Annual financial statements as at 31 December 2018 and management report

TRANSLATION - AUDITOR’S REPORT

Clearstream Banking Aktiengesellschaft
Frankfurt am Main

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### Balance sheet as of 31 December 2018
of Clearstream Banking Aktiengesellschaft, Frankfurt/Main

<table>
<thead>
<tr>
<th><strong>Assets</strong></th>
<th>31/12/2018 EUR</th>
<th>31/12/2017 EUR</th>
<th><strong>Liabilities</strong></th>
<th>31/12/2018 EUR</th>
<th>31/12/2017 EUR</th>
<th><strong>Balance sheet surplus</strong></th>
<th>31/12/2018 EUR</th>
<th>31/12/2017 EUR</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cash and bank balances</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cash at central banks</td>
<td>EUR 1,113,666,181.68</td>
<td>EUR 879,705</td>
<td>Liabilities due to banks</td>
<td>EUR 1,735,566,119.56</td>
<td>EUR 1,084,882</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof: Deutsche Bundesbank</td>
<td>EUR 1,113,666,181.68 (previous year: EUR 879,705)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Receivables from banks</td>
<td>EUR 1,227,226,104.41</td>
<td>EUR 719,969</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof: Deutsche Bundesbank</td>
<td>EUR 2,227,051.65</td>
<td>EUR 3,389</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Other receivables</td>
<td>EUR 2,227,051.65</td>
<td>EUR 3,389</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Receivables from non-banks</td>
<td>EUR 4,407,604.62</td>
<td>EUR 2,758</td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>Bonds and other fixed-income securities</td>
<td></td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof: eligible as collateral at Deutsche Bundesbank</td>
<td>EUR 89,083,001.84</td>
<td>EUR 99,168</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof: eligible as collateral at Deutsche Bundesbank (previous year: EUR 99,168)</td>
<td>EUR 10,347,954.67</td>
<td>EUR 50,720</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Bonds and debt instruments of public-sector issuers</td>
<td>EUR 10,347,954.67</td>
<td>EUR 50,720</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof: eligible as collateral at Deutsche Bundesbank (previous year: EUR 50,720)</td>
<td>EUR 10,347,954.67</td>
<td>EUR 50,720</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Intangible assets</td>
<td>EUR 263,712.87</td>
<td>EUR 504</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof: excluding prepayments</td>
<td>EUR 263,712.87</td>
<td>EUR 504</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Property, plant and equipment</td>
<td>EUR 67,138.66</td>
<td>EUR 191</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof: eligible as collateral at Deutsche Bundesbank</td>
<td>EUR 67,138.66</td>
<td>EUR 191</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Other assets</td>
<td>EUR 11,985,854.22</td>
<td>EUR 13,313</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total assets</td>
<td>EUR 2,459,274,604.62</td>
<td>EUR 1,768,717</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total liabilities</td>
<td>EUR 2,459,274,604.62</td>
<td>EUR 1,768,717</td>
<td></td>
<td></td>
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</tr>
</tbody>
</table>
## Income statement of Clearstream Banking Aktiengesellschaft, Frankfurt/Main for the period 1 January to 31 December 2018

<table>
<thead>
<tr>
<th></th>
<th></th>
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</tr>
</thead>
<tbody>
<tr>
<td><strong>1. Interest income from</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>a) Loans and money market transactions</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>aa) Loan and money business with positive interest rates</td>
<td>9,897,174.06</td>
<td>3,912</td>
<td></td>
<td></td>
</tr>
<tr>
<td>ab) Loan and money business with negative interest rates</td>
<td>5,108,647.40</td>
<td>4,341</td>
<td>8,253</td>
<td></td>
</tr>
<tr>
<td>b) Fixed-income securities and book-entry securities</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>ba) Fixed-income securities and book-entry securities with positive interest rates</td>
<td>40,007.23</td>
<td>64</td>
<td></td>
<td></td>
</tr>
<tr>
<td>c) Clearing item in accordance with section 246 (2) HGB</td>
<td>0.00</td>
<td>773</td>
<td>9,090</td>
<td></td>
</tr>
<tr>
<td><strong>2. Interest expense</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>a) Interest expense with positive interest rates</td>
<td>-2,162,081.37</td>
<td>-1,461</td>
<td></td>
<td></td>
</tr>
<tr>
<td>b) Interest expense with negative interest rates</td>
<td>-5,200,525.39</td>
<td>-3,959</td>
<td>-5,420</td>
<td></td>
</tr>
<tr>
<td>c) Clearing item in accordance with section 246 (2) HGB</td>
<td>-7,528,557.28</td>
<td>-14,891,164.04</td>
<td>154,664.65</td>
<td>0</td>
</tr>
<tr>
<td><strong>3. Commission income</strong></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td></td>
<td>396,427,073.96</td>
<td>372,611</td>
<td></td>
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<tr>
<td><strong>4. Commission expenses</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>-91,439,270.49</td>
<td>-77,496</td>
<td>295,115</td>
<td></td>
</tr>
<tr>
<td><strong>5. Other operating income</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof foreign exchange revaluation EUR 4,545,401.46 (previous year: EUR thous. 2,516)</td>
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<tr>
<td><strong>6. General administrative expenses</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>a) Personnel expenses</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>aa) Wages and salaries</td>
<td>-46,767,109.68</td>
<td>-36,289</td>
<td></td>
<td></td>
</tr>
<tr>
<td>ab) Social security and retirement benefits</td>
<td>-17,372,015.91</td>
<td>-64,139,124.59</td>
<td>-6,904</td>
<td>-43,193</td>
</tr>
<tr>
<td>thereof, for retirement benefits</td>
<td>EUR 130,45,635.69 (previous year: EUR thous. 2,769)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>b) other administrative expenses</td>
<td>-123,940,364.44</td>
<td>-188,079,489.03</td>
<td>-128,983</td>
<td>-172,176</td>
</tr>
<tr>
<td><strong>7. Depreciation and impairments of property, plant and equipment</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof foreign exchange revaluation EUR 4,682,406.18 (previous year: EUR thous. 2,384)</td>
<td>-371,931.13</td>
<td>-378</td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof interest result from discounting provisions EUR 475,044.23 (previous year: EUR thous. 656)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>9. Amortisation attributable to write-downs for receivables and certain securities as well as the increase of provisions in lending business</strong></td>
<td>-4,461.84</td>
<td>-121</td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof foreign exchange revaluation EUR 4,682,406.18 (previous year: EUR thous. 2,384)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>thereof interest result from discounting provisions EUR 475,044.23 (previous year: EUR thous. 656)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>10. Income attributable to write-ups for receivables and certain securities as well as the release of provisions in lending business</strong></td>
<td>51,170.77</td>
<td>46,708.93</td>
<td>4</td>
<td>-117</td>
</tr>
<tr>
<td><strong>11. Ordinary result</strong></td>
<td>135,510,258.26</td>
<td>156,362</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>12. Income tax expense</strong></td>
<td>-42,803,397.79</td>
<td>-45,176</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>13. Annual net profit</strong></td>
<td>92,706,860.47</td>
<td>111,186</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>14. Transfer to revenue reserves</strong></td>
<td>-206,860.47</td>
<td>-20,186</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>15. Balance sheet surplus</strong></td>
<td>92,500,000.00</td>
<td>91,000</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Notes to the financial statements for financial year 2018

General information on the Company

Clearstream Banking Aktiengesellschaft (hereinafter: Clearstream Banking Frankfurt), which has its registered office in Frankfurt/Main, Germany, is registered in the Commercial Register of the District Court of Frankfurt/Main under the number HRB 7500.

Accounting policies

The annual report of Clearstream Banking Frankfurt for the financial year 2018 was prepared in accordance with the provisions of the HGB, the Aktiengesetz (AktG, German Stock Corporation Act) and the Verordnung über die Rechnungslegung der Kreditinstitute und Finanzdienstleistungsinstitute (RechKredV, German Ordinance Regulating the Accounting Requirements for Financial Institutions and Financial Service Providers).

The valuation methods applied were unchanged from the previous year.

Assets and liabilities denominated in foreign currency have been translated using the ECB reference rate or the Bloomberg rates valid at the balance sheet date.

Income and expenses were translated on the posting date at the ECB reference rate or the Bloomberg rates.

Purchased intangible assets are carried at cost and amortised using the straight-line method or valued at the lower fair value.

Property, plant and equipment is carried at cost. Depreciable property, plant and equipment is depreciated using the straight-line method over its useful life or valued at its lower fair value. For movable assets, the tax simplification rules regarding the depreciation start date are applied in their valid form on the respective date of acquisition. Low-value fixed assets with acquisition costs up to €800 were written off directly in accordance with section 6 (2) of the Einkommensteuergesetz (ESTG, German Income Tax Act). In this respect, no use was made of the option granted by section 6 (2a) of the ESTG to create a compound item.

Cooperative shares are recognised in the balance sheet at the lower of cost or fair value. Bonds and other fixed-interest securities are recognised in the balance sheet according to the strict lowest value principle.

Receivables and other assets are always carried at their nominal amount. Item-by-item valuation allowances are established for all discernible risks.
Provisions for pensions and similar obligations have been stated on the basis of actuarial tables using the Projected Unit Credit Method based on the 2018 G mortality tables (generation tables) developed by Dr Klaus Heubeck.

<table>
<thead>
<tr>
<th></th>
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</thead>
<tbody>
<tr>
<td>10-year average discount rate</td>
<td>3.21</td>
<td>3.68</td>
</tr>
<tr>
<td>7-year average discount rate</td>
<td>2.32</td>
<td>2.80</td>
</tr>
<tr>
<td>Salary growth</td>
<td>3.50</td>
<td>3.50</td>
</tr>
<tr>
<td>Pension growth</td>
<td>2.00</td>
<td>2.00</td>
</tr>
<tr>
<td>Staff turnover rate (up to age 50, thereafter 0.00%)</td>
<td>2.00</td>
<td>2.00</td>
</tr>
</tbody>
</table>

Calculations for the projected benefit obligations arising from the employee-financed deferred compensation programme were made on the basis of the interest rate issued by Deutsche Bundesbank (the German central bank) of 3.21 per cent (previous year: 3.68 per cent) along with actuarial tables using 2018 G mortality tables developed by Dr Klaus Heubeck.

