Property, plant and equipment	Amortized costs
Intangible assets	
<i>With definite useful life</i>	<i>Amortized costs</i>
<i>With indefinite useful life</i>	<i>Impairment-only approach</i>
Goodwill	Impairment-only approach
Right-of-use assets	Amortized costs
Equity and liabilities	
Borrowings	Amortized costs
Trade payables	Amortized costs
Provisions	Present value of future settlement amount
Deferred revenue	Expected settlement amount
Other financial liabilities	Amortized costs or fair value through profit or loss
Other non-financial liabilities	Amortized costs
Pensions and related obligations	Projected unit credit method
Accrued liabilities	Amortized costs

Financial assets are classified and measured according to IFRS 9. Purchase and sale of financial assets are recognized on the trade date and are initially measured at fair value. Subsequently a financial asset is measured at 1) amortized cost, 2) at fair value through other comprehensive income or 3) at fair value through profit or loss. The classification and measurement of financial assets which are not equity instruments depend on two factors which are to be checked at the time of acquisition: the business model under which the financial asset is held as well as the cash flow conditions of the instrument.

A financial asset is measured at amortized cost if it meets both of the following conditions and is not designated as at fair value through profit or loss: financial asset which is held within a business model whose objective is to hold assets to collect contractual cash flows and its contractual terms give rise on specified dates to cash flows that are solely payments of principal and interest on the principal amount outstanding.

Investments in equity instruments do not fulfill the cash flow conditions. Generally, the instruments are to be measured at fair value through profit or loss. The Nemetschek Group exercises the irrevocable option of measuring investments in equity instruments at fair value without impacting profit or loss.

All financial assets which are not classified as measured at amortized cost or at fair value through other comprehensive income as described above are measured at fair value through profit or loss.

Reclassification of a financial asset between measurement categories of IFRS 9 requires a change to the business model for the corresponding group of instruments, in which case all affected financial assets are reclassified.

The subsequent measurement of financial assets is as follows:

SUBSEQUENT MEASUREMENT OF FINANCIAL ASSETS ACCORDING TO IFRS 9

IFRS 9 category	Subsequent measurement principle
Amortized cost	These assets are subsequently measured at amortized cost using the effective interest method. The amortized cost is reduced by loss allowances. Interest income, foreign exchange gains and losses and loss allowances are recognized in profit or loss. Any gain or loss on derecognition is recognized in profit or loss.
Fair value through profit or loss	These assets are subsequently measured at fair value. Net gains and losses, including any interest or dividend income, are recognized in profit or loss.
Fair value through other comprehensive income (debt instrument)	These assets are subsequently measured at fair value. Interest income calculated using the effective interest method, foreign exchange gains and losses and loss allowances are recognized in profit or loss. Other net gains and losses are recognized in other comprehensive income. On derecognition, accumulated gains and losses are reclassified to profit or loss.
Fair value through other comprehensive income (equity instrument)	These assets are subsequently measured at fair value. Dividends are recognized as income in profit or loss unless the dividend clearly represents a recovery of part of the cost of the investment. Other gains and losses are recognized in other comprehensive income and are never reclassified to profit or loss.

Fair value estimation

IFRS 7 requires for financial instruments that are measured in the statement of financial position at fair value in accordance with IFRS 13 a disclosure of fair value measurements by level using the following fair value measurement hierarchy:

- » 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), and
- » Level 3: Inputs for asset or liability that are not based on observable market data (that is unobservable inputs).

On December 31, 2019 and 2018, the Group's financial instruments carried in the statement of financial position at fair value are categorized within Level 3 of the fair value hierarchy. In accordance with IFRS 13, the following overview shows the valuation methods as well as the unobservable inputs used:

» Type

Earn-out components

» Valuation method

The discounted cash flow method is applied, which considers the present value of expected payments, discounted using a risk-adjusted discount rate. The fair value adjustments refer to accretion and are recognized under other financial expenses/income.

» Significant unobservable input

Risk adjusted discount rate or probability adjusted revenues and profits

» Relationship of unobservable inputs to fair value

An increase in the discount rate used in isolation would result in a decrease in the fair value. An increase in the probability adjusted revenues and profits used in isolation would result in an increase in the fair value.

The fair value of financial assets and financial liabilities that are not measured at fair value but for which fair value disclosures are required are included in Level 3 categories. The fair values have been determined in accordance with generally accepted pricing models based on a discounted cash flow analysis, with the most significant inputs being the discount rate that reflects the credit risk of counterparties.

Currency translation

Functional and presentation currency

Items included in the financial statements of each of the Group's entities are measured using the currency of the primary economic environment in which the entity operates (the functional currency). The consolidated financial statements are prepared in EUR, which is the Group's presentation currency.

Group companies

In the consolidated financial statements, the assets and liabilities of companies that do not use the Euro as their functional currency are translated as follows:

- » Assets and liabilities are translated at the closing rate on the date of that consolidated statement of financial position. Goodwill and fair value adjustments arising through the acquisition of a foreign entity are treated as assets and liabilities of the foreign entity and are translated at the closing rate. Equity components are translated at the historical exchange rates prevailing at the respective dates of their first-time recognition in the Group equity.

- » Income and expenses are translated at average exchange rates; and
- » all resulting exchange differences are recognized as a separate component of equity

Transactions and balances

Foreign currency transactions are translated into the functional currency using the actual exchange rates on the dates of the transactions or valuation where items are remeasured. Foreign exchange gains and losses resulting from the settlement of such transactions and from the translation at year-end exchange rates

of monetary assets and liabilities denominated in foreign currencies are recognized in profit or loss. There is an exception for monetary items that are designated as part of the hedge of the Group's net investment in a foreign operation. These are recognized in other comprehensive income until the net investment is disposed of, at which time, the cumulative amount is reclassified to profit or loss. Tax charges and credits attributable to exchange differences on those monetary items are also recognized in other comprehensive income.

The exchange rates of the currencies affecting foreign currency translation are as follows:

EXCHANGE RATES

Currency	Average exchange rate in 2019	Spot rate as at December 31, 2019	Average exchange rate in 2018	Spot rate as at December 31, 2018
EUR / USD	1.12	1.12	1.18	1.15
EUR / CHF	1.11	1.09	1.16	1.13
EUR / CZK	25.67	25.41	25.65	25.72
EUR / RUB	72.46	69.96	74.04	79.72
EUR / JPY	122.01	121.94	130.40	125.85
EUR / HUF	325.30	330.53	318.89	320.98
EUR / GBP	0.88	0.85	0.88	0.89
EUR / BRL	4.41	4.52	4.31	4.44
EUR / MXN	21.56	21.22	22.71	22.49
EUR / NOK	9.85	9.86	9.60	9.95
EUR / SGD	1.53	1.51	1.59	1.56
EUR / CNY	7.74	7.82	7.81	7.88
EUR / CAD	1.49	1.46	1.53	1.56
EUR / AUD	1.61	1.60	1.58	1.62
EUR / INR	78.84	80.19	82.80	79.73
EUR / SEK	10.59	10.45	10.26	10.25

Cash and cash equivalents

Cash and cash equivalents represent cash at banks, cash on hand, and short-term deposits with maturities of three months or less from the date of acquisition. Cash equivalents are highly liquid short-term financial investments that are readily convertible to known amounts of cash and which are subject to an insignificant risk of change in value. Cash not available from rental guarantee deposits is disclosed as other assets. For the purposes of the consolidated cash flow statement, cash and cash equivalents as described above are net of outstanding bank overdrafts.

Trade receivables

Trade receivables are recognized at the transaction price, which represents the amount of consideration to which an entity expects to be entitled in exchange for transferring promised goods or services to a customer, excluding amounts collected on behalf of third parties. Subsequently, these are measured at amortized cost.

Inventories

Inventories mainly comprise hardware and third party licenses, which are carried at the lower of cost and net realizable value. Net realizable value is the estimated selling price in the ordinary course of business less the estimated costs necessary to make the sale.

Other financial assets

Other financial assets are classified based on the business model for managing these assets and the contractual cash flow characteristics. Those other financial assets that give rise to cash flows consisting only of payments of principal and interest are classified in accordance with the respective business model for managing the financial assets. Financial assets held in a business model with the objective to hold them until maturity and collect the contractual cash flows are measured at amortized cost. Nemetschek mainly has security deposits which fall under this category.

Impairment of financial assets

Impairment losses for debt instruments measured at amortized cost or at fair value through other comprehensive income are recognized in accordance with IFRS 9 *Financial Instruments*. The standard requires that not only historical data but also future expectations and projections are taken into consideration when accounting for impairment losses (expected credit loss model).

For trade receivables and contract assets as per IFRS 15, Nemetschek consistently applies the simplified approach and recognizes lifetime expected credit losses. In order to calculate the collective loss allowance, the Nemetschek Group determines a default rate on the basis of historical defaults and adjusts these with forward looking information if appropriate. The rates are reviewed on a regular basis to ensure that they reflect latest data on credit risk. In case objective evidence of credit impairment is observed for trade receivables from a specific customer, a detailed analysis of the credit risk is performed and an appropriate individual loss allowance is recognized for this customer. Trade receivables are considered to be in default when it is expected that the debtor will not fulfill its credit obligations toward Nemetschek. Loss allowances on trade receivables are presented as other operating expenses in the consolidated statement of comprehensive income.

For other financial assets, Nemetschek Group applies the general impairment approach. As it is the policy of Nemetschek Group to invest only in high-quality assets of issuers with a minimum internal or external rating of at least investment grade, the low credit risk exception is used. Thus, these assets are always allocated to stage 1 of the three-stage credit loss model and, if material, a loss allowance for an amount equal to 12-month expected credit losses will be recorded. Impairment losses on other financial assets are shown in the line item "Other financial expenses." The credit risk of cash and cash equivalents measured at amortized cost is insignificant due to their short-term maturity, counterparties' investment grade credit ratings and established exposure limits. Therefore, Nemetschek Group did not recognize any credit impairment losses of those financial assets.

Other assets

Accrued items and other non-financial assets are carried at amortized cost. The Group recognizes contract assets under the balance sheet position "Other non-financial assets." A contract asset is a right to consideration in exchange for goods or services transferred to the customer. If the Group performs by transferring goods or services to a customer before the customer pays consideration or before payment is due, a contract asset is recognized for the earned consideration that is conditional.

Property, plant and equipment

Property, plant and equipment are measured at amortized cost. This comprises any costs directly attributable to bringing the asset to the condition necessary for it to be capable of operating in the manner intended by management less any accumulated depreciation and accumulated impairment losses. Depreciation is recognized for those assets, with the exception of land and construction in progress, over the estimated useful life utilizing the "straight-line method" and taking into account any potential residual value. Parts of an item of property, plant and equipment with a cost that is significant in relation to the total cost of the item are depreciated separately.

The estimated useful lives of property, plant and equipment are as follows:

TABLE OF USEFUL LIVES OF PROPERTY, PLANT AND EQUIPMENT

	Useful life in years
Vehicles	5
Office equipment	3 – 10
Leasehold improvements	5 – 10

Expenditure for repairs and maintenance is expensed as incurred. Renewals and improvements are capitalized and depreciated separately, if the recognition criteria are met.

Gains and losses on disposals are determined by comparing the proceeds with the carrying amount and are recognized within "Other operating income/expenses."

Intangible assets and goodwill

Goodwill

Goodwill represents the excess of the cost of an acquisition over the fair value of the Group's share of the net identifiable assets of the acquired subsidiary on the date of acquisition. Goodwill is tested annually for impairment and carried at cost less accumulated impairment losses. Impairment losses on goodwill are not reversed. Gains and losses on the disposal of an entity include the carrying amount of goodwill relating to the entity sold.

Goodwill is allocated to cash-generating units (CGUs) for the purpose of impairment testing. The allocation is made to those cash-generating units or groups of cash-generating units that are expected to benefit from the business combination in which the goodwill arose. For purposes of internal and external reporting, the activities of Nemetschek Group are broken down into the Design, Build, Manage and Media & Entertainment segments. The budget for 2020 and the medium-term planning for the subsequent years were drawn up on the basis of this reporting structure.

Intangible assets (except goodwill)

Separately acquired intangible assets are shown at historical cost less accumulated amortization. Intangible assets acquired in a business combination are recognized at fair value on the acquisition date. Intangible assets which have a finite useful life will be amortized over their estimated useful lives. Amortization is calculated using the straight-line method. Intangible assets which are determined to have indefinite useful lives as well as intangible assets not yet available for use are not amortized, but instead tested for impairment at least annually. Furthermore, intangible assets which are determined to have indefinite useful lives and therefore are not amortized, will be reviewed each period to determine whether events and circumstances continue to support an indefinite useful life assessment for these assets. As in the previous year, the Group has no intangibles with an indefinite useful life.

The Group's intangibles are not qualifying assets in accordance with IAS 23. Therefore no borrowing costs are capitalized.

The useful lives of intangible assets acquired in a business combination are estimates based on the economics of each specific asset which were determined in the process of the purchase price allocation. The major part of these assets are brand names, software, customer relationships and non-compete agreements. Intangibles acquired in a business combination are amortized as follows:

USEFUL LIFE OF INTANGIBLE ASSETS FROM THE PURCHASE PRICE ALLOCATION

	Useful life in years
Brand name	10 – 15
Software	5 – 12
Customer relationship	10 – 25
Non-compete agreement	2 – 3

Development costs

Costs of research are expensed in the period in which they are incurred. Costs for development activities, whereby research findings are applied to a plan or design for the development of new or substantially improved intangible asset, are capitalized if development costs can be measured reliably, the product or process is technically and commercially feasible and future economic benefits are probable. Furthermore, Nemetschek Group intends, and has sufficient resources, to complete development and use or sell the intangible asset. In the financial year 2019, as well as in the previous year, none of the development projects fulfilled the capitalization criteria. Development costs in the amount of EUR 133,253k (previous year: EUR 110,416k) are carried as expenses.

Impairment of non-financial assets

Assets with a finite useful life

For assets with a finite useful life, an impairment test is needed if there are indications that those assets may be impaired. If such indications exist, the amortized carrying value of the asset is compared to the recoverable amount, which is the higher of an asset's fair value less costs to sell and its value in use. The value in use is the discounted present value of future cash flows expected to arise from the continuing use of the asset. In the case of an impairment, the difference between the amortized carrying amount and the lower recoverable amount is recognized as an expense in profit or loss. If evidence exists that the reasons for the impairment no longer exist, the impairment loss is reversed. The reversal cannot result in an amount exceeding amortized cost.

Goodwill and other assets with an indefinite useful life

Intangible assets with an indefinite useful life, intangible assets not yet ready for use or advance payments on such assets as well as goodwill must be tested for impairment annually. A test is also performed whenever there is any indication that an asset might be impaired. Where the reasons for an impairment no longer exist, the impairment loss is reversed, except in the case of goodwill.

The recoverable amount is determined for each individual asset, unless an asset generates cash inflows that are not largely independent of those from other assets or other groups of assets or cash-generating units. In these cases, the impairment test is performed at the relevant level of cash-generating units to which the asset is attributable. Where the recoverable amount of the cash-generating unit (group of cash-generating units) is less than the carrying amount, an impairment loss is recognized.

Nemetschek determines the recoverable amount of the relevant unit to which the goodwill is allocated based on the value in use. The value in use is calculated using a discount rate from the present value of the future cash flows from the use of this unit.

The determination of the future cash flows and their underlying parameters such as revenue growth and EBITDA margin is performed on the basis of the knowledge gained in the past, the current economic results and the budgets approved over a period of three to five years. The budgeting for the financial year 2020 is prepared applying certain uniform Group assumptions "from the bottom to the top" (bottom-up method). The cash flows for the further budget years follow similar premises, however they are not at the same level of detail as the first budget year. Estimates for periods beyond the budgeting horizon are made using the perpetuity method. The growth rates applied here do not account for capacity expanding investments for which cash flows have not yet been made. These are derived from available market studies by market research institutes and do not exceed the long-term average historical growth rates of the relevant cash-generating units. In the financial year 2019 a growth rate of up to 2.0% (previous year: 2.0%) was assumed.

