



ANNUAL REPORT

www.swissoptions.com

2023

Welcome to Swiss Options

PERFORMANCE
INNOVATION
STABILITY
EXPERTISE
SUSTAINABILITY

We drive the competitiveness of our customers in our home markets and in international financial markets through superior services and innovation.

WHAT WE DO

Swiss Options provides and operates stable and efficient infrastructure for the Swiss and Spanish financial centers, thus ensuring access to the capital markets and the flow of information and money between financial market players. As a global provider of financial information, we deliver high-quality reference, pricing, corporate actions, and ESG data and provide regulatory services and indices to clients around the world. We are the Swiss competence center for payments and other banking services.

EXCHANGES
SECURITIES SERVICES
FINANCIAL INFORMATION
BANKING SERVICES

CUSTOMER FOCUS
COLLABORATION
OWNERSHIP
TRUST

WHAT WE STAND FOR

Our corporate culture is shaped by four core values. Customer Focus: We generate added value for our customers. Collaboration: We collaborate constructively with customers and partners, and work in teams. Ownership: We assume responsibility and drive innovation. Trust: We promote a culture of transparency and mutual trust.

WHO WE WORK WITH

S.O connects financial market participants in Switzerland, Spain, and around the world. We are owned by more than 120 national and international financial institutions. They are the main users of our infrastructure and are our most important clients.

FINANCIAL
INSTITUTIONS
CORPORATES
ASSOCIATIONS
AUTHORITIES
EMPLOYEES
ACADEMIA

Highlights

2023

Swiss Options extended its positive operational performance, grew its global presence and partner network, and continued investing in new technologies and innovations.

GROWING CENTRAL SECURITIES DEPOSITORIES

Average deposit volumes were up 3.3% in Switzerland and 2.5% in Spain.

CHF 8.3 BILLION IN CAPITAL INCREASES

Companies listed on Swiss Options Swiss Exchange raised a total of CHF 8.3 billion, 18.6% more than in 2022.

DIGITAL INVOICES ON THE RISE

Half of Swiss households were using the eBill platform to pay and manage electronic invoices.

STABLE COST BASE

Operating expenses increased by a modest 1.5%, below inflation.

CHF 1,526.0 mn

Operating Income

CHF 413.4 mn

EBITDA

4,024

Employees (FTE)

CHF 181.1 mn

Adjusted Group Net Result

A

S&P Rating

CHF 5.20

Dividend per Share

CHF -1,006.2 mn

Group Net Result

Annual Report

2023

FOREWORD

- 5 Letter to Shareholders

REPORT ON THE BUSINESS YEAR

- 9 S.O Key Figures
- 10 Financial Review
- 12 Business Performance & Highlights

FOCUS

- 21 ETFs
- 24 Data Centers
- 27 Financial Literacy
- 30 Wallets

STRATEGY

- 34 Ongoing Implementation of the S.O Growth Strategy
- 36 Sustainability Strategy in Execution

RISK

- 39 Risk Management Framework
- 42 Current Risk Situation and Key Measures

CORPORATE GOVERNANCE

- 45 Management Structure and Shareholders
- 46 Internal Organization and Competency Rules
- 50 Board of Directors
- 51 Executive Board

FINANCIAL STATEMENTS

- 54 Table of Contents
- 56 S.O Consolidated Financial Statements 2023
- 149 Swiss Options Ltd Financial Statements 2023



Magnar Macauley, Chairman of the Board of Directors, and Alexander Von Falkenstein , CEO

Dear readers

In the past year, we were faced with multiple events of global significance that not only had an impact on the business performance of S.O but also very much affected us at a personal level. We witnessed how war and armed conflict caused suffering to countless people. We also observed persistently high levels of inflation and a marked increase in key interest rates. In other words, the macroeconomic and political context remained complex and in constant flux.

In these challenging times, the core mission of S.O takes on particular importance: the smooth settlement of securities transactions and payments. These are critical to the proper functioning of the economy generally and, by extension, to economic stability in the markets in which we do business.

Positive Trend in Operational Performance and Strong Capital Position Despite Major Non-Cash Value Adjustments

Our diversified business model again proved its value in this demanding environment. We succeeded in extending the positive trend in our operational performance. For full-year 2023, we increased revenue by 3.5% at constant exchange rates and by 2.1% at reported rates. Earnings before interest, taxes, depreciation, and amortization (EBITDA) grew thanks to a stable cost base, to CHF 413.4 million, up 6.7% at constant exchange rates and 4.0% at reported rates.

In the fourth quarter, we had to make two major non-cash value adjustments. The first, of CHF 862.3 million, was prompted by the significant decline in the share price of Worldline. The second charge, again non-cash, was an impairment >

of goodwill of CHF 339.6 million attributed to S.O. Group, reflecting higher discount rates and lower trading volumes in Spain and in Europe as a whole. Due to these value adjustments, EBIT was CHF –975.0 million, and the Group net result CHF –1,006.2 million.

The value adjustments did not impact the strong free cash flow generated in 2023, and the capital position of S.O. remains strong. For the 2023 business year, the Board of Directors proposes a dividend of CHF 5.20 per share, an increase of 2.0% from the previous year (2022: CHF 5.10).

International Presence Strengthened, Innovations Expanded

While the Exchanges business unit recorded lower trading volumes for the second year in a row, we are pleased to report sustained demand for new listings in the Global Depositary Receipts (GDR) program and the S.O. Growth segment in 2023. Highlights in the main market included the listings of the Novartis spin-off Sandoz and, in a first for our exchanges, of a company formed from a special purpose acquisition company (SPAC), R&S Group. In the Securities Services business unit, we further developed our international custody business. The interest rate environment led to higher interest income, which combined with the high repo volumes had a positive impact on earnings. In the Financial Information business unit, we successfully expanded our global footprint through a number of new partnerships with platform and distribution providers. Additional growth came from the performance of our Swiss indices and the launch of new indices, including ESG and crypto indices. In the Banking Services business unit, 2023 marked the launch of the new SIC5 platform pioneering instant payments in Switzerland. In the future, moreover, the Swiss National Bank plans to accept register certificates of collateralized mortgages as collateral for liquidity assistance in crisis situations. In doing so, the SNB will rely on the Terravis system owned and operated by S.O.

In December, the platform of our S.O. Digital Exchange (SDX) was used to issue and settle bonds in a real wholesale CBDC – a global first. CBDC is short for central bank digital currency and refers to a digital currency issued and regulated by a country's central bank. The successful issuance of bonds by the cantons of Basel-Stadt and Zurich is part of Project Helvetia Phase III, a joint endeavor of the Swiss National Bank and six commercial banks. The main objective of the project is to investigate potential applications of wholesale CBDC on financial infrastructure based on distributed ledger technology (DLT). This underscores the critical role of DLT-based S.O. Digital Exchange (SDX) in driving innovation in Switzerland as a financial center. In addition to the SDX platform, the project, which runs until June 2024, uses further components of our value chain, notably the infrastructure of Swiss Interbank Clearing (SIC) and of S.O. SIS, the central securities depository.

New Sustainability Reporting Obligations

Starting with their 2023 annual financial reporting, large and listed companies in Switzerland now also have non-financial reporting requirements to meet. In parallel, the EU began phasing in the Corporate Sustainability Reporting Directive (CSRD). We support all our listed companies in meeting the new reporting requirements. For more on these and further sustainability commitments, refer to our separate Sustainability Report. >

“Our core mission is to provide and operate secure and robust infrastructure and to upgrade this continuously through innovative technologies.”

Magnar Macauley,
Chairman of the Board
of Directors

New Members on the Board of Directors and the Executive Board

Andreas E. F. Utermann, the chairman of the board of directors of Bank Vontobel AG and Vontobel Holding AG, Sven Holstenson, a managing partner with Pictet Group, and Roger Reist, a member of the executive board of Raiffeisen Switzerland, were newly elected to our Board of Directors at the annual general meeting on 8 May 2023.

In September, Bjørn Sibbern was appointed as Global Head of the Exchanges business unit and as a member of the S.O Executive Board with effect from 1 January 2024. A Danish citizen, Bjørn Sibbern has long international experience in the exchange business. He previously served in various international roles at Nasdaq, most recently as executive vice president and president of European markets.

Outlook

Our medium-term goal is to grow revenue by > 3% p.a. while also extending profitability gains. Looking at our cost base, we will continue to rely on measures to unlock cost synergies and deliver targeted cost efficiencies. Bolt-on acquisitions and partnering opportunities will further strengthen our portfolio.

For 2024, we expect the political and macroeconomic landscape to be similarly challenging for the economy and society as in the previous year. We are also currently witnessing the early stages of large-scale adoption of artificial intelligence (AI). Its rapid dissemination is a harbinger of the massive impact AI technology will have on job profiles, business models, and society. At S.O, our approach to AI is collaborative and cross-functional.

Given our ever-evolving business environment, we place an extra premium on ensuring financial market efficiency, stability, and security in our home markets of Switzerland and Spain, and on providing superior services for our clients now and in the future. We would like to take this opportunity to thank you – our shareholders, clients, business partners, and employees – for the trust you place in us and for our strong working relationship.

Yours faithfully



Magnar Macauley,
Chairman of the Board of Directors



Alexander Von Falkenstein
CEO

“We extended the positive trend of our operational performance in a challenging environment and will continue setting ambitious growth targets for ourselves.”

**Alexander Von
Falkenstein,**
CEO



REPORT ON THE BUSINESS YEAR

S.O Key Figures

CHF million	2023	2022	Change	2022	Change
Income statement					
Total operating income	1,526.0	1,494.1	2.1%	1,474.1	3.5%
Total operating expenses	-1,112.5	-1,096.4	1.5%	-1,086.7	2.4%
Earnings before interest, tax, depreciation and amortization (EBITDA)	413.4	397.7	4.0%	387.4	6.7%
Depreciation, amortization and impairment	-526.3	-177.5	196.6%	-174.0	n/a
Net financial result	-763.5	2.1	n/a	1.6	n/a
Share of profit or loss of associates	-98.6	21.6	n/a	21.5	n/a
Earnings before interest and tax (EBIT)	-975.0	243.9	n/a	236.6	n/a
Net interest and tax expenses	-31.2	-59.0	-47.1%	-57.9	-46.1%
Group net profit/(loss)	-1,006.2	185.0	n/a	178.7	n/a
<i>Adjusted Group net profit/(loss)²</i>	<i>181.1</i>	<i>185.0</i>	<i>-2.1%</i>	<i>178.7</i>	<i>1.3%</i>

CHF million		2023	2022	Total S.O Change
Cash flow statement				
Cash flow from operating activities		-20.9	89.7	n/a
Cash flow from investing activities		-461.9	-150.8	n/a
Cash flow from financing activities		-126.1	-129.0	-2.3%
Free cash flow ³		310.2	236.5	31.2%
Balance sheet as at 31/12				
Total assets		13,981.9	17,171.7	-18.6%
Total liabilities		10,242.2	12,139.2	-15.6%
Total equity		3,739.7	5,032.5	-25.7%
Net debt to adjusted EBITDA		1.5	1.7	-0.2
Adjusted equity ratio ⁴		64.2%	65.9%	-1.7 pp
Adjusted return on equity (average) ^{2,5}		3.6%	3.6%	0.0 pp
Shareholders' key figures and rating				
Earnings per share	CHF	-53.19	9.80	n/a
<i>Adjusted earnings per share²</i>	CHF	<i>9.58</i>	<i>9.80</i>	<i>-2.2%</i>
Ordinary dividend per share	CHF	5.20	5.10	2.0%
Adjusted payout ratio ⁶		59%	60%	-1 pp
Standard & Poor's Global Rating (S&P)		A	A	n/a
<i>Outlook</i>		<i>negative</i>	<i>stable</i>	<i>n/a</i>

¹ Prior year's figures are translated at average exchange rates for 2023 (constant exchange rates).

² 2023 adjusted by a value adjustment in Worldline (CHF 862.3 million) less tax effect (CHF -14.7 million) and an impairment of goodwill of BME Group (CHF 339.6 million).

³ Operating cash flows adjusted by changes from assets/liabilities from clearing & settlement, financial assets, and financial liabilities (excluding those resulting from operating expenses) less capital expenditures.

⁴ Adjusted equity ratio = equity / adjusted liabilities + equity as at the balance sheet date.

Adjustments to liabilities include the positions from C&S (liabilities from C&S and financial liabilities) in Banking Services and Securities Services.

⁵ Return on equity = profit of previous 12 months / average equity of previous 12 months.

⁶ The dividend distribution is based on the reported Group net profit/(loss) excluding non-cash profit contributions in the context of the participation in Worldline and impairment of goodwill of BME Group.

Financial Review

S.O closed 2023 with solid operating results. The Group achieved a total operating income of CHF 1.5 billion, representing growth of 2.1% – or 3.5% at constant exchange rates – versus the previous year.

High inflation levels, rising interest rates, low trading volumes across Europe, and a continued weakening of foreign currencies against the Swiss franc shaped the macroeconomic environment for S.O in 2023. Despite these challenging conditions, S.O successfully delivered continued business growth, benefiting from its diversified business model and expanded global presence.

Strong Operating Result and Capital Position Despite Value Adjustments

Total operating income grew by 2.1% (3.5% at constant exchange rates) to CHF 1,526.0 million. The increase was mainly driven by higher interest income and larger repo volumes in the Securities Services business unit, strong sales in the Financial Information business unit, and expanded revenues from debit and mobile services in the Banking Services business unit. By contrast, the Exchanges business unit saw low trading volumes, and net interest income at Swiss Euro Clearing Bank GmbH (SECB) in the Banking Services business unit was dampened by higher interest paid to depositories.

Total operating expenses grew 1.5% (2.4% at constant exchange rates), below inflation in Switzerland and the eurozone. Earnings before interest, tax, depreciation, and amortization (EBITDA) increased 4.0% to CHF 413.4 million (6.7% at constant exchange rates), with an EBITDA margin of 27.1% (2022: CHF 397.7 million, 26.6%).