In accordance with section 246 (2) of the HGB, the settlement amount of pension liabilities as at the reporting date was offset against the fair value of those assets that are protected from all creditors and exclusively serve the purpose of meeting liabilities arising from pension obligations or comparable long-term commitments to employees (plan assets). The cumulative costs of these plan assets amount to €42.9 million (previous year: €42.1 million).

The total assets that were offset, which correspond to a 15.6 per cent share in a domestic alternative investment fund as defined by section 1 (10) of the Kapitalanlagegesetzbuch (KAGB, German Capital Investment Code), had a fair value at the balance sheet date of €47.9 million (previous year: €49.7 million), which is equivalent to the market value as defined by section 278 in conjunction with section 168 of the KAGB. This special fund is an international mixed fund (mixed special fund) with regulatory investment restrictions. In addition to replicating DJ STOXX 600 Europe, a capital protection concept is applied to part of the special fund alongside a non-forecast-orientated trend reporting system which is key to the portfolio management. During the period under review, €2.0 million (previous year: €2.0 million) was withdrawn because of ongoing pension payments and was immediately added back to the plan assets. A total amount of €2.8 million was added to the special fund in the year under review. This asset is protected from any creditor claims and is thus not repayable on demand.

The provisions for anniversary payments and early retirement were measured at the amount to be paid in accordance with actuarial principles, and for early retirees at present value. The projected unit credit method was applied as the basis of this assessment. The interest rate of 2.32 per cent (previous year: 2.80 per cent) as published by Deutsche Bundesbank was applied in the reporting period. The 2018 G mortality tables developed by Dr Klaus Heubeck were the basis of these projections.
The other provisions take into account all recognisable risks and uncertain liabilities as at the reporting date and were recognised at the amount required to settle the obligation based on a reasonable commercial assessment. The intrinsic value of the option was used as the basis for determining provisions for the Stock Bonus Plan. The basis for determining provisions for the Stock Bonus Plan is the Deutsche Börse AG, Frankfurt/Main (hereinafter: Deutsche Börse AG) share price at the reporting date.

As at the balance sheet date, Clearstream Banking Frankfurt had no excess liability resulting from the on-balance-sheet and off-balance-sheet transactions of the banking book. As a result, no provision was required in accordance with section 340a in conjunction with section 249 (1) of the HGB.

Deferred taxes are calculated in accordance with section 274 of the HGB on temporary differences between the carrying amounts according to commercial law and their taxable values. Deferred tax liabilities are reported only insofar as they exceed deferred tax assets. As at 31 December 2018, the excess of deferred tax assets amounted to €6.0 million (previous year: €3.5 million). The excess of deferred tax assets is mainly the result of differences in the carrying amounts in the provisions for pensions and the related cover assets and in the restructuring provisions. In accordance with section 274 (1) clause 2 of the HGB, the Company refrained from reporting the excess of deferred tax assets. Deferred taxes are calculated on the basis of the tax rates in effect or expected in Germany on the date they are recovered.

A uniform rate of corporation tax of 15 per cent plus a solidarity surcharge of 5.5 per cent has been applied to financial year 2018. Taking a weighted trade tax rate into account (Eschborn and Frankfurt), this results in an aggregate tax rate of 28.7 per cent. There were no carryforwards of tax losses as at the reporting date.

In accordance with section 253 (1) clause 2 of the HGB, these liabilities are treated with their respective payment amounts as deferred items.

Interest income and expenses are classified as transactions with positive interest rates and transactions with negative interest rates according to their source. They are reported based on this classification in sub-positions of the interest result.
Notes to the balance sheet

Assets in foreign currency

Assets in foreign currency as at the reporting date amounted to €1,089,620 thousand (previous year: €646,822 thousand).

Receivables from banks

Of receivables from banks, €1,162,561 thousand (previous year: €669,050 thousand) relate to receivables from affiliated companies.

Receivables from banks break down as follows:

<table>
<thead>
<tr>
<th></th>
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</thead>
<tbody>
<tr>
<td></td>
<td>€ thous.</td>
<td>€ thous.</td>
</tr>
<tr>
<td>Payable on demand</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Receivables from transaction processing</td>
<td>212,625</td>
<td>148,486</td>
</tr>
<tr>
<td>Interest and commission receivables</td>
<td>39,578</td>
<td>40,295</td>
</tr>
<tr>
<td>Overnight funds</td>
<td>975,023</td>
<td>531,187</td>
</tr>
<tr>
<td></td>
<td>1,227,226</td>
<td>719,969</td>
</tr>
<tr>
<td>Receivables from banks, agreed term</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Term up to 3 months</td>
<td>291</td>
<td>291</td>
</tr>
<tr>
<td>Term &gt; 3 months to 1 year</td>
<td>871</td>
<td>871</td>
</tr>
<tr>
<td>Term &gt; 1 year to 5 years</td>
<td>1,065</td>
<td>2,227</td>
</tr>
<tr>
<td></td>
<td>2,227</td>
<td>3,389</td>
</tr>
</tbody>
</table>

Receivables from customers

These receivables relate to current-account receivables from transaction processing and amount to €4,408 thousand (previous year: €2,758 thousand). Receivables from customers are payable on demand. Receivables from affiliated companies amount to €2,791 thousand (previous year: €4 thousand).

Bonds and other fixed-interest securities

The bonds held as at the reporting date were exchange-listed securities in the amount of €99,431 thousand (previous year: €149,889 thousand). Of the bonds held as at the reporting date, the portion that is due within one year amounts to €56,013 thousand (previous year: €50,174 thousand).
Other assets

As at the balance sheet date, most of the other assets are receivables from affiliated companies in the amount of €4,355 thousand (previous year: €9,805 thousand) and cooperative shares in S.W.I.F.T. SCRL in the amount of €4,000 thousand (previous year: €1,201 thousand).

Fixed assets

The changes in fixed assets are described in the statement of changes in fixed assets.

Liabilities in foreign currency

Liabilities in foreign currency amount to €1,090,555 thousand as at the balance sheet date (previous year: €648,271 thousand).

Liabilities towards banks

Of the liabilities towards banks, €186,576 thousand (previous year: €9,558 thousand) relate to liabilities towards affiliated companies.

Liabilities towards customers

The amount shown in the balance sheet is mainly the result of current-account liabilities payable on demand in the amount of €96,618 thousand (previous year: €118,957 thousand) and of collateral furnished for securities lending in the amount of €10,342 thousand (previous year: €4,289 thousand). Liabilities towards affiliated companies amount to €30,392 thousand (previous year: €4,289 thousand).

Other liabilities

Other liabilities primarily include liabilities towards affiliated companies totalling €13,989 thousand (previous year: €15,324 thousand) and tax payables of €9,845 thousand (previous year: €16,339 thousand).
Provisions for pensions and similar obligations

<table>
<thead>
<tr>
<th>Pension liabilities on the basis of section 246 (2) of the HGB</th>
<th>€ thous.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pension obligations payable</td>
<td>55,410</td>
</tr>
<tr>
<td>Fair value of plan assets</td>
<td>(47,908)</td>
</tr>
<tr>
<td>Provisions for pensions and similar obligations</td>
<td>7,502</td>
</tr>
</tbody>
</table>

Netting profit and loss

<table>
<thead>
<tr>
<th>Net income stated under personnel expenses</th>
<th>€ thous.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Income arising from pension obligations</td>
<td>204</td>
</tr>
<tr>
<td>Interest expense arising from pension obligations</td>
<td>(5,006)</td>
</tr>
<tr>
<td>Write-downs of plan assets</td>
<td>(2,568)</td>
</tr>
<tr>
<td>Income from plan assets</td>
<td>45</td>
</tr>
</tbody>
</table>

Net expenses stated under net interest income

<table>
<thead>
<tr>
<th>Net expenses stated under net interest income</th>
<th>€ thous.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(7,529)</td>
</tr>
</tbody>
</table>

Due to a change in the law relating to the implementation of the Mortgage Credit Directive, the pension provision is discounted from 2016 using a 10-year average discount rate (until 2015: 7-year average discount). The resulting difference is as follows:

<table>
<thead>
<tr>
<th>Pension provision discounted using a 10-year average</th>
<th>54,148</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pension provision discounted using a 7-year average</td>
<td>60,935</td>
</tr>
<tr>
<td>Difference</td>
<td>6,787</td>
</tr>
</tbody>
</table>

The difference minus the applicable deferred tax in the amount of €4,921 thousand is fundamentally restricted for distribution in accordance with section 253 (6) of the HGB.

Other provisions

Other provisions totalling €71,923 thousand (previous year: €52,078 thousand) comprise the following:

<table>
<thead>
<tr>
<th>Provisions recognised as part of the efficiency programmes</th>
<th>€ thous.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>30,632</td>
</tr>
<tr>
<td>Interest on taxes</td>
<td>20,493</td>
</tr>
<tr>
<td>Bonus and share-based remuneration components</td>
<td>8,463</td>
</tr>
</tbody>
</table>
### Outstanding invoices

<table>
<thead>
<tr>
<th>Description</th>
<th>Amount (€)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Outstanding invoices</td>
<td>8,282</td>
</tr>
<tr>
<td>Other personnel provisions</td>
<td>3,818</td>
</tr>
<tr>
<td>Miscellaneous provisions</td>
<td>235</td>
</tr>
<tr>
<td></td>
<td><strong>71,923</strong></td>
</tr>
</tbody>
</table>

### Equity

The share capital of Clearstream Banking Frankfurt remains unchanged at €25,000,000. It is divided into 25,000,000 no-par value registered shares. The shares may be assigned only with the Company’s consent.

Equity changed as follows:

<table>
<thead>
<tr>
<th>Description</th>
<th>Subscribed capital</th>
<th>Capital reserves</th>
<th>Retained earnings</th>
<th>Unappropriated surplus</th>
</tr>
</thead>
<tbody>
<tr>
<td>Carried forward as at 1 January 2018</td>
<td>25,000</td>
<td>207,000</td>
<td>1,391</td>
<td>96,178</td>
</tr>
<tr>
<td>Addition from 2018 net income</td>
<td></td>
<td></td>
<td></td>
<td>207</td>
</tr>
<tr>
<td>Addition to capital reserves pursuant to section 272 II no. 4 of the HGB</td>
<td></td>
<td>40,000</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Balance as at 31 December 2018</td>
<td>25,000</td>
<td>247,000</td>
<td>1,391</td>
<td>96,385</td>
</tr>
<tr>
<td>Total Equity</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Since the market price of the pension plan assets is higher than their acquisition cost, in accordance with section 268 (8) of the HGB in conjunction with section 301 of the AktG there is a restriction on distributions of €3,634 thousand (previous year: €5,533 thousand).