The discount rate required for discounting future cash flows is calculated from the weighted average cost of capital (WACC) of the related cash-generating unit or group of cash-generating units after tax. The relevant pre-tax WACC in accordance with IAS 36 is derived from future cash flows after tax and the after-tax WACC applying typical tax rates for each cash-generating unit. Then, the risk-free interest rate according to the Svensson method with accounting for risk premiums, and the beta as well as the gearing ratio are derived from a group of comparable entities. The discount rate thus estimated reflects the current market returns as well as the specific risk of the respective cash-generating unit or group of cash-generating units. The discount rate applied to derive the present value of the cash flow forecasted ranges between 12.92% and 13.50% (previous year: 11.48% and 13.83%) before tax.

Leases

The Group has applied IFRS 16 using the modified retrospective approach and therefore the comparative information has not been restated and continues to be reported under IAS 17 and IFRIC 4.

Policy applicable from January 1, 2019

At inception of a contract, the Group assesses whether a contract is, or contains, a lease. A contract is, or contains, a lease if the contract conveys the right to control the use of an identified asset for a period of time in exchange for consideration.

At commencement or on modification of a contract that contains a lease component, the Group allocates the consideration in the contract to each lease component on the basis of its relative stand-alone prices. However, for the leases of vehicles and office equipment the Group has elected not to separate non-lease components and account for the lease and non-lease components as a single lease component.

The Group recognizes a right-of-use asset and a lease liability at the lease commencement date. The right-of-use asset is initially measured at cost, which comprises the initial amount of the lease liability adjusted for any lease payments made at or before the commencement date, plus any initial direct costs incurred and an estimate of costs to dismantle and remove the underlying asset or to restore the underlying asset or the site on which it is located, less any lease incentives received.

The right-of-use asset is subsequently depreciated using the straight-line method from the commencement date to the end of the lease term, unless the lease transfers ownership of the underlying asset to the Group by the end of the lease term or the cost of the right-of-use asset reflects that the Group will exercise a purchase option. In that case the right-of-use asset will be depreciated over the useful life of the underlying asset, which is determined on the same basis as those of property, plant and equipment. In addition, the right-of-use asset is periodically reduced by impairment losses, if any, and adjusted for certain remeasurements of the lease liability.

The Group recognizes leasehold improvements as an item of property, plant and equipment. Related payments by a lessor are recognized as deferred income if the definition of lease incentives according to IFRS 16 is not met.

The lease liability is initially measured at the present value of the lease payments that are not paid at the commencement date, discounted using the interest rate implicit in the lease or, if that rate cannot be readily determined, the Group's incremental borrowing rate. Generally, the Group uses its incremental borrowing rate as the discount rate.

Lease payments included in the measurement of the lease liability comprise the following:

- » fixed payments, including in-substance fixed payments
- » variable lease payments that depend on an index or a rate, initially measured using the index or rate as at the commencement date
- » amounts expected to be payable under a residual value guarantee; and
- » the exercise price under a purchase option that the Group is reasonably certain to exercise, lease payments in an optional renewal period if the Group is reasonably certain to exercise an extension option, and penalties for early termination of a lease unless the Group is reasonably certain not to terminate early

The lease liability is measured at amortized cost using the effective interest method. It is remeasured when there is a change in future lease payments arising from a change in an index or rate, when there is a change in the Group's estimate of the amount expected to be payable under a residual value guarantee, when the Group changes its assessment of whether it will exercise a purchase, extension or termination option or when there is a revised in-substance fixed lease payment.

When the lease liability is remeasured in this way, a corresponding adjustment is made to the carrying amount of the right-of-use asset, or is recorded in profit or loss if the carrying amount of the right-of-use asset has been reduced to zero.

The Group has elected not to recognize right-of-use assets and lease liabilities for leases of low-value assets and short-term leases, including IT equipment. The Group recognizes the lease payments associated with these leases as an expense on a straight-line basis over the lease term.

Policy applicable before January 1, 2019

In the comparative period, as a lessee the Group classified leases that transferred substantially all of the risks and rewards of ownership as finance leases. When this was the case, the leased assets were measured initially at an amount equal to the lower of their fair value and the present value of the minimum lease payments. Minimum lease payments were the payments over the lease term that the lessee was required to make, excluding any contingent rent. Subsequent to initial recognition, the assets were accounted for in accordance with the accounting policy applicable to that asset.

Assets held under other leases were classified as operating leases and were not recognized in the Group's statement of financial position. Payments made under operating leases were recognized in profit or loss on a straight-line basis over the term of the lease. Lease incentives received were recognized as an integral part of the total lease expense over the term of the lease.

Financial liabilities

Financial liabilities primarily include trade payables, borrowings and other financial liabilities. Upon initial recognition, financial liabilities are measured at fair value. In the case of all financial liabilities which are subsequently not classified at fair value through profit or loss, the transaction costs which are directly attributable to the purchase will be recognized.

Financial liabilities measured at amortized cost

After initial recognition, financial liabilities are carried at amortized cost using the effective interest method. Trade payables, borrowings and other financial liabilities, in particular, are classified in this category.

Financial liabilities at fair value through profit or loss

Financial liabilities at fair value through profit or loss include derivative financial instruments (e.g. interest rate swaps) and contingent consideration. Gains or losses on financial liabilities that are measured at fair value through profit or loss are included in profit or loss.

Financial liabilities are derecognized when the contractual obligation is discharged or canceled, or has expired.

Derivative financial instruments

Derivatives are initially recognized at fair value on the date on which a derivative contract is entered into and are subsequently remeasured at fair value. Derivative financial instruments are carried as assets when the fair value is positive and as liabilities when the fair value is negative. Any gains or losses arising from changes in fair value of derivatives during the year that do not qualify for hedge accounting are taken directly to profit or loss.

Offsetting of financial instruments

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

Provisions

Provisions are recognized when the Group has a present obligation (legal or factual) as a result of a past event, and it is probable that an outflow of resources embodying economic benefits will be required to settle the obligation and a reliable estimate can be made of the amount of the obligation. Provisions and accrued expenses which do not already lead to an outflow of resources in the subsequent year are measured at their discounted settlement amount at the balance sheet date where the interest effect is material. Where the Group expects some or all of a provision to be reimbursed (e.g. under an insurance contract) the reimbursement is recognized as a separate asset if the reimbursement is virtually certain. The expense relating to any provision is presented in profit or loss net of any reimbursement.

Deferred revenue

Prepayments from customers are reported as deferred revenue. As soon as the Group performs under the contract, these are recognized as revenue.

Employee benefits

Short-term employee benefits

Short-term employee benefits include wages, social security contributions, vacation and sickness pay. They are recognized with the undiscounted amount to be paid in exchange for the service rendered by the employee.

Pensions

The Group provides a company pension plan for certain employees. The provisions are measured every year by reputable independent appraisers. Provisions for pensions are determined using the projected unit credit method. The projected unit credit method considers each period of service as giving rise to an additional unit of benefit entitlement and measures each unit separately to build up the final obligation. The pension obligation less plan assets is recorded as the provision in the balance sheet. Actuarial gains and losses are recorded in other comprehensive income. Effects resulting from interests are disclosed accordingly in interest result.

Termination benefits

Termination benefits are payable when employment is terminated by the Group before the normal retirement date, or whenever an employee accepts voluntary redundancy in exchange for these benefits. Termination benefits are recognized as a liability and expense on the earlier date of:

- » when the entity can no longer withdraw the offer of those benefits; or
- » when the entity recognizes costs for a restructuring that is within the scope of IAS 37 and involves the payment of termination benefits.

Benefits falling due more than 12 months after the balance sheet date are discounted to their present value.

Provisions for other long-term employee benefits

Other long-term employee benefits such as anniversary allowances are comprised of the present value of future payment obligations to the employee less any associated assets measured at fair value. Gains and losses from the remeasurement are recognized in profit or loss in the period in which they are incurred.

Contingent liabilities

Contingent liabilities are possible obligations that arise from past events and whose existence will be confirmed only by the occurrence of one or more uncertain future events not wholly within the control of the Group. Contingent liabilities are not recognized in the consolidated financial statement of financial position but are disclosed and explained in the Notes.

Taxes

Current income taxes

Current income taxes are calculated within the Nemetschek Group on the basis of tax legislation applicable in the relevant countries. To the extent that judgement was necessary to determine the treatment and amount of tax items presented in the financial statements, there is in principle a possibility that local tax authorities may take a different position.

Deferred taxes

Deferred taxes are recognized on all temporary differences between the tax and accounting bases of assets and liabilities and on consolidation procedures. No deferred tax is recognized for non-tax-deductible goodwill. The deferred taxes are measured at the applicable tax rates related to the period when the temporary differences are expected to reverse. Changes in tax rates are recognized once the rate has been substantially enacted. Deferred tax assets are not recognized if it is not probable that they will be realized in the future.

Revenues

Revenue is measured based on the consideration specified in a contract with a customer and excludes amounts collected on behalf of third parties. The Group recognizes revenue when it transfers control over a good or service to a customer.

The following is a description of principal activities from which the Group generates its revenue.

Software

Standard software

Standard software only includes the software performance obligation. Revenue from standard software is recognized when control of the software passes on to the customer. Control of the software (saved on hardware, i.e. USB-Stick, CD-ROM) passes on to the customer after the hardware is shipped to the customer or a link for downloading the software is sent to the customer.

Software rental models

The Nemetschek Group's software rental models usually include the performance obligations "Software" and "User support" or "Upgrade." The performance obligation "User support" / "Upgrade" is a "stand-ready obligation" which is recognized straight-line over the period during which the service is rendered. For recognition of the performance obligation "Software," the Nemetschek Group distinguishes between two different models:

- » For software rental models that include access to the most recent version of the corresponding application via servers provided by Nemetschek Group companies, revenue is recognized straight-line over the term of the contract.
- » In case the customer runs the application directly on the customer's own system, revenue is recognized at the point in time the customer has control over the software. The allocation of revenue to "Software" and other performance obligations is based on the residual value method or on the adjusted market assessment approach.

Sales transactions via sales representatives/agents

In the case of sales transactions with end customers via sales representatives, the income from the sale is recorded as of the point in time that ownership is transferred to the end customer. The sales representative serves only in the function of an agent in such transactions, for which he/she receives a commission. The Nemetschek Group acts as the principal; Nemetschek has primary responsibility for fulfillment of the contract and influence on pricing of such.

Maintenance/Software maintenance contracts

The performance obligations in the case of software service contracts can be subdivided into two material obligations. On the one hand, user support, which is available to the customer for the entire term of the contract. On the other hand, with software service contracts, customers receive the most recent version of the corresponding Nemetschek software by getting software updates. However, it is at the discretion of the Group to decide the intervals at which new versions of the software will be provided and what functionalities and/or modules of the corresponding software will be changed, modified, reduced or extended. In the case of demand for software versions and user support which are not further defined, these are stand-ready obligations according to IFRS 15, for which revenue is recognized straight-line over the term of the contract. Advance payments received from customers for software maintenance contracts are carried as deferred revenue (contract liability) and normally lead to revenue within the next twelve months.

Consulting

Consulting services constitute in general separate performance obligations for which revenue is recognized in the period in which they were rendered. In the case that they do not constitute separate performance obligations, consulting services are combined with other contract components to a bundle and recognized in accordance with the provisions of IFRS 15.

Hardware

Revenue from hardware sales is usually recognized at the point in time of the transfer of control to the customer. Hardware revenue is of minor significance to the Nemetschek Group.

Training

Revenue from trainings is recognized after the service has been rendered on account of the short period of time during which the service is rendered.

Development subsidies

Development subsidies for basic research are recorded on the basis of hours worked. These are recognized as other operating income in the consolidated financial statements. Government grants are recognized at their fair value where there is reasonable assurance that the grant will be received and all related conditions will be complied with. Special-purpose development subsidies are treated as deductions from acquisition costs.

Segment reporting

The resource allocation and the measurement of profitability of the business segments are performed by the executive board as the main decision-maker. The allocation of segments and regions as well as the selection of key figures is in agreement with the internal controlling and reporting system ("management approach").

The operating business segments are organized and managed separately according to the nature of the products and services provided. Each segment represents a strategic business unit whose product range and markets differ from those of the other segments.

For the purpose of managing the company, management has organized the Group into four operational business segments: Design, Build, Manage and Media & Entertainment which form four reportable segments.

Post balance sheet events

Events after the balance sheet date that provide additional information about the Group's position at the balance sheet date (reportable events) have been taken into account in the financial statements as required. Non-adjusting events after the balance sheet date are stated in the notes to the consolidated financial statements if they are material.

Significant discretionary decisions, estimates and assumptions when preparing the consolidated financial statements

In the process of preparing the consolidated financial statements, management has made discretionary decisions, estimates and assumptions that have an effect on the income, expenses, assets and liabilities recognized as at the balance sheet date as well as on the disclosure of contingent liabilities. The uncertainty relating to these assumptions and estimates could lead to results that may require material adjustment to the carrying amounts of the assets and liabilities concerned in the future. The most important assumptions concerning the future and other key sources of estimation uncertainty that have a significant risk of causing a material adjustment to the carrying amounts of assets and liabilities within the next financial year are analyzed below.

Impairment of non-financial assets

The Group assesses at each balance sheet date whether there are any indications that a non-financial asset may be impaired. Goodwill and other intangible assets with indefinite useful lives as well as intangible assets not yet available for use are tested for impairment at least once a year or whenever there is evidence that they might be impaired. The determination of the recoverable amount of an asset or cash-generating unit, in connection with which the asset generates independent cash inflows, is associated with estimates by company management. These estimates are influenced by certain factors such as expected economic development or successful integration of acquired companies. The recoverable amount is the higher of an asset's fair value less costs to sell and its value in use. Nemetschek generally determines these amounts using discounted cash flow measurements. The discounted cash flows are generally based on three- to five-year forecasts. The forecasts account for experiences of the past and current operating results and are based on market assumptions as well as management's best estimate of future developments. Cash flows outside the forecast period are extrapolated, with the application of individual growth rates. Important assumptions upon which the recoverable amount is based include growth rates and weighted average capital cost rates. The estimates and the method on which these are based can have a substantial influence on the relevant values and, ultimately, on the amount of a potential impairment loss on the asset to be tested. The estimates of growth rates account for inflation and market growth expectations. Other non-financial assets are tested for impairment when there is evidence that their carrying amount might exceed their recoverable amount. Estimating a value in use requires management to make an estimate of the expected future cash flow of the asset or cash-generating unit and also choose a suitable discount rate in order to calculate the present value of those cash flows.

Determination of fair values as part of the purchase price allocation

Acquired businesses are accounted for using the acquisition method, which requires that the assets acquired and liabilities assumed be recorded at their respective fair values on the date Nemetschek obtains control. The application of the acquisition method requires certain estimates and assumptions to be made, especially concerning the fair values of the acquired intangible assets at the acquisition date, and their useful lives. Measurement is based to a large extent on anticipated cash flows. If actual cash flows vary from those used in calculating fair values, this may materially affect the Group's future results of operations.

Determination of fair values for contingent consideration

The Group sometimes enters into contingent consideration arrangements. The arrangements depend on the future development of specific indicators of success and are measured at fair value as of the date of the acquisition. When determining the fair value, the Group estimates the likelihood and timing of achieving the arrangement's relevant milestones. When applying a probability assessment for each of the potential outcomes, the Group needs to exercise judgment.

Deferred tax assets

Deferred tax assets are recognized for all unused tax losses to the extent that it is probable that taxable profit will be available in the future so that the loss carryforwards can actually be utilized. A significant degree of judgement must be exercised by management to determine the amount of deferred tax assets that can be recognized, based upon the likely timing and level of future taxable profits together with future tax planning strategies.

Allowances for expected credit losses of trade receivables

The determination of expected credit defaults in the case of trade receivables is based on historical values which are adjusted to account for information relating to the future. Material (special) effects from the past may distort risk provisioning, which may make correction necessary.