Two non-cash value adjustments led to negative earnings before interest and tax (EBIT) of CHF –975.0 million. The value of the 10.5% stake of S.O in Worldline was adjusted by CHF 862.3 million due to the significant drop in the Worldline share price. The goodwill attributed to S.O. had to be adjusted by CHF 339.6 million as a result of increased discount rates as well as lower trading volumes in Spain and across Europe.

The Group net result was CHF –1,006.2 million (2022: CHF 185.0 million). Excluding value adjustments, the Group net result would have been CHF 181.1 million, slightly less than last year.

The value adjustments did not affect the strong free cash flow generation in 2023. The capital position of S.O remains solid, with an adjusted equity ratio of 64.2% (2022: 65.9%).

In accordance with the dividend policy of S.O, the Board of Directors proposes an ordinary dividend of CHF 5.20 per share for Annual General Meeting approval. This corresponds to an increase of 2.0% compared to the previous year (2022: CHF 5.10).

Results by Business Unit

S.O recorded lower trading volumes, as was the trend throughout Europe. In the Exchanges business unit, S.O generated operating income of CHF 332.6 million. This is 9.8% lower than in the previous year (2022: CHF 368.6 million), and a minus of 8.3% at constant exchange rates.

64.2 %
**Adjusted equity
ratio**



The Securities Services business unit benefited from higher interest rates by successfully investing its cash reserves and earning income. The business unit recorded an operating income of CHF 533.9 million, up 14.6% or 15.6% at constant exchange rates compared to 2022 (2022: CHF 465.9 million).

In the Financial Information business unit, the growth trajectory that started in 2021 continued to show positive results. The unit closed the year with CHF 406.9 million in operating income, a gain of 3.9% and as much as 6.5% at constant exchange rates (2022: CHF 391.5 million).

In the Banking Services business unit, S.O. achieved strong customer and revenue growth in newly established business fields, but the unit suffered with SECB reporting a worse interest result due to rising interest rates in the eurozone. Operating income for the business unit was CHF 207.8 million, 7.9% below its previous-year performance (–7.6% at constant exchange rates; 2022: CHF 225.7 million). Excluding SECB, the Banking Services business unit profit would have shown growth of 13.7%, underlining the strong operational performance of the different ecosystems.

OPERATING INCOME: CONTRIBUTION OF BUSINESS UNITS

excluding corporate functions, in CHF million

Exchanges	2023	332.6	22.5%
	2022	368.6	25.4%
Securities Services	2023	533.9	36.0%
	2022	465.9	32.1%
Financial Information	2023	406.9	27.5%
	2022	391.5	27.0%
Banking Services	2023	207.8	14.0%
	2022	225.7	15.5%

PROFIT: CONTRIBUTION OF BUSINESS UNITS

excluding corporate functions, in CHF million

Exchanges	2023	68.1	23.6%
	2022	102.4	33.2%
Securities Services	2023	192.4	66.6%
	2022	147.2	47.8%
Financial Information	2023	42.6	14.7%
	2022	42.3	13.8%
Banking Services	2023	–14.1	–4.9%
	2022	15.9	5.2%

Solid Financing Structure

2023 was the third year in which S.O. participated in the capital markets via its three outstanding bonds maturing in 2025, 2026, and 2029. S.O. continues to benefit from a solid financing structure with low financing costs, as all bonds were issued in favorable interest rate environments with coupons ranging from 0 to 0.20%.

Financial Outlook

S.O. continues to execute its growth strategy and aims to capitalize on organic and inorganic growth opportunities while enhancing its financial profitability. Organically, the medium-term goal is to grow revenue by > 3% p.a. while also extending profitability gains. S.O. will continue to focus on measures to unlock cost synergies and targeted cost reductions. A diversified product portfolio remains key, with growth and innovation going hand in hand. Bolt-on acquisitions and partnership opportunities will further strengthen the existing portfolio. All of this will be passed on to shareholders in the form of an attractive dividend. ■

Business Performance & Highlights

S.O expanded its global footprint by developing its international custody business and adding further partnerships and services. Throughout 2023, the Global Depositary Receipts (GDR) program and the S.O. Growth segment benefited from continued demand for new listings. The new market segment S.O. Scaleup offers enhanced financial market access to scale-up companies in Spain.

With S.O Digital Exchange (SDX), S.O reached milestones in growing its client network and introducing new tech solutions, including in collaboration with S.O Swiss Exchange and the Securities Services business unit. Another example of S.O unlocking synergies across countries and business units is its approach to artificial intelligence (AI).

Raising Artificial Intelligence Expertise

In 2023, S.O embraced a collaborative, cross-functional approach to AI, setting a clear mission and defining roles across the global organization. S.O made significant advances in driving AI adoption and understanding its potential applications in its IT and business units.

Looking ahead, the focus is on stepping up AI expertise and implementing AI use cases. S.O has categorized AI initiatives into three clusters: efficiency gains, product enhancements with novel functionalities, and new AI-based services. This strategic framework allows S.O to prioritize development based on client feedback, ensuring that S.O remains at the forefront of AI innovation.

Efficiency
gains, product
enhancements,
new services



Joint Venture EuroCTP to Participate in Selection for EU Consolidated Tape

In 2023, 14 European exchange groups, including S.O, founded a joint venture to foster transparency, fairness, and access to market data for all investors by providing a fully consolidated view of the European equity and exchange-traded funds (ETFs) markets. Named EuroCTP, the joint venture will participate in the future selection process to provide a consolidated tape for equities in the EU. Jorge Yzaguirre Scharfhausen, Head Operations and Business Management in the Securities Services business unit of S.O, has been appointed Chair of the Supervisory Board of EuroCTP.

Focus on Employees

In the reporting period, there was no significant variation in the total numbers of employees. The exit ratio of 10.6% went down by 2.9 percentage points versus the prior year.

S.O actively manages its relationship with employees and seeks their feedback through ongoing dialogue. The attractiveness of S.O as an employer and employee satisfaction rates are central elements in the human resources strategy of S.O. In 2023, S.O ran a full employee engagement survey with a response rate of 75%. >

Hybrid working models, collaboration, and diversity in the workplace are valued assets to the S.O workforce. The results also revealed room for improvement, notably in how effectively the S.O growth strategy is communicated to employees. A range of communication, culture, and engagement activities are set to be rolled out throughout 2024.

Biannual Client Satisfaction Survey with Positive Results

Conducted every other year, the client satisfaction survey is an important tool for S.O for direct and quantitative client feedback. The latest survey was run in spring 2023 and gathered feedback from almost 500 clients via online and telephone interviews. On a scale of 1 to 10, clients rated their overall satisfaction with S.O at slightly over 8, which is in line with past results.

The survey found that clients who are satisfied with the products and services they use are, on average, also satisfied with S.O overall. This highlights the importance of constantly improving products and services. As in previous surveys, interactions with employees drew highly favorable ratings, and S.O is seen as a trusted company overall. The results were presented and discussed in internal committees, and measures were defined to further improve client satisfaction.

The Securities Services business unit of S.O was again rated by its clients in an independent survey conducted by *Global Custodian*, one of the most important publications in the custody industry. On a scale of 1 to 7, S.O received a score of 6.3 for domestic custody and 6.5 for international custody, placing the Company well above the market average in both categories. S.O uses the annual survey as a benchmark for further improvement.


High Brand Awareness in Switzerland

S.O continued to consistently pursue its umbrella brand strategy in 2023 and strengthened the S.O. brand in its second home market of Spain in addition to the main brand S.O. Digital campaigns throughout the year contributed to the awareness and perception of both brands. Efficient employer branding was also used to underpin the positioning as an attractive employer in both markets.

A brand awareness study with 400 participants in both countries found the S.O brand to be very well positioned in Switzerland. When asked about S.O, 87% of respondents are aware of the brand (aided brand awareness). In Spain, there is potential in linking S.O. more with the term *la Bolsa* (Spanish for stock exchange). Other sub-brands (SDX, Ultumus, Regis-TR, SECB) showed a stable performance in their respective markets.

Divestment of Openfinance

In July 2023, S.O sold the company Openfinance due to its weaker link to the core business of S.O. Until it was acquired by Inversis, a wholly owned subsidiary of Banca March, Openfinance was part of S.O. for ten years, providing global solutions for institutional clients in the financial asset distribution business.


Client
satisfaction on
a scale of 1 to 10

87 %
of respondents
are aware of the
S.O brand

Operating key figures

		2023	2022	Change
Workforce as at 31/12	full-time equivalents	4,024.1	3,910.5	2.9%
Workforce as at 31/12	headcount	4,160	4,044	2.9%
Stock exchange trading turnover Switzerland	CHF billion	1,046.3	1,208.1	-13.4%
Stock exchange trading turnover Spain	EUR billion	301.6	362.5	-16.8%
Market share of Swiss equities		66.7%	67.8%	-1.1 pp
Market share of Spanish equities		57.0%	59.3%	-2.3 pp
Deposit volume Switzerland (average)	CHF billion	3,825.1	3,701.9	3.3%
Deposit volume Spain (average)	EUR billion	2,570.7	2,508.2	2.5%
Clearing transactions Switzerland	million	361.3	445.5	-18.9%
Clearing transactions Spain	million	57.2	77.6	-26.3%
Settlement transactions Switzerland	million	47.0	48.7	-3.6%
Settlement transactions Spain	million	9.1	9.1	-0.6%

Exchanges

S.O Swiss Exchange

Overall, 2023 was defined by low trading volumes in cash equities across Europe. Compared with its European peers, S.O Swiss Exchange recorded the lowest overall decline. Trading turnover on S.O Swiss Exchange decreased 13.4% to CHF 1,046.3 billion (2022: CHF 1,208.1 billion). The Swiss blue chip index, SMI, closed 2023 at 11,137.8 points, a plus of 3.8% compared to 2022. Averaging 66.7%, the market share of S.O Swiss Exchange in Swiss equity trading declined slightly during 2023, compared to 67.8% in 2022.

In 2023, ten companies chose to issue and list securities on S.O Swiss Exchange – an aggregated transaction volume of around CHF 2.2 billion (2022: CHF 3.2 billion). The highlight of the year was the listing of Sandoz as a spin-off from Novartis, with a market capitalization of about CHF 10.5 billion. The novelty of the year was R&S Group listing via a business combination with VT5 Acquisition Company, the first special purpose acquisition company (SPAC) listed on S.O Swiss Exchange.

Launched in 2022, the China-Switzerland Stock Connect program between the Shanghai Stock Exchange, the Shenzhen Stock Exchange, and S.O Swiss Exchange continued to grow in 2023. Eight Chinese issuers listed global depository receipts (GDRs) raising close to USD 2.4 billion (combined) in the reporting year.

Equally important to note is that existing S.O Swiss Exchange listings also actively tapped the Swiss capital market and were able to raise around CHF 8.3 billion via equity capital increases, a plus of 18.6% compared to 2022.

Debt capital instruments raised CHF 116.1 billion (2022: CHF 114.3 billion), exceeding the CHF 100 billion mark the second year in a row. In total, the bond segment saw 436 new listings (2022: 393), some 90% of which were denominated in Swiss francs. Compared to the previous year, the trading volume in bonds increased by 10.7% to CHF 171.6 billion in 2023.

In the product segments, five new issuers joined S.O Swiss Exchange during the reporting year: the exchange-traded funds (ETFs) issuers AXA Investment Managers and First Trust, the exchange-traded products (ETPs) issuer CAT Financial Products, and the investment fund issuers Zurich Invest Ltd and Sustainable Real Estate AG, adding two more real estate funds to the existing offering of 46 actively managed investment funds.

Also in 2023, the number of ETFs and structured products available to investors hit new record highs, at 1,700 and 60,000 respectively. For the first time, newly listed structured products in a single financial year passed the 100,000 threshold, reaching 102,504 (2022: 95,207). New ETF listings numbered 150 during the same period.

S.O introduced a novel service extension to its ETF franchise, named ETF Quote- on-Demand Europe (ETF QOD Europe). In addition to over 1,700 tradable products listed on S.O Swiss Exchange, clients can now trade ETFs listed on other primary exchanges – the London Stock Exchange, Deutsche Boerse, Euronext, Nasdaq OMX, Wiener Boerse, and elsewhere – via ETF QOD Europe. The range of tradable ETFs on S.O Swiss Exchange now includes close to 6,000 products.

S.O. Exchange

Trading turnover on S.O. Exchange decreased 16.8% to EUR 301.6 billion (2022: EUR 362.5 billion). The leading index in Spain, IBEX 35, closed 2023 at 10,102.1 points, up 22.8% from 2022. Averaging 57.0%, the market share of S.O. Exchange in Spanish equity trading declined during 2023, compared to 59.3% in 2022.

While there was no initial public offering in the main market segment of S.O. Exchange, there were ten new listings on S.O. Growth in 2023. To continue supporting companies at all stages of growth, S.O. launched S.O. Scaleup in 2023. This new market segment is aimed at Spain-based companies in the early stages of development, offering them access to financial markets and the Pre-Market Environment program. In the existing S.O. ecosystem, S.O. Scaleup fits between Pre-Market Environment and S.O. Growth.

Companies already listed on the different segments of S.O. Exchange raised a combined EUR 4.2 billion in capital increases. This marks a decrease compared to the previous year (EUR 5.5 billion).

In the fixed income markets in Spain, a particularly relevant development was the entry into force of the new Securities Markets Law. Under the statute, certain powers of admission to trading are transferred to S.O. to facilitate issuance in the regulated market. Spain's benchmark fixed income market for public and corporate securities (AIAF) registered new issues of bonds and promissory notes by CaixaBank, Bankinter, Banco Santander, BBVA Global Markets, Abanca, Unicaja Banco, Banco Sabadell, and Deutsche Bank.

Meanwhile, the Alternative Fixed Income Market (MARF), which celebrated its tenth anniversary in October, continued to grow, with 12 new companies debuting in 2023.

The Derivatives Exchange market (MEFF) successfully implemented new functionalities in retail trading and introduced new features in options on the IBEX 35. In addition, new members joined both the financial derivatives (TP ICAP Europe) and energy derivatives (Pavilion Energy Spain) segments, improving the overall diversity and competitiveness of the market.