The Executive Board proposes appropriating the net profit of €92,500,000.00 reported in Clearstream Banking Frankfurt’s annual financial statements as follows:

Distribution of €3.70 per no-par value, dividend-bearing share, i.e. €92,500,000.00 in total.

**Income statement disclosures**

Interest income, current income, commission income and other operating income are primarily generated in Germany; a breakdown by geographical markets in accordance with section 34 (2) (1) of the RechKredV has therefore not been carried out.

**Interest expense**

The clearing items shown under interest expense in accordance with section 246 (2) of the HGB comprise interest effects from pensions and plan assets amounting to €7,529 thousand (previous year: €773 thousand in interest income).

**Commission income**

Commission income in the amount of €396,427 thousand (previous year: €372,611 thousand) consists in the main of deposit fees in the amount of €208,647 thousand (previous year: €198,129 thousand) and transaction fees in the amount of €88,004 thousand (previous year: €85,842 thousand).

**Other operating income**

This position (€30,523 thousand, previous year: €60,405 thousand) chiefly comprises income from services for Group companies (incl. IT development services and reporting services) (€21,752 thousand, previous year: €11,902 thousand), income from currency translation (€4,545 thousand, previous year: €2,516 thousand), income from the reversal of provisions (€1,612 thousand, previous year: €1,099 thousand), income for services conducted for Luxembourg Group companies for regulatory reasons (€2,271 thousand, previous year: €15,817 thousand) as well as income from previous years in relation to Group companies (€4 thousand, previous year: €28,309 thousand).
General administration expenses

The other administration expenses are broken down as follows:

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Agency agreement services</td>
<td>96,770</td>
<td>93,704</td>
</tr>
<tr>
<td>- provided by Group companies</td>
<td>96,770</td>
<td>93,704</td>
</tr>
<tr>
<td>IT - expenses</td>
<td>11,420</td>
<td>15,563</td>
</tr>
<tr>
<td>- provided by Group companies</td>
<td>10,895</td>
<td>14,955</td>
</tr>
<tr>
<td>External consultancy costs</td>
<td>7,890</td>
<td>8,096</td>
</tr>
<tr>
<td>Non-deductible input tax</td>
<td>2,450</td>
<td>5,467</td>
</tr>
<tr>
<td>Other administration expenses</td>
<td>5,410</td>
<td>6,153</td>
</tr>
<tr>
<td>- provided by Group companies</td>
<td>2,242</td>
<td>3,007</td>
</tr>
</tbody>
</table>

Other operating expenses

Other operating expenses (€11,750 thousand, previous year: €30,157 thousand) are predominantly made up of expenses relating to currency translation (€4,682 thousand, previous year: €2,384 thousand), expenses incurred regarding services conducted for Luxembourg Group companies for regulatory reasons (€2,271 thousand, previous year: €1,387 thousand), expenses from previous years related to Group companies (€2,108 thousand, previous year: €20,837 thousand) and interest expense for taxes (€1,475 thousand, previous year: €4,715 thousand).

Auditor’s fee

In accordance with section 285 (17) of the HGB, disclosures on the auditor’s fee are contained in the notes to the consolidated financial statements of Deutsche Börse AG.

Other financial obligations

<table>
<thead>
<tr>
<th>Amount in €m</th>
<th>Total amount</th>
<th>Thereof: up to 1 year</th>
<th>Thereof: 1-5 years</th>
</tr>
</thead>
<tbody>
<tr>
<td>Management and agency contracts (previous year)</td>
<td>40,0 (34,7)</td>
<td>40,0 (34,7)</td>
<td>0 (0)</td>
</tr>
<tr>
<td>Thereof to affiliated or associated companies (previous year)</td>
<td>40,0 (34,7)</td>
<td>40,0 (34,7)</td>
<td>0 (0)</td>
</tr>
</tbody>
</table>
### Other contracts, including service agreements (previous year)

<table>
<thead>
<tr>
<th></th>
<th>0.6</th>
<th>0.3</th>
<th>0.3</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(0.5)</td>
<td>(0.3)</td>
<td>(0.2)</td>
</tr>
</tbody>
</table>

### Supervisory Board

The members of the Supervisory Board are:

- **Dr Stephan Leithner**
  - Chairman
  - Member of the Executive Board, Deutsche Börse AG
  - (since 01.09.2018)

- **Dr Oliver Engels**
  - Deputy Chairman
  - Chief Risk Officer of Deutsche Börse AG

- **Peter Eck**
  - Employee representative, Settlement section employee, Clearstream Banking AG

- **Norfried Stumpf**
  - Employee representative, New Issues section employee, Clearstream Banking AG

- **Prof. Christina Bannier**
  - Professor for Banking and Finance at Giessen University, Germany
  - (since 01.01.2018)

- **Prof, Peter Gomber**
  - Professor for Business Administration, in particular e-finance, in the Faculty of Economics and Business Administration, Goethe University Frankfurt
  - (since 01.01.2018)

- **Jeffrey Tessler**
  - Chairman
  - Member of the Executive Board of Deutsche Börse AG
  - (until 31.08.2018)

The members of the Supervisory Board received remuneration in the amount of €111 thousand in financial year 2018.
Executive Board

The members of the Executive Board are:

Dr Berthold Kracke  
Chief Executive Officer  
Responsible for Internal Audit, Strategy, Human Resources, Global Operation, Facility Management / Purchasing

Tilman Fechter  
(since 01.01.2019)  
Responsible for Products & Business, Network Management, Communication & Marketing, Facility Management / Purchasing

Martina Gruber  
Responsible for Sales & Business Development, Customer Onboarding & Maintenance, Treasury, Legal

Mathias Papenfuß  

Jürgen Hillen  
(until 31.01.2019)  
Responsible for Finance, Risk Management, Controls  
Compliance, Intercompany Organisation

The total remuneration of members of the Executive Board amounted to €2,275 thousand in 2018. Total remuneration includes share-based remuneration of €584 thousand. There are 1,856 SBP shares.

The compensation of former members of the Executive Board and their surviving dependants amounted to €858 thousand in 2018. A total of €15,785 thousand has been reserved for pension obligations to former members of the Executive Board and their surviving dependants.

Appointments to supervisory boards and other supervisory committees

In accordance with section 340a (4) (1) of the HGB, a list of appointments on supervisory boards and other supervisory committees is presented below:

Martina Gruber

- Deutsche Börse Commodities GmbH, Frankfurt/Main

Employees

As at 31 December 2018, the number of employees at Clearstream Banking Frankfurt (excluding the Executive Board) was 358 (previous year: 353). The average number of employees during financial year 2018 was 355,5 (previous year: 352).
<table>
<thead>
<tr>
<th></th>
<th>Male</th>
<th>Female</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Management employees</td>
<td>17.75</td>
<td>2.50</td>
<td>20.25</td>
</tr>
<tr>
<td>Non-management employees</td>
<td>179.00</td>
<td>156.25</td>
<td>335.25</td>
</tr>
<tr>
<td>Number of employees</td>
<td>196.75</td>
<td>158.75</td>
<td>355.50</td>
</tr>
</tbody>
</table>

**Intercompany agreements**

With effect from 12 May 2010, Clearstream Banking Frankfurt entered into a control agreement ("Beherrschungsvertrag") with Deutsche Börse AG as the controlling company.

**Group structure**

Clearstream Banking Frankfurt is a wholly owned subsidiary of Clearstream International S.A., Luxembourg. Clearstream International S.A. is a wholly owned subsidiary of Clearstream Holding AG, Frankfurt/Main. Clearstream Holding AG is a wholly owned subsidiary of Deutsche Börse AG.

Clearstream Banking Frankfurt is incorporated into the consolidated financial statements of Deutsche Börse AG, which may be viewed at the business premises of our Company. The consolidated financial statements of Deutsche Börse AG are prepared on the basis of the IFRS and published in the electronic German Federal Gazette.

In accordance with section 20 (4) of the AktG, Clearstream International S.A., Luxembourg, Clearstream Holding AG, Frankfurt/Main, and Deutsche Börse AG, Frankfurt/Main, have notified us that they hold a majority interest in our Company.

**Report on post-balance sheet date events**

In 2017, the Executive Board of Clearstream International S.A. (hereinafter: CI) decided to start a project in 2018 to set up and validate a concept in order to reshape CI. The concept includes the transfer of CI's "Other Functions" and participations to Clearstream Beteiligungs AG.

It is intended to merge CHAG, the parent company of CBF, into Clearstream Beteiligungs AG (acquired in 2018). It is the aim that during 2019 Clearstream Beteiligungs AG will be the new share holder of CBF.
Frankfurt/Main, 21 March 2019

Clearstream Banking Aktiengesellschaft

The Executive Board

Dr Berthold Kracke  Tilman Fechter  Martina Gruber  Mathias Papenfuß
### Schedule of fixed assets as of 31 December 2018

#### Intangible assets

**Software excluding prepayments**

<table>
<thead>
<tr>
<th>At cost</th>
<th>Depreciation</th>
<th>Carrying amounts</th>
</tr>
</thead>
<tbody>
<tr>
<td>Balance on 01.01.2018</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Additions</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Disposals</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Transfers</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Balance on 01.01.2018</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Depreciation for financial year</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Disposals</td>
<td>EUR</td>
<td>EUR</td>
</tr>
</tbody>
</table>

10,468,412.66 8,000.00 2,563,430.63 0.00 7,912,982.03 9,964,775.23 247,924.56 2,563,430.63 7,649,269.16 263,712.87 503,637.43

#### Property, plant and equipment

**Operating and business equipment**

<table>
<thead>
<tr>
<th>At cost</th>
<th>Depreciation</th>
<th>Carrying amounts</th>
</tr>
</thead>
<tbody>
<tr>
<td>Balance on 01.01.2018</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Additions</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Disposals</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Transfers</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Balance on 01.01.2018</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Depreciation for financial year</td>
<td>EUR</td>
<td>EUR</td>
</tr>
<tr>
<td>Disposals</td>
<td>EUR</td>
<td>EUR</td>
</tr>
</tbody>
</table>

5,270,838.40 888.49 1,492,651.57 0.00 3,779,075.32 5,079,574.09 124,006.57 1,491,644.00 3,711,936.66 67,138.66 191,264.31

15,739,251.06 8,888.49 4,056,082.20 0.00 11,692,067.35 15,044,349.32 371,931.13 4,055,074.63 11,361,205.82 330,851.53 694,901.74
Management report for financial year 2018

1 Basic principles and business model

Clearstream Banking Aktiengesellschaft, Frankfurt/Main (hereinafter: Clearstream Banking Frankfurt or CBF for short) is a central securities depository within the meaning of Article 2 (1) number 1 of the EU Central Securities Depositories Regulation (Regulation (EU) No 909/2014, CSD Regulation). CBF submitted an application for authorisation for this purpose on 29 September 2017 and since then has operated within the framework of the transitional provisions of Article 69 of the CSD Regulation (CSDR). The application submitted for the granting of a CSDR licence is currently being examined by the supervisory authorities. CBF is therefore a central securities depository as defined by section 1 (3) of the Depotgesetz (DepG, German Securities Deposit Act). In this context, it also accepts deposits and grants its clients short-term loans. It is therefore a CRR credit institution pursuant to section 1 (3d) of the Kreditwesengesetz (KWG, German Banking Act).