Scope of consolidation

With Nemetschek Group, the consolidated financial statements contain all domestic and foreign companies which Nemetschek SE controls directly or indirectly.

In **2019** the scope of consolidation changed as follows:

- » In the first quarter, Spacewell acquired 100% of the shares in Axserion Group B.V.
- » In the second quarter, Maxon Computer, Inc. acquired 100% of the shares in Redshift Rendering Technologies Inc.
- » The liquidation of Nemetschek OOO was completed. The entity was deconsolidated in the fiscal year.

In **2018** the scope of consolidation changed as follows:

- » In the second quarter NEVARIS Bausoftware GmbH acquired 100% of the shares in 123erfasst.de GmbH.
- » In the third quarter Nemetschek SE acquired 100% of the shares in Spacewell. Also, Vectorworks, Inc. acquired 100% of a Canadian distributor.
- » Deconsolidation of Scia do Brasil Software Ltda, SCIA Inc. and Online Projects BVBA due to liquidation.

For a detailed overview of Nemetschek Group's shareholdings, please refer to the following chart:

AFFILIATED ENTITIES

Name, registered office of the entity	Shareholding in %
Design segment	
Allplan Česko s.r.o., Prague, Czech Republic	100.00
Allplan Deutschland GmbH, Munich*	100.00
Allplan Development Germany GmbH, Munich*	100.00
Allplan France S.A.R.L., Paris, France	100.00
Allplan GmbH, Munich*	100.00
Allplan Infrastructure GmbH, Graz, Austria	100.00
Allplan Inc., West Chester, United States	100.00
Allplan Italia S.r.l., Trient, Italy	100.00
Allplan Österreich Ges.m.b.H., Wals-Siezenheim, Austria	100.00
Allplan Schweiz AG, Wallisellen, Switzerland	93.33
Allplan Slovensko s.r.o., Bratislava, Slovakia	100.00
Allplan Systems España S.A., Madrid, Spain	100.00
Allplan UK Ltd., Ashby-de-la-Zouch, Great Britain	100.00
Dacoda GmbH, Rottenburg	100.00
Data Design System AS, Klepp Stasjon, Norway	100.00
Data Design System GmbH, Ascheberg	100.00
Data Design System UK Ltd., Wiltshire, Great Britain	100.00
DDS Building Innovation AS, Klepp Stasjon, Norway	100.00
dRofus AB, Stockholm, Sweden	100.00
dRofus AS, Oslo, Norway	100.00
dRofus Inc., Lincoln, United States	100.00
dRofus Pty Ltd, North Sydney, Australia	100.00
Frilo Software GmbH, Stuttgart*	100.00
Graphisoft Asia Ltd., Hong Kong, China	100.00
Graphisoft Brasil Serviços de Tecnologia da Informação Ltda, São Paulo, Brazil	100.00
Graphisoft Deutschland GmbH, Munich*	100.00
Graphisoft Italia S.R.L., Spinea, Italy	100.00
Graphisoft Japan Co., Tokyo, Japan	100.00
Graphisoft México S.A. de C.V., Mexico D.F., Mexico	100.00
Graphisoft North America, Inc., Waltham, Massachusetts, United States	100.00
Graphisoft SE, Budapest, Hungary	100.00
Graphisoft UK Ltd., Uxbridge, Great Britain	100.00
Nemetschek Austria Beteiligungen GmbH, Mondsee, Austria	100.00
Precast Software Engineering Co. Ltd., Shanghai, China	100.00
Precast Software Engineering GmbH, Puch bei Hallein, Austria	100.00
Precast Software Engineering Pte. Ltd., Singapore	100.00
RISA Tech, Inc., Foothill Ranch, United States	100.00
Scia CZ s.r.o., Prague, Czech Republic	100.00
Scia France S.A.R.L., Lille, France	100.00
SCIA Group International nv, Hasselt, Belgium	100.00
Scia Nederland B.V., Arnhem, Netherlands	100.00
Scia nv, Hasselt, Belgium	100.00
Scia SK s.r.o., Zilina, Slovakia	100.00

Solibri DACH GmbH, Hamburg	100.00
Solibri LLC, Scottsdale, United States	100.00
Solibri Oy, Helsinki, Finland	100.00
Solibri UK Ltd., Leeds, Great Britain	100.00
Vectorworks Canada, Inc., Vancouver, BC, Canada	100.00
Vectorworks UK, Ltd., Newbury, Great Britain	100.00
Vectorworks, Inc., Columbia, Maryland, United States	100.00
Build segment	
123erfasst.de GmbH, Lohne	100.00
Bluebeam AB, Kista, Sweden	100.00
Bluebeam Holding, Inc., Delaware, United States	100.00
Bluebeam GmbH, Munich	100.00
Bluebeam, Inc., Pasadena, United States	100.00
Bluebeam Limited UK, Ltd., London, Great Britain	100.00
Design Data Corporation, Lincoln, United States	100.00
NEVARIS Bausoftware GmbH, Bremen*	100.00
NEVARIS Bausoftware GmbH, Elixhausen, Austria	100.00
Nevaris BIM Software GmbH, Berlin – in liquidation	100.00
SDS/2 Ltd., London, Great Britain	100.00
Manage segment	
Crem Solutions GmbH & Co. KG, Ratingen	100.00
Crem Solutions Verwaltungs GmbH, Munich	100.00
Spacewell International NV, Antwerp, Belgium	100.00
FASEAS NV, Antwerp, Belgium	100.00
MCS Americas Single Member LLC, New York, United States	100.00
MCS NV, Antwerp, Belgium	100.00
MCS Solutions Private Ltd., Hyderabad, India	100.00
myMCS AB, Knivsta, Sweden	100.00
Axxerion Group B.V., Heteren, Netherlands (consolidated since January 18, 2019)	100.00
Axxerion B.V., Heteren, Netherlands (consolidated since January 18, 2019)	100.00
Axxerion International B.V., Heteren, Netherlands (consolidated since January 18, 2019)	100.00
Plandatis Beheer B.V., Apeldoorn, Netherlands (consolidated since January 18, 2019)	100.00
Plandatis B.V., Apeldoorn, Netherlands (consolidated since January 18, 2019)	100.00
Media & Entertainment segment	
MAXON Computer Canada, Inc., Montreal, Canada	100.00
MAXON Computer GmbH, Friedrichsdorf	100.00
MAXON Computer, Inc., Newbury Park, United States	100.00
MAXON Computer Ltd., Bedford, Great Britain	100.00
Redshift Rendering Technologies, Inc., Newport Beach, United States (consolidated since April 1, 2019)	100.00
Other	
Nemetschek, Inc., Washington, United States	100.00

* In the fiscal year 2019, the entities exercised the exemptions of Sec. 264 (3) HGB as follows:

- Option not to prepare notes to the financial statements (Frilo Software GmbH and Allplan Deutschland GmbH, Allplan Development Germany GmbH, Graphisoft Deutschland GmbH und NEVARIS Bausoftware GmbH).
- Option not to prepare a management report (Allplan GmbH, Allplan Deutschland GmbH, Allplan Development Germany GmbH, Graphisoft Deutschland GmbH und NEVARIS Bausoftware GmbH).
- Option not to publish the annual financial statements.
- Option not to audit the annual financial statements (Allplan GmbH, Allplan Deutschland GmbH, Allplan Development Germany GmbH und NEVARIS Bausoftware GmbH).

Business combinations

Acquisitions in 2019

Axxerion Group B.V., MR Heteren, Netherlands

Under the purchase agreement of January 11, 2019, Spacewell acquired 100% of the shares of Axxerion Group B.V., MR Heteren, Netherlands. The transfer of benefits and encumbrances was completed as at the end of January 19, 2019. Axxerion Group B.V. is one of the leading providers of cloud-based software solutions for facility management and property management. Spacewell acquired the company because it strengthens competence in building operations. The fair values of the identifiable assets and liabilities of Axxerion Group B.V. as at the date of acquisition were:

AXXERION

Thousands of €	2019
Goodwill	54,905
Intangible assets	31,333
Property, plant and equipment	201
Right-of-use assets	1,670
Trade receivables	2,479
Other current assets	88
Cash and cash equivalents	3,383
Total assets acquired	94,058
Deferred tax liabilities	8,006
Long-term debts	1,660
Trade payables	353
Other current liabilities	3,957
Deferred revenue	3,236
Total liabilities assumed	17,211
Net assets acquired	76,848
Purchase consideration transferred	76,848

The identified goodwill represents synergies in the Manage segment. None of the goodwill recognized is expected to be deductible for tax purposes. The fair value of the trade receivables amounts to EUR 2,479k, the gross amount of trade receivables is EUR 2,488k. It is expected that the full contractual amounts can be collected.

The purchase consideration transferred consists of EUR 76,848k in cash which results in a net cash flow on acquisition of EUR 73,465k.

Since joining the Group, the company has generated revenues of EUR 12.1 million and an EBITDA of EUR 3.0 million. If Axxerion Group B.V. had been in the Group for the entire 2019 financial year, it would have contributed to the consolidated earnings with revenue in the amount of EUR 12.6 million and an EBITDA of EUR 3.1 million.

Redshift Rendering Technologies, Inc., Newport Beach, United States

With the purchase agreement of April 5, 2019, Maxon Computer, Inc., acquired 100% of the shares of Redshift Rendering Technologies, Inc. Redshift offers a powerful and flexible GPU-based rendering solution for the creation of visual effects, animations and animated graphics. Maxon acquired Redshift because it strengthens competence in market for 3D content creation and rendering.

The preliminary fair values of the identifiable assets and liabilities of Redshift Rendering Technologies, Inc. as at the date of acquisition were:

REDSHIFT

Thousands of €	2019
Goodwill	24,334
Intangible assets	9,807
Property, plant and equipment	24
Right-of-use assets	227
Other non-current assets	8
Trade receivables	41
Other current assets	139
Cash and cash equivalents	3,098
Total assets acquired	37,677
Deferred tax liabilities	2,932
Long-term debts	142
Current debts	85
Other current liabilities	32
Deferred revenue	1,377
Total liabilities assumed	4,568
Net assets acquired	33,109
Purchase consideration transferred	33,109

The fair value of the trade receivables amounts to EUR 41k which is also the gross amount of trade receivables. It is expected that the full contractual amounts can be collected. The identified goodwill represents synergies in the Media & Entertainment segment. None of the goodwill recognized is expected to be deductible for tax purposes.

As part of the purchase agreement with the previous owner, a contingent consideration has been agreed. There will be additional cash payments to the previous owners of up to EUR 7,567k if specified revenue targets and earnings targets as well as technical milestones are met. As at the acquisition date, the fair value of the contingent consideration was estimated to be EUR 5,778k.

As at December 31, 2019 the first technical milestone is met. The fair value of the contingent consideration determined at December 31, 2019 in the amount of EUR 6,078k reflects this development, among other factors. The remeasurement charge has been recognized through profit or loss.

The purchase consideration transferred consists of EUR 27,331k in cash and of a contingent consideration liability in the amount of EUR 5,778k which results in a net cash flow on acquisition of EUR 24,233k.

Since joining the Group, the company has generated revenues of EUR 4.7 million and an EBITDA of EUR 1.9 million. If Redshift had been in the Group for the entire 2019 financial year, it would have contributed to the consolidated earnings with revenue in the amount of EUR 6.3 million and an EBITDA of EUR 2.6 million.

Vectorworks, Inc., Columbia, Maryland, United States

Under the purchase agreement of August 7, 2019, Vectorworks, Inc. acquired the technology and customer relationships of a distributor within the scope of an asset deal, meeting the criteria for a business combination. The purchase price amounted to EUR 223k. On the basis of the purchase price allocation, technology amounting to EUR 85k and customer relationships amounting to EUR 27k were recognized. The resulting goodwill amounted to EUR 111k.

Acquisitions in 2018

Spacewell, Antwerp, Belgium

Under the purchase agreement of August 28, 2018, Nemetschek SE acquired 100% of the shares of Spacewell, Antwerp, Belgium. Spacewell offers modular and integrated software solutions for real estate management, facility management and workplace management of large privately owned and public organizations. Moreover, Spacewell developed the intelligent smart building platform COBUNDU™, which uses Internet of Things (IoT) sensors and big data analyses in order to optimize productivity and efficiency for building administrators. With the acquisition of Spacewell, the Nemetschek Group is opening up the dynamically growing market in building management. Spacewell was initially included in the consolidated financial statements of the Group as at September 1, 2018.

For this acquisition of shares, there were payments amounting to EUR 46,103k in the 2018 financial year. The fair value of the identifiable assets and liabilities of Spacewell as at the date of acquisition were:

SPACEWELL

Thousands of €	2018
Goodwill	33,626
Intangible assets	18,889
Property, plant and equipment	410
Other non-current assets	642
Trade receivables	4,000
Other current assets	464
Cash and cash equivalents	656
Total assets acquired	58,687
Deferred tax liabilities	3,347
Long-term debts	1,005
Current debts	2,887
Trade payables	2,598
Other current liabilities	1,268
Deferred revenue	1,479
Total liabilities assumed	12,584
Net assets acquired	46,103
Purchase consideration transferred	46,103

The incidence of payment defaults in connection with trade receivables is not anticipated. This estimation is based on historical values from the past. Thus, the gross amount of trade receivables corresponds to their fair value.

The net assets recognized in the December 31, 2018 financial statements were based on a preliminary assessment. In 2019, the valuation was completed and the acquisition date fair value of intangible assets was EUR 18,889k, an increase of EUR 594k over the provisional value. As a result, there was an increase in the deferred tax liability of EUR 69k and a corresponding reduction in goodwill of EUR 525k.

The identified goodwill represents synergies in the Manage segment. None of the goodwill recognized is expected to be deductible for tax purposes.

Since joining the Group, the company has generated revenues of EUR 5.0 million and an EBITDA of EUR 0.5 million in 2018. If Spacewell had been in the Group for the entire 2018 financial year, it would have contributed to the consolidated earnings with revenue in the amount of EUR 14.5 million and an EBITDA of EUR 1.6 million.

123erfasst.de GmbH, Lohne, Germany

Under the purchase agreement of June 14, 2018, NEVARIS Bausoftware GmbH acquired 100% of the shares in 123erfasst.de GmbH, Lohne, Germany. The transfer of benefits and encumbrances was completed as at the end of July 2, 2018. 123erfasst offers an advanced app which uses a conventional smartphone to transmit data such as time, performance, location, weather, material, device use and photos for documenting construction sites in real time straight from the employee to the office.

The fair value of the identifiable assets and liabilities of 123erfasst.de GmbH as at the date of acquisition were:

123ERFASST.DE GMBH

Thousands of €	2018
Goodwill	10,986
Intangible assets	8,239
Property, plant and equipment	69
Other non-current assets	0
Trade receivables	308
Other current assets	65
Cash and cash equivalents	285
Total assets acquired	19,953
Deferred tax liabilities	2,255
Other current provisions	274
Trade payables	59
Other current liabilities	165
Other non-current financial liabilities	55
Total liabilities assumed	2,808
Net assets acquired	17,145
Purchase consideration transferred	17,145

The incidence of payment defaults in connection with trade receivables is not anticipated. This estimation is based on historical values from the past. Thus, the gross amount of trade receivables corresponds to their fair value.

The net assets recognized in the December 31, 2018 financial statements were based on a preliminary assessment. In 2019, the valuation was completed and the acquisition date fair value of intangible assets was EUR 8,239k, an increase of EUR 67k over the preliminary value. As a result, there was an increase in the deferred tax liability of EUR 18k and a corresponding reduction in goodwill of EUR 49k.

The identified goodwill represents synergies in the Build segment. None of the goodwill recognized is expected to be deductible for tax purposes.

The acquisition of shares resulted in payments in the amount of EUR 14,492k in the 2018 financial year. In addition, there is a subsequent purchase price obligation (earn-out component)

based on the achievement of revenue targets in the 2020 financial year. Within the scope of the preliminary estimate, this obligation was estimated at EUR 2,653k. Due to a change in the business model in 2019, the probability that the targets will be met decreased. The fair value of the contingent consideration in the amount of EUR 684k as at December 31, 2019 reflects this development.