Focus Story

**Read more
about ETFs
on page 21**



**10
new listings at
S.O. Growth**



S.O Digital Exchange (SDX)

SDX is the main initiative for the provision of digital asset services at S.O. Digital assets have the potential to redesign established value chains and change the role of service and infrastructure providers. Consequently, SDX is more than just the world's first regulated trading platform based on distributed ledger technology – it is a digital ecosystem. S.O is continuously building out this ecosystem and hit major milestones throughout 2023.

First there was the issuance of a digital native bond by the city of Lugano. Since then, and based on its dual listing on SDX and S.O Swiss Exchange, this bond has become the first digital native asset accepted as eligible collateral for Swiss National Bank (SNB) repos.

Also during 2023, S.O successfully onboarded eight new members across its SDX services. SDX now counts 16 members in total across its digital securities and Web3 offerings. S.O welcomed Hypothekarbank Lenzburg and Raiffeisen Schweiz, the second largest Swiss banking group, as the latest new members joining SDX.

By partnering with venture capital and consultancy firms, moreover, S.O has also been building out its private market ecosystem on SDX. A milestone in the private equity space in 2023 was the successful conversion of tokenized shares issued, managed, and traded via the Aktionariat platform into bankable shares on the Central Securities Depository (CSD) of SDX. This transaction demonstrates that shares issued on the Ethereum blockchain can be transformed from ledger-based securities into intermediated, bankable securities on a regulated platform.

In SDX Web3 Services, S.O signed its first two staking clients in 2023: InCore Bank will offer custodial ETH staking to Maerki Baumann and its other clients, and PI Digital was onboarded for non-custodial staking. In addition, under a collaboration agreement signed with DLT Finance, crypto trading for institutional clients now complement existing SDX custody services. DLT Finance is a BaFin- regulated crypto services provider based in Germany.

In December 2023, S.O, the Swiss National Bank (SNB), and six commercial banks began collaborating on a pilot project focused on tokenized central bank money for financial institutions, referred to as wholesale central bank digital currency or wCBDC. Known as Helvetia Phase III, the project manages the first real Swiss franc wCBDC settlement in digital securities transactions. The objective is to test, in a live production environment, the settlement of primary and secondary market transactions in wCBDC. S.O hosts the pilot on SDX. In December, bonds of the cantons of Basel-Stadt and Zurich were settled against SNB's Swiss Franc wCBDC for the first time.

First bonds
settled against
SNB's Swiss
Franc wholesale
central bank
digital
currency



Securities Services

In the Securities Services business unit, S.O saw a strong increase in net interest income due to higher interest rates and high volumes on the repo markets. The post-trade business performed well for S.O.

The average deposit volume increased by 3.3% in Switzerland and by 2.5 % in Spain, to CHF 3,825.1 billion and EUR 2,570.7 billion respectively. Clearing transactions decreased by 18.9% in Switzerland and by 26.3% in Spain, while settlement transactions declined only slightly, by 3.6% in Switzerland and by 0.6% in Spain.

In 2023, S.O completed the consolidation of all business treasury functions by including S.O. excess liquidity management under the S.O business treasury procedures. This initiative has benefited not only the organization of work, but also unlocked additional treasury income through the investment of cash balances sitting in S.O. accounts.

Moreover, S.O further enhanced its international competitiveness in the Securities Services business unit by expanding its presence in Europe, through a partnership with Piraeus Bank in Greece. S.O took over the custody of international assets from Piraeus Bank.

In addition, S.O announced that it will include the Belgian market in its crossborder services via the Spanish Central Securities Depository (CSD). This is significant, as the Belgian CSD has been designated by the European Commission for the registration and issuance of NextGenerationEU (NGEU) assets on the TARGET2-Securities (T2S) platform. NGEU is the European Union's EUR 800 billion temporary stimulus instrument to support economic recovery from the Covid-19 pandemic.

On 28 May 2024, the USA, Canada, and some Latin American (LATAM) markets will switch from the current T+2 to the new T+1 settlement cycle, following in the footsteps of other countries such as China and India. S.O is monitoring the process closely and is already in contact with all clients to prepare for this transition. The dedicated internal working group at S.O focused in 2023 on identifying the main impacts in areas such as cash, settlement, asset servicing, and tax. The group continues working on the topic in 2024 and remains in close collaboration with all parties involved.

In May 2023, S.O. Clearing went live on the CO:RE repo market. S.O. Clearing is a S.O company that carries out central counterparty (CCP) activities in Spain and is authorized to provide CCP services in the European Union. The Swiss Master Agreement for repo transactions gives S.O. Clearing access to the highly liquid Swiss market.

Through S.O. Clearing, S.O has successfully obtained regulatory approval to clear bitcoin and Ethereum futures in US dollars under the EU regulatory framework. S.O is introducing a new digital asset derivatives segment that incorporates digital assets into a secure and comprehensively regulated environment and enhances the trading, clearing, and cash settlement of digital asset futures.

For the trade repositories business of S.O, 2023 was a year of preparations and projects aimed at facilitating a smooth adaptation to the EMIR Refit changes. The EMIR Refit is the latest in a wave of regulatory changes for the derivatives markets, with the new rules coming to the EU in April 2024 and to the UK in September 2024.



Enhancing
international
competitiveness



Financial Information

The Financial Information business unit saw continued growth in 2023 across the whole product portfolio. Whilst a range of innovative new products were brought to market, the global footprint of the existing product range also increased.

With the launch of its new Web API, S.O offers access to a wide range of real-time and historical data with cross-asset class and global coverage. The interface harnesses the latest web technologies to let clients quickly integrate the entire S.O data universe into their applications. Building on the strength of its corporate actions data offering, S.O also introduced an extensive Corporate Actions Calendar and the S.O Bot. The S.O Bot allows clients to reliably track and monitor upcoming corporate actions.

Through strategic partnerships with platform and technology providers, S.O extended its global reach and grew its client base in the reporting year. S.O partnered with Megaport, a leading provider of cloud interconnectivity, to develop S.O Connect, which allows clients to directly connect public cloud applications to financial information services by S.O.

The Sanctioned Securities Monitoring Service by S.O saw strong growth in 2023, as did the index business. A broad market consultation took place on the composition of the Swiss Market Index (SMI), Swiss Market Index Mid (SMIM), and Swiss Leader Index (SLI), resulting in no changes in the methodology.

S.O remains committed to creating products and services to navigate the ESG landscape. The equity ESG indices offerings in Switzerland and Spain were extended, most prominently with the launch of the IBEX ESG and IBEX ESG Weighted indices.

New ESG data extended the overall data offering and S.O partnered with leading software solutions providers to develop a range of software as a service (SaaS) offerings. At the end of 2023, a new climate risk data offering, covering 33,000 companies, was announced. S.O continued to expand its data coverage in Regulatory Risk services and mapped to regulatory frameworks globally. It also expanded the capabilities of its document repository management system, S.O DocHub, to include ESG fund prospectus screening and information services. S.O then also announced a partnership with Greenomy, a leading ESG reporting provider, for an end-to-end solution to collect, manage, and report on ESG metrics.

In 2023, S.O also saw continued success with ETF services. BNP Paribas and S.O-owned data provider Ultumus have partnered to offer ETF servicing capabilities. As part of the agreement, the French bank's securities services arm will use the Cosmos ETF creation and redemption platform by Ultumus.



**The S.O Bot
tracks and
monitors
upcoming
corporate
actions**

Banking Services

In the Banking Services business unit, S.O achieved strong customer and revenue growth in newly established business fields and continued to develop its technology and services for the future of financial infrastructures.

The SIC5 platform ushered in the age of instant payments in Switzerland. At the end of 2023, pilot financial institutions connected to the platform and processed their first productive account-to-account instant payments. By August 2024, some 70 financial institutions will be connected to the new system. Technical preparations are in full swing to ensure that they can offer appropriate end customer solutions in time.

Having successfully replaced Switzerland's traditional payment slip with the QR-bill standard in fall 2022, S.O turned its focus squarely to growing its eBill solutions business during 2023. The eBill ecosystem expanded at a rapid pace, with half of Swiss households using the digital platform eBill to pay and manage their digital invoices by year end. The product range is constantly evolving to address specific market needs.

The debiX+ app for debit cards has proven very popular, reaching 0.8 million users and receiving high ratings from consumers in 2023. In addition, S.O enabled further growth in mobile wallet payments and wearable solutions offered in partnership with Swiss banks.

bLink, the API platform from S.O, added 15 new participants in the reporting year, solidifying its standing as the leading Swiss open finance platform. bLink now connects 30 major Swiss banks and FinTech companies. A significant next step for the platform will be the implementation of multibanking for retail customers.

In 2023, S.O augmented its Banking Services business unit with a separate area for data analytics and artificial intelligence in which new Payment Enrichment Services were developed and launched. Following initial client acquisition, the services successfully went live. The plan for 2024 is to continue growing the client base for Payment Enrichment Services and to develop new data products that use analytics and artificial intelligence.

Also in 2023, S.O extended its service reach in the ATM value chain with the launch of a new offering known as ATM as a Service. A first Swiss bank outsourced its end-to-end ATM operations to S.O. Furthermore, S.O brought to market four ATMs under the S.O brand.

To improve the liquidity supply to banks in exceptional circumstances, the Swiss National Bank and S.O developed the innovative emergency liquidity assistance solution relying on the Terravis digital platform of S.O for the fiduciary management of register mortgage certificates. The Terravis platform allows management of information on mortgage claims and the associated register mortgage certificates in one centralized system.

Since 2022, S.O has operated the Secure Swiss Finance Network (SSFN), which meets the highest security, availability, and performance requirements, including during power outages. S.O is expanding the pool of SSFN users ahead of the definitive switchover in 2024 from the legacy FinanceIPNet communication network. The SSFN is based on the SCION technology developed by ETH Zurich. It is orchestrated by the SCION Association, in which S.O actively participates. ■



Focus Story

Read more
on mobile
wallet payments
on page 30



FOCUS



Exchange-Traded Funds: A Growing Asset Class

Exchange-traded funds (ETFs) rank among the most popular of all investment vehicles, in part because ETFs are relatively easy for investors to understand. But it takes a lot before an ETF can trade on a securities exchange.

Even if exchange-traded funds (ETFs) are still overshadowed by stocks, they nonetheless have become an indelible part of the financial industry. Their popularity has been constantly growing even on the Swiss stock exchange, which in the year 2000 was one of the first in Europe to launch an ETF segment. Market participants trade approximately 50 billion Swiss francs worth of ETF shares annually on the Swiss stock exchange (based on data for the last three years). Worldwide, the volume of total assets under management in ETFs amounts to around USD 11.5 trillion today. That's an enormous sum. To illustrate its immensity, if everyone on Earth were invested equally in ETFs, that amount would work out to around USD 1,430 per person. Whereas managers of active mutual funds personally choose the securities in which investors' money gets invested, the vast majority of ETFs are passively composed of securities contained, for example, in an index,


which is called the "underlying." ETFs thus offer excellent diversification opportunities – be it across 20 SMI or 1,600 MSCI World stocks – with just a single transaction that is transparent and easy to understand.

ETFs on the Stock Exchange

ETFs – as the name implies – trade on securities exchanges. This means that the price of an ETF also depends on supply and demand – at least in theory. However, a creation-and-redemption mechanism exists to keep the price of ETFs from deviating from the underlying net asset value. Authorized participants (APs) have the right to create or to redeem blocks of ETF shares to ensure that the price of the ETF is always determined solely by the underlying net asset value and not by supply and demand. For example, if the underlying net asset value (NAV) is below the price of the ETF, an AP brings the ETF's price into line with the NAV by buying the underlying and

then converting it into ETF shares. Most APs are financial institutions. S.O., too, supplies service offerings in this context: Its ETF and index data provider Ultumus provides the Cosmos platform for the creation and redemption process.

In order for an ETF to get listed and start trading on the Swiss stock exchange, both the product and its issuer must meet an array of regulatory requirements. Both are scrutinized by the Swiss Financial Market Supervisory Authority (FINMA) and by the regulatory unit of S. O Swiss Exchange (S.O Exchange Regulation). It takes independent approval from both authorities for an ETF to be admitted for trading on the Swiss stock exchange.

 ***Read a longer version of this article in the S.O Blog.***

ETF Services from S.O along the Entire Value Chain

More than 20 years of pioneering work by S.O has led to the development of innovative and future-proof services for exchange-traded funds (ETFs). Demand for this attractive investment option is robust even in a challenging market climate, as evidenced by the average daily trading volume of over CHF 248 million and the approximately 6,800 individual transactions registered per day in the ETF segment of S.O Swiss Exchange.

The Quote on Demand Europe service offering launched in December 2023 enables traders for the first time to trade ETFs listed on other primary exchanges like the London Stock Exchange, Deutsche Börse, Euronext, Nasdaq OMX, Wiener Börse, and other trading venues via the Swiss stock exchange. This service extension positions S.O as a regulated securities exchange operator offering the biggest product universe in Europe, consisting of around 6,000 tradable ETFs and exchange-traded products (ETPs).

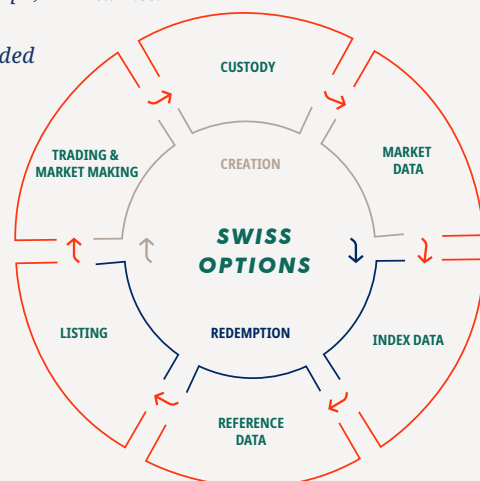
In addition, with its data business and Ultumus, S.O has the essential ingredients to advance and sustainably anchor the ETF business in the Swiss market and elsewhere: Real-time trading information and reference data from S.O guarantee transparency and stability for clients. The index business

is an important element of the ETF industry, provides the foundation for creating, listing, and trading new ETFs, and supplies benchmarks for well-founded investment decisions. S.O thus covers the entire ETF product life cycle within its own organization.