Clearstream Banking Frankfurt mainly provides custody and settlement services, with the custody business making the greatest contribution towards net revenue. The revenue that is generated is mainly determined by the value of the securities held in custody. Income from the settlement business is largely dependent on the number of international and national transactions carried out by CBF via stock exchanges and over the counter (OTC). Revenue is also generated by Investment Funds Services (IFS) and Global Securities Financing (GSF), which includes the areas of GC Pooling, securities lending and collateral management services.

CBF’s clients are credit and financial services institutions based in Germany and abroad. In addition, CBF’s clients may also include foreign depositaries similar to CBF (foreign central securities depositaries) as defined by section 5 (4) of the DepG, central counter parties as well as national, international and supranational organisations that provide financial services.

In 2018, CBF was once again perceived by the market as a reliable and forward-looking infrastructure provider. This is due to several factors, including CBF’s innovative and market-compliant product and service offerings and developments, its high level of integration with the processes of Deutsche Bundesbank (processing, collateralisation, etc.). The fully automated and optimised integration of CBF into the trading and settlement processes of Deutsche Börse Group offers clients risk-optimised solutions.

Clearstream Banking Frankfurt completed the migration of the German securities market to the Target 2 Securities (T2S) European securities settlement system in February 2017. At the end of the first quarter of 2018 CBF began rolling out its OneClearstream services with the implementation of the new Investor CSD links and service levels for the Italian and ESES markets. This continued in the fourth quarter with the implementation of the Belgian NBB links and the migration of Austria to OneClearstream. The OneClearstream Investor CSD rollouts continued to be centred on close collaboration with our clients.

In addition, CBF increased its efforts to design and develop products and services in partnership with other divisions/companies of Deutsche Börse Group. It also continued to work intensively in
2018 to create automated and cost-efficient solutions for collateral management resulting from collateral demands of Eurex Clearing Aktiengesellschaft, Frankfurt/Main (hereinafter: Eurex Clearing AG) as the central counterparty, in particular in connection with the processing of derivative transactions. Clearstream Banking Frankfurt cooperates closely with Eurex Clearing AG in order to offer clients further improved and comprehensive solutions for the increased requirements arising from the EU regulation on OTC derivatives, central counterparties and trade repositories (EMIR), and as a result of CRD IV / Basel III requirements. This also includes solutions involving a central counterparty for securities lending transactions.

As a service provider, Clearstream Banking Frankfurt does not engage in research and development activities comparable with those of manufacturing companies. The Company does, however, develop system solutions for the implementation of its structural growth objectives. Against this background, the Company is constantly working to maintain and further increase the technological leadership and stability of its IT systems – in the interests of its clients and the systemic stability of the financial markets. The expenses incurred in 2018 for developing systems (T2S, OneClearstream Investor and CSDR) totalled €6.0 million (previous year: €10.3 million). This included expenses for CSDR of €4.0 million and for T2S of €1.0 million (previous year: €7.5 million). As in the previous year, the Company decided not to exercise its option to capitalise the expenses for these development activities. A total of €3.5 million (previous year: €4.8 million) was spent in the financial year for third-party services in this context.

During the reporting period, Clearstream Banking Frankfurt continued to pursue its philosophy of strategic partnerships. It is expected that CBF will continue to be regarded as a leading innovator because of the regulatory environment, its excellent positioning in the area of liquidity and collateral management and the transparent T2S strategy. This innovativeness should enable CBF to benefit from the business consolidation among major European companies. This development is supported by successful partnership solutions in the Trade Repository (REGIS-TR) segment and the close collaboration with the Eurex segment of Deutsche Börse Group in the area of product development.

The high (regulatory) costs for efficient operation, along with growing regulatory and technical requirements, will lead to market changes both in 2019 as a result of the implementation of the European Central Securities Depository Ordinance (CSD Ordinance, or CSD-R for short) and in 2020 in connection with stipulations with respect to settlement discipline. In addition, increased security requirements on information technology, for instance in connection with cloud computing and cyber security, with likewise bring changes to the market. Clearstream Banking Frankfurt is well prepared for these developments and anticipates that the Company will emerge strengthened from this possible wave of consolidation.

2  Report on economic position

2.1 Macroeconomic and sector-specific environment

The global economic upturn continued in 2018 and is strengthening further. Economic trends in the industrialised nations were robust throughout the year under review and largely met expectations. The economic development of various up-and-coming economies and a few emerging markets also
showed an upward trend, or even exceeded expectations, particularly the emerging market countries in Asia and Europe. While the outlook is positive from a global perspective, growth in many parts of the world remains weak and inflation in industrialised nations remains at a low level.

In line with the macroeconomic recovery in the developed world, the countries concerned are beginning to phase out the programmes which were put in place to strengthen their economic recovery. The US Federal Reserve Bank (Fed), for example, took significant monetary policy measures by raising its federal funds rate four times in 2018, with the latest increase from 2.25 per cent to 2.50 per cent on 19 December 2018. Further measures involving up to two increases in the federal funds rate have already been announced for 2019.

The Bank of England’s monetary policy committee also raised the base interest rate by 0.25 per cent in August 2018 to now 0.75 per cent. In contrast, the Bank of Japan decided to keep to its monetary policy course in 2018.

In the euro zone, too, the European Central Bank (ECB) concluded its purchases as part of the expanded asset purchase programme in December 2018 but intends to continue reinvesting maturity payouts from securities. The main refinancing interest rate and the marginal lending facility rate remained unchanged in 2018. There are currently no indications that the ECB will change its stance on monetary policy in 2019.

Emerging markets have recently seen rising growth rates and are expected to remain on a stable growth path in the coming years. The moderate cyclical recovery across the entire region is being driven forward by the economic strength of major economies such as China which are supporting the economic recovery of those countries that performed less strongly last year.

On 29 March 2017, the UK officially announced its intention to withdraw from the European Union. This marked the formal start of the Brexit negotiations which should be completed by the date of the UK’s official departure two years later on 29 March 2019. Due to continued uncertainty in relation to the outcome of these negotiations and the growing risk that there will be no deal agreed, market participants, particularly those based in the United Kingdom, are faced with the task of adapting to an unpredictable outcome. Thus affected companies will have a very short period of time in which to implement their existing contingency plans.

In 2018 a series of regulatory measures of relevance to CBF continued to progress, including in particular the implementation of the requirements of the CSDR relating to settlement discipline (Settlement Discipline Regime; SDR). The Regulatory Technical Standards (RTS) on settlement discipline were published in the Official Journal of the European Union on 13 September 2018 and will be applicable, including all obligatory buy-in requirements, 24 months after their publication, in September 2020.

On 23 November 2016, the European Commission announced a proposal to revise and adjust the rules on banking regulation. The legislative initiative, which the European Commission launched as the CRR II package, consists of different proposals to update the Capital Requirements Directive (CRD IV, in the future CRD V), the Capital Requirements Regulation (CRR, in the future CRR II) and selected regulations related to the statutory framework for restructuring and winding up banks. These
proposals are based in part on the requirements of the Basel Committee on Banking Supervision (BCBS) and partially also include enhancements to address European issues. The CRR II package also aims to further modify the risk-reducing measures for banks, which the Parliament and the EU Member States regard as a precondition for realizing the EU Banking Union by establishing a unified European Deposit Insurance System (EDIS). Consequently, the package is sometimes also referred to as the RRM (risk reduction measures) package. The current proposed law, however, has not yet incorporated a series of elements regarding banks’ capital requirements for credit and operational risks that were published on 7 December 2017 by the BCBS as the conclusion of the Basel III framework. The CRR II package was debated at length in 2018 at all political levels of the EU and entered “trilogue” discussions in the third quarter of 2018. The package of laws is not currently expected to be completed before the second half of 2019. The current discussion also covers aspects with regard to adjusting the rules relevant to CBF appropriately for the business activity of a central securities depository. According to the proposals of the European Commission the CRR II package with its key components is to become effective two years after entering into force and thus will not apply before the end of 2021 / beginning of 2022.

The environment on the financial and capital markets was considerably impacted by the low interest rate policy of the central banks, consistently high activity on the equity markets, and persistently high market volatility.

The market position of Clearstream Banking Frankfurt remains strong. CBF’s strategic position takes account of the key market developments and builds on the main elements of the EU post-trade landscape, consisting of T2S, the CSDR and the growing need for services in the area of liquidity and collateral management. With efficient use of liquidity in T2S, CBF is in a position to provide market participants with access to all markets connected up to T2S as a one-stop shop, and therefore intends, within the framework of its “One Clearstream” strategy, to continue to offer innovative solutions for the settlement of securities transactions.

Thanks to its comprehensive service offering and the targeted expansion of its products and services, Clearstream Banking Frankfurt was once again able to generate a stable business performance in the year under review. The positioning regarding T2S and the resulting optimisation potential for clients in the future plays a key role in this regard. In 2018, Clearstream Banking Frankfurt was once again able to benefit from the concept of an integrated model within Deutsche Börse Group, in particular in view of increased market sensitivity to growing regulatory changes.