Since joining the Group, the company has generated revenues of EUR 1.3 million and an EBITDA of EUR 0.5 million. If 123erfasst. de GmbH had been in the Group for the entire 2018 financial year, it would have contributed to the consolidated earnings with revenue in the amount of EUR 2.4 million and an EBITDA of EUR 0.9 million.

Vectorworks Canada, Inc., Vancouver, BC, Canada

Under the purchase agreement of September 25, 2018, Vectorworks, Inc., Columbia, USA acquired 100% of a Canadian distributor, extending its Canadian sales network and integrating the distributor in the Vectorworks Group entity. The purchase price amounted to EUR 141k. On the basis of the purchase price allocation, mainly intangible assets for customer relationships amounting to EUR 103k were recognized.

Under the purchase agreement of September 24, 2018, Vectorworks, Inc., Columbia acquired the customer relationships of a distributor within the scope of an asset deal, meeting the criteria for a business combination. The purchase price amounted to EUR 320k. On the basis of the purchase price allocation, customer relationships amounting to EUR 224k were recognized. On the basis of the purchase price allocation, the resulting goodwill amounted to EUR 96k.

Project Atlas

On June 12, 2018, within the scope of an asset deal, Bluebeam, Inc. acquired all material assets of the private company Project Atlas, LLC. Project Atlas developed a digital mapping module that organizes and visualizes 2D plans and construction data using site data instead of traditional folder structures. This location-based approach makes it possible for experts from the architecture and building sectors to create and search through a flawless digital overview of their project.

The purchase price amounted to EUR 3,100k; within the scope of the purchase price allocation, the amount of EUR 362k was distributed for technology, EUR 82k for the customer base and EUR 106k for the brand names. The goodwill resulting from the acquisition amounted to EUR 2,550k.

Notes to the consolidated statement of comprehensive income

[1] Revenue

Revenue recognized in the period related to the following:

REVENUES

Thousands of €	2019	2018
Software and licenses	228,200	216,830
Recurring revenues (software service contracts and rental models)	299,519	225,806
Services (consulting and training)	28,263	18,501
Hardware	897	162
	556,879	461,299

Recurring revenue includes revenue from software rental models in the amount of EUR 50,329k (previous year: EUR 23,427k).

Categorized by geographic sector, the following allocation of revenues results:

REVENUES BY REGION

Thousands of €	2019	2018
Germany	141,164	126,516
Europe without Germany	175,574	141,311
Americas	188,370	148,993
Asia/Pacific	50,028	42,583
Rest of World	1,742	1,897
	556,879	461,299

The contract balances at December 31 are as follows:

CONTRACT BALANCES

Thousands of €	December 31, 2019	December 31, 2018
Contract assets	839	803
Deferred revenue	122,185	95,375

During the reporting period there have been no significant changes with regard to contract assets. For reasons of materiality, no expected credit loss allowance was recorded for contract assets. The Group receives prepayments from customers which are reported as deferred revenue. As soon as the contractual services are rendered, these are recorded as revenue.

Of the amount totaling EUR 95,375k (January 1, 2018: EUR 67,745k) reported at the beginning of the period in deferred revenue, EUR 95,113k (previous year: EUR 67,007k) was recognized as revenue in the 2019 financial year.

No revenue from performance obligations fulfilled in previous years was recognized in the 2019 financial year (previous year: EUR 0). As most of the contracts have a term of one year, no information is provided with regard to the remaining performance obligations as at December 31, 2019.

The Group does not adjust the promised amount of consideration for the effects of a significant financing component if the contract term is one year or less. Also, the Group does not capitalize incremental cost of obtaining a contract if the amortization period of the asset is one year or less. The breakdown of revenues by segment can be seen under segment reporting [26].

[2] OTHER OPERATING INCOME

Thousands of €	2019	2018
Income from foreign currency transactions	2,944	2,960
Other services	1,536	1,392
Development subsidies	253	287
Income from disposal of fixed assets	67	39
Other	1,414	800
	6,216	5,478

[3] COST OF GOODS AND SERVICES

Thousands of €	2019	2018
Cost of purchased software licenses and hardware	16,434	12,313
Cost of purchased services	3,812	1,970
	20,246	14,283

[4] PERSONNEL EXPENSES

Thousands of €	2019	2018
Wages and salaries	199,627	166,383
Social security, other pension costs and welfare	39,800	34,179
	239,427	200,562

[5] AMORTIZATION AND DEPRECIATION

Thousands of €	2019	2018
Amortization of intangible assets other than those acquired in a business combination	3,071	2,226
Depreciation of property, plant and equipment	7,176	6,521
Depreciation of right-of-use assets	14,742	0
Depreciation / amortization of tangible and intangible assets	24,990	8,747
Amortization due to purchase price allocated intangible assets	17,062	14,713
Total amortization and depreciation	42,052	23,460

[6] OTHER OPERATING EXPENSES

Thousands of €	2019	2018
Expenses for third-party services	26,898	21,087
Marketing expenses	25,438	22,782
Commissions	19,096	16,595
Legal and consulting expenses	12,517	12,665
EDP equipment	11,834	8,448
Travel expenses and hospitality	11,274	11,368
Training and recruiting expenses	4,933	4,087
Ancillary rent costs (previous year includes rents)	4,507	15,115
Communication expenses	3,553	2,874
Expenses from foreign currency transactions	2,788	2,793
Vehicle expenses	2,404	3,707
Other	12,517	9,156
	137,757	130,677

The item "Other" consists of various individual items, all of which are less than EUR 2,000k.

[7] INTEREST INCOME / EXPENSES

Thousands of €	2019	2018
Other interest and similar income	858	470
Interest and similar expenses	-3,165	-1,124
	-2,307	-654

The increase of interest expenses in the financial year mainly relates to the initial application of IFRS 16 *Leases* as well as additional borrowings.

[8] Share of profit of associates and gain on disposal of shares in associates

The income/expenditure from associates of EUR 531k (previous year: EUR 536k) include the income from DocuWare GmbH, Germering, amounting to EUR 363k (previous year: EUR 435k), as well as the income from Nemetschek OOD, Bulgaria, as an associate, amounting to EUR 168k (previous year: EUR 101k). Gain on disposal of shares in associate of EUR 29,927k relate to the sale of the 22.41% share in the associate DocuWare GmbH. For more information, see [18].

[9] Other financial income and expenses

Other financial expenditure/income amount to EUR 1,907k in the reporting year (previous year: EUR 2,131k) and relate to the revaluation of contingent consideration liabilities. For more details, reference is made to the note business combinations and financial instruments [24]. In the previous year, other financial income includes gains from releasing contingent consideration liabilities in the amount of EUR 2,075k.

[10] Taxes

The major components of the income tax expense are as follows:

INCOME TAXES

Thousands of €	2019	2018
Current tax expenses	-34,496	-25,605
Deferred tax income	8,081	2,357
<i>thereof from addition / release of temporary differences</i>	<i>7,527</i>	<i>387</i>
	-26,415	-23,248

The tax expenses for the financial year 2019 include tax expenses from previous years amounting to EUR 32k (previous year: tax expense EUR 220k). Furthermore, in the financial year 2019, EUR 55k (previous year: -28k) deferred taxes from the revaluation of pension obligations were recorded in other comprehensive income without impacting profit or loss.

The income tax rates of the individual entities range from 9.0% to 33.3% (previous year: from 9.0% to 33.3%).

The tax rate for the financial year 2019 applied by Nemetschek SE is 31.6% (financial year 2018: 32.5%). It is calculated as follows:

INCOME TAX RATE

in %	2019		2018	
Earnings before taxes	100.0		100.0	
Trade tax (weighted)	15.8	15.8	16.7	16.7
	84.2		83.3	
Corporate income tax	15.0	15.0	15.0	15.0
Solidarity surcharge	0.8	0.8	0.8	0.8
	68.4	31.6	67.5	32.5

Deferred taxes are measured on the basis of the nominal tax rate of Nemetschek SE or the tax rate applying to the respective subsidiary.

Deferred tax assets and deferred tax liabilities are offset for each tax-paying entity if a legally enforceable right exists to set off current tax assets against current tax liabilities and the deferred taxes relate to the income tax of the same taxable entity and the same taxation authority.

Deferred taxes at the balance sheet date comprise the following:

DEFERRED TAXES

Thousands of €	Consolidated balance sheet	
	2019	2018
Deferred tax assets resulting from		
Intangible assets	4,402	3,016
Property, plant and equipment	273	240
Receivables	181	99
Pensions and related obligations	565	342
Provisions	2,549	1,572
Liabilities	802	617
Tax loss carryforward	3,166	2,607
Foreign tax credit	1,470	313
Other	24	1
Lease liabilities	17,583	0
Offsetting	-24,764	-5,651
	6,250	3,157
Deferred tax liabilities resulting from		
Intangible assets	29,462	20,329
Property, plant and equipment	419	450
Receivables	173	23
Provisions	24	23
Liabilities	705	509
Other	586	1,514
Right-of-use assets	16,737	0
Offsetting	-24,764	-5,651
	23,342	17,198

A reconciliation between the reported income tax expense and the expected income tax expense (measured using the tax rate for 2019) for the financial years ending December 31, 2019 and 2018 is as follows:

INCOME TAX RECONCILIATION

Thousands of €	2019	2018
Earnings before taxes	153,669	99,808
Expected tax 31.6% (previous year: 32.5%)	48,575	32,458
Differences to German and foreign tax rates	-8,515	-8,040
Tax effects on:		
Investments accounted for at-equity	-129	-174
Change in the recoverability of deferred tax assets and tax credits	-1,120	1,779
Change of deferred taxes on permanent differences	23	180
Current and deferred taxes previous years	32	220
Non-deductible expenses	2,565	1,425
Effect of functional currency conversion	0	-33
Tax-free income and Tax Credits	-14,469	-4,617
Tax rate changes and adaptation	-42	30
Other	-507	20
Effective tax expense	26,415	23,248
Effective tax rate	17.2%	23.3%

Tax-free income and tax credits include in the amount of EUR 9,409k the sale of the shares in the associate DocuWare GmbH.

The deferred tax assets on losses carried forward are determined as follows:

DEFERRED TAX ON LOSSES CARRIED FORWARD

Thousands of €	2019	2018
Losses according to entities	78,172	70,203
Deferred tax assets, gross	12,869	11,364
Allowances on tax losses carried forward	-9,703	-8,757
Deferred tax assets on unused tax losses, net	3,166	2,607

The items contain deferred taxes on unused tax losses which are likely to be realized in the future. The deferred tax assets on tax losses carried forward were recognized on the basis of the income and expense budgets of Nemetschek SE subsidiaries for the financial years 2020 – 2022.

The deferred tax assets on losses carried forward in the subgroup Graphisoft were recognized for the first time in the amount of their probable usage.

LOSSES CARRIED FORWARD WITH LIMITED LIFE OF USAGE

Thousands of €	2019	2018
Unused tax loss carried forward		
Never expire	26,126	19,153
Expire by 2025 (prev. year 2024)	37,132	4,854
Expire from 2026 (prev. year 2025)	8,752	35,496
Sum of unused tax loss carried forward	72,010	59,503

The temporary differences associated with investments in the Group's subsidiaries for which a deferred tax liability has not been recognized in the periods presented, aggregate to EUR 2,641k (previous year: EUR 3,762k). They would result in a tax expense of EUR 515k (previous year: EUR 885k) in the future.

There are no income tax consequences attached to the payment of dividends in either 2019 or 2018 by Nemetschek SE to its shareholders.

[11] Earnings per share

Basic undiluted earnings per share are calculated by dividing the net income for the period attributable to shares by the average number of shares during the period. No diluting effects existed as of the reporting date.

EARNINGS PER SHARE

	2019	2018*
Net income attributable to the parent (in thousands of EUR)	127,155	76,467
Weighted average number of ordinary shares outstanding as at December 31	115,500,000	115,500,000
Weighted average number of ordinary shares to be included in the calculation of diluted earnings per share as at December 31	115,500,000	115,500,000
Earnings per share in EUR, undiluted	1.10	0.66
Earnings per share in EUR, diluted	1.10	0.66

* Previous year values adjusted due to the stock split.

For more details reference is made to note [25].

Notes to the consolidated statement of financial position

[12] Cash and cash equivalents

For the purposes of the consolidated statement of cash flows, cash and cash equivalents include cash on hand and in banks, net of outstanding bank overdrafts. Cash and cash equivalents at the end of the reporting period as shown in the consolidated statement of cash flows can be reconciled to the related items in the consolidated financial position as follows:

CASH AND CASH EQUIVALENTS

Thousands of €	December 31, 2019	December 31, 2018
Bank balances	207,517	116,884
Fixed term deposits (contract period up to 3 months)	1,626	3,863
	209,143	120,747

[13] TRADE RECEIVABLES

Thousands of €	December 31, 2019	December 31, 2018
Trade receivables (before allowances)	65,340	58,342
Lifetime expected credit loss allowance	-3,293	-2,584
	62,046	55,758

Trade receivables are non-interest bearing and are generally due within 30- to 90-day terms customary for the industry.

Bad debt allowances developed as follows:

DEVELOPMENT OF EXPECTED CREDIT LOSS ALLOWANCES

Thousands of €	January 1	Utilization	Release	Addition	December 31
Lifetime expected credit loss allowance 2019	-2,584	632	849	-2,190	-3,293
Lifetime expected credit loss allowance 2018	-2,973	888	1,013	-1,512	-2,584

The aging structure of trade receivables together with the respective loss allowances recognized is as follows:

AGEING STRUCTURE OF TRADE RECEIVABLES

2019	Thousands of €	not past due	Past due (by < 30 days)	Past due (by 30–60 days)	Past due (by 60–90 days)	Past due (by 90–180 days)	Past due (by 180–360 days)	Past due (by > 360 days)	December 31, 2019
Gross Trade receivables		42,392	9,075	2,500	1,961	3,315	2,945	3,152	65,340
Expected credit loss allowance		-49	-144	-81	-89	-387	-500	-2,043	-3,293
Net Trade receivables		42,343	8,930	2,419	1,872	2,929	2,444	1,109	62,046
Expected credit loss rate (weighted average)		0.12%	1.59%	3.25%	4.53%	11.66%	17.00%	64.81%	

AGEING STRUCTURE OF TRADE RECEIVABLES

2018	Thousands of €	not past due	Past due (by < 30 days)	Past due (by 30–60 days)	Past due (by 60–90 days)	Past due (by 90–180 days)	Past due (by 180–360 days)	Past due (by > 360 days)	December 31, 2018
Gross Trade receivables		39,701	8,490	3,073	1,025	2,147	2,047	1,859	58,342
Expected credit loss allowance		-229	-145	-48	-17	-76	-339	-1,730	-2,584
Net Trade receivables		39,472	8,345	3,025	1,008	2,071	1,708	129	55,758
Expected credit loss rate (weighted average)		0.58%	1.71%	1.56%	1.66%	3.54%	16.56%	93.06%	

[14] ASSETS

Thousands of €	December 31, 2019	December 31, 2018
Inventories	1,012	811
Other financial assets	6,702	9,524
Other non-financial assets	20,518	18,350
	28,232	28,685

Inventories mainly consist of third party licenses amounting to EUR 539k (previous year: EUR 0k) as well as hardware amounting to EUR 167k (previous year: EUR 284k). As in the previous year no write-downs or reversals of write-downs were recognized. On December 31, 2019 and 2018, the inventories were not collateralized.

Other financial assets mainly include security deposits from office rental agreements. The prior years' "Other current financial assets" include a receivable for subsidies from a lessor.

Other non-financial assets mainly consist of prepaid expenses in the amount of EUR 14,171k (previous year: EUR 12,140k) as well as contract assets according to IFRS 15 in the amount of EUR 839k (previous year: EUR 803k).