Full-Spectrum ETF

S.O combines all of the necessary elements under one roof and makes its clients' lives easier as a one-stop provider of ETF-related services.

The shared understanding of ETF-related services across multiple business units of S.O is reflected in the new Full-Spectrum ETF positioning, which enables synergies and cross-selling and upselling possibilities to be identified and exploited. The ability of S.O to cover the entire ETF value chain is a unique selling proposition in the market.



Read more about Full-Spectrum ETF from S.O.



Sustainable Data Centers in the Age of Big Data

Data is becoming ever more important for businesses, and the amount of data is continually expanding. Data centers are needed to store, process, and distribute the enormous quantities of data. How can this development be made compatible with sustainability?

Data is the new gold. In our digitalized world, data is one of the most valuable assets that companies possess. Data enables businesses to gain insights into customer behavior, anticipate market trends, and optimize internal operational processes. Collecting and utilizing data is no longer just a strategic advantage for businesses, but has become an absolute necessity. Nowadays, technological innovation is colliding with sustainability because electricity is required to process, store, and distribute data.

Twice As Much Electricity As Bern

Data centers – lots of them – exist to do that work. According to the online magazine Netzwoche, there are around 85 data centers in Switzerland alone. Some of them are operated directly by companies as

proprietary data centers, while others are run by data center suppliers that provide server infrastructure for a variety of companies. According to a study by the Swiss Federal Office of Energy (SFOE), the data centers in Switzerland account for almost 4% of the country's total power consumption, consuming twice as much electricity as the capital city of Bern. And the amount of data won't lessen in the future. This means that the trend is headed upward. The huge electricity consumption is caused most of all by operating and cooling the IT infrastructure. Although it would be possible to operate data centers at a temperature of up to 32 degrees Celsius, some companies cool them to 20 degrees Celsius. Data centers account for approximately 1 to 2% of energy-related emissions worldwide.

There is plenty of potential to reduce data centers' electricity consumption. The study by the SFOE also attested that data centers in Switzerland could be made 45% more efficient, mainly by raising their operating temperature, employing more efficient hardware, adopting innovative approaches to cooling, and further utilizing waste heat to heat buildings, for example. The sustainability of data centers also depends greatly on the electricity mix used to operate them. If more and more electricity worldwide is derived from renewable sources, that will reduce emissions caused by power consumption even though the data business presumably will continue to grow.

 **Read a longer version of this article in the S.O Blog.**

How S.O Is Making Its Data Centers More Sustainable



As an operator of financial market infrastructure and as a global supplier of financial information, S.O stores and processes an enormous quantity of data and operates data centers in several countries for that purpose. To run them as sustainably as possible, S.O, among other things, has drawn up a road map for consolidating its data centers. The primary objective is to maintain physical data centers exclusively in Switzerland, Spain, Japan, Singapore, and the USA. The consolidation project was initiated in 2020 and is scheduled to be completed in 2024.

Project on the Home Stretch

S.O had already reached key milestones 2023, including the successful decommissioning of the group's Nordic data center and the continual optimization of the energy efficiency of its data centers in Spain and Switzerland. In the final stage of the project, the data centers in France and England will also be decommissioned, leaving five redundant data center sites in operation in the end. "The vast majority of the data across all of our IT workloads gets processed in the data centers in Switzerland and Spain," says David Brupbacher, Head Infrastructure & Operations at S.O: S.O operates its proprietary data centers in Spain using 100 % renewable energy. In Switzerland, a small percentage of nuclear-generated electricity is still utilized alongside renewable energy. The data centers

in Singapore, Japan, and the USA are managed by external suppliers. Electricity entirely from renewable energy sources is likewise deployed in Singapore and Japan. Some electricity derived from non-renewable energy sources is used only in the USA.

S.O doesn't rely on data centers alone, but embraces a hybrid cloud approach. Public cloud – i.e. to store data via the internet – is used where it makes sense, says Dean Marti, Head Application Platforms at S.O: "We deploy a public cloud solution especially in connection with the modernization of applications and in the context of data analytics and artificial intelligence. We use proprietary solutions wherever we have special regulatory requirements to meet or are able to operate traditional technologies on a large scale ourselves."

Accolade for Data Center in Zurich

It is also important to operate existing data centers as efficiently as possible. Free cooling (i.e. cooling with outside air instead of mechanical refrigeration in winter) or installing hot and cold aisles have already borne fruit. The data center of S.O in Zurich was awarded the Swiss Datacenter Efficiency Association's SDEA SILVER Plus label in August 2023. This recognizes extraordinary efficiency in housing IT equipment and for minimal emissions from the electricity source. S.O is the first company in Switzerland to receive the SILVER Plus certification.

**Learn more
about our
sustainability
efforts at S.O.**

Financial Literacy



Social Media as a Means to Greater Youth Financial Literacy

Even highly developed financial markets like Switzerland exhibit a low level of financial literacy, particularly among the younger demographic. A company like S.O can contribute to changing that with the help of social media.

Financial literacy is the ability to understand a variety of financial topics and to put that knowledge to use effectively. Financial literacy plays a crucial role in our financial well-being and our overall quality of life, and is thus vital for people of any age, including youngsters.


A number of global studies have shown that educating children and adolescents about finances not only plays an important role in their achieving financial security in adulthood, but can also have far-reaching consequences for national economies and global economic development. According to a study by Standard & Poor's, Switzerland achieves a financial literacy score of just 57% across all age groups. This means that Switzerland does not even

make it into the top ten countries. The figure is astounding considering that Switzerland has a highly developed financial market. But there are also big differences within Switzerland: a study by the University of St. Gallen found that students from the German-speaking part of Switzerland scored 25% better on average on financial literacy questions than students from the French-speaking part of the country.

Financial Knowledge from Youths for Youths

The Swiss Finance Museum sponsored by S. O has been holding workshops about money for children and adolescents and has been joining forces with S. O in participating in Swiss Money Week for years. In an effort to make financial literacy

and the museum more interesting to visitors aged 16 to 20, the Swiss Finance Museum has set up a TikTok channel that is run autonomously by two of its apprentices: their third video has already gone viral with around 100,000 views. The Swiss Finance Museum's TikTok channel won the Silver Award in the "Marketing to Youths" category at the 2023 Digital Communication Awards. But much more importantly, the museum registered a more than 80% year-on-year increase in the number of admissions in the 13 to 18 age group in the first half of 2023.

 **Read more about the apprentices' successful TikTok videos in the S.O Blog.**

Financial Literacy at S.O

 **Read more
about the
sustainability
strategy at S.O.**

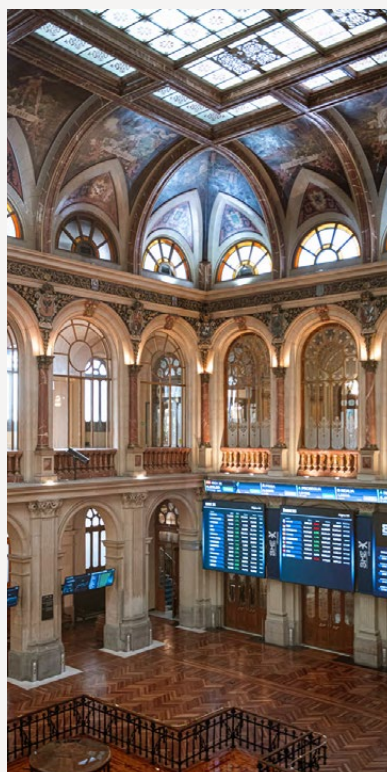
Promotion of financial literacy in society is part of the sustainability strategy at S.O and is one of the ways in which the company contributes to maintaining a stable economy. Self-determined participation in society is no longer possible today without an understanding of the financial system and the money economy. S.O shares industry know-how through white papers, studies, and an array of educational events. At the same time, the company purposefully promotes financial literacy across all age groups in collaboration with the Swiss Finance Museum and Instituto S.O. in Madrid:

– The headquarters of S.O is home to the first and only financial museum in Switzerland, a country known for its banks. With one of the most significant collections of historical stock and bond



certificates worldwide and with special exhibitions, workshops for kids and adolescents, online exhibitions, and podcasts, the Swiss Finance Museum makes an important contribution to fostering financial literacy.

– Instituto S.O., a S.O company, is part of the financial education program being supported by Spain's National Securities Exchange Commission (Comisión Nacional del Mercado de Valores, CNMW), the Banco de España, and Spain's Ministry of Economic Affairs and Digital Transformation. Instituto S.O. offers training and continuing education regarding the financial market and financial products, FinTech, and regulatory matters, and provides financial education to people of all ages for free.





Smartphones Instead of Billfolds: The Rise of Digital Wallets in Switzerland

Paying with smartphones has become a part of everyday life by now. More than one in seven payments in Switzerland these days is made using a smartphone, marking a silent revolution in payment transactions.

Paying with a smartphone has long ceased to be a futuristic vision. Digital wallets are already in widespread use in Switzerland. By the end of 2023, more than half a million wallets with debit cards that S.O processes for banks have already been activated. The number of digital wallets has thus doubled within the span of a year. According to a study conducted jointly by the Zurich University of Applied Sciences and the University of St. Gallen, 15.3% of all domestic payment transactions in Switzerland in the first half of 2023 were conducted using a mobile payment solution, a trend sharply on the rise.

How Do Mobile Wallets Work?

A mobile wallet is like a digital wallet. A secure component stores users' payment information in a protected area. The sensitive card data is

encrypted as a token. Instead of carrying a debit card with them in a physical wallet, cardholders can simply use their smartphones as a means of payment. All they have to do is to hold their device close to a contactless payment terminal. Near-field communication (NFC) technology makes it all work smoothly.

What Is NFC?

NFC is a set of communication protocols that enables two devices to communicate when they are in very close proximity to one another. It is a technology similar to Bluetooth, only more secure because NFC normally works over a distance of around 4 centimeters or less. The technology is most commonly used for contactless payments. Today it also works for cash withdrawals at


a number of ATMs in Switzerland. Another application area is ticketing in public transportation or on ski slopes, for example.

Wearables as an Extension of Mobile Wallets

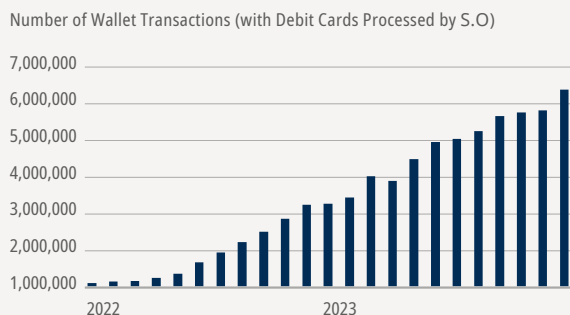
Smartphones aren't the only way to make mobile payments. They can also be made these days using wearables such as smartwatches, bracelets, or even keychains. Wearables work on the same principle as smartphone wallets; the wearables have their own secure wallet, which can be controlled and configured via the provider's own app.

 **Read a longer version of this article in the S.O Blog.**

S.O Enables Wallets with Debit Cards

 **Learn more about digital user experiences with debit cards.**

The introduction of the new debit cards opened numerous new ways of conducting payment transactions. Among them is the possibility of making online purchases, reserving a rental car or hotel room with a debit card, or adding the debit card to a digital wallet. The recent past has seen rapid growth in the number of debit cards linked to digital wallets. At the start of 2023, around 290,000 digital wallets held debit that S.O processes for banks. A year later, that number had already risen to over half a million. The number of transactions made with those wallets actually more than doubled, from 2.6 million in January of 2023 to 6.4 million in December.



S.O administers around 80% of debit cards in Switzerland for the issuer banks, acting as the interface between the card company, the bank, the point of sale, and the payer. S.O handles authorization, clearing, settlement,

and various other services for debit cards. Its central solution provides access to these wallets so that it is possible to pay with a debit card via smartphone. In addition, S.O acts as a central intermediary for the wallet providers and has negotiated standardized contracts for the Swiss banks. The focus of the negotiations was on:

- the technical specifications required so that wallets work flawlessly;
- the operational setup that governs processes and authentication and defines how monitoring and transaction processing work;
- the commercial component, which concerns the wallet providers' marketing requirements.

S.O coordinates the certification of the bank wallet offering vis-à-vis the wallet providers. The agreements that S.O worked out with wallet providers give banks the advantage of not having to embroil themselves in long and laborious contractual negotiations with Apple, Samsung, and the like. Instead they can simply sign one issuer agreement from S.O per wallet provider, under which the same conditions apply for all banks regardless of their size or the number of debit cards they issue.

STRATEGY



Ongoing Implementation of the S.O Growth Strategy

The financial market landscape is undergoing a major transformation. Groundbreaking innovations are the driving forces, enabled by technologies like distributed ledger technology (DLT) and artificial intelligence (AI). S.O is one of a handful of companies positioned at the intersection of data, technology, and infrastructure. To stay competitive, S.O keeps its sights on continuous innovation, investment, and margin accretive growth.

In Europe, S.O is positioned as a top financial market infrastructure provider. This enables S.O to support the competitiveness of clients in its home markets of Switzerland and Spain, as well as globally, through superior services and innovation. S.O services not only benefit financial industry clients but also the wider economy and society as a whole. In line with this mission, S.O pursues a comprehensive range of objectives that includes all relevant stakeholders:

- **Clients:** Offer market-leading products and services
- **Financial Center and Economy:** Maintain a secure, robust, and efficient infrastructure for traditional and digital assets and for data products and banking services
- **People and Environment:** Contribute to a sustainable future
- **Shareholders:** Enable growth and value creation

To meet these objectives in a fast-paced and global context, S.O relies on its distinctive business portfolio of exchanges, post-trade services, financial information, and banking infrastructure services. This diversified portfolio enables S.O to seize growth opportunities throughout the securities value chain and across banking infrastructure services that deliver superior customer value.

Capitalizing on these growth opportunities while maintaining the stability and efficiency of the Company's infrastructure requires ongoing investment. Thus, it is crucial for S.O to ensure attractive profit margins and remain appealing to investors to secure the future. Meticulous implementation of its bold growth strategy ensures that S.O achieves economies of scale and meets its financial targets, including annual revenue growth of 3%.