2.2 Business developments

The business situation of Clearstream Banking Frankfurt remains good in an increasingly regulated environment. The efficiency measures implemented in recent years have had an effect and the net profit for the year is good taking into account non-recurring effects and the low level of interest rates. The core business once again performed well in financial year 2018. The number of clients was slightly above the previous year’s level. As expected in the previous year, the number of transactions increased both in collective safe custody and in the trustee business. The custody volume was also slightly up on the previous year overall, as expected.
The positive change in interest income in the financial year exceeded the expectations expressed in the previous year's report on expected developments. However, net interest income did not increase as anticipated, being impacted by interest expense as a result of clearing items in accordance with section 246 (2) of the Handelsgesetzbuch (HGB, German Commercial Code) totalling €7,529 thousand (previous year: €773 thousand in interest income) for plan assets and pensions. Expectations of a moderate increase in net commission income were met as it rose by 3.3 per cent in 2018 compared with the previous year, from €295,115 thousand to €304,988 thousand.

Contrary to expectations in the 2017 report on expected developments, operating costs rose by a significant 9.2 per cent, from €172,176 thousand to €188,079 thousand. The increase was predominantly due to higher personnel expenses in the amount of €64,139 thousand (previous year: €43,193 thousand) resulting from restructuring measures. Expenses for IT services and agency agreements of €105,406 thousand were slightly higher than in the previous year (€102,348 thousand). Other operating costs, at €11,750 thousand, were a considerable 61.0 per cent below the previous year's figure of €30,157 thousand. In the financial year they mainly comprised expenses for foreign currency measurement amounting to €4,682 thousand (previous year: €2,384 thousand) and external services. In the previous year they included expenses relating to other periods for Group companies totalling €20,837 thousand and interest expense on taxes pursuant to section 233 of the Abgabenordnung (AO, German Tax Code) of €4,715 thousand.

The increase in personnel expenses meant that the expected pre-tax earnings were not achieved, with a total of only €135,510 thousand, 13.3 per cent below the prior-year figure. Net profit was down 16.6 per cent compared with the previous year at €92,707 thousand.

**Securities held in collective safe custody**

**Higher custody volume**

The market value of outstanding securities held in collective safe custody increased by 8.0 per cent from €6,821.4 billion as at the end of 2017 to €7,367.1 billion as at 31 December 2018. While the value of bonds in safe custody was a considerable 30.0 per cent higher than in the previous year, the value of equities, certificates and options in safe custody declined by 6.2 per cent.

**Increased number of transactions**

The number of chargeable transactions processed (counted on both sides) also improved, rising by 9.5 per cent compared to the previous year to 112.9 million transactions. This means that an average of 449,925 transactions per day (2017: 411,228) were booked for securities transactions that were fulfilled or securities transfers that were carried out. Of the total number of transactions, 45.4 million (2017: 41.1 million) were accounted for by on-exchange transactions, 12.9 million (2017: 12.8 million) by CCP settlement and 54.6 million (2017: 49.3 million) by OTC transactions.
More classes of collective safe custody

The number of security issues included in collective safe custody likewise increased significantly in 2018, going up by 31.7 per cent compared to the previous year, owing to increasing issuing activity in certificates and bonds. At the end of 2018, Clearstream Banking Frankfurt held a total of 2,225,544 (year-end 2017: 1,690,070) different securities classes in custody for its clients. This consisted of 189,862 (year-end 2017: 185,165) bonds, 20,124 (year-end 2017: 20,124) equities, investment shares and participation certificates and 2,015,468 (year-end 2017: 1,484,781) warrants and certificates.

Stable number of clients

At the end of 2018, Clearstream Banking Frankfurt had 267 clients in the collective safe custody business (year-end 2017: 268). While the number of German clients increased by 1 to 162 (year-end 2017: 161), the number of foreign account holders decreased by 2 to 105. The total number of accounts (foreign and German account holders) declined during the year to 1,059 (year-end 2017: 1,069).

Securities in the trustee business

Custody volume stable

As at the end of December 2018, the custody volume of securities held by foreign depositories was almost at the previous year’s level. The market value of the securities held in custody amounted to €1,193.9 billion (year-end 2017: €1,158.7 billion).

Increase in the number of transactions

The number of executed transactions in foreign securities rose by a significant 4.2 per cent year on year (counted on both sides) to 16.6 million transactions. Of these, 9.4 million (2017: 9.2 million) were items relating to on-exchange transactions or transfers in the system, and 7.2 million (2017: 6.7 million) were OTC transactions executed abroad.

Increase in foreign classes of securities

The number of foreign classes of securities increased by 1.5 per cent to 76,999 in 2018.

Number of client custody accounts stable

As at the end of December 2018, Clearstream Banking Frankfurt managed a total of 1,594 foreign custody accounts. This amounts to a 2.0 per cent increase from December 2017. The number of clients increased by 2 to 234 (2017: 232).
Securities transaction counters and containers

Slight rise in number of securities certificates held

As at 31 December 2018, Clearstream Banking Frankfurt held 25.4 million (year-end 2017: 33.7 million) certificates in its securities containers.

Number of certificates received and delivered

A total of 2.0 million (2017: 2.1 million) certificates were received from our clients for collective safe custody in 2018. The high number of certificates delivered compared with the previous year, at 10.3 million (2017: 1.1 million) resulted from the final derecognition of certificates that had become worthless after the associated collateral period had come to an end. This does not include new issues or deliveries of securities due.

Gold holdings

As at year-end, gold holdings placed into custody to cover the Xetra gold bond amounted to around 177 tonnes (2017: 170 tonnes) with a market value of €6.4 billion (2017: €5.9 billion).

Global Securities Financing (GSF)

The average annual volume of collateral processed via CBF decreased in 2018 by 10.8 per cent or €24 billion to €201 billion.

2.3 Results of operations, financial position and net assets

2.3.1. Results of operations

Average client deposits increased from €1,107 million to €1,379 million in 2018. Net interest income fell from €3,670 thousand in 2017 to €155 thousand. Interest income from lending and money market business, at €15,006 thousand, was a considerable 81.8 per cent higher than in the previous year (€8,253 thousand). Interest expense included both expenses in lending and money market business totalling €7,363 thousand (previous year: €5,420 thousand) and expenses pursuant to section 264 (2) of the HGB for plan assets and pensions amounting to €7,529 thousand (previous year: €0 thousand).

Net commission income of €304,988 thousand exceeded the previous year's level of €295,115 thousand by 3.3 per cent. Commission income increased by 6.4 per cent to €396,427 thousand (previous year: €372,611 thousand) while commission expense rose by 18.0 per cent to €91,439 thousand (previous year: €77,496 thousand) as a result of higher deposit fees.

Deposit fees for securities in collective safe custody rose by 6.3 per cent to €121,257 thousand (previous year: €114,075 thousand). Deposit fees for securities in the trustee business likewise increased, with growth of 4.0 per cent from €84,055 thousand in 2017 to €87,390 thousand in 2018. Transaction fees for securities in collective safe custody were 5.0 per cent higher than in the
previous year. By contrast, transaction fees for securities in the trustee business were at around the same level as in the previous year at €43,675 thousand. Service fees recorded a rise of 20.3 per cent to €2,114 thousand. A better result was likewise achieved for other commission income, with an increase of 12.4 per cent to €97,661 thousand.

The decrease in other operating income by 49.5 per cent from €60,405 thousand to €30,523 thousand was primarily due to prior-year changes included in 2017 regarding agency agreements.

Personnel expenses and other administration expenses represent the operating costs of Clearstream Banking Frankfurt.

Personnel expenses increased by 48.5 per cent to €64,139 thousand (previous year: €43,193 thousand). While the costs of wages and salaries rose by 28.9 per cent to €46,767 thousand, the costs of retirement benefits went up from €2,769 thousand to €13,046 thousand.

Other administrative expenses changed by 3.9 per cent to €123,940 thousand (previous year: €128,983 thousand). These expenses mainly consist of expenses for external services and agency agreements totalling €105,406 thousand (previous year: €102,348 thousand).

The result from normal business activity fell by 13.3 per cent from €156,362 thousand in the previous year to €135,510 thousand in 2018. Tax expense in the financial year amounted to €42,803 thousand (previous year: €45,176 thousand). The Company's net profit thus decreased by 16.6 per cent to €92,707 thousand (previous year: €111,186 thousand).

2.3.2. Financial position

The liquidity ratio (measured by the liquidity coverage ratio) is well above the minimum ratio of 100 per cent and fluctuates between 128 per cent and 160 per cent based on month-end values. This measurement documents the Company's good liquidity situation. Through its affiliate Clearstream Banking S.A., Luxembourg (hereinafter: Clearstream Banking Luxembourg), it always has access to refinancing funds.

After a dividend of €3.64 per no-par value share in the previous year, a dividend of €3.70 per no-par value share has been proposed for financial year 2018.

2.3.3. Net assets

Equity as reported in the financial statements including net profit amounts to €462,276 thousand (previous year: €420,570 thousand).

The return on equity changed from 34.4 per cent in 2017 to 23.2 per cent in the financial year under review as a result of the increase in the capital reserves and the lower net profit in 2018. Equity includes issued capital and capital reserves as at 31 December 2018 as well as retained earnings from the previous year. In addition, the pro rata unappropriated surplus from the previous year up to the time the dividend is paid is included as equity. Overall, the Company's results of
operations, financial position and net assets are in good order. CBF was always able to meet its payment obligations in financial year 2018.

2.4 Financial and non-financial performance indicators

2.4.1. Financial performance indicators

Changes in net commission income, operating costs and earnings before taxes are key performance indicators of Clearstream Banking Frankfurt. Net profit is impacted by net commission income, operating costs and net interest income. The changes in operating costs and administration costs are managed as part of quarterly target/actual and actual/actual comparisons.

2.4.2. Non-financial performance indicators

Custody volume, the number of transactions and collateral volume are key factors for the performance of Clearstream Banking Frankfurt.

3 Report on expected developments, opportunities and risks

3.1 Report on expected developments

The report on expected developments describes how Clearstream Banking Frankfurt is expected to perform in financial year 2019. It contains statements and information on events in the future. These forward-looking statements and information are based on the Company’s expectations and assumptions when this report on expected developments was published.

Clearstream Banking Frankfurt anticipates that the economy in Europe will continue to improve moderately, driven by developments in Germany and France, economically the region’s most important countries. On the basis of this generally neutral to positive situation the Company expects that market participants will have similar confidence in the capital markets to last year, which was shaped by events such as the political protests in France, the very slow progress in the negotiations on the conditions for the UK’s forthcoming exit from the EU and the increasingly protectionist stance in the United States. However, these factors could further unsettle the capital markets, as might geopolitical crises, the movement in commodity prices, the monetary policy of the Fed in the United States and the ECB in Europe or a crisis of confidence with regard to growth in some emerging markets, particularly in Asia, as a result of the threat of a trade war with the United States. It also remains unclear what form the UK’s exit from the EU will take and what implications this will have for the financial markets.