[15] Property, plant and equipment

The acquisition and manufacturing costs as well as accumulated depreciation of property, plant and equipment developed as follows:

DEVELOPMENT OF PROPERTY, PLANT AND EQUIPMENT

Thousands of €	2019	2018
Cost		
As of January 1	51,368	41,148
Additions	16,895	8,678
Additions from business combinations	611	1,429
Disposal	-7,348	-571
Reclassification	351	-
Foreign currency translation difference	127	684
As of December 31	62,004	51,368
Depreciation and impairment		
As of January 1	33,794	26,296
Additions	7,176	6,520
Additions from business combinations	386	884
Disposal	-7,197	-477
Reclassification	0	-
Foreign currency translation difference	225	571
As of December 31	34,384	33,794
Carrying amount December 31	27,620	17,574

No material impairment and no material write-ups were recognized on property, plant and equipment in 2019 and 2018. On December 31, 2019 and 2018, property, plant and equipment were not pledged.

[16] Intangible assets and goodwill

The acquisition costs as well as accumulated amortization and impairment of intangible assets consist of the following:

DEVELOPMENT OF GOODWILL AND OTHER INTANGIBLE ASSETS

Thousands of €	2019			2018		
	Goodwill	Software, industrial and similar rights	Internally generated software	Goodwill	Software, industrial and similar rights	Internally generated software
Cost						
As of January 1	244,349	212,501	7,489	192,736	179,557	7,489
Additions	0	2,999	0	0	2,366	0
Additions from business combinations	78,807	41,252	0	47,862	28,425	0
Disposal		-44	0	0	-78	0
Reclassification	0	-351	0	0	0	0
Foreign currency translation difference	1,884	1,297	0	3,751	2,231	0
As of December 31	325,041	257,654	7,489	244,349	212,501	7,489
Amortization and impairment						
As of January 1	0	111,196	6,709	0	94,235	5,954
Additions	0	19,466	668	0	16,185	755
Additions from business combinations	0	7	0	0	774	0
Disposal	0	-9	0	0	-61	0
Reclassification	0	0	0	0	0	0
Foreign currency translation difference	0	-555	0	0	63	0
As of December 31	0	130,105	7,377	0	111,196	6,709
Carrying amount December 31	325,041	127,548	112	244,349	101,305	780

Intangible assets

The development of intangible assets from purchase price allocations of major acquisitions were as follows:

INTANGIBLE ASSETS FROM MATERIAL PURCHASE PRICE ALLOCATION

Thousands of €	Fair value at time of acquisition	Useful life in years	Amortization 2019	Net book value as of Dec. 31, 2019	Net book value as of Dec. 31, 2018
Brand name	20,176	10–15	1,385	9,670	8,911
Software	108,103	5–12	8,973	55,638	45,839
Customer relationship	105,176	10–25	5,684	54,199	39,149
Non-compete agreements	2,146	2–3	556	1,445	981
Intangible assets	235,602		16,598	120,952	94,881

On December 31, 2019 and 2018, the intangibles were not pledged.

Goodwill

At the beginning of the reporting period Nemetschek changed the organization toward the divisions. The divisional set up not only strengthens the market position of Nemetschek in that area by increasing synergies within the division but also determines how business combinations and resulting assets are managed to increase the success of the respective division on that organizational level. Consequently, the reorganization also triggers a change to the level at which the goodwill is managed and monitored for impairment test purposes.

Following the reorganization, goodwill is monitored on the division levels which represent the operating segments Design, Build, Manage and Media & Entertainment. Please refer to note [26] for more information regarding changes in the presentation of segment disclosures. Prior to the reorganization, goodwill was monitored on brand level. The impairment test conducted before the reallocation of goodwill did not indicate that goodwill was impaired in prior periods.

Following the reallocation, goodwill is allocated as follows:

GOODWILL

Thousands of €	Carrying Amount per balance sheet Dec. 31, 2019	Discount rate after tax	Discount rate before tax	Terminal value growth rate
Division				
Design	95,352	10.24%	13.11%	1.50%
Build	111,636	10.24%	13.50%	1.50%
Manage	90,715	10.15%	13.01%	2.00%
Media & Entertainment	27,338	9.59%	12.92%	2.00%
Total group	325,041			

The basic assumptions for the business plan also used for impairment test purposes are revenue and personnel cost. The development of sales volumes and prices is based on the expectations of market developments considering general economic factors as well as AEC sector specific factors. Also the development of personnel cost is a key driver to revenue by enabling the development of successful products as well addressing markets.

According to the impairment tests for goodwill conducted in financial year 2019 and in the previous year, the carrying amounts are recoverable. Thus, no impairments were recognized. As in the previous year, the impairment test was carried out as at the valuation date, December 31, 2019.

For goodwill for which the recoverable amount is not at least 30% above the carrying value of the cash-generating unit, the impairment test was complemented by sensitivity analyses for which assumptions deviating from original forecasts are made for EBITA, WACC and growth rates in perpetuity. These scenarios are deemed by management as improbable yet possible. In the case of the division Manage, the recoverable amount exceeds the carrying amount by 27%.

The key assumption of which the recoverable amount is sensitive to are the WACC, the terminal growth rate as well as the EBITA in the terminal value calculation. The sensitivity analysis is performed by varying the key assumptions as follows:

- » Increase in WACC by 1 percentage point
- » Reduction of the growth rate in perpetuity by 0.5 percentage points
- » Deduction of 20% on the EBITA in perpetuity

Thus, the Group accounts for uncertainties within the scope of forecasts and analyzes the goodwill for impairment as well as for scenarios which are less favorable than forecast. Changes to the specified parameters considered possible would have no effect on goodwill in terms of impairment.

On the basis of the impairment testing performed, as well as on the basis of the sensitivity analyses conducted within this scope, the Group has come to the conclusion that in the reporting year goodwill needs not to be impaired.

Goodwill before reallocation

In the prior year the carrying amounts of the goodwill allocable to Bluebeam Software, Inc., Pasadena, USA, Spacewell, Antwerp, Belgium, Design Data Corporation, Lincoln, USA, Solibri Oy, Helsinki, Finland, Graphisoft SE European Company Limited by Shares, Budapest, Hungary and the NEVARIS Group are material

compared to the total carrying amount of goodwill. The total goodwill of the Nemetschek Group as of December 31, 2018 amounts to EUR 244,349k. In total, 78% of this goodwill is allocable to the cash-generating units represented in the following table:

MATERIAL GOODWILL

2018	Carrying value of the goodwill allocable to the CGU in thousand €	Share in total goodwill in %	Discount rate (before taxes) in %	Discount rate (after taxes) in %	Growth rate in %	Description of the basic assumptions for corporate plan	Presentation of approach for determination of values for the basic assumptions
Bluebeam Software, Inc., Pasadena, USA	56,262	23	13.54	10.02	1.50	» Sales prices and sales volumes » Personnel costs » Market development » Exchange rate development USD/SEK	Intra-group estimation of the relevant sales departments including distribution partners and accounting for investments in personnel structures. General economic framework conditions as well as sector-related market studies are also included.
Spacewell (FASEAS International NV), Antwerp, Belgium	34,151	14	12.57	10.16	2.00	» Sales prices and sales volumes » Personnel costs » Market development	Intra-group estimation of the relevant sales departments including distribution partners and accounting for investments in personnel structures. General economic framework conditions as well as sector-related market studies are also included.
Design Data Corporation, Lincoln, USA	28,599	12	12.09	10.02	1.90	» Sales prices and sales volumes » Personnel costs » Market development » Exchange rate development USD/EUR	Intra-group estimation of the relevant sales departments including distribution partners and accounting for investments in personnel structures. General economic framework conditions as well as sector-related market studies are also included.
Solibri Oy, Helsinki, Finland	24,039	10	12.03	9.88	1.50	» Sales prices and sales volumes » Personnel costs » Market development	Intra-group estimation of the relevant sales departments including distribution partners and accounting for investments in personnel structures. General economic framework conditions as well as sector-related market studies are also included.
Graphisoft SE, Budapest, Hungary	21,463	9	13.83	12.39	2.00	» Sales prices and sales volumes » Personnel costs » Market development » Exchange rate development HUF/USD	Intra-group estimation of the relevant sales departments including distribution partners and accounting for investments in personnel structures. General economic framework conditions, forecast of exchange rate developments as well as sector-related market studies are also included.
NEVARIS Group	25,201	10	12.89	9.33	1.50	» Sales prices and sales volumes » Personnel costs » Market development	Intra-group estimation of the relevant sales departments including distribution partners and accounting for investments in personnel structures. General economic framework conditions as well as sector-related market studies are also included.

The following deviating assumptions were taken into account within the scope of the sensitivity analyses:

- » Increase in WACC by 1 percentage point
- » Reduction of the growth rate in perpetuity by 0.5 percentage points
- » Deduction of 20% on the EBITA in perpetuity

Thus the Group accounts for uncertainties within the scope of forecasts and analyzes the goodwill for impairment as well as for scenarios which are less favorable than forecast. Changes to the specified parameters considered possible would have no material effect on goodwill in terms of impairment with the exception of Spacewell acquired as of August 28, 2018. In the case of the acquisitions of the 2018 financial year, the recoverable amount is only slightly higher than the carrying value.

On the basis of the impairment testing performed, as well as on the basis of the sensitivity analyses conducted within this scope, the Group comes to the conclusion that in the reporting year there is no impairment of goodwill in any of the cash-generating units.

[17] Leases

The right-of-use assets resulting from leases are as follows:

RIGHT-OF-USE ASSETS

Thousands of €	December 31, 2019	January 1, 2019
Right-of-use assets – Property	61,676	65,408
Right-of-use assets – Office Equipment	261	365
Right-of-use assets – Vehicles	4,227	3,448
	66,163	69,221

Property leases mainly include office space. Additions to the right-of-use assets during 2019 were EUR 10,243k. Right-of-use assets are depreciated over the shorter period of lease term and useful life of the underlying asset. The depreciation per asset class in the financial year is as follows:

DEPRECIATION CHARGE FOR THE YEAR

Thousands of €	Property	Vehicles	Office Equipment
Depreciation charge for the year	12,454	2,116	172

Information on the corresponding lease liabilities can be found under financial liabilities [24]. Expenses recognized in profit or loss besides depreciation are shown in the overview below:

AMOUNTS RECOGNIZED IN PROFIT OR LOSS

Thousands of €	2019
Interest on lease liabilities	1,524
Expenses relating to short-term leases	1,134
Expenses relating to leases of low-value assets	86
Variable lease payments not included in the measurement of lease liabilities	8

AMOUNTS RECOGNIZED IN THE CONSOLIDATED STATEMENT OF CASH FLOWS

Thousands of €	2019
Total cash outflow for leases	12,779

[18] Investments in associates

Details of each of the Groups associates at the end of the reporting period are as follows:

Name, registered office of the entity	Thousands of €	Shareholding in %	Equity	pro rata	Shareholding in %	Equity	pro rata
		2019	2019	2019	2018	2018	2018
Nemetschek OOD, Bulgaria		20.00	5,505	1,101	20.00	4,773	955
Sablono GmbH, Berlin		24.99	-1,081	-270	24.99	-675	-169
DocuWare GmbH, Germering		-	-	-	22.41	13,847	3,103

Nemetschek OOD, Bulgaria, develops customer-specific software within the scope of order developments. Sablono GmbH develops software solutions for the digital design, control and monitoring of complex building projects. The DocuWare Group develops and distributes software for electronic document management. On June 28, 2019, Nemetschek concluded the sale of its 22.41% share in the associate DocuWare GmbH to a company belonging to the Ricoh Group. The sale was completed on August 5, 2019, after approval was granted by antitrust authorities. The gain on disposal in the amount of EUR 29,927k is reported under financial results.

The following table summarizes financial information for the shares of the Group in its non-material associates, based on the amounts reported in the consolidated financial statements:

AGGREGATE INFORMATION OF ASSOCIATES THAT ARE NOT INDIVIDUALLY MATERIAL

Thousands of €	December 31, 2019	December 31, 2018
Group's share of net income from continuing operations	531	536
Group's share of net income from discontinued operations	0	0
Group's share of net income for the year	531	536
Group's share of other comprehensive income	74	-48
Group's share of total comprehensive income	605	489
Aggregate carrying amount of the Group's interests in these associates	1,101	3,964

UNRECOGNIZED SHARE OF LOSSES OF AN ASSOCIATE

Thousands of €	December 31, 2019	December 31, 2018
The unrecognized share of loss of an associate for the year	-101	-106
Cumulative share of loss of an associate	-270	-169

[19] Financial liabilities

FINANCIAL LIABILITIES

Thousands of €	December 31, 2019	December 31, 2018
Borrowings	188,123	130,628
Trade payables	12,404	12,878
Other financial liabilities	9,216	5,813
Lease liabilities	70,327	-
	280,071	149,319

Borrowings include liabilities to banks in connection with business combinations in the amount of EUR 185,800k (previous year: EUR 127,800k). Borrowings are recognized initially at fair value, net of directly attributable transaction costs incurred. Borrowings are subsequently stated at amortized cost.

Trade payables are obligations to pay for goods or services that have been acquired in the ordinary course of business from suppliers. Trade payables are initially recognized at fair value and subsequently measured at amortized cost using the effective interest method. Debts from trade payables are usually settled on 60-day terms.

Other financial liabilities comprise subsequent purchase price obligations in connection with business combinations. As of December 31, 2019 these mainly consist of EUR 6,078k resulting from the acquisition of Redshift Rendering Technologies, Inc., and EUR 684k (previous year: EUR 2,653k) resulting from the acquisition of 123erfasst.de GmbH. Additional EUR 1,500k (previous year: EUR 2,961k) relate to the purchase of non-controlling interests in Maxon GmbH.

[20] Provisions and accrued liabilities

Provisions and accrued liabilities contain the following items:

PROVISIONS AND ACCRUED LIABILITIES

Thousands of €	December 31, 2019	December 31, 2018
Provisions		
Personnel	26,003	24,772
Warranty and liability risks	188	227
Other	440	100
Accruals		
Outstanding invoices	8,035	7,459
Personnel	6,986	6,203
Legal and consulting fees	1,567	1,015
Other	4,015	2,999
	47,234	42,775

Provisions for personnel mainly consist of provisions for short- and long-term variable compensation components and commissions. The increase is caused by the positive business development in the financial year 2019. Long-term variable compensation components have a term of up to three years.

Provisions for warranty and liability risks arise due to the obligation of fulfilling customer claims with regard to goods and services sold. They are based on an individual assessment per company.

Accruals for outstanding invoices mainly relate to commissions for distributors due to achievement of targets as well as goods and services not yet invoiced. Accruals for personnel mainly consist of outstanding vacation.

The development of provisions is as follows:

PROVISIONS

Thousands of €	As of January 1	Usage	Release	Additions	Reclassification	Currency translation	As of December 31	thereof long-term
Personnel	24,772	-16,443	-2,392	20,918	-26	-826	26,003	2,845
Warranty and liability risks	227	-35	-13	9	-	-	188	-
Other	100	-50	-	390	-	-	440	390

[21] Deferred revenue

Deferred revenue amounts to EUR 122,185k (previous year: EUR 95,375k).

[22] Other non-financial liabilities

Other current liabilities primarily comprise liabilities to the tax authorities on account of obligations to pay wage tax and VAT as well as to pay social security contributions to the social security authorities. Other liabilities are non-interest bearing and have an average term of 60 days.

The other non-current liabilities of the previous year mainly comprise non-current accrued rent.

[23] Pensions and related obligations

Pensions and related obligations include the defined benefit obligation in the amount of EUR 1,926k (previous year: EUR 1,665k) and provisions for anniversary-related payments in the amount of EUR 14k (previous year: EUR 12k).

The obligation resulting from pension plans to a subsidiary's former general managers is determined using the projected unit credit method. The pension plans provide a benefit after reaching the age of 65 amounting to 60% of the last net salary, however up to a maximum amount of EUR 3,834 (DEM 7,500) per month. These claims are vested. The term of the pension obligation is 23 years. In the year ending December 31, 2019 there were no curtailments to the plan, as was the case in the previous year.