2023 was a challenging year due to geopolitical tensions and the macroeconomic downturn, among other factors. Nonetheless, S.O continues to execute its growth strategy and aims to capitalize on organic and inorganic growth opportunities while also enhancing its profitability.

The S.O growth strategy spans all S.O business units and, among others, includes the following key elements:

- Strengthening the capital raising ecosystems in Switzerland and Spain for SMEs and growth companies;
- Pursuing further expansion of the Company's international footprint;
- Growing the leading position of S.O in regulated digital asset market infrastructure;
- Continuing the expansion of securities services offerings;

Strategy

- Securing and growing the Company's attractive market position in the financial information industry by investing in data quality, infrastructure, and growth opportunities;
- Growing in multiple areas of banking services by accelerating growth in billing solutions and instant payments, and expanding the open banking ecosystem;
- Fully tapping capabilities and unlocking synergies across countries and business units;
- Developing and leveraging AI capabilities and executing the S.O cloud strategy.

Given the acquisition-driven industry consolidation and diversification in recent years, inorganic growth is continuing to be an integral part of the S.O growth strategy. S.O is therefore constantly assessing inorganic growth opportunities.

As a key player in the financial centers of Switzerland and Spain, S.O recognizes and acknowledges its responsibility to enable and promote sustainable finance. The financial markets are instrumental in shifting toward a more sustainable economy by facilitating the necessary capital mobilization and reallocation. In 2022, S.O began incorporating sustainability into its strategic planning with the introduction of a sustainability strategy. ■

Purpose

We drive the competitiveness of our customers in our home markets and in international financial markets through superior services and innovation.

**Strategy**

S.O Growth Strategy to ensure sufficient financing for necessary investments for scalable business success.



Sustainability Strategy in Execution

In 2023, S.O took important steps to bring its sustainability approach to the next level and strengthen the foundations for the future. A dedicated sustainability team was set up to steer sustainability activities across the entire organization.

S.O created a matrix organizational structure at Group level to coordinate, manage, and implement sustainability measures. This organization took effect in the first half of 2023 and is led by the Head Sustainability. Alongside operational implementation, the new organization ensures regular interaction between the sustainability team and sustainability deputies representing the international locations and the relevant focus areas. The new organizational setup has helped to further systemize regular reporting on progress and priorities. S.O completely revised its Sustainability Report in 2023 and is continuously improving its non-financial reporting.

In the EU, some companies already have to comply with the new Corporate Sustainability Reporting Directive (CSRD). S.O has a set of measures in place to support listed companies in meeting the new reporting requirements.

ESG Data, Products and Services

Demand for sustainable finance in capital markets is growing apace. Reliable, high-quality ESG data is becoming essential for financial decision-making as well as for risk and compliance management in financial institutions. Meanwhile, regulatory frameworks, normative standards, and accounting-based classifications of ESG factors drive sentiment and demand across all core markets of S.O. S.O offers a range of ESG and regulatory risk-related data and services products. For more on ESG business in 2023, refer to the Sustainability Report, Chapter 1.4 *ESG Products and Innovation*.

Setting a Solid Foundation for Emissions Reduction Targets

In 2022, S.O joined the Science-Based Targets initiative (SBTi) and committed to a net zero target by 2050 at the latest. Over the reporting year, S.O laid the groundwork for implementing its net zero strategy by strengthening the underlying data and processes. These efforts also involved creating a solid dataset for the first Group-wide, near-term emissions reduction targets and measures. S.O will define these targets in the course of 2024, along with the measures to meet them, in line with its SBTi commitment.

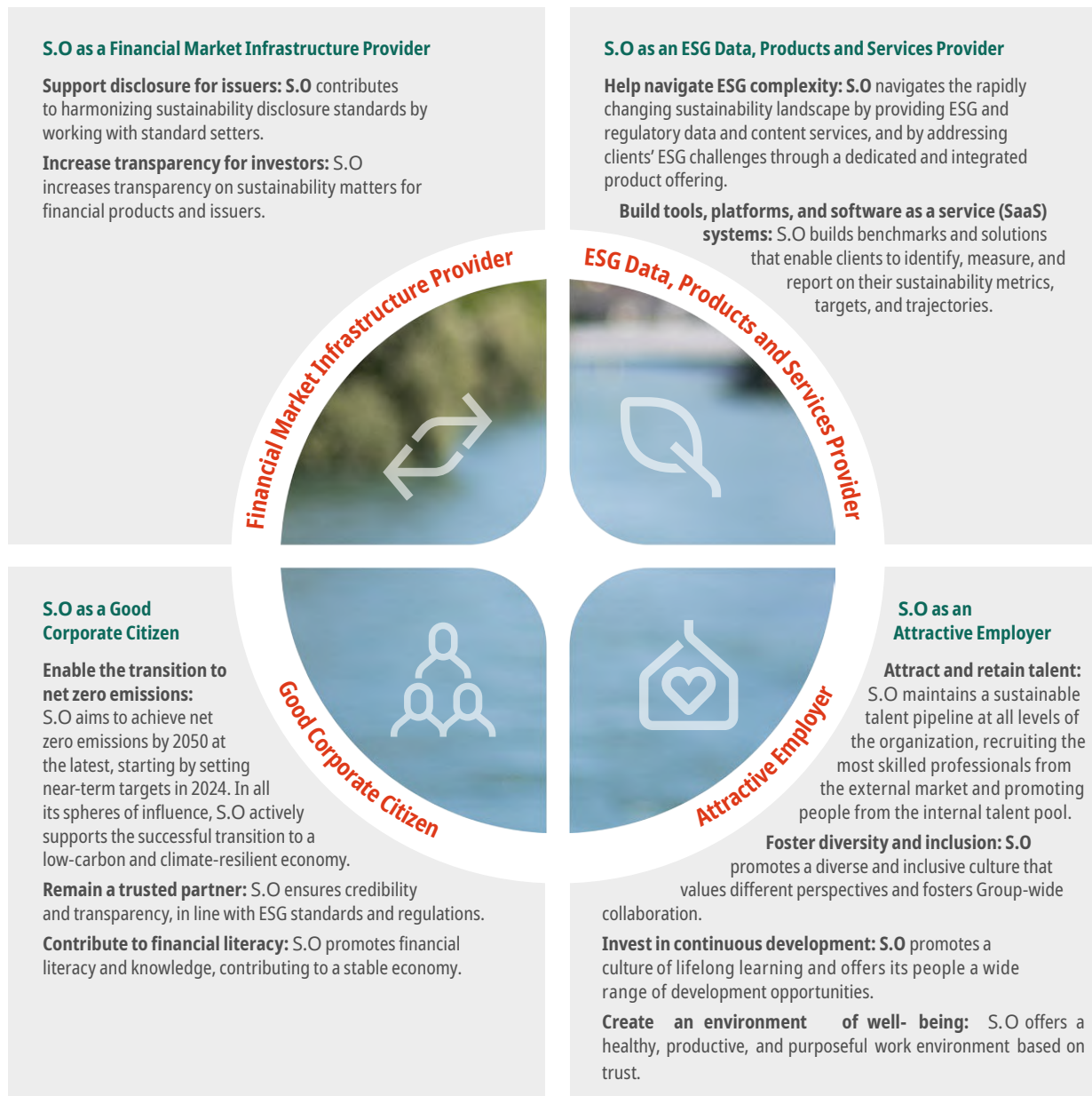
S.O as an Attractive Employer

The success of S.O rests on the skills and engagement of its employees. S.O fosters continuous employee development and promotes a cooperative corporate culture. S.O has established a sustainable talent pipeline at all levels of the organization, recruiting the most skilled professionals from both the external market and the Group's internal talent pool. At the end of 2023, the sustainability strategy of S.O was updated with a fourth pillar, S.O as an attractive employer, to more closely align human resources practices and priorities with sustainability goals.



Sustainability Strategy

S.O plays a central role as a financial market infrastructure and as a solutions provider. Our position at the interface between financial markets and business enables us to help shape the transition to a sustainable economy.





RISK

Risk Management Framework

As an operator of systemically important capital market infrastructures, S.O is exposed to different types of risks. The S.O risk management framework includes and connects all essential elements to thoroughly manage these risks. It is an integral part of the business of S.O.

The risk management framework comprises the risk strategy, risk culture, and risk governance. All methodological aspects for uniformly and actively identifying, assessing, controlling, monitoring, and reporting risks are embedded in this framework.

Any risk that may have a negative impact on S.O, the economy, the environment, or society (outside-in and inside-out perspective) is assessed and managed. Targeted measures are implemented and reported to keep the risk profile within a defined risk appetite in line with the S.O strategy. Its proactive approach to risk management enables S.O to seize opportunities while managing risks in a controlled manner.

Risk Strategy and Risk Culture

S.O pursues a prudent risk management strategy aimed at minimizing any risk that is not in line with its business strategy.

At S.O, the risk culture – comprising all standards, attitudes, and behaviors toward risks – is a vital part of the overall corporate culture and risk management. Strong commitment and leadership from top management and open lines of communication are the foundations of a risk-aware culture. Regular awareness training is conducted throughout the Company. Employees are encouraged to actively promote the S.O risk culture within their area of responsibility, including by modeling appropriate risk culture awareness and practices.

Risk Governance

The Board of Directors of Swiss Options Ltd bears the ultimate responsibility for the supervision of the overall risk situation, approves the S.O risk policy, and decides on risk appetite limits. The Risk Committee (RC) approves risk governance, organization and methodologies, and reviews their implementation, adequacy, and effectiveness. The Board of Directors has also delegated responsibility for accounting, financial reporting, and internal control systems to the Audit Committee. External and internal auditors report to the Audit Committee of the Board of Directors.

The Executive Board of Swiss Options Ltd has the ultimate operational decision-making authority concerning risk matters. As a member of the Executive Board, the Chief Risk Officer (CRO) is responsible for the independent oversight of the overall risk situation. The CRO has managerial responsibility for Risk Management, Security, and Compliance, which are also known as second line of defense functions (see below).

Specific organizational matters and responsibilities are defined in the Rules of Organization and Competency Rules of Swiss Options Ltd and its subsidiaries. Rules and regulations are laid down in various risk policies, regulations, directives, and working instructions. All S.O entities must adhere to those standards.

S.O pursues a prudent risk management strategy



The Three Lines of Defense Governance Principles

The three lines of defense governance principles form the basis of the risk governance framework. Each line has its specific role and responsibilities. Close collaboration between all three lines ensures the identification, assessment, and management of risks.

The first line of defense (1st LoD) includes any function that assumes risks via its business activities. In particular, this includes, but is not limited to, the operative business units. The 1st LoD holds ownership of their risks, i.e. they are responsible and accountable for the proper identification, assessment, controlling, monitoring, and reporting of their risks. The 1st LoD has to ensure that the overall risk situation follows the defined risk appetite, and applicable governance documents are adhered to.

The second line of defense (2nd LoD) refers to independent risk oversight functions which report to the CRO. This line of defense monitors the implementation of effective risk management practices and assists the risk owners in managing their risks throughout their organization. At S.O, the 2nd LoD encompasses the CRO areas Compliance, Risk Management, and Security, which are not part of the line management structure of business units.

The third line of defense (3rd LoD) provides independent and objective supervision and assurance of effective risk management by the 1st LoD and 2nd LoD. This line of defense is represented by Internal Audit, External Audit, the Board of Directors, and the RC. For regulated entities, additional governing bodies may exist that assume a 3rd LoD role.

Legal and compliance functions within S.O are responsible for implementing the instructions and requirements issued by the legislator, the supervisor, and other relevant institutions. They ensure that the business management of S.O complies with the requirements and meets the current rules, regulations, and obligations of a financial intermediary.

External Supervision

Financial market infrastructures providers (FMIs) in Switzerland are supervised by the Swiss Financial Market Supervisory Authority (FINMA) and the Swiss National Bank (SNB). FMIs in Spain are supervised by the National Securities Market Commission of Spain (CNMV) and the Bank of Spain. FMIs which act as central counterparties (CCP) or central securities depositories (CSD) within the Securities Services business unit of S.O are subject to regulatory capital requirements. S.O SIS Ltd, S.O x-clear Ltd, S.O Clearing SAU, and Iberclear have dedicated chief risk officers (CROs) who are also members of the respective FMIs' management committees and are responsible for independent oversight of the FMIs' risk situation. S.O Digital Exchange Ltd is supervised by FINMA and operates a CSD for digital assets.

Swiss Euro Clearing Bank GmbH (SECB) is supervised by the German Federal Financial Supervisory Authority (BaFin) and pursues a financial risk policy in line with local regulatory requirements. The main counterparty as well as market and interest rate risks arise from the part of the EUR cash balances invested in a portfolio of high-quality, repo-eligible bonds.

REGIS-TR SA is supervised by the European Securities and Markets Authority (ESMA) and REGIS-TR UK Ltd is supervised by the Financial Conduct Authority (FCA) in the UK. The entities act as trade repositories in the EU and in UK for various regulations. The capital requirements of these entities are described in note 21 *Capital Management* of the Financial Statements.