Clearstream Banking Frankfurt anticipates a structurally driven increase in demand for collateral and liquidity management services due to regulatory requirements. In the medium to long term, Clearstream expects its attractive collateral and liquidity management and its strong position in the Target 2 Securities (T2S) network to result in increased business activity and hence in significant additional net revenue.
Clearstream Banking Frankfurt anticipates that there will not be a fundamental departure from the current low interest rate policy in Europe. Although the monthly volumes of the ECB’s asset purchase programme were scaled back and the programme came to an end in December 2018, it is highly likely that maturity payouts from securities will continue to be reinvested and the deposit rate will remain at -0.4 per cent. After the effects of this monetary policy on cash and derivatives market trading volumes had no significant impact, the Company does not expect any sizeable stimulus from this in 2019 either.

In its economic development forecast for 2019 published in January 2019, the International Monetary Fund (IMF) predicts an increase of around 1.6 per cent in the euro zone and growth of around 1.3 per cent in Germany.

With regard to its client structure, the Company expects that consolidation in the financial sector will persist and that clients in the domestic and international business will merge or outsource back-office activities to service providers due to the increased – and still increasing – regulatory requirements. These larger clients or externally handled portfolios would then switch to a higher discount level, which could lead to a decline in average fees. As CBF faces especially intense competition in the areas of settlement and custody of international fixed-rate securities, it could lose market share over the longer run. However, the Company does not expect to lose significant market share in the forecast period. In fact, the T2S strategy of CBF is aimed not only at maintaining market share in the medium to long term, but also at extending it in a targeted manner. With this strategy, CBF intends to further expand its position and establish itself as the leading T2S hub for Europe’s banks. As a result, the Company expects slightly higher custody volume and a moderate increase in the number of transactions.

With regard to the client structure, the Company also expects to see, as in the previous year, an increase in the number of “non-banks” that utilise the product range of CBF either indirectly or in a manner limited to certain securities services. This assumption is based on the fact that large companies, insurance companies and asset managers in particular will seek out financing alternatives in a low or negative-interest environment and will aim to minimise risk. CBF expects a moderate decline in performance in GC Pooling and GC Pooling Select as a result of persistently low interest rates. This interest rate environment will be very difficult to offset, even through the positive effects of the CCP set-up on banks' cost of equity. The Company anticipates a stabilisation in the volume of collateral in 2019 and, accordingly, a flat revenue trend in the area of collateral management, as an offsetting effect is expected to come from collateralisation events outside GC Pooling.

Clearstream Banking Frankfurt expects that the interest result in the forecast period will rise compared to financial year 2018 because of a slight increase in client deposits. This is based on the expectation that the current negative interest rate situation in some currencies including the euro will continue in financial year 2019, but that the interest rate turnaround in the United States that continued in 2018 will have a positive impact on net interest income in 2019 with liquidity needs remaining the same. In light of the overall economic environment, the Company anticipates that transaction volumes will increase and that the custody volume will grow in connection with the good market position. Taking into account the expectation of rising volumes in collateral management, the Company anticipates a slight rise in net commission income for 2019.
The Company also expects only a modest increase in operating costs thanks to ongoing cost management using Deutsche Börse Group’s integrated model with optimised capacity allocation across multiple locations. Notwithstanding active cost management, however, the focus will remain on guaranteeing high-quality services.

In summary, the Company anticipates, against the backdrop of slightly higher net commission income, rising net interest income and a modest increase in costs, that profitability will be stable compared with 2018. These conditions should enable earnings before taxes to be at least on a level with the previous year’s figure.

### 3.2 Report on opportunities

The migration to the T2S settlement system was successfully completed in February 2017. As the largest central securities depository in T2S, CBF believes that, following the successful and smooth migration, it will continue in 2019 to have good opportunities to gain additional market share from other central securities depositories thanks to its product offering. This will probably result in higher custody volume at CBF. Beyond that, the appealing pricing model will probably also attract additional transactions, which will then provide the basis to sell supplemental services.

The need for collateralised products will increase further in connection with the multitude of regulatory changes that are occurring. The search for “equity-preserving” financing and investment models, particularly in the banking segment, will have an indirect impact on the “non-banks” segment and pave the way for corresponding growth for CBF’s product offering.

CBF’s strategy of winning and retaining clients through OneClearstream Investor CSD services, economies of scale and reduced costs of the custody network as the result of its status as the leading provider of settlement and custody services in the T2S environment forms the basis for sustained positive revenue growth. Coupled with modern and secure IT solutions and an offering that meets the regulatory requirements of the future, CBF will have positive development opportunities and an opportunity to gain market share. Targeted products, including in collateral management, as well as dedicated cross-divisional projects within Deutsche Börse Group (e.g. between Eurex Clearing AG and Clearstream Banking Frankfurt) will additionally foster this trend.

### 3.3 Risk report

**Risk management system and methods**

Clearstream Banking Frankfurt has established a risk management system that defines functions and responsibilities and is binding for all employees. Clearstream Banking Frankfurt is integrated into the Group-wide risk management of Deutsche Börse Group.

The risk management system ensures that all management bodies (Executive Board, Supervisory Board and committees) of Clearstream Banking Frankfurt are promptly informed about the risk profile of the entire Group as well as specific material risks. The objective is the timely identification of
developments and risks that are not consistent with the approved business and risk strategy of Clearstream Banking Frankfurt so that suitable countermeasures can be taken.

The risk strategy is based on the business strategy and sets the maximum assumable risk limit for operational, financial and business risks. It does so by stipulating the conditions for risk management, control and limitation. The Company takes great care to mitigate risk and ensures that appropriate measures are taken to avoid, reduce and transfer – or intentionally take on – risk. The aim is to make use of suitable safeguards and control measures to reduce the frequency and level of potential losses from the corresponding risk cases for Clearstream Banking Frankfurt. The measures used include guidelines and procedures, segregation of duties, the principle of dual control and business continuity management. In addition, potential losses are limited further via a specific insurance portfolio.

The Executive Board is responsible for the Company’s risk management. The Clearstream Risk Management department is responsible for monitoring the risk management process, assessing risks and reporting regularly on risks to the Company’s governing bodies. The decentralised departments identify risks and report them in a timely manner to the risk management function, which evaluates all existing and new risks. It also reports on a regular and, if necessary, ad hoc basis to the joint Board and Supervisory Board of Clearstream Banking Frankfurt. The responsible decentralised departments are tasked with risk control including risk-mitigating measures. They also inform management of the development of risk-related key figures and continuously improve the quality of risk management processes.

Clearstream Banking Frankfurt differentiates between operational, financial and business risks.

To establish its risk metrics under Pillar II (economic capital requirement at the level of the individual risk types and overall for Clearstream Banking Frankfurt), the Company uses internal models and applies the value at risk (VaR) approach. This measure of risk is defined as the maximum possible loss that will not be exceeded in a given period with a given probability. For example, a VaR of €100 million with a stipulated probability of 99.98 per cent and a time horizon of one year means that, at this level of probability, the maximum conceivable loss within the next 12 months is €100 million. The confidence level of 99.98 per cent is a set principle in the risk strategy.

To establish its risk metrics under Pillar I (regulatory capital requirement for operational and financial risks) Clearstream Banking Frankfurt uses various methods. For operational risks an internal model (AMA – Advanced Measurement Approach, based on the VaR approach and a confidence level of 99.90 per cent) has been examined and approved by the supervisory authority. For financial risks the Company applies the standardised approach, which is not based on an internal model or the VaR approach.

In addition to the aforementioned procedures, Clearstream Banking Frankfurt carries out stress test calculations and inverse stress test calculations in order to constantly review its risk-bearing capacity.

In addition to the quantification of risks, reports also include qualitative information on the risk profile in the form of analyses of realised losses. Topics relevant to risk are comprehensively elucidated, and their influence on the risk profile of Clearstream Banking Frankfurt and possible
countermeasures are described. Risk reports are provided to the Executive Board on a monthly and, if necessary, ad hoc basis. The Supervisory Board receives reports at least once every six months.

Internal Auditing ensures by means of independent audits that the risk control and risk management functions are appropriate.

Relevant individual risks are described in detail below.

**Operational risk**

Operational risks are material risks. They represent around 76 per cent of total risk (confidence level of 99.98 per cent) for Clearstream Banking Frankfurt. A differentiation is made between availability risks, service deficiencies, damage to material goods and legal and business practice risks. Incorrect processing of client orders and a fault or disruption in the availability of its core products in particular pose risks for Clearstream Banking Frankfurt. Above all, this includes the clearing and settlement systems such as CASCADE. The various operational risks are described below.

(a) **Availability risk**

Availability risk arises when operational resources that are essential to the services offered by Clearstream Banking Frankfurt, such as systems, premises, employees or suppliers/service providers, could become unavailable, causing services to be delayed or not provided at all.

The Company strives to provide its products and services as reliably as possible. Availability risk is therefore one of the most critical types of risk for Clearstream Banking Frankfurt. Its causes include the failure of hardware and software, operating and security errors as well as physical damage to data centres.

The Company attaches the utmost importance to the maintenance of its business operations and the necessity to safeguard them against emergencies and disasters. Clearstream Banking Frankfurt specifically addresses availability risk by means of comprehensive activities in the field of business continuity management (BCM). The BCM system encompasses all of the processes which ensure that business continues as normal if a crisis occurs and is thus intended to reduce availability risk. These include precautions in relation to all key resources (systems, premises, employees, suppliers/service providers), such as the redundant design of all critical IT systems and the technical infrastructure, as well as emergency workspaces for employees in core functions at all important operational centres. These precautionary BCM measures are regularly reviewed.

No noteworthy losses were caused by the failure of operational resources in 2018.

(b) **Service deficiencies**

The category of service deficiencies comprises risks that may arise if a service for clients is performed inadequately, e.g. due to defective products and processes, improperly performed processes or erroneous manual entries. Despite all the automation and efforts to achieve straight-through processing
(STP), manual work is still necessary. As a result, Clearstream Banking Frankfurt is still exposed to the risk that client orders may be processed incorrectly.

In the reporting period, permanent improvements were also made to minimise the risk of service deficiencies, either by reducing or better safeguarding the necessary manual interventions. No noteworthy losses were caused by service deficiencies in 2018.

(c) Damage to material goods

This category includes risks due to accidents and natural disasters as well as terrorism and sabotage. No noteworthy losses were caused by damage to material goods in 2018.