Plan assets from these benefit plans have been invested in life insurances. Plan assets include any reinsurance plans entered into which are assigned to the pension beneficiary entitled to these.

The amount included in the consolidated statement of financial position arising from the Group's obligation in respect of its defined benefit plan is as follows:

PROVISIONS FOR PENSIONS

Thousands of €	As of January 1	Changes	As of December 31
Defined benefit obligation 2019	2,236	294	2,530
Less plan asset 2019	571	33	604
Status of coverage (= pension provisions) 2019	1,665	261	1,926
Defined benefit obligation 2018	2,227	9	2,236
Less plan asset 2018	543	28	571
Status of coverage (= pension provisions) 2018	1,684	-19	1,665

The determination of assets and liabilities for defined benefit plans is based upon statistical and actuarial valuations. The principal assumptions used for the purposes of the actuarial valuations were as follows:

DISCOUNT RATE

in %	2019	2018
Discount rate	1.25	1.90
Future pension increases	1.00	1.00
Compensation increase	0.00	0.00

The actuarial assumptions as at the balance sheet date are used to determine the defined benefit liability at that date and the pensions expense for the upcoming financial year. The mortality rates are based on the Heubeck 2018 G mortality tables.

Movements in the present value of the defined benefit obligation and in the fair value of the plan assets were as follows:

CHANGE IN DEFINED BENEFIT OBLIGATIONS (DBO)

Thousands of €	2019	2018
DBO at beginning of fiscal year	2,236	2,227
Current service cost	71	73
Interest expense	42	40
Actuarial changes arising from changes in demographic assumptions	0	-37
Actuarial changes arising from changes in financial assumptions	313	-47
Experience adjustments	-132	-19
Benefit payments	0	-1
DBO at end of fiscal year	2,530	2,236
Change in plan assets:		
Fair value of plan assets at beginning of fiscal year	571	543
Interest income	11	10
Actuarial gains/(losses)	-3	-7
Employer contributions	25	25
Fair value of plan assets at end of fiscal year	604	571

Significant actuarial assumptions for the determination of the defined obligation are discount rate and expected pension increase. The sensitivity analyses below have been determined based on reasonably possible changes of the respective assumptions occurring at the end of the reporting period, while holding all other assumptions constant.

SENSITIVITY

Changes in actuarial assumptions	Thousands of €	2019	2018
Present value of pension obligation for the reporting date		2,530	2,236
Discount rate	increase by 0.5 percent points	2,284	2,017
	decrease by 0.5 percent points	2,810	2,485
Pension cost	increase by 0.5 percent points	2,717	2,395
	decrease by 0.5 percent points	2,360	2,091

The average duration of the benefit obligation at December 31, 2019 is 21.0 years (2018: 21.3 years). The expected payments in the 2020 financial year amount to EUR 25k (previous year: EUR 25k) and relate to employer contributions paid into the plan assets. In the next financial years, the following payments are expected from the pension plans:

FUTURE PENSION PAYMENTS

Thousands of €	
(for fiscal year)	
2020	1
2021	3
2022	4
2023	6
2024	7
2025–2049	2,503
	2,524

[24] Financial instruments

The financial assets and liabilities are presented in the following table according to their measurement categories and classes:

FINANCIAL INSTRUMENTS

2019	Thousands of €	Carrying amount per balance sheet Dec. 31, 2019	Measurement in accordance with IFRS 9			Fair value Dec. 31, 2019
			Amortized cost	Fair value impacting profit/loss	Fair value not impacting profit/loss	
Trade receivables		62,046	62,046	-	-	62,046
Other financial assets		6,703	6,653	-	50	6,703
Cash and cash equivalents		209,143	209,143	-	-	209,143
Total financial assets		277,892	-	-	-	277,892
Borrowings		188,123	188,123	-	-	188,123
Trade payables		12,404	12,404	-	-	12,404
Other financial liabilities		9,216	954	8,262	-	9,216
Lease liabilities		70,327	70,327	-	-	-
Total financial liabilities		280,071	-	-	-	209,743

FINANCIAL INSTRUMENTS

2018	Thousands of €	Carrying amount per balance sheet Dec. 31, 2018	Measurement in accordance with IFRS 9			Fair value Dec. 31, 2018
			Amortized cost	Fair value impacting profit/loss	Fair value not impacting profit/loss	
Trade receivables		55,758	55,758	-	-	55,758
Other financial assets		9,524	9,474	-	50	9,524
Cash and cash equivalents		120,747	120,747	-	-	120,747
Total financial assets		186,029	-	-	-	186,029
Borrowings		130,628	130,628	-	-	130,628
Trade payables		12,878	12,878	-	-	12,878
Other financial liabilities		5,813	199	5,614	-	5,813
Lease liabilities		0	-	-	-	0
Total financial liabilities		149,319	-	-	-	149,319

Due to the short-term maturities of cash and cash equivalents, trade receivables and payables, current financial assets and liabilities, the respective fair values correspond to their carrying amount.

RECONCILIATION OF LEVEL 3 FAIR VALUE MEASUREMENTS

Thousands of €	2019	2018
Balance at January 1	5,614	2,167
Changes in scope of consolidation, currency adjustments	5,778	5,614
Changes with cash effect	-1,500	0
Changes recognized in profit or loss	-1,630	-2,167
Balance at December 31	8,262	5,614

NET GAINS AND LOSSES ON FINANCIAL INSTRUMENTS

Thousands of €	2019	2018
Financial assets measured at amortized cost	304	148
Financial liabilities measured at fair value through profit or loss	1,630	2,075
Financial liabilities measured at amortized cost	-3,165	-1,124
	-1,230	1,099

Net gains and losses from financial instruments comprise the results from valuations, the recognition and reversal of loss allowances, results from the translation of foreign currencies as well as interests. Financial assets measured at amortized costs include interest income in the amount of EUR 858k (previous year: EUR 470k). Financial liabilities measured at amortized cost include interest expenses in the amount of EUR -3.165k (previous year: EUR -1.124k).

Financial risk management

The objective of the Group with regard to financial risk management is to mitigate the risks presented below by the methods described. The Group generally pursues a conservative, risk-averse strategy.

Credit risk

Credit risk is the risk of financial loss to the Group if a customer or counterparty to a financial instrument fails to meet its contractual obligations, and arises principally from the Group's receivables from customers and from the Group's cash and cash equivalents. The carrying amounts of financial assets and contract assets represent the maximum credit exposure.

Accounts receivables

At the end of 2019, there was no relevant concentration of credit risk by type of customer. The Group's credit risk exposure is mainly influenced by individual customer characteristics. Sales of goods and services are made to customers after having conducted appropriate internal credit risk assessment. At the end of 2019, no customer accounted for more than 10% of accounts receivable.

Cash and cash equivalents

The credit risk from balances with banks and financial institutions of Group companies is managed in accordance with the Group's policy and in agreement with Group headquarters. The limits are set to minimize the concentration of risks and therefore mitigate financial loss through potential default of a business partner.

Liquidity risk

Liquidity risk is the risk that the Group will encounter difficulty in meeting the obligations associated with its financial liabilities that are settled by delivering cash or another financial asset. The Group's approach to managing liquidity is to ensure, as far as possible, that it will have sufficient liquidity to meet its liabilities when they are due, under both normal and stressed conditions, without incurring unacceptable losses or risking damage to the Group's reputation.

As at the balance sheet date, the Group holds cash and cash equivalents amounting to EUR 209,143k (previous year: EUR 120,747k).

The following are the remaining contractual maturities of financial liabilities at the reporting date. The amounts are gross and undiscounted, and include contractual interest payments.

MATURITY ANALYSIS FINANCIAL LIABILITIES

Thousands of €	Carrying Amount	Contractual cash flows	Less than 1 year	1 to 5 years	More than 5 years
December 31, 2019					
Borrowings	188,123	189,976	59,512	130,464	0
Trade payables	12,404	12,404	12,404	0	0
Other financial liabilities	9,216	9,769	2,131	7,638	0
Lease liabilities	70,327	76,682	14,169	44,703	17,810
Total	280,071				
December 31, 2018					
Borrowings	130,628	132,156	57,200	74,956	0
Trade payables	12,878	12,878	12,878	0	0
Other financial liabilities	5,813	5,813	1,698	4,115	0
Lease liabilities	0	0	0	0	0
Total	149,319				

Market risk

Market risk is the risk that changes in market prices – e.g. foreign exchange rates and interest rates – will affect the Group's income or the value of its holdings of financial instruments. The objective of market risk management is to manage and control market risk exposures within acceptable parameters, while optimizing the return.

Currency risk

The Group undertakes transactions denominated in foreign currencies; consequently, exposures to exchange rate fluctuations arise. The exchange rate fluctuation only has a limited effect at top Group level because the operating subsidiaries outside the Euro area record revenue as well as cost of goods and services, personnel expenses and other expenses primarily in their local currency.

Sensitivity analysis of selected foreign currencies

The table below shows the sensitivity of Group revenue and Group EBIT to a reasonably possible fluctuation in the US Dollar and the Hungarian Forint exchange rates. All other variables remain constant.

SENSITIVITY OF USD / EUR

Thousands of €	Change of exchange rate USD	Sensitivity effect on revenues	Sensitivity effect on EBIT
Fiscal year 2019			
(average USD / EUR exchange rate = 1.12)	+ 5%	-10,918	-2,690
	- 5%	12,067	2,973
Fiscal year 2018			
(average USD / EUR exchange rate = 1.18)	+ 5%	-8,837	-1,873
	- 5%	9,767	2,071

SENSITIVITY OF HUF / EUR

Thousands of €	Change of exchange rate HUF	Sensitivity effect on revenues	Sensitivity effect on EBIT
Fiscal year 2019			
(average HUF / EUR exchange rate = 325.30)	+ 5%	-1,633	61
	- 5%	1,805	-67
Fiscal year 2018			
(average HUF / EUR exchange rate = 318.89)	+ 5%	-1,520	-98
	- 5%	1,681	108

Foreign currency financial assets mainly exist in a subsidiary in Hungary. The following table shows the foreign currency receivables existing as at December 31, 2019, and changes in the closing date rate:

TRADE RECEIVABLES

Thousands of €	Change of exchange rate	Sensitivity effect on EBIT
2019		
Trade receivables		
HUF / EUR	+ 5%	-246
Total in kEUR: 5,168	- 5%	272
HUF / USD	+ 5%	-18
Total in kEUR: 386	- 5%	20

TRADE RECEIVABLES

Thousands of €	Change of exchange rate	Sensitivity effect on EBIT
2018		
Trade receivables		
HUF / EUR	+ 5%	-230
Total in kEUR: 4,823	- 5%	254
HUF / USD	+ 5%	-14
Total in kEUR: 284	- 5%	6

Interest risk and interest risk management

As a result of the current Group financing structure, there are no material interest risks.

Capital management

The primary objective of the Group's capital management is to ensure that it maintains a strong credit rating and healthy equity ratios in order to support its business operations and maximize shareholder value.

The Group manages its capital structure and makes adjustments to it, in light of changes in economic conditions. To maintain or adjust the capital structure, the Group may adjust the dividend payment to shareholders or return capital payments to shareholders. No changes were made to the objectives, policies or processes as of December 31, 2019 or as of December 31, 2018. The Group meets externally imposed minimum capital requirements.

The Group monitors its capital based on the key indicators of gearing and equity ratios.

Gearing ratio

The gearing ratio represents the relationship between net debt and EBITDA. Net debt is essentially defined as current and non-current loans less any cash and cash equivalents. Group net liquidity/debt as of December 31, 2019 amounted to EUR 21.0 million (previous year: EUR -9.9 million). Thus, external and internal key indicators have been met.

Equity ratio

The equity ratio is the ratio of equity to total equity and liabilities. The Nemetschek Group's equity ratio amounts to 40.7% (previous year: 43.0%).

[25] Equity

The development of subscribed capital, the capital reserve, the revenue reserve, foreign currency translation and the retained earnings/accumulated losses of the Group as well as shares without controlling interest are presented in the consolidated statement of changes in equity.

Nemetschek SE's **subscribed capital** as of December 31, 2019 amounted to EUR 115,500,000.00 (previous year: EUR 38,500,000.00) and is divided into 115,500,000 (previous year: EUR 38,500,000) no-par value bearer shares. Each share is attributed with EUR 1.00 of share capital. The capital is fully paid in.

On June 28, 2019, Nemetschek SE implemented the stock split resolved on by the annual general meeting on May 28, 2019. Every shareholder received two additional shares for every Nemetschek share held at no further charge by means of a corresponding depot credit. The stock split was technically carried out by means of a capital increase of the company's funds of EUR 77,000,000 from EUR 38,500,000 to EUR 115,500,000. Given that the overall value remained the same, the estimated price level of the Nemetschek share for the shareholders was accordingly divided by three. As a result of the split, the nominal capital of Nemetschek SE has tripled from EUR 38,500,000 to EUR 115,500,000 no-par value bearer shares.

The **capital reserve** mainly comprises the share premium from the IPO.

The **translation reserve** comprises all foreign currency differences arising from the translation of the financial statements of foreign subsidiaries.

Dividends

In the financial year 2019, a dividend of EUR 31,185,000.00 (previous year: EUR 28,875,000.00) was distributed to the shareholders. This represents EUR 0.81 (in consideration of the stock split: EUR 0.27 per share, previous year: EUR 0.75) per share. The executive board proposes to the supervisory board that a dividend be paid in the fiscal year 2020 amounting to EUR 32,340,000.00. This corresponds to EUR 0.28 per share. This proposal is subject to the ongoing examination of the corona pandemic with regard to the overall economic development, the Group's industry and its financial and economic situation as well as the Group's ability to distribute dividends. Until the general meeting is convened, the executive board in agreement with the supervisory board reserves the right to adjust the proposal for the appropriation of profit.

[26] Segment reporting

The Nemetschek Group is managed centrally by the Executive Board of Nemetschek SE in its function as chief operating decision maker (CODM). At the beginning of the reporting period Nemetschek changed the organization toward the divisions. The reorganization did not result in a change of the operating segments identified. The adjusted management reporting is reflected in the disclosures below. Previous year figures are adjusted accordingly.

Operating segments

The operating segments of the Group are Design, Build, Manage and Media & Entertainment.

The **Design** segment contains the architecture and engineering division and is mainly characterized by the development and marketing of CAD, static engineering and tender software.

The **Build** segment involves the creation and marketing of commercial software for construction companies.

The **Manage** segment covers facility and property management, which involves the extensive administration and management of property development projects.

Furthermore, with the **Media & Entertainment** segment, the Group is involved in the field of multimedia software, visualization and animation.

Management and reporting system

The Group's management reporting and controlling systems principally use accounting policies that are the same as those described in the summary of significant accounting policies according to IFRS with the exception of intercompany leases, which are accounted as operating leases.

Intersegment revenue is generally recorded at values that approximate third-party selling prices.

Reconciliation includes corporate items for which headquarters are responsible as well as strategic projects. Transactions between the segments are eliminated in the context of consolidation and the eliminated amounts are also included in the reconciliation.

SEGMENT REPORTING

2019	Thousands of €	Design	Build	Manage	Media & Entertainment	Reconciliation	Total
Revenue, total		314,650	177,653	38,487	33,913	-7,824	556,879
thereof revenue external		310,142	176,082	38,397	32,258	0	556,879
thereof intersegment revenue		3	1,571	90	1,655	-3,319	0
EBITDA		101,952	61,629	7,902	9,418	-15,237	165,664
Depreciation		-11,571	-7,452	-1,660	-683	-552	-21,918
EBITA		90,381	54,177	6,243	8,735	-15,789	143,746
Amortization							-20,134
Financial result							30,057
EBT							153,669

SEGMENT REPORTING

2018	Thousands of €	Design	Build	Manage	Media & Entertainment	Reconciliation	Total
Revenue, total		285,414	141,495	13,806	27,528	-6,944	461,299
thereof revenue external		281,363	140,189	13,806	25,941	0	461,299
thereof intersegment revenue		1	1,306	0	1,587	-2,895	0
EBITDA		82,703	41,838	2,907	11,852	-18,045	121,255
Depreciation		-3,374	-2,662	-109	-265	-111	-6,521
EBITA		79,329	39,176	2,798	11,587	-18,156	114,734
Amortization							-16,939
Financial result							2,013
EBT							99,808

Information related to geographic areas

Segment reporting by geographical region is as follows:

SEGMENT REPORTING - GEOGRAPHICAL REGION

Thousands of €	Revenues 2019	Non-current assets 2019	Revenues 2018	Non-current assets 2018
Germany	141,164	58,968	130,100	47,234
Abroad	415,715	490,869	331,199	322,653
Total	556,879	549,837	461,299	369,887

With respect to information about geographical regions, revenue is allocated to countries based on the location of the customer; non-current assets are presented according to the physical location of these assets.