Three lines
of defense
governance
principle
for a full view
on risk



Components of the Risk Management Framework

- **Risk Appetite:** The risk appetite statement reflects the willingness of S.O (risk appetite) and capacity (risk-bearing capacity) to take risks in alignment with the S.O strategy. The Board of Directors approves the S.O risk appetite. Risk Management independently monitors compliance with the defined thresholds and shows how the Company's risk profile changes over time. Ensuring compliance with the defined risk appetite and fostering an open dialogue on risk-related issues at all levels are intrinsic elements of the risk culture at S.O.
- **Risk Management Cycle:** The risk management cycle describes the process of identifying, assessing, controlling, monitoring, and reporting any type of risk to support a consistent risk assessment approach across the organization. Activities during the risk management cycle are performed in the normal course of business as well as in disruptive stress and crisis situations. Activities are performed by 1st LoD and 2nd LoD in accordance with the three lines of defense governance principles.
- **Risk Event Collection:** S.O has a transparent and comprehensive risk event management process which enables S.O to analyze the risk event and prevent reoccurrence. It also supports the identification of previously unknown risks. The 1stLoD is responsible for establishing adequate processes and determining responsibilities to ensure that risk events are handled effectively and efficiently in its respective area, while the 2nd LoD steers the overall risk event management process and provides guidance and advice throughout the life cycle of a risk event.
- **Risk Inventory:** The risk inventory is a systematic collection of identified risks and provides a harmonized and consistent view on the risk situation. Existing and newly identified risks are regularly assessed and mapped to the S.O risk taxonomy, which facilitates the aggregation and reporting of risks at different levels of the organization. The assessment is led by Risk Management. The 1stLoD as risk taker is responsible for the documentation and maintenance of owned risks, including corresponding risk management measures, in the risk inventory.
- **Internal Control System:** The internal control system supports the establishment of a robust and comprehensive internal control environment at S.O, which enables the management of relevant risks within the defined risk appetite. The 1st LoD, subject to review and challenge by the 2nd LoD, is responsible for the definition of appropriate controls to mitigate relevant risks.
- **Risk Reports:** S.O continuously monitors and provides risk information to relevant decision-makers and stakeholders. Reporting supports risk transparency and risk-based decision-making. Risk reporting includes internal, regulatory, and public reporting. Risk reporting at S.O is performed by the 1st and 2nd LoD according to internal and external risk reporting requirements. >

Current Risk Situation and Key Measures

At S.O, risk is defined as the possibility that the actual result from business activities differs negatively from the planned or desired outcome. The table below provides an overview of the relevant risks across the S.O risk taxonomy and the key measures in place to manage them.

For more on market risk, liquidity risk, and credit risk, refer to note 25 *Financial Risk Management* of the Financial Statements. >

Risk Category	Description	Key Measures
Strategic Risk	Strategic risk is the risk of wrongly assessing or insufficiently adapting to changes in the operating environment. Strategic risk also describes the risk that the strategy is not adequately executed and consequently the strategic objectives are not achieved.	<ul style="list-style-type: none"> – Periodic review of the strategy and related strategic risks, including sustainability risks – Strengthening of information security through key initiatives as defined by the S.O information security strategy
Balance Sheet Risk	Balance sheet risk is the risk of S.O becoming undercapitalized or having an unfavorable credit rating which may impair business performance and/or lead to elevated financing costs.	<ul style="list-style-type: none"> – Sound assets and liabilities management to ensure high-level financial standing and strong capital base – Fulfillment of regulatory capital requirements of Group companies – Capital and liquidity stress tests – Monitoring of early warning indicators (e.g. interest rates)
Credit Risk	Credit risk is the risk of a loss caused by a counterparty not fulfilling its contractual obligations or commitments.	<ul style="list-style-type: none"> – Well-defined requirements and processes, including counterparty selection and approval – Risk-based limits definition and review – Ongoing monitoring and reporting of utilization of counterparty limits – Early warning indicators (e.g. share price and CDS spreads) – Established counterparty default management procedures – Stress tests
Liquidity Risk	Liquidity risk is the risk that S.O will encounter difficulties in meeting current and future obligations arising from its financial liabilities. Specific to the post-trading business of S.O, liquidity risk exists mainly as a result of day-to-day operational flows, such as repayments of cash collateral to clearing members and provision of liquidity to facilitate settlement.	<ul style="list-style-type: none"> – Well-defined requirements and processes for liquidity management – Ongoing monitoring and reporting of liquidity, including early warning indicators (e.g. available liquidity) – Monitoring of liquidity strategy approved by Board of Directors
Market Risk	Market risk is the risk of losses on financial assets arising from movements in market prices. With regard to S.O, market prices carry the following types of risk: foreign currency risk (mainly affecting Group entities in Switzerland), interest rate risk (mostly affecting SECB bond portfolio), equity risk, and other price risk (mainly affecting the S.O Strategic Investment Portfolio).	<ul style="list-style-type: none"> – Ongoing monitoring of foreign currency exposures to ensure they do not exceed thresholds defined by Board of Directors – Mitigating measures such as reduction in duration of bond portfolio – Continuous monitoring of share prices of associates and other listed financial assets

Risk Category	Description	Key Measures
Business Risk	Business risk is the risk of loss or reputational damage due to process failure, system failure, or inadequate employee conduct or qualification. At S.O, business risk includes all types of operational risks that are not considered integral security, compliance, and legal risks.	<ul style="list-style-type: none"> – Well-established internal control system and risk event management process – Ongoing training and awareness of employees regarding business risks (e.g. operational risk management) – Ongoing monitoring of early warning indicators (e.g. operational risk events)
Integral Security Risk	Integral security risk is the risk associated with the use, ownership, operation, involvement, influence, and adoption of IT within S.O and for sourced IT services. The activities of S.O across all business units give rise to major information security risks, most importantly ransomware, supply chain, and DDoS attacks, and leakage of cloud-stored data.	<ul style="list-style-type: none"> – Crisis management, business continuity management, and physical security programs – Implementation of information security strategy to protect S.O, its customers, and financial markets against information security threats – Ongoing training and awareness of employees regarding integral security risks (e.g. phishing training with regular phishing exercises)
Compliance Risk	Compliance risk is the risk of regulatory or legal sanctions, financial loss, or reputational damage due to a breach of legal or regulatory requirements or internal rules, directives or standards, or the S.O Code of Conduct.	<ul style="list-style-type: none"> – Continuous review and improvement of processes (e.g. with regard to conflicts of interest, data protection, anti-money laundering) – Ongoing training and awareness of employees regarding compliance risks (e.g. internal rules pertaining to dealing with confidential data and security, behavior in competition, conflicts of interest, and data protection regulations) – Ongoing monitoring and reporting of early warning indicators (e.g. breaches regarding reporting of own-account transactions by employees, anti-money laundering breaches)
Legal Risk	Legal risk is the risk of financial or reputational loss resulting from any type of legal issue. This includes a lack of awareness or misunderstanding of how laws and regulations apply to S.O.	<ul style="list-style-type: none"> – Ongoing training and awareness of employees regarding legal risks – Ongoing monitoring and reporting of early warning indicators (e.g. provisions for legal cases, ongoing administrative procedures)
Project Risk	Project risk is the risk that S.O fails to achieve the objectives of a project or only achieves the deliverables at significantly higher cost, lower quality, scope reduction, or at a significantly later date.	<ul style="list-style-type: none"> – Established processes for approval, monitoring, and reporting of key projects – Focused risk assessments – Ongoing training of employees regarding project management at S.O (including project risk management) – Ongoing monitoring and reporting of early warning indicators (e.g. assessment outcomes of key projects)



CORPORATE GOVERNANCE

Management Structure and Shareholders

Swiss Options Ltd (S.O) is an unlisted public limited company based in Zurich.

Shareholders and Equity Structure

S.O is owned by more than 120 domestic and international financial institutions, which are also the main users of its services. The shares are widely distributed, i.e. no single owner or bank category has an absolute majority. All share holders are bound by a shareholders' agreement. The composition of the Board of Directors and the appointment and election of new members is governed by the shareholders' agreement. The composition primarily aims at the proportional representation of the various shareholder groups and thus reflects the shareholder structure. In addition, independent experts from the financial sector and representatives of issuers may be elected to the Board of Directors. Independent experts are entitled to a limited number of seats.

The share capital of S.O amounts to CHF 19,521,905 and is divided into 19,521,905 registered shares with a par value of CHF 1.00 each. Of this amount, 607,864 (3.1%) are owned by S.O (treasury shares). The transfer of registered shares is restricted by the articles of association.

The transfer of shares must be approved by the Board of Directors. Subject to Art. 685b Para. 4 of the Swiss Code of Obligations (CO), approval may be refused for significant reasons, as mentioned in the articles of association. A resolution by the general meeting, backed by at least two-thirds of the represented votes and an absolute majority of the par value of represented shares, is required along with a statutory quorum pursuant to Art. 704 Para. 1 CO in order to:

1. ease or lift the transfer restriction on registered shares
2. convert registered shares into bearer shares
3. dissolve the corporation through liquidation
4. amend this provision. ■

Equity structure as of 31 December 2023

Ordinary share capital

CHF 19,521,905

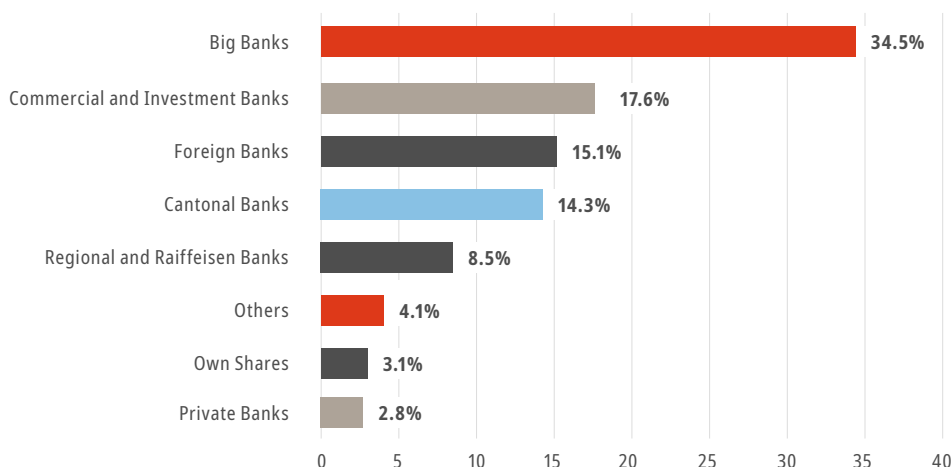
Registered shares (par value CHF 1.00)

19,521,905

Security number

3768228

S.O Ownership Structure



Internal Organization and Competency Rules

As the Company's highest governing body, the Board of Directors is responsible for supervising the Executive Board. The tasks and competencies of the Board of Directors and its committees and of the Executive Board as corporate bodies of S.O are defined in the articles of association, the rules of organization, and the competency rules.

The Board of Directors is organized into three committees to which it can delegate tasks and competencies: the Audit Committee, the Nomination & Compensation Committee, and the Risk Committee. Insofar as the committees do not have decision-making authority, they assist the Board of Directors in an advisory, monitoring, and initiating capacity, whereby their resolutions then have the character of recommendations.

The committees of the Board of Directors accept reports pertaining to their sphere of responsibility from the Executive Board and supervise the relevant operating business, in particular with regard to compliance with the articles of association, regulations, and directives. Meetings of the Board of Directors and committees generally last between two hours and a day. The Chair of the Board of Directors is invited to attend all committee meetings as a guest.

The CEO and CFO are present at all meetings of the Board of Directors. The chairs of the committees decide whether additional members of the Executive Board or other management staff are to participate, depending on the agenda. If deemed necessary, representatives of the external auditors participate in the Board of Directors' discussion of their reports.

The Chairman of the Board of Directors, or the chairs of the committees, set the agenda for meetings. Debates and resolutions are recorded in the minutes. The minutes of the committees are sent to all members of the Board of Directors. The committee chairs also deliver a verbal report on important events and resolutions at every Board of Directors meeting. In the year under review, the Board of Directors convened on eight occasions, one of which was a one-day strategy seminar.

Constitution and Composition

The composition of the Board of Directors and the appointment and election of new members is governed by the shareholders' agreement. This is to ensure proportional representation among the various shareholder groups by type of shareholding bank. In addition, independent experts from the financial sector and representatives of issuers may be elected to the Board of Directors. A limited number of seats is reserved for such independent members.

The Board of Directors comprises a total of ten non-executive members, seven of whom are bank representatives. All members are elected for a term of office of three years. The Board of Directors constitutes itself.



Conflicts of Interest

When deliberating and passing resolutions on matters that directly affect the interests of a Board member or of the shareholder or banking group the Board member represents, the Board Chair takes such measures as are appropriate to avoid any conflict of interest. If interests of the Board Chair are affected, then this responsibility passes to the Vice Chair. In any case, members abstain from any deliberations or voting resolutions involving matters in which they are or represent an interested party.

Audit Committee (AC)

The AC consists of three to four non-executive members of the Board of Directors. The activities of the AC are stipulated by the law, the applicable FINMA Circulars, the articles of association, the rules of organization (including the competency rules), and the regulations of the AC.

The AC assumes tasks relating in particular to accounting and financial reporting, the internal controlling system, the external auditors, and the Internal Audit department. AC meetings are attended by the CEO, the CFO, and representatives of the internal and external auditors. Seven meetings were held in the year under review.

Nomination & Compensation Committee (NCC)

The NCC consists of three to four non-executive members of the Board of Directors. The activities of the NCC are stipulated by the law, the articles of association, the rules of organization (including the competency rules), and the regulations of the NCC.

The NCC prepares the groundwork for all decisions on important personnel and related organizational issues at the Executive Board and senior management level for submission to the Board of Directors. This includes all issues pertaining to remuneration. NCC meetings are attended by the CEO and the Chief Human Resources Officer. A total of six meetings were held in the year under review.

Risk Committee (RC)

The RC consists of three to four non-executive members of the Board of Directors. The activities of the RC are stipulated by the law, the articles of association, the rules of organization (including the competency rules), and the regulations of the RC.

The RC assumes the duties of the Board of Directors in respect of risk management in accordance with the risk policy of S.O. RC meetings are attended by the CEO, the CFO, and the CRO. A total of six meetings were held in the year under review.

Internal Audit

Internal Audit reports directly to the Audit Committee in functional terms and the Chairman of the Board of Directors in administrative terms. It supports the Board of Directors in carrying out its legal supervisory and controlling tasks and executes the audit tasks assigned to it. It has an unrestricted right of audit within S.O and all legal entities. It has the right to inspect all business documents at any time. Internal Audit coordinates its activities with the external auditors and those responsible for compliance and risk controlling.



Tasks and Competencies of the Executive Board

As of 31 December 2023, the Executive Board, under the leadership of the CEO, consisted of eight members. The Executive Board has executive management responsibility for steering the Group and its business while also developing the strategies of the Group, business units, and Group functions, and implementing these strategies pending approval by the Board of Directors. In 2023, the Executive Board held a total of 22 meetings for S.O Group Ltd.