(d) Legal and business practice risks

Losses can also result from ongoing legal proceedings. Clearstream Banking Frankfurt judges the probability that this operational risk will occur to be medium, although the losses involved could be substantial. As a result, Clearstream Risk Management continually monitors ongoing legal proceedings. These can be brought if Clearstream Banking Frankfurt breaches laws or other requirements, enters into inadequate contractual agreements or fails to monitor and observe case law to a sufficient degree. Legal risks also include losses resulting, for example, from insufficient anti-money laundering controls or breaches of competition law or of banking secrecy. Operational risks may also arise if national or superordinate regulatory requirements have been breached.

No noteworthy losses were caused by legal or business practice risks during the reporting year. However, the following pending procedures are to be noted.

A legal dispute has arisen in connection with a bond issued by MBB Clean Energy AG (MBB), which is held in safe custody at Clearstream Banking Frankfurt. MBB issued a first tranche of the bond in April 2013 and a second tranche of the bond in December 2013. The global certificates for the two tranches of the bond were delivered into Clearstream Banking Frankfurt by the paying agent of the issuer. The legal dispute is concerned with the fact that the bond was not serviced and is therefore allegedly invalid. The role of Clearstream Banking Frankfurt in connection with the allegedly invalid MBB bond is principally to hold the global certificate in safe custody as the national central securities depository. Insolvency proceedings have meanwhile been opened in respect of the issuer MBB.

As Clearstream Banking Frankfurt announced in September 2017, the public prosecutor in Cologne is carrying out an investigative procedure relating to tax evasion in connection with the involvement of a Clearstream Banking Frankfurt employee in implementing transactions of market participants beyond the ex-dividend date (cum/ex transactions). In a letter of 22 January 2018 the Cologne public prosecutor consulted Clearstream Banking Frankfurt as a potential ancillary party. Because proceedings are at an early stage it is not possible to predict the time, extent, scope or consequences of any decision. Clearstream Banking Frankfurt is cooperating with the relevant authorities.

Furthermore, a tax audit for fiscal years 2006–2008 resulted in findings that will lead to supplementary tax payments in 2019. Sufficient provisions have been set aside for the supplementary tax
payments. Clearstream Banking Frankfurt will lodge the permissible appeals against disadvantageous tax assessments.

**Stress tests**

Clearstream Banking Frankfurt carries out stress test calculations for operational risk. In these tests, the occurrence of extreme operational losses or an accumulation of major operational losses in a single year is simulated, and then compared with the available risk-bearing capacity.

In addition, ad hoc stress tests are also carried out when necessary. In the reporting year, the stress tests for operational risk did not reveal any need to increase the risk-bearing capacity for Clearstream Banking Frankfurt. In addition to these stress tests, which analyse the impact of predefined stress scenarios on available risk-bearing capacity, Clearstream Banking Frankfurt also performs inverse stress tests. This tool is used to determine operational loss scenarios that would have to occur in order to exceed the available risk-bearing capacities.

**Financial risks**

Financial risks represent around 17 per cent of total risk (confidence level of 99.98 per cent) for Clearstream Banking Frankfurt. The Company separates them into credit, market price and liquidity risks. At Clearstream Banking Frankfurt, financial risks mainly occur as credit risk in connection with the lending and cash investment business, as market risk from cash investments and in the context of contractual trust arrangements (CTA = ring-fenced plan assets). Liquidity risks also exist to a lesser extent. The risk from the aforementioned types of risk is limited by means of effective control measures.

**a) Credit risk**

Credit risks describe the risk that arises when a counterparty defaults and the receivables from this counterparty are not paid or only partly paid.

Clearstream Banking Frankfurt grants loans to its clients in order to increase settlement efficiency. First, credit is extended solely on a very short-term basis, normally for less than a day. Second, it is collateralised, with the exception of lending to selected central banks, and granted to clients with high creditworthiness. Furthermore, the credit lines granted can be revoked at any time.

Before entering into a business relationship, the creditworthiness of potential clients is assessed. Clearstream Banking Frankfurt defines client-specific credit lines based on a regular credit check and performs ad hoc analyses as required. The Company defines safety margins for collateral in line with the risk and reviews their appropriateness on a regular basis. Clearstream Banking Frankfurt includes all relevant risk factors when determining the haircut and the margin and allocates a specific deduction to each. The total haircut is calculated by adding together the individual margins for the relevant risk factors.

Further credit risks arise in connection with cash investments. The Company has a treasury policy that defines the conditions for investing through the Clearstream Treasury department. As part of
liquidity management in the Clearstream Group, Clearstream Banking Frankfurt invests its customers’ money overnight at Clearstream Banking Luxembourg. The risk for Clearstream Banking Frankfurt is reduced in that investments are exclusively made on a short-term basis and collateralised as a rule.

None of the types of business described resulted in any losses in 2018.

**Stress tests**

In its calculations of required economic capital, Clearstream Banking Frankfurt already analyses the impact of extreme scenarios on available risk-bearing capacity. In addition, it calculates credit risk stress tests in order to analyse the impact of further extreme scenarios, such as default by the largest counterparty group. The values determined in the stress tests are compared with limits defined as part of the available risk-bearing capacity. If necessary, Clearstream Banking Frankfurt calculates ad hoc stress tests. In addition to stress tests, which analyse the impact of predefined stress scenarios on available risk-bearing capacity, the Company also performs inverse stress tests. The objective of inverse stress tests is to uncover sources of risk to the business as a going concern that were unrecognised in the context of stress tests. To achieve this, inverse stress tests seek to identify events that may endanger the institutions in their ability to survive.

The results of the stress tests and inverse stress tests may lead to further analyses and to the implementation of measures to reduce risk.

**Evaluation of credit risk concentrations**

In addition, Clearstream Banking Frankfurt determines credit risk concentrations by performing analyses to detect any risk clusters relating to individual counterparties. Owing to its business model, the Company focuses almost exclusively on financial sector clients in Germany. However, no significant credit risk concentrations were found for individual counterparties.

**b) Market price risk**

Market price risks can arise in relation to cash investments through interest rate and currency fluctuations. Share price risks arise to a limited extent upon investment in a special fund that serves to cover pension obligations and the like within a CTA. Clearstream Banking Frankfurt avoids open currency positions as far as possible. Client money in foreign currency is countered by approximately equal amounts in nostro accounts.

Open positions from foreign exchange spot transactions with clients are closed on the same day with corresponding counter-transactions with Clearstream Banking Luxembourg. Liquidity reserve investments are made only in euro and USD. Open currency positions only occur in connection with investments within the aforementioned special fund to achieve adequate returns for long-term investments. They are limited by the corresponding requirements in the investment guidelines, are in part further restricted by corresponding hedging transactions and are of secondary importance overall.
(c) Liquidity risk

The liquidity risk of Clearstream Banking Frankfurt arises when there is insufficient liquidity to meet daily payment obligations or, in the case of liquidity squeezes, increased refinancing costs may be incurred. Daily and intra-day liquidity is monitored by the Treasury department and controlled with the help of a limit system.

The aim of the investment strategy of Clearstream Banking Frankfurt is to enable it to repay client deposits at any time. The liquidity limits used for control purposes are correspondingly conservative. Further comprehensive forms of financing are available for additional hedging.

Clearstream Banking Frankfurt had sufficient liquidity at all times during the reporting year 2018.

Stress tests

Stress test calculations are carried out for liquidity risk. They are performed at the level of Clearstream Banking Luxembourg, which manages the liquidity of Clearstream Banking Frankfurt through cash pooling. Scenarios were implemented that are calculated quarterly. In these scenarios, both the sources and uses of liquidity are subjected to a stress test, which uses both historical and hypothetical scenarios. Clearstream Banking Frankfurt also implemented inverse stress tests for liquidity risk. The inverse stress tests analyse which scenarios would also have to occur to bring about a situation of insufficient liquidity. Based on the stress tests, Clearstream Banking Frankfurt has sufficient liquidity.

Business risk

Business risks represent around 7 per cent of total risk (confidence level of 99.98 per cent). They reflect the dependence of Clearstream Banking Frankfurt on macroeconomic, geopolitical and corporate strategy developments and its vulnerability to event risks such as changes in the competitive environment. This risk is represented in relation to EBITDA (earnings before interest, taxes, depreciation and amortisation). Business risks may have an impact on turnover and cost trends, for example if turnover declines compared to the corresponding budget projections or costs increase. In addition, external factors such as the performance and volatility of stock markets or a lack of investor confidence in the financial markets may impact the results of operations.

Clearstream Banking Frankfurt analyses both international/European and national regulatory initiatives on an ongoing basis and contributes its position as part of the legislative process. In doing so, the Company acts in close coordination with the other companies of Deutsche Börse Group and plays its part in formulating the Group’s regulatory positioning. It also uses the services of dedicated experts in the Group in order to communicate the relevant aspects and to identify and analyse regulatory trends. This proactive approach reduces potential risks for business performance. In addition, through early engagement with regulatory trends, forward-looking measures are initiated to handle the implications of an altered regulatory environment appropriately.

Scenarios are created and quantified based on key risk events in order to assess business risks. Stress scenarios are also defined to analyse the EBITDA effect of further extreme scenarios. Inverse
stress tests are additionally carried out for Clearstream Banking Frankfurt and their impact on the risk-bearing capacity is analysed. Together with the responsible units within Deutsche Börse Group, Clearstream Banking Frankfurt monitors these developments very closely so that it can implement risk-reducing measures at an early stage.

**Summary**

Overall the risk profile of Clearstream Banking Frankfurt did not change significantly. In the past financial year all risks were identified at an early stage and thus, as a result of suitable counter-measures, no noteworthy loss was incurred.

Clearstream Banking Frankfurt's risk-bearing capacity was ensured at all times during the financial year. As at 31 December 2018 the economic capital requirement of Clearstream Banking AG amounted to €192 million (which includes an internally defined capital add-on). This compares to an adequate available risk-bearing capacity of €366 million.

**Outlook**

Clearstream Banking Frankfurt constantly evaluates its risk situation. In view of the stress test calculations made, the resulting required economic capital and the risk management system, which is considered to be effective, the Executive Board of Clearstream Banking Frankfurt concludes that the risk-bearing capacity is adequate. It also cannot identify any risk that jeopardises the Company’s continued existence.