[27] Notes to the cash flow statement and composition of the cash and cash equivalents

The cash flow statement is split into cash flows from operating, investing and financing activities. Whereas the cash flow from operating activities is derived using the indirect method, the cash flows from investing and financing activities are based on direct cash inflows and outflows.

Cash flow from operating activities amounts to EUR 160,376k (previous year: EUR 99,747k).

The cash flow from investing activities amounts to EUR –83,781k (previous year: EUR –74,388k). In the current financial year this mainly includes

- » payments for the acquisition of Axserion Group B.V. and Redshift Rendering Technologies, Inc.

» proceeds from the sale of the 22.41% share in the associate DocuWare GmbH

- » investments in intangible assets and office equipment

The previous financial year primarily includes payments for the purchase of Spacewell, 123erfasst.de GmbH and investments in intangible assets and office equipment.

The cash flow from financing activities amounting to EUR 10,676k (previous year: EUR –10,394k). Cash outflows from the repayment of financial liabilities and the payment of interests increased by EUR 12.779 due to the initial recognition of lease liabilities.

[28] FINANCIAL COMMITMENTS

Thousands of €	Total	Less than 1 year	1 to 5 years	More than 5 years
Rental agreements	73,670	11,019	35,888	26,763
Leases	4,765	2,056	2,577	132
Total financial commitments as of December 31, 2018	78,435	13,075	38,465	26,895

Since January 1, 2019 the operating lease commitments have been reported in accordance with the requirements of IFRS 16.

Furthermore, there are guarantee obligations amounting to EUR 706k (previous year: EUR 935k) in total. These are mainly rental guarantees.

Contingent liabilities

As at the closing date, there are no contingent liabilities.

[29] Related party transactions

The Group enters into transactions with related parties. These transactions are part of ordinary activities and are treated at arm's length. Related parties are defined as parties who can at least be significantly influenced by the company or over whom the company can at least exercise significant influence. In addition, the executive and supervisory boards as well as their family members and partners have been identified as related parties.

Sales and purchases of goods and services

During the year, the group entities entered into the following transactions with related parties:

- (1) Rental of space as well as repairs from Concentra GmbH & Co. KG, Munich, amounting to a total of EUR 1,599k (previous year: EUR 1,531k).
- (2) Use of services from Nemetschek OOD, Bulgaria, amounting to a total of EUR 4,411k (previous year: EUR 3,472k).
- (3) Use of services from DocuWare GmbH, Germering, amounting to a total of EUR 456k (previous year: EUR 777k).

As of December 31, 2019 trade payables to Concentra GmbH & Co. KG, Munich amounted to EUR 2k (previous year: EUR 20k) and trade payables to Nemetschek OOD, Bulgaria amounted to EUR 19k (previous year: EUR 202k). As of December 31, 2018 loans given to the associate Sablono GmbH amounted to EUR 30k.

Compensation of members of the executive board

Total remuneration attributable to the Executive Board amounted to EUR 3.110k (previous year: EUR 3.102k). Thereof EUR 2.356k (previous year: EUR 2.119k) relate to short-term employee benefits and EUR 754k (previous year: 983k) relate to other long-term benefits.

Compensation of members of the supervisory board

Remuneration of the supervisory board breaks down as follows:

REMUNERATION OF THE SUPERVISORY BOARD

2019	Thousands of €	2019	2018
Kurt Dobitsch		250	250
Prof. Georg Nemetschek		225	225
Rüdiger Herzog		200	200
Bill Krouch		200	117
		875	792

[30] Other information

Headcount

The average headcount breaks down as follows:

HEADCOUNT

	Number of employees	2019	2018
Sales/Marketing/Hotline		1,280	1,084
Development		1,103	962
Administration		383	321
Average headcount for the year		2,767	2,367
Headcount as of December 31		2,875	2,587

Auditor's fees

The following fees of the auditor of the consolidated financial statements were expensed in the financial year 2019:

AUDITORS' FEES

	Thousands of €	2019	2018
Financial statements audit services		332	313
Other audit services		12	10
Tax advisory services		0	20
Other services		71	0
		415	343

[31] Information on the "German Corporate Governance Code"

The Declaration of Conformity was submitted on December 19, 2019. The relevant current version is available to the shareholders on the website of Nemetschek SE (<https://ir.nemetschek.com/websites/nemetschek/English/5100/declaration-of-conformity.html>).

[32] Events after the balance sheet date

Subsequent events

Under the purchase agreement of December 17, 2019, Maxon Computer GmbH acquired 100% of the shares of Red Giant LLC, Portland, United States. Red Giant offers a comprehensive product portfolio of motion graphics and innovative visual effects software solutions. The purchase consideration consists of EUR 71,212k in cash and of approximately 16% of the shares in Maxon Computer GmbH. The Group obtained control as at January 7, 2020. More detailed information pursuant to IFRS 3.B66 were not available at the time of the preparation of the consolidated financial statements.

Date of preparation

The executive board prepared and approved the consolidated financial statements on March 27, 2020, to be passed on to the supervisory board. It is the supervisory board's task to examine the consolidated financial statements and give its approval and authorization for issue.

[33] Supervisory board

Kurt Dobitsch, (Businessman)

Chairman

Year of birth 1954

First appointed 1998

Term expires 2022

Member of the following supervisory boards:

» Nemetschek SE, Munich, Germany (Chairman)

Mandates related to the Group:

- Graphisoft SE, Budapest, Hungary
- Vectorworks, Inc., Columbia, USA

» Bechtle AG, Gaildorf, Germany

» Singhammer IT Consulting AG, Munich, Germany

» United Internet AG, Montabaur (Chairman)

Mandates associated with the Group:

- 1 & 1 Telecommunication SE, Montabaur, Germany
- 1 & 1 Mail & Media Applications SE, Montabaur, Germany
- Drillisch AG, Maintal, Germany

Prof. Georg Nemetschek, (Businessman)

Deputy Chairman

Year of birth 1934

First appointed 2001

Term expires 2022

Rüdiger Herzog, (Lawyer)

Year of birth 1950

First appointed 2003

Term expires 2022

Member of the following supervisory boards:

» DF Deutsche Finance Holding AG,
Munich, Germany (Chairman)

» DF Deutsche Finance Investment GmbH,
Munich, Germany (Chairman)

» DBC Finance GmbH, Munich, Germany (Chairman)

Bill Krouch, (Businessman)

Year of birth 1959

First appointed 2018

Term expires 2022

Member of the following supervisory board:

» INVESTCORP, New York, USA

Executive board

Dr. Axel Kaufmann

(Dipl.-Kfm.)

Spokesman of the Executive Board and CFOO

(since January 1, 2020)

Managing director Nemetschek Austria Beteiligungen GmbH

(since January 7, 2020)

Member of the following supervisory boards:

- » Bluebeam Holding, Inc., USA (since January 1, 2020)
- » Bluebeam Inc., USA (since January 1, 2020)
- » Nemetschek Inc., USA (since January 1, 2020)

Viktor Várkonyi

(Master of Computer Science, MBA)

Chief Division Officer, Planning & Design Division

CEO Graphisoft SE (until March 31, 2019)

Member of the following supervisory boards:

- » Data Design System AS, Norway
- » dRofus AS, Norway
- » Graphisoft SE
- » RISA Tech. Inc., USA (since May 16, 2019)
- » SCIA Group International NV, Belgium (since April 12, 2019)
- » SCIA NV, Belgium (since April 12, 2019)
- » Solibri Oy, Finland
- » Vectorworks , Inc., USA (since May 17, 2019)

Jon Elliott

(Master of Business Administration, MBA)

Chief Division Officer, Build & Construct Division

(since February 1, 2019)

CEO Bluebeam Holding, Inc., USA

CEO Bluebeam, Inc., USA

CEO Bluebeam Ltd., UK

CEO Nemetschek Inc., USA (since July 25, 2019)

Member of the following supervisory board:

- » Design Data Corp., USA (since May 16, 2019)

Patrik Heider

(Dipl.-Kfm. FH [Business degree])

Spokesman of the Executive Board and CFOO

(until December 31, 2019)

Managing director Nemetschek Austria Beteiligungen GmbH
(until January 7, 2020)

Member of the following supervisory boards:

- » Bluebeam Holding, Inc., USA (until December 31, 2019)
- » Bluebeam Inc., USA (until December 31, 2019)
- » Data Design System AS, Norway
(until September 30, 2019)
- » Design Data Corp., USA (until May 16, 2019)
- » Nemetschek Inc., USA (until December 31, 2019)
- » RISA Tech. Inc., USA (until May 16, 2019)
- » SCIA Group International NV, Belgium (until April 12, 2019)
- » SCIA NV, Belgium (until April 12, 2019)
- » Solibri Oy, Finland (until May 15, 2019)
- » Spacewell (formerly: FASEAS International NV/
MCS Solutions), Belgium (until December 13, 2019)

Munich, March 27, 2020

Nemetschek SE



Dr. Axel Kaufmann



Viktor Várkonyi



Jon Elliott

Declaration Confirmation of the members of the authorized body

"I hereby confirm that, to the best of my knowledge, in accordance with the applicable financial reporting framework, the consolidated financial statements give a true and fair view of the net assets, financial position and results of operations of the Group and the Group management report gives a true and fair view of business performance, including the results of operations and the situation of the Group, and describes the main opportunities and risks and anticipated development of the Group."

Munich, March 27, 2020



Dr. Axel Kaufmann



Viktor Várkonyi



Jon Elliott

Independent auditor's report

To Nemetschek SE

Report on the audit of the consolidated financial statements and of the group management report

Opinions

We have audited the consolidated financial statements of Nemetschek SE and its subsidiaries (the Group), which comprise the consolidated statement of comprehensive income for the fiscal year from 1 January 2019 to 31 December 2019, the consolidated statement of financial position as of 31 December 2019, the consolidated cash flow statement and the consolidated statement of changes in equity for the fiscal year from 1 January 2019 to 31 December 2019, and notes to the consolidated financial statements, including a summary of significant accounting policies. In addition, we have audited the group management report of Nemetschek SE, which has been combined with the management report of Nemetschek SE, for the fiscal year from 1 January 2019 to 31 December 2019. In accordance with the German legal requirements, we have not audited the content of the non-financial statement contained in section 2 and the report on corporate controlling and statement on corporate management contained in section 7.1.

In our opinion, based on the knowledge we obtained in the audit,

- » the accompanying consolidated financial statements comply, in all material respects, with the IFRS as adopted by the EU, and the additional requirements of German commercial law pursuant to Sec. 315e (1) HGB ["Handelsgesetzbuch": German Commercial Code] and, in compliance with these requirements, give a true and fair view of the assets, liabilities, and financial position of the Group as of 31 December 2019, and of its financial performance for the fiscal year from 1 January 2019 to 31 December 2019, and
- » the accompanying group management report as a whole provides an appropriate view of the Group's position. In all material respects, this group management report is consistent with the consolidated financial statements, complies with German legal requirements and appropriately presents the opportunities and risks of future development. Our opinion on the group management report does not cover the content of the non-financial statement and the report on enterprise controlling and declaration on corporate management referred to above.

Pursuant to Sec. 322 (3) Sentence 1 HGB, we declare that our audit has not led to any reservations relating to the legal compliance of the consolidated financial statements and of the group management report.

Basis for the opinions

We conducted our audit of the consolidated financial statements and of the group management report in accordance with Section

317 HGB and the EU Audit Regulation (No 537/2014, referred to subsequently as “EU Audit Regulation”) and in compliance with German Generally Accepted Standards for Financial Statement Audits promulgated by the Institut der Wirtschaftsprüfer [Institute of Public Auditors in Germany] (IDW). Our responsibilities according to those requirements and principles are further described in the “Auditor’s responsibilities for the audit of the consolidated financial statements and of the group management report” section of our auditor’s report. We are independent of the group entities in accordance with the requirements of European law and German commercial and professional law, and we have fulfilled our other German professional responsibilities in accordance with these requirements. In addition, in accordance with Article 10 (2) f) of the EU Audit Regulation, we declare that we have not provided non-audit services prohibited under Article 5 (1) of the EU Audit Regulation. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinions on the consolidated financial statements and on the group management report.

Key audit matters in the audit of the consolidated financial statements

Key audit matters are those matters that, in our professional judgment, were of most significance in our audit of the consolidated financial statements for the fiscal year from 1 January 2019 to 31 December 2019. These matters were addressed in the context of our audit of the consolidated financial statements as a whole, and in forming our opinion thereon; we do not provide a separate opinion on these matters.

Below, we describe what we consider to be the key audit matters:

1. Recognition of revenue from software service agreements

Reasons why the matter was determined to be a key audit matter

The business activities of the Group comprise among others the sale of software licenses as well as the rendering of services such as a telephone hotline and updates in connection with this software under software service agreements (“service agreements”). Revenue from these service agreements is recognized on a pro rata basis over the term of the agreement. Recognizing revenue over the term of these service agreements is an area that carries significant risk of material misstatement in the consolidated financial statements (including the potential risk of management overriding controls) and is thus a key audit matter, as there is a large number of these transactions and revenue is a financial performance indicator.

Auditor’s response

In the course of our audit, we examined the processes associated with revenue recognition as well as the application of the accounting policies for service agreements. We assessed the

design and operating effectiveness of the accounting-related internal control system by verifying business transactions from initiation to its recognition in the financial statements as well as the controls implemented as part of the process.

Our audit procedures included, but were not limited to, a review of the contractual bases including contractually agreed regulations regarding service performance and termination rights. To assess the accounting performed by the executive directors, we performed substantive testing to verify that the prerequisites for the recognition of revenue were met for service agreements. In particular, to assess whether revenue from service agreements was matched to the correct period, we reconciled and recalculated on a sample basis the revenue recognized as of the reporting date as well as the corresponding deferred items for work in process with the contractual bases and compared records of payments received with bank statements. Data analysis procedures were also used in this context to evaluate mass data. In order to detect irregularities in the margin development over the course of the year and in comparison, to the prior year, we carried out analytical audit procedures.

Furthermore, we obtained documents from third parties for the receivables outstanding as of the reporting date.

Our audit procedures did not lead to any reservations regarding the recognition of revenue from software service agreements.

Reference to related disclosures

For information on the accounting policies applied to the recognition of revenue from software service agreements, we refer to the disclosures in the notes to the consolidated financial statements in the section Summary of significant accounting policies – Revenues, as well as to no. 1 Revenue, no. 21 Deferred items and no. 26 Segment reporting.

2. Accounting for business combinations

Reasons why the matter was determined to be a key audit matter

The purchase of the Axserion Group, Heteren, Netherlands, on 18 January 2019 and the acquisition of Redshift Rendering Technologies, Inc. Newport Beach, USA, on 5 April 2019 were key audit matters because of the complexity of the transactions as well as the assumptions and estimates required by the executive directors as part of the purchase price allocation.

Auditor’s response

Our audit procedures in relation to the purchase of the companies involved verifying the assessment by the executive directors regarding control of the entities acquired. For this purpose, we compared, among other things, the corporate law agreements with the criteria for control defined in IFRS 10 Consolidated Financial Statements.