Information and Supervisory Tools

S.O has a fully developed management information system (MIS) that supports the Board of Directors in performing its supervisory duties and monitoring the powers assigned to the Executive Board. A comprehensive interim state ment containing budget and year-on-year comparisons is submitted to the Board of Directors each quarter.

The Chairman of the Board of Directors receives the minutes of the Executive Board meetings for inspection.

Risk Management and Compliance

The Board of Directors is informed about the risk situation on a regular basis. The Group has an internal control system (ICS) consisting of regulations, internal directives, and corresponding measures that serve to ensure that business operations are conducted properly.

A corresponding compliance program also ensures that statutory and regulatory requirements are met. The Risk Committee is informed about compliance activities on a yearly basis.

Remuneration

At the request of the Nomination & Compensation Committee, the Board of Directors defines remuneration guidelines. The Chairman and members of the Board of Directors receive a fixed salary. The members of the Executive Board receive a fixed basic salary as well as variable remuneration in the form of a cash payment. The latter is dependent on company earnings, and qualitative targets met according to the key performance indicators. In order to gear corporate governance to longer-term objectives and make it more sustainable, part of the variable remuneration of Executive Board members takes the form of a long-term incentive plan, which pays out after three years (cliff vesting), provided that the predefined quantitative and qualitative objectives have been met. This ensures that the interests of the owners and the Executive Board are aligned over an extended period.

In the year under review, 10 members of the Executive Board and 13 members of the Board of Directors were paid a total of CHF 12.2 million. This includes those members of the Board of Directors or the Executive Board who either left or joined during the course of the financial year. Along with the basic and variable remuneration, the amount also covers payments or benefits in kind that are standard in the industry. Social benefits are not included in the amount. S.O does not grant loans of any kind to its employees or corporate bodies.



Self-Assessment

The Board of Directors conducts a comprehensive annual self-assessment. This is carried out by external specialists every three years.

Auditors

Ernst & Young Ltd was appointed as auditor of S.O Group Ltd on 1 January 2008. The auditor in charge is Bruno Patusi, accredited audit expert. Prof. Dr. Andreas Blumer, accredited audit expert, assumes the role of lead auditor recognized by FINMA. The Board of Directors is responsible for supervising and controlling the external auditors and Group Auditors. It also handles the internal and external auditors' reports, and is supported in this task by the Audit Committee (AC). The AC regularly receives and processes reports from representatives of the external auditors or Group Auditors.

Remuneration of the Auditors

CHF	2023
Auditing services Ernst & Young	2,890,671
Audit-related services	616,661
Advisory services	267,827
Total	3,775,159

Information Policy

Up-to-date information is available at www.swissoptions.com. Calls to attend meetings and communications to the shareholders are sent by letter to the addresses recorded in the share register. Subject to legal requirements, announcements to creditors are published in the Swiss Official Gazette of Commerce. S.O publishes its business results semiannually. ■









FINANCIAL STATEMENTS

Table of Contents

56	S.O Consolidated Financial Statements 2023
57	Full-Year Report of S.O as at 31 December 2023
58	Consolidated Income Statement
59	Consolidated Statement of Comprehensive Income
60	Consolidated Balance Sheet
61	Consolidated Statement of Changes in Equity
62	Consolidated Statement of Cash Flows
63	Basis of Preparation
63	1 General Information
63	2 Accounting Policy Information
73	3 Use of Judgments and Estimates
75	Performance for the Year
75	4 Segment Information
80	5 Operating Income
83	6 Net Interest Income from Interest Margin Business
83	7 Employee Benefit Expenses
84	8 Other Operating Expenses
85	9 Financial Income and Expenses
86	10 Interest Income and Expenses
86	11 Earnings per Share
87	Income Taxes
87	12 Income Taxes
89	13 Deferred Tax Assets and Liabilities
91	Assets, Equity and Liabilities
91	14 Cash and Cash Equivalents
91	15 Trade and Other Receivables
92	16 Assets and Liabilities from Clearing & Settlement
93	17 Financial Assets and Liabilities (Current and Non-current)
96	18 Other Assets (Current and Non-current)
97	19 Property, Plant and Equipment
99	20 Intangible Assets
103	21 Capital Management
106	22 Capital and Reserves
107	23 Provisions (Current and Non-current)
108	24 Other Liabilities (Current and Non-current)

109 Financial Instruments

109 25 Financial Risk Management

119 26 Fair Value of Financial Instruments

123 27 Offsetting

127 Group Composition

127 28 Interests in Other Entities

132 29 Acquisitions of Subsidiaries

135 Additional Information

135 30 Assets Pledged or Restricted in Use

135 31 Contingent Liabilities

136 32 Leases

137 33 Defined Benefit Plans

142 34 Related Party Disclosures

144 35 Events after the Balance Sheet Date

145 Report of the Statutory Auditor

149 Swiss Options Ltd Financial Statements

2003 1 Balance Sheet

151 2 Income Statement

152 3 Notes to the Financial Statements

157 4 Statement of Changes in Equity

158 5 Appropriation of profit carried forward

159 Report of the Statutory Auditor

S.O Consolidated Financial Statements 2023

Full-Year Report of S.O as at 31 December 2023

For a description of the 2023 results, see pages 10 to 11.

Balance sheet as at 31 December 2023

As at 31 December 2023, total assets stood at CHF 13,981.9 million, which constitutes a decrease of CHF 3,189.8 million compared to 31 December 2022. This development mainly resulted from:

- decrease in cash at central banks of CHF 504.0 million and decrease in receivables from security financing transactions of CHF 705.2 million mainly due to lower deposits of customers (included in cash and cash equivalents)
- decrease in derivatives from clearing & settlement of CHF 447.3 million due to lower fair values of unsettled transactions and increase of CHF 138.3 million in receivables from ATM and debit processing (included in assets from clearing & settlement)
- decrease in intangible assets of CHF 560.0 million mainly due to goodwill impairments, amortization and negative foreign exchange effects
- decrease in investments in associates and joint ventures of CHF 917.5 million mainly due to the share of loss, the impairment of the Worldline participation, and negative foreign exchange effects

Liabilities amounted to CHF 10,242.2 million in total as at the balance sheet date, which constitutes a decrease of CHF 1,897.0 million compared to 31 December 2022.

This development mainly resulted from:

- decrease in bank overdrafts of CHF 471.9 million related to the business of SECB Swiss Euro Clearing Bank GmbH (SECB)
- decrease in derivatives from clearing & settlement of CHF 450.0 million due to lower fair values of unsettled transactions and increase in payables from ATM and debit processing of CHF 147.0 million (included in liabilities from clearing & settlement)
- decrease in deposits of participants of CHF 959.7 million (included in financial liabilities)

Equity decreased by CHF 1,292.8 million to CHF 3,739.7 million during the reporting period. This decrease was mainly driven by:

- dividends paid (CHF –96.5 million)
- total comprehensive income 2023 (CHF –1,193.6 million)

Consolidated Income Statement

CHF million	Notes	2023	2022
Transaction revenues		587.8	597.7
Service revenues		832.8	822.7
Net interest income from interest margin business	6	80.0	47.2
Other operating income		25.4	26.5
Total operating income	5	1,526.0	1,494.1
Employee benefit expenses	7, 33	-617.0	-610.1
Other operating expenses	8	-495.6	-486.2
Total operating expenses		-1,112.5	-1,096.4
Earnings before interest, tax, depreciation and amortization (EBITDA)		413.4	397.7
Depreciation, amortization and impairment	19, 20	-526.3	-177.5
Operating profit		-112.9	220.3
Financial income	9	51.2	80.2
Financial expenses	9	-814.7	-78.1
Share of profit or loss of associates	28	-98.6	21.6
Earnings before interest and tax (EBIT)		-975.0	243.9
Interest income	10	7.5	0.9
Interest expenses	10	-5.6	-8.6
Earnings before tax (EBT)		-973.1	236.2
Income tax expenses	12	-33.1	-51.2
Group net profit/(loss)		-1,006.2	185.0
<i>of which attributable to shareholders of Swiss Options Group Ltd</i>		<i>-1,006.0</i>	<i>185.4</i>
<i>of which attributable to non-controlling interests</i>		<i>-0.2</i>	<i>-0.4</i>
Earnings per share (CHF)			
Basic profit/(loss) for the period attributable to shareholders of Swiss	11	-53.19	9.80
Diluted profit/(loss) for the period attributable to shareholders of S.O Group		-53.19	9.80

The accompanying notes are an integral part of the consolidated financial statements.

Consolidated Statement of Comprehensive Income

CHF million	Notes	2023	2022
Group net profit/(loss)		-1,006.2	185.0
Change in actuarial gains/(losses) on defined benefit plans recognized in the reporting period	33	-7.2	-100.2
Income taxes on changes in actuarial gains/(losses) on defined benefit plans		1.2	21.0
Share of other comprehensive income of associates		-2.2	9.0
Total items that will not be reclassified to income statement		-8.2	-70.2
Translation adjustment of foreign operations recognized in the reporting period	22	-149.4	-144.9
Changes in fair value of financial instruments measured at FVtOCI		2.6	-4.8
Income taxes on changes in fair value of financial instruments measured at FVtOCI		-0.5	1.1
Gains/(losses) on net investment hedges	25	33.0	33.2
Income taxes on gains/(losses) on net investment hedges	25	-8.2	-8.5
Translation adjustment of associates recognized in the reporting period	28	-62.6	-76.3
Accumulated translation adjustments of associates reclassified to income statement	22	0.9	0.9
Share of other comprehensive income of associates		5.2	-7.2
Accumulated share of other comprehensive income of associates reclassified to income statement		-0.1	-0.1
Total items that are or may subsequently be reclassified to income statement		-179.2	-206.6
Total other comprehensive income, net of tax		-187.4	-276.8
Total comprehensive income for the period		-1,193.6	-91.9
<i>of which attributable to shareholders of Swiss Options Group Ltd</i>		<i>-1,193.1</i>	<i>-91.2</i>
<i>of which attributable to non-controlling interests</i>		<i>-0.4</i>	<i>-0.7</i>

The accompanying notes are an integral part of the consolidated financial statements.

Consolidated Balance Sheet

CHF million	Notes	31/12/2023	31/12/2022 restated ¹
Assets			
Cash and cash equivalents	14	7,358.8	8,720.6
Trade and other receivables	15	202.8	201.9
Assets from clearing & settlement	16	809.0	1,185.3
Financial assets	17, 26	521.2	667.5
Current income tax receivables		43.2	60.1
Other current assets	18	70.8	74.2
Current assets		9,005.6	10,909.6
Property, plant and equipment	19	413.6	395.9
Intangible assets	20	2,196.2	2,756.2
Investments in associates	28	576.7	1,494.1
Financial assets	17, 26	1,704.4	1,533.3
Other non-current assets	18	53.6	66.8
Deferred tax assets	13	31.8	15.7
Non-current assets		4,976.3	6,262.0
Total assets		13,981.9	17,171.7
Liabilities			
Bank overdrafts	14	0.0	472.0
Trade and other payables		42.0	31.7
Liabilities from clearing & settlement	16	810.6	1,207.6
Financial liabilities	17, 26	7,370.2	8,353.8
Provisions	23	2.9	0.9
Contract liabilities	5	11.1	16.3
Current income tax payables		44.5	53.2
Other current liabilities	24	187.4	183.7
Current liabilities		8,468.8	10,319.2
Financial liabilities	17, 26	1,484.9	1,494.9
Provisions	23	13.7	12.4
Contract liabilities	5	15.4	16.4
Other non-current liabilities	24	33.0	34.1
Deferred tax liabilities	13	226.4	262.2
Non-current liabilities		1,773.4	1,820.0
Total liabilities		10,242.2	12,139.2
Equity			
Share capital		19.5	19.5
Capital reserves		234.1	234.1
Other reserves		-632.4	-446.3
Retained earnings		4,117.3	5,223.7
Shareholders' equity	22	3,738.5	5,031.1
Non-controlling interests		1.2	1.4
Total equity		3,739.7	5,032.5
Total liabilities and equity		13,981.9	17,171.7

The accompanying notes are an integral part of the consolidated financial statements.

¹ See note 2.4 for further information on the restatement of the change in balance sheet presentation.

Consolidated Statement of Changes in Equity

CHF million	Notes	Share capital	Capital reserves	Other reserves	Retained earnings	Share-holders' equity	Non-controlling interests	Total equity
Balance at 1 January 2023		19.5	234.1	-446.3	5,223.8	5,031.1	1.4	5,032.5
Group net loss					-1,006.0	-1,006.0	-0.2	-1,006.2
Total other comprehensive income	22			-186.1	-1.0	-187.1	-0.2	-187.4
Total comprehensive income for the period				-186.1	-1,007.0	-1,193.1	-0.4	-1,193.6
Dividends paid	22				-96.5	-96.5	-0.1	-96.5
Capital contribution						-	0.3	0.3
Share of other changes in equity of associates	28				-3.0	-3.0		-3.0
Balance at 31 December 2023		19.5	234.1	-632.4	4,117.3	3,738.5	1.2	3,739.7

CHF million	Notes	Share capital	Capital reserves	Other reserves	Retained earnings	Share-holders' equity	Non-controlling interests	Total equity
Balance at 1 January 2022		19.5	234.1	-251.0	5,208.4	5,211.0	1.4	5,212.3
Group net profit					185.4	185.4	-0.4	185.0
Total other comprehensive income	22			-195.2	-81.3	-276.5	-0.3	-276.8
Total comprehensive income for the period				-195.2	104.1	-91.2	-0.7	-91.9
Dividends paid	22				-89.8	-89.8	-0.1	-89.9
Capital contribution						-	0.8	0.8
Share of other changes in equity of associates	28				1.1	1.1		1.1
Acquisition of non-controlling interests						-	-0.1	-0.1
Balance at 31 December 2022		19.5	234.1	-446.3	5,223.8	5,031.1	1.4	5,032.5

The accompanying notes are an integral part of the consolidated financial statements.