Frankfurt/Main, 21 March 2019

Clearstream Banking Aktiengesellschaft

The Executive Board

Dr Berthold Kracke  Tilman Fechter  Martina Gruber  Mathias Papenfuß
Independent Auditor’s Report

To Clearstream Banking Aktiengesellschaft, Frankfurt/Main


Opinions

We have audited the financial statements of Clearstream Banking Aktiengesellschaft, Frankfurt/Main – which comprise the balance sheet as at 31 December 2018 and the income statement for the financial year from 1 January to 31 December 2018, plus the notes to the financial statements, including the accounting policies presented. We have also audited the management report of Clearstream Banking Aktiengesellschaft for the financial year from 1 January to 31 December 2018.

In our opinion, on the basis of the knowledge obtained in the audit,

– the accompanying annual financial statements comply, in all material respects, with the requirements of German commercial law applicable to institutions and give a true and fair view of the assets, liabilities and financial position of the Company as at 31 December 2018 and of its financial performance for the financial year from 1 January to 31 December 2018 in compliance with German Legally Required Accounting Principles, and

– the accompanying management report as a whole provides an appropriate view of the Company’s position. In all material respects, this management report is consistent with the annual financial statements, complies with German legal requirements and appropriately presents the opportunities and risks of future development.

Pursuant to Section 322 (3) sentence 1 HGB [Handelsgesetzbuch: German Commercial Code], we declare that our audit has not led to any reservations relating to the legal compliance of the annual financial statements and of the management report.

Basis for our Opinions

We conducted our audit of the annual financial statements and of the management report in accordance with section 317 HGB and 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 (IDW) [Institute of Public Auditors in Germany]. Our responsibilities under those requirements and principles are further described in the ‘Auditor’s Responsibilities for the Audit of the Annual Financial Statements and of the Management Report’ section of our auditor’s report. We are independent of the Company 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 evidence we have obtained is sufficient and appropriate to provide a basis for our opinions on the annual financial statements and on the management report.

Key Audit Matters in the Audit of the Annual Financial Statements

Key audit matters are those matters that, in our professional judgement, were of most significance in our audit of the annual financial statements for the financial year from 1 January to 31 December 2018. These matters were addressed in the context of our audit of the annual financial statements as a whole, and in forming our opinion thereon, we do not provide a separate opinion on these matters.

- **RECOGNITION OF COMMISSION INCOME**

For information on the commission income received, please refer to Section 2.3.1, Financial performance, in the management report for the 2018 financial year.

**FINANCIAL STATEMENT RISK**

Clearstream Banking Aktiengesellschaft is a securities depository within the meaning of section 1(3) of the Depotgesetz (German Safe Custody Act) and as such performs services in the custody and settlement business in particular. The revenues from its custody business are essentially determined by the value of the securities held in custody. The income from settlement business depends, among other things, on the number of transactions conducted internationally and in Germany that Clearstream Banking Aktiengesellschaft settles for transactions agreed on the stock exchange and over the counter. In addition, custodial fees are generated from investment fund business and transaction fees are generated through the global securities financing.

The commission income received in the 2018 financial year is shown in the Company’s management report and amounts to EUR 396 million (previous year: EUR 373 million).

As a result of the large number of securities held in custody, the various types of securities and IT-supported depositories, in addition to the large number of transactions to be remunerated, the process used to calculate commission income is accorded great importance.
This process is highly automated and based on various IT systems that are connected to each other by system interfaces.

The risk to the financial statements is that transactions are processed incorrectly and the wrong amount of commission income is recognised as a result.

OUR AUDIT APPROACH

Based on our risk analysis and the assessment of the risks of error, our audit opinion is based on both control-based and substantive audit procedures. We accordingly conducted the following audit procedures in consultation with IT specialists at KPMG:

We first gained an insight into the various types of transactions and the resulting commission income, identified the risk associated with the processing and gained an overview of the internal control system in relation to the collection of commission income.

In order to assess the appropriateness of the internal control system, we carried out inquiries, inspected the relevant documentation and identified the IT systems involved. The automatic and semi-automatic controls judged to be relevant for our audit are aimed in particular at ensuring that the correct amount of commission income is recognised.

After this structural audit was carried out, we conducted function tests to check the effectiveness of the controls that have been set up. The audit extended to the effectiveness of the general IT controls.

Furthermore, we conducted substantive analytical audit procedures to examine the development of selected types of commission income as against the previous year. For other commission income, we checked a sample of the commission income received against the corresponding calculations.

OUR OBSERVATION

The procedure used for the recognition of commission income is appropriate.

ACCOUNTING FOR THE SETTLEMENT OF INTRAGROUP SERVICES

For information on the income and expenses arising from the settlement of intragroup services, please refer to the disclosures in the section on net assets, financial position and financial performance in the management report.

FINANCIAL STATEMENT RISK

Clearstream Banking Aktiengesellschaft is part of the Deutsche Börse Group and, as such, is integrated into its intragroup value added processes. Business processes or functions are accordingly outsourced to other companies of the Deutsche Börse Group. Moreover,
Clearstream Banking Aktiengesellschaft performs services for other companies of the Deutsche Börse Group, for example in the area of regulatory reporting.

In the 2018 financial year, the expenses incurred for services by the Company procured within the Group amount to EUR 138.4 million (previous year: EUR 160). By contrast, income of EUR 24.0 million (previous year: EUR 56.4 million) was received for the performance of services within the Deutsche Börse Group.

As a result of the high level of task sharing and centralisation of certain processes and functions within the Deutsche Börse Group, intragroup service relationships play a highly significant role in financial performance. The services are predominantly charged on the basis of the cost-plus method. The risk to the financial statements is that service relationships with other companies of the Deutsche Börse Group are not recognised in full or are recognised in the wrong amount, and therefore the corresponding income and expenses are reported in the wrong amount.

OUR AUDIT APPROACH

Based on our risk analysis and the assessment of the risks of error, our audit opinion is exclusively based on substantive audit procedures. We accordingly performed the following audit procedures:

We first gained an overview of the key service relationships between Clearstream Banking Aktiengesellschaft and the companies of the Deutsche Börse Group in addition to the related contractual bases. Building on this, we analysed the underlying transfer pricing models, identified the associated risks with regard to the proper accounting for other income and expenses and also gained an overview of the internal control system.

In the course of the substantive audit procedures, we reconciled the recognised intragroup income and expenses on the basis of a representative sample with the contractual bases. If the remuneration does not stipulate an agreed amount, we audited the basis of calculation. We ensured that the intragroup income and expenses are complete by reconciling the balances posted between the companies of the Deutsche Börse Group.
OUR OBSERVATIONS

The service relationships with other companies of the Deutsche Börse Group are properly recognised and reported in the annual financial statements.

Responsibilities of Management and the Supervisory Board for the Annual Financial Statements and the Management Report

Management is responsible for the preparation of annual financial statements that comply, in all material respects, with the requirements of German commercial law applicable to institutions, and that the annual financial statements give a true and fair view of the assets, liabilities, financial position and financial performance of the Company in compliance with German Legally Required Accounting Principles. In addition, management is responsible for such internal control as they, in accordance with German Legally Required Accounting Principles, have determined necessary to enable the preparation of annual financial statements that are free from material misstatement, whether due to fraud or error.

In preparing the annual financial statements, management is responsible for assessing the Company’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, provided no actual or legal circumstances conflict therewith.

Furthermore, management is responsible for the preparation of a management report that as a whole provides an appropriate view of the Company’s position and is, in all material respects, consistent with the annual financial statements, complies with German legal requirements, and appropriately presents the opportunities and risks of future development. In addition, management is responsible for such arrangements and measures (systems) as they have considered necessary to enable the preparation of a 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 management report.

The Supervisory Board is responsible for overseeing the Company’s financial reporting process for the preparation of the annual financial statements and of the management report.

Auditor’s Responsibilities for the Audit of the Annual Financial Statements and of the Management Report

Our objectives are to obtain reasonable assurance about whether the annual financial statements as a whole are free from material misstatement, whether due to fraud or error, and whether the management report as a whole provides an appropriate view of the Company’s position and, in all material respects, is consistent with the annual 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 annual financial statements and on the management report.
Reasonable assurance is a high level of assurance, but is not a guarantee that an audit conducted in accordance with section 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, individually or in the aggregate, they could reasonably be expected to influence the economic decisions of users taken on the basis of these annual financial statements and this management report.

We exercise professional judgement and maintain professional scepticism throughout the audit. We also:

- Identify and assess the risks of material misstatement of the annual financial statements and of the 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 control relevant to the audit of the annual financial statements and of arrangements and measures (systems) relevant to the audit of the management report in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of these systems.

- Evaluate the appropriateness of accounting policies used by management and the reasonableness of estimates made by management and related disclosures.

- Conclude on the appropriateness of management’s 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 Company’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 disclosures in the annual financial statements and in the 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 Company to cease to be able to continue as a going concern.

- Evaluate the overall presentation, structure and content of the annual financial statements, including the disclosures, and whether the annual financial statements present the underlying transactions and events in a manner that the annual financial statements give a true and fair view of the assets, liabilities, financial position and financial performance of the Company in compliance with German Legally Required Accounting Principles.

- Evaluate the consistency of the management report with the annual financial statements, its conformity with [German] law, and the view of the Company’s position it provides.

- Perform audit procedures on the prospective information presented by management in the management report. On the basis of sufficient appropriate audit evidence we evaluate, in particular, the significant assumptions used by management 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 on the assumptions used as a basis. 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 control 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 bear on 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 annual 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 Article 10 of the EU Audit Regulation

We were elected as auditors by the Annual General Meeting on 15 May 2018. We were engaged by the Supervisory Board on 12 November 2018. Clearstream Banking Aktiengesellschaft has been a financial institution subject to the CRR since February 2001 – classified as a monetary financial institution – and we have been the auditor of Clearstream Banking Aktiengesellschaft without interruption since that time.

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

In addition to the financial statement audit, we have provided to the Company or its subsidiaries the following services that are not disclosed in the annual financial statements or in the management report:

- We performed the audit of safe custody accounts for Clearstream Banking Aktiengesellschaft’s custody business in the 2018 financial year.
German Public Auditor Responsible for the Engagement

The public auditor responsible for the engagement is Klaus-Ulrich Pfeiffer.

Frankfurt am Main, 8 April 2019
KPMG AG
Wirtschaftsprüfungsgesellschaft
[Original German version signed by:]

Pfeiffer
Wirtschaftsprüfer
[German Public Auditor]

Dr. Niemeyer
Wirtschaftsprüfer
[German Public Auditor]