In addition to comparing the consideration provided by Nemetschek SE with the contractual bases, our audit procedures in relation to the (preliminary) purchase price allocations involved assessing the methodology used by the external appraiser engaged by the executive directors to identify the acquired assets as well as the conceptual assessment of the measurement models, considering the rules in IFRS 3 Business Combinations. With the support of our internal measurement specialists, we verified the methods used to measure fair value. We also analyzed assumptions and estimates based on judgment (for example growth rates, cost of capital rates, royalty rates or remaining useful lives) made to determine the fair values of the acquired, identifiable assets as well as of the liabilities assumed on the acquisition date in order to check whether they correspond to general and industry-specific market expectations. In addition, we verified the models arithmetically and reconciled the future expected cash flows used for measurement with internal budgets and other items.

Another focus was on the determination of the fair values for technologies and the customer base. Among other things, we assessed the suitability of the measurement appraisal and of the appraisals by external experts engaged by the executive directors as audit evidence by interviewing the experts to determine whether the assumptions made reflect the view of an external market participant on the acquisition date. With regard to the determination of goodwill, we examined the calculation as a residual amount between the purchase price calculated less the fair value of identified, acquired assets and liabilities, taking into account the resulting deferred taxes.

We compared the accounting treatment of the assets and liabilities acquired in the business combinations with the accounting policies used in the Nemetschek Group. We also examined the tax effects of the combination and the presentation of the first-time consolidation in the consolidation system. Additionally, we assessed the disclosures in the notes to the consolidated financial statements regarding the requirements in IFRS 3.

Our audit procedures did not lead to any reservations regarding the accounting for business combinations.

Reference to related disclosures

The disclosures on the accounting for business combinations are presented in the sections Summary of significant accounting policies, Significant discretionary decisions, estimates and assumptions when preparing the consolidated financial statements, Business combinations – *Acquisitions in 2019, Acquisitions in fiscal year 2018*, as well as in no. 15 *Property, plant and equipment* and no. 16 *Intangible Assets and Goodwill* in the notes to the consolidated financial statements.

3. Impairment of goodwill and intangible assets

Reasons why the matter was determined to be a key audit matter

Testing goodwill and intangible assets at the level of the cash-generating unit for possible impairments was a key audit matter, as the measurements underlying the impairment tests highly depend on the estimate of future cash flows and the discount rate used and have a material effect on the consolidated financial statements.

Auditor's response

To assess the appropriateness of the measurements performed by the executive directors, we carried out control-based audit procedures and examined the underlying processes associated with the identification of the cash-generating units and determination of fair values, and also carried out substantive audit procedures.

To check the cash-generating unit for possible impairments, we verified the underlying measurement models both methodologically and arithmetically, with the support of internal valuation specialists. In this context, we examined whether the budgets reflect general and industry-specific market expectations and compared the measurement parameters used for the estimates of the fair values – in particular the estimated growth rates, the weighted average cost of capital rates and the tax rates – with publicly available market data and assessed these against changes in significant assumptions, including future market conditions. To determine the reliability of the budgets, we compared historical budget data with actual figures on a sample basis.

To be able to assess a possible impairment risk in the event of a potential change in one of the main assumptions, we also carried out our own sensitivity analyses.

Our audit procedures did not lead to any reservations regarding the impairment of goodwill and intangible assets.

Reference to related disclosures

For information on the accounting policies applied to the impairment of goodwill and intangible assets, we refer to the disclosures in the notes to the consolidated financial statements in the section Summary of significant accounting policies – *Intangible Assets and goodwill, Impairment of non-financial assets*, Significant discretionary decisions, estimates and assumptions when preparing the consolidated financial statements as well as to in no. 16 *Intangible Assets and Goodwill*.

Other information

The executive directors are responsible for the other information. The other information comprises:

- » Activities of the Company;
- » "Key Figures";
- » The statement to shareholders;
- » "Management" in the section "To our shareholders" of the annual report 2019;
- » "Nemetschek on the Capital Market" in the section "To our shareholders" of the annual report 2019;
- » "Corporate Governance" in the section "To our shareholders" of the annual report 2019;
- » "Declaration of the members of the authorized body";
- » Non-financial statement in the combined management report;
- » Report on corporate controlling and statement on corporate management in the combined management report, and
- » Reference projects.

The supervisory board is responsible for the following other information:

- » Report of the Supervisory Board 2019.

Our opinions on the consolidated financial statements and on the group management report do not cover the other information, and consequently we do not express an opinion or any other form of assurance conclusion thereon.

In connection with our audit, our responsibility is to read the other information and, in so doing, to consider whether the other information

- » is materially inconsistent with the consolidated financial statements, with the group management report 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 executive directors and the supervisory board for the consolidated financial statements and the group management report

The executive directors are responsible for the preparation of consolidated financial statements that comply, in all material respects, with IFRS as adopted by the EU and the additional requirements of German commercial law pursuant to Sec. 315e (1) HGB, and that the consolidated financial statements, in compliance with these requirements, give a true and fair view of the assets, liabilities, financial position and financial performance of the Group. In addition, the executive directors are responsible for such internal control as they have determined 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 executive directors are responsible for assessing the Group's ability to continue as a going concern. They also have the responsibility for disclosing, as applicable, matters related to going concern. In addition, they are responsible for financial reporting based on the going concern basis of accounting unless there is an intention to liquidate the Group or to cease operations, or there is no realistic alternative but to do so.

Furthermore, the executive directors are responsible for the preparation of the group management report that, as a whole, provides an appropriate view of the Group's position and is, in all material respects, consistent with the consolidated financial statements, complies with German legal requirements, and appropriately presents the opportunities and risks of future development. In addition, the executive directors are responsible for such arrangements and measures (systems) that they have considered necessary to enable the preparation of a group management report that is in accordance with the applicable German legal requirements, and to be able to provide sufficient appropriate evidence for the assertions in the group management report.

The supervisory board is responsible for overseeing the Group's financial reporting process for the preparation of the consolidated financial statements and of the group management report.

Auditor's responsibilities for the audit of the consolidated financial statements and of the group management report

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 whether the group management report as a whole provides an appropriate view of the Group's position and, in all material respects, is consistent with the consolidated financial statements and the knowledge obtained in the audit, complies with the German legal requirements and appropriately presents the opportunities and risks of future development, as well as to issue an auditor's report that includes our opinions on the consolidated financial statements and on the group management report.

Reasonable assurance is a high level of assurance, but it is not a guarantee that an audit conducted in accordance with Sec. 317 HGB and the EU Audit Regulation and in compliance with German Generally Accepted Standards for Financial Statement Audits promulgated by the Institut der Wirtschaftsprüfer (IDW) will always detect a material misstatement. Misstatements can arise from fraud or error and are considered material if they, individually or in the aggregate, could reasonably be expected to influence the economic decisions of users taken on the basis of these consolidated financial statements and this group management report.

We exercise professional judgment and maintain professional skepticism throughout the audit. We also:

- » Identify and assess the risks of material misstatement of the consolidated financial statements and of the group management report, whether due to fraud or error, design and perform audit procedures responsive to those risks, and obtain audit evidence that is sufficient and appropriate to provide a basis for our opinions. The risk of not detecting a material misstatement resulting from fraud is higher than for one resulting from error, as fraud may involve collusion, forgery, intentional omissions, misrepresentations, or the override of internal controls;
- » Obtain an understanding of internal controls relevant to the audit of the consolidated financial statements and of arrangements and measures (systems) relevant to the audit of the group management report to design audit procedures that are appropriate under the given circumstances, but not for the purpose of expressing an opinion on the effectiveness of these systems;
- » Evaluate the appropriateness of accounting policies used by the executive directors and the reasonableness of estimates made by the executive directors and related disclosures;
- » Conclude on the appropriateness of the executive directors' use of the going concern basis of accounting and, based on the audit evidence obtained, whether a material uncertainty exists related to events or conditions that may cast significant doubt on the Group's ability to continue as a going concern. If we conclude that a material uncertainty exists, we are required to draw attention in the auditor's report to the related disclo-

tures in the consolidated financial statements and in the group management report or, if such disclosures are inadequate, to modify our respective opinions. Our conclusions are based on the audit evidence obtained up to the date of our auditor's report. However, future events or conditions may cause the Group to cease to be able to continue as a going concern;

- » Evaluate the overall presentation, structure and content of the consolidated financial statements, including the disclosures, and whether the consolidated financial statements present the underlying transactions and events in a manner that the consolidated financial statements give a true and fair view of the assets, liabilities, financial position and financial performance of the Group in compliance with IFRS as adopted by the EU and the additional requirements of German commercial law pursuant to Sec. 315e (1) HGB;
- » Obtain sufficient appropriate audit evidence regarding the financial information of the entities or business activities within the Group to express opinions on the consolidated financial statements and on the group management report. We are responsible for the direction, supervision and performance of the group audit. We remain solely responsible for our audit opinions;
- » Evaluate the consistency of the group management report with the consolidated financial statements, its conformity with German law, and the view of the Group's position it provides;
- » Perform audit procedures on the prospective information presented by the executive directors in the group management report. On the basis of sufficient appropriate audit evidence we evaluate, in particular, the significant underlying assumptions used by the executive directors as a basis for the prospective information, and evaluate the proper derivation of the prospective information from these assumptions. We do not express a separate opinion on the prospective information and the underlying assumptions. There is a substantial unavoidable risk that future events will differ materially from the prospective information;

We communicate with those charged with governance regarding, among other matters, the planned scope and timing of the audit and significant audit findings, including any significant deficiencies in internal controls that we identify during our audit.

We also provide those charged with governance with a statement that we have complied with the relevant independence requirements and communicate with them all relationships and other matters that may reasonably be thought to affect our independence and where applicable, the related safeguards.

From the matters communicated with those charged with governance, we determine those matters that were of most significance in the audit of the consolidated financial statements of the current period and are therefore the key audit matters. We describe these matters in our auditor's report unless law or regulation precludes public disclosure about the matter.

Other legal and regulatory requirements

Further information pursuant to Art. 10 of the EU Audit

Regulation

We were elected as group auditor by the Annual General Meeting on 28 May 2019. We were engaged by the supervisory board on 22 October 2019. We have been the auditor of Nemetschek SE without interruption since the fiscal year from 1 January 2013 to 31 December 2013.

We declare that the opinions expressed in this auditor's report are consistent with the additional report to the audit committee pursuant to Art. 11 of the EU Audit Regulation (long-form audit report).

German Public Auditor responsible for the engagement

The German Public Auditor responsible for the engagement is Ralf Bostedt.

Munich, March 27, 2019

Ernst & Young GmbH
Wirtschaftsprüfungsgesellschaft

Bostedt
Wirtschaftsprüfer

Turba
Wirtschaftsprüferin

The assurance engagement performed by Ernst & Young (EY) relates exclusively to the German version of the non-financial group statement 2019 of Nemetschek SE. The following text is a translation of the original German Independent Auditor's Limited Assurance Report.

Independent Auditor's Limited Assurance Report

To Nemetschek SE, Munich

We have performed a limited assurance engagement on the non-financial group statement of Nemetschek SE according to § 315b HGB ("Handelsgesetzbuch": German Commercial Code), as well as the section "1.1 Business model" in the combined management report being incorporated by reference for the reporting period from 1 January 2019 to 31 December 2019 (hereafter non-financial group statement).

Management's responsibility

The legal representatives of the Company are responsible for the preparation of the non-financial group statement in accordance with §§ 315c in conjunction with 289c to 289e HGB.

This responsibility includes the selection and application of appropriate methods to prepare the non-financial group statement as well as making assumptions and estimates related to individual disclosures, which are reasonable in the circumstances. Furthermore, the legal representatives are responsible for such internal controls that they have considered necessary to enable the preparation of a non-financial group statement that is free from material misstatement, whether due to fraud or error.

Auditor's declaration relating to independence and quality control

We are independent from the Company in accordance with the provisions under German commercial law and professional requirements, and we have fulfilled our other professional responsibilities in accordance with these requirements.

Our audit firm applies the national statutory regulations and professional pronouncements for quality control, in particular the by-laws regulating the rights and duties of Wirtschaftsprüfer and vereidigte Buchprüfer in the exercise of their profession [Berufssatzung für Wirtschaftsprüfer und vereidigte Buchprüfer] as well as the IDW Standard on Quality Control 1: Requirements for Quality Control in audit firms [IDW Qualitätssicherungsstandard 1: Anforderungen an die Qualitätssicherung in der Wirtschaftsprüferpraxis (IDW QS 1)].

Auditor's responsibility

Our responsibility is to express a limited assurance conclusion on the non-financial group statement based on the assurance engagement we have performed.

We conducted our assurance engagement in accordance with the International Standard on Assurance Engagements (ISAE) 3000 (Revised): Assurance Engagements other than Audits or Reviews of Historical Financial Information, issued by the International Auditing and Assurance Standards Board (IAASB). This Standard requires that we plan and perform the assurance engagement to obtain limited assurance about whether the non-financial group statement of the Company has been prepared, in all material respects, in accordance with §§ 315c in conjunction with 289c to 289e HGB. In a limited assurance engagement the assurance procedures are less in extent than for a reasonable assurance engagement and therefore a substantially lower level of assurance is obtained. The assurance procedures selected depend on the auditor's professional judgment.

Within the scope of our assurance engagement, which has been conducted between January 2020 and March 2020, we performed amongst others the following assurance and other procedures:

- » Inquiries of employees regarding the selection of topics for the non-financial group report, the risk assessment and the concepts of Nemetschek SE for the topics that have been identified as material,
- » Inquiries of employees responsible for data capture and consolidation as well as the preparation of the non-financial group statement, to evaluate the reporting processes, the data capture and compilation methods as well as internal controls to the extent relevant for the assurance of the non-financial group statement,
- » Identification of likely risks of material misstatement in the non-financial group statement,
- » Inspection of relevant documentation of the systems and processes for compiling, aggregating and validating relevant data in the reporting period and testing such documentation on a sample basis,
- » Analytical evaluation of disclosures in the non-financial group statement,
- » Inquiries and inspection of documents on a sample basis relating to the collection and reporting of selected data,
- » Evaluation of the presentation of disclosures in the non-financial group statement.

Assurance conclusion

Based on our assurance procedures performed and assurance evidence obtained, nothing has come to our attention that causes us to believe that the non-financial statement of Nemetschek SE for the period from 1 January 2019 to 31 December 2019 has not been prepared, in all material respects, in accordance with §§ 315c in conjunction with 289c to 289e HGB.

Intended use of the assurance report

We issue this report on the basis of the engagement agreed with Nemetschek SE. The assurance engagement has been performed for the purposes of the Company and the statement is solely intended to inform the Company as to the results of the assurance engagement and must not be used for purposes other than those intended. The statement is not intended to provide third parties with support in making (financial) decisions.

Engagement terms and liability

The “General Engagement Terms for Wirtschaftsprüfer and Wirtschaftsprüfungsgesellschaften [German Public Auditors and Public Audit Firms]” dated 1 January 2017 are applicable to this engagement and also govern our relations with third parties in the context of this engagement (www.de.ey.com/general-engagement-terms). In addition, please refer to the liability provisions contained there in no. 9 and to the exclusion of liability towards third parties. We assume no responsibility, liability or other obligations towards third parties unless we have concluded a written agreement to the contrary with the respective third party or liability cannot effectively be precluded.

We make express reference to the fact that we do not update the assurance report to reflect events or circumstances arising after it was issued unless required to do so by law. It is the sole responsibility of anyone taking note of the result of our assurance engagement summarized in this assurance report to decide whether and in what way this result is useful or suitable for their purposes and to supplement, verify or update it by means of their own review procedures.

Munich, 27 March 2020

Ernst & Young GmbH
Wirtschaftsprüfungsgesellschaft

Nicole Richter
Wirtschaftsprüferin
(German Public Auditor)

Yvonne Meyer
Wirtschaftsprüferin
(German Public Auditor)





Bunjil Place

Narre Warren, Australia

ARCHITECTS: fjmt

PARTICIPATING BRAND: GRAPHISOFT