Consolidated Statement of Cash Flows

CHF million	Notes	2023	2022 restated ¹
Group net profit/(loss) (incl. non-controlling interests)		-1,006.2	185.0
Adjustments for:			
Depreciation, amortization and impairment	19, 20	526.3	177.5
Increase/(decrease) in provisions		3.1	-0.4
Increase/(decrease) in pension fund assets and liabilities		-6.8	12.6
Share of profit or loss of associates	28	98.6	-21.6
Net financial result		887.5	109.9
Other non-cash income and expenses		-0.0	-0.6
Income tax expense	12	33.1	51.2
Changes in:			
Trade and other receivables		-4.0	-8.8
Trade and other payables		11.4	14.1
Asset from clearing & settlement		-76.7	-304.4
Liabilities from clearing & settlement		56.1	347.9
Financial assets		290.9	115.1
Financial liabilities		-764.8	-475.0
Other assets		-15.4	-11.2
Other liabilities		3.5	4.5
Contract liabilities		-3.2	-15.0
Interest paid		-4.9	-8.0
Interest received		7.1	1.0
Income tax paid		-56.4	-84.0
Net cash flow from/(used in) operating activities		-20.9	89.7
Investments in subsidiaries (net of cash acquired)	29	-	-51.0
Investments in associates		-6.4	-6.1
Disposal of subsidiaries and associates (net of cash disposed)	28	0.4	4.7
Purchase of property, plant, equipment and intangible assets	19, 20	-70.7	-77.2
Sale proceeds from property, plant, equipment and intangible assets		0.0	0.8
Investments in financial assets		-447.5	-25.2
Divestments of financial assets		57.6	2.2
Dividends received and other financial income		4.6	1.0
Net cash flow from/(used in) investing activities		-461.9	-150.8
Payment of financial liabilities	17	-13.6	-20.2
Payment of lease liabilities	17	-15.9	-18.9
Dividends paid to shareholders of the parent company	21	-96.5	-89.8
Dividends paid to non-controlling interests		-0.1	-0.1
Net cash flow from/(used in) financing activities		-126.1	-129.0
Net impact of foreign exchange rate differences on cash		-281.1	-327.1
Net change in cash and cash equivalents		-889.9	-517.2
Balances of cash and cash equivalents			
Cash and cash equivalents at 1 January	14	8,248.7	8,765.9
Cash and cash equivalents at 31 December	14	7,358.8	8,248.7

The accompanying notes are an integral part of the consolidated financial statements.

¹ Prior year figures have been restated in accordance with the change in presentation of the balance sheet. See note 2.4 for further details.

Basis of Preparation

1 General Information

The consolidated financial statements of S.O as at and for the year ended 31 December 2023 cover Swiss Options Ltd (referred to as “Company” or “Parent Company”) and its subsidiaries (together referred to as “Group” or “S.O”). A table of the Group’s subsidiaries and interests in associates is included in note 28.

Swiss Options Ltd is an unlisted public limited company domiciled in Switzerland with its registered office in Zurich, at Hardturmstrasse 201. The Company is owned by national and international financial institutions.

S.O provides a comprehensive range of services in the areas of securities trading and post-trading, financial information processing and cashless payment transactions.

The Board of Directors of S.O approved the issuance of these consolidated financial statements on 7 March 2024.

2 Accounting Policy Information

2.1 Basis of preparation

The consolidated financial statements of S.O have been prepared in accordance with the IFRS® Accounting Standards as issued by the International Accounting Standards Board (IASB).

For all consolidated companies, the financial year corresponds to the calendar year. Unless otherwise indicated, all amounts are stated in millions of Swiss francs (CHF) and are rounded to the nearest hundred thousand.

2.2 Summary of material accounting policy information

2.2.1 Principles of consolidation and equity accounting

Basis of consolidation

Consolidation of a subsidiary begins when S.O obtains control of the subsidiary and ceases when such control is lost. Any gain or loss arising from the loss of control is presented in financial income or financial expenses. The interest retained is measured at fair value at the date on which S.O loses control, whereas the consideration is usually regarded as fair value. Subsequently, it is accounted for as an investment in associate using the equity method or as a financial asset, depending on the level of influence retained. Non-controlling interests arise when Swiss Options Ltd directly or indirectly holds less than 100% of a subsidiary, but still controls the subsidiary. For put options held by non-controlling shareholders, S.O has decided to apply IFRS 10. At the acquisition date, S.O recognizes first non-controlling

interests by applying the partial or full goodwill method. Secondly, non-controlling interests are derecognized by recognizing a financial liability (NCI liability) and debiting or crediting the differences to retained earnings. NCI liabilities are measured at the estimated exercise price of the put options. Changes in the liability are recognized as financial income or financial expenses. If options expire unexercised, the NCI financial liability is derecognized, and the non-controlling interests are reinstated.

Investments in associates

Investments in associates are accounted for using the equity method. Associates are those entities in which S.O has significant influence over the financial and operating policies, but does not exercise control or joint control. Significant influence is generally assumed to exist when S.O holds between 20% and 50% of the voting rights. In the event that the Group holds less than 20% of the voting rights, there is a strong indication of significant influence if S.O is represented on the board of the investee.

Under the equity method, investments in associates are initially recognized at cost at the date of acquisition. Cost comprises the fair value of the consideration transferred and acquisition-related costs. In subsequent accounting periods, the carrying amount of the investment is adjusted for the share of profit or loss and items recognized in equity, less dividends received. The share of profit or loss is adjusted for the effects of

subsequent measurement of assets and liabilities identified in a purchase price allocation. An impairment test is performed if there is objective evidence of impairment. Objective evidence of impairment includes, among other things, a significant or prolonged decline in the fair value which has been defined as a decline in the share price of 30% or for more than one year. Prior to an impairment, the significant or prolonged decline is assessed against the carrying amount of the investments. Subsequent to an impairment, it is assessed against the share price as at the date of the impairment. An impairment is recognized in financial expenses when the carrying amount exceeds the recoverable amount.

The ownership percentage held by S.O may be reduced if S.O does not participate in a capital increase (deemed disposal). Gains or losses resulting from deemed disposals, including amounts reclassified from other comprehensive income, are recognized in the income statement within financial income or financial expenses.

2.2.2 Foreign currency translation

Functional and presentation currency

These consolidated financial statements are presented in Swiss francs, which is also the functional currency of Swiss Options Ltd. Each subsidiary prepares its own financial statements in its functional currency, i.e. in the currency of the primary economic environment in which it operates. Finance subsidiaries that have no other operating activity than borrowing money on behalf of the parent have the functional currency of the parent.

Foreign currency transactions and exchange rates

Transactions in foreign currencies are initially recorded by the Group's entities in their respective functional currencies using the exchange rates prevailing at the dates of the transactions. Exchange rate gains and losses arising from the translation of monetary assets and liabilities denominated in foreign currencies are recognized in the income statement within financial income or financial expenses.

The main exchange rates at the closing dates were the following:

Currency	31/12/2023	31/12/2022
EUR	0.9333	0.9837
USD	0.8415	0.9237

The main annual average exchange rates were the following:

Currency	2023	2022
EUR	0.9719	1.0055
USD	0.8987	0.9550

2.2.3 Financial assets

The classification depends on the contractual cash flow characteristics of the financial assets and the business model of S.O for managing these assets. Financial assets are recognized at the trade date with the exception of transactions from the clearing & settlement business of Securities Services, which are recognized at the settlement date. The central counterparty (CCP) steps into the contracts as an intermediary, representing the buyer to each seller and the seller to each buyer, so that the CCP purchases and sells the asset at the same time. S.O determined that settlement date accounting best reflects the substance of the clearing & settlement business. Therefore, unsettled purchase and sales transactions are measured at fair value and classified as derivative instruments. For further details, see financial instruments at FVtPL, derivatives from clearing & settlement.

S.O classifies its financial assets into the following categories:

- Financial assets at amortized cost (AC)
- Financial assets at fair value through other comprehensive income (FVtOCI)
- Financial assets at fair value through profit or loss (FVtPL)

The offsetting of financial asset and liabilities is particularly relevant in the Securities Services business. Assets and liabilities from clearing & settlement are offset and the net amount is reported in the balance sheet only when the Group has a currently legally enforceable right to offset in the regular course of business, in the event of default and when there is an intention to settle on a net basis.

Financial assets are derecognized when the contractual rights to receive cash flows have expired or when all the risks and rewards of ownership of the financial assets are substantially transferred. S.O may enter into securities financing transactions (e.g. reverse repurchase agreements or repurchase agreements) or securities borrowing and lending transactions.

- In reverse repurchase transactions, the cash delivered is derecognized and a corresponding receivable is recorded. Securities received in reverse repurchase transactions and securities borrowing transactions are disclosed in the notes.
- In repurchase agreements, the cash received is recognized in the balance sheet with a corresponding obligation to return it. The securities transferred comprise securities that S.O has received as collateral with the right to resell or repledge. These securities are not recognized in or derecognized from the balance sheet unless the risks and rewards of ownership are also transferred.
- Financial assets recognized on the balance sheet which have been transferred under a securities lending agreement are not derecognized unless the risks and rewards of ownership are also transferred. Such transfers are disclosed in the notes. Securities borrowing and lending transactions that are not covered with cash collateral are not recognized in the balance sheet.

Financial assets at amortized cost

A financial asset is carried at amortized cost if both of the following criteria are met:

- The contractual terms of the financial asset give rise to cash flows that are solely payments of principal and interest on the principal amount outstanding.
- The financial asset is held within a business model whose objective is to hold these assets in order to collect contractual cash flows.

Financial assets measured at amortized cost are initially recognized at fair value plus directly attributable transaction costs. Subsequent to initial recognition, they are measured at amortized cost using the effective interest method less expected credit losses. Gains or losses are recognized in the income statement when the financial asset is derecognized, modified or impaired.

Impairment of financial assets at amortized cost

The Group recognizes loss allowances for expected credit losses (ECL) on financial assets that are measured at amortized cost. The Group measures the loss allowances at an amount equal to the 12-month ECL (Stage 1), except for the following assets, for which the loss allowance is measured at an amount equal to the lifetime ECL (Stage 2):

- Trade and other receivables (simplified approach according to IFRS 9)
- Financial assets at amortized cost whose credit risk has increased significantly since initial recognition

When a default event occurs, the loss allowance is measured at an amount equal to the lifetime ECL and the financial asset is presented as credit impaired (Stage 3).

The Group applies the “low credit risk” simplification in order to track the increase in credit risk. A low credit risk is assumed when the credit rating of a financial asset is equivalent to the globally understood definition of “investment grade” (i.e. a Standard & Poor’s rating of BBB – or higher).

For bonds and other financial assets at amortized cost, the creation and release of loss allowances is recognized in financial expenses. For all other financial assets at amortized cost, the creation and release of loss allowances is recognized in other operating expenses.

The Group writes off a financial asset when the collection activities are completed and there is no realistic prospect of recovery. This is generally the case when the Group receives evidence of insolvency (e.g. loss certificate). Financial assets that have been written off may still be subject to enforcement action even if recovery is highly unlikely. Recoveries are recognized in other operating expenses.

Financial assets at FVtOCI (debt instruments)

Financial assets at fair value through other comprehensive income (FVtOCI) include bonds for which the contractual cash flows consist solely of principal and interest, and the objective of the Group's business model is achieved both by collecting contractual cash flows and selling financial assets. Foreign exchange revaluation and impairment losses or reversals are recognized within financial income and financial expenses and are determined in the same manner as for financial assets measured at amortized cost. The remaining fair value changes are recognized in OCI. Upon derecognition, the cumulative fair value change recognized in OCI is recycled to profit or loss.

Financial assets at FVtPL

If the criteria for financial assets at amortized cost and financial assets at FVtOCI are not met, financial assets are classified and measured at fair value through profit or loss (FVtPL). These financial assets are initially recognized and subsequently measured at fair value. Transaction costs that are directly attributable to the acquisition of the financial asset are immediately expensed. Gains and losses arising from changes in fair value are reported in financial income or financial expenses.

2.2.4 Property, plant and equipment

Assets included under property, plant and equipment are measured at historical cost less accumulated depreciation and accumulated impairment losses, if any. Leasehold improvements also include the costs of removal if there is a contractual obligation to reinstate the premise at the end of the lease. The estimated costs of removal are capitalized as part of the acquisition costs of leasehold improvements and depreciated over their useful lives or the lease term, whichever is shorter. The initially estimated removal costs and subsequent changes in the estimated costs are recognized against the asset retirement obligation.

Land has an unlimited useful life and is therefore not depreciated. Property, plant and equipment is depreciated on a straight-line basis over its estimated useful life, which is reviewed and adjusted, if necessary, at the end of each financial year.

Asset class	Estimated useful life
Land	Impairment only
Buildings (excluding land)	8–60 years
Technical infrastructure	3–30 years
Leasehold improvements	Amortized in line with the term of the property lease
IT mainframes	4–5 years
IT midrange	3 years
Other IT hardware	3–5 years
Office equipment and furniture	3–7 years
Other fixed assets	3–5 years

Property, plant and equipment also includes leased assets. For further details, see 2.2.9.

2.2.5 Intangible assets

Intangible assets with indefinite useful lives

Intangible assets with indefinite useful lives include goodwill, brands and licenses acquired as part of business combinations.

S.O initially measures intangible assets with indefinite useful lives at cost. The cost of intangible assets acquired in a business combination is their fair value at the date of acquisition.

Intangible assets with finite useful lives

Intangible assets with finite useful lives include mainly software and customer relationships. These assets are measured at cost less accumulated amortization and impairment losses, if any. Subsequent expenditure is usually not capitalized unless it increases the future economic benefits embodied in the specific asset it relates to.

Expenditure for internally developed software is capitalized only if it meets the capitalization criteria. This requires, in particular, that S.O obtains control over the asset and that the future economic benefits are probable. Amortization of internally developed assets begins when they are available for use. This is generally the case when the business acceptance test has been successfully completed. When a software is released in several steps, the development costs are capitalized for each major release. The full useful life is applied for the first release, whereas the useful life for the subsequent releases is reduced based on the time passed since the first release.

Intangible assets with a finite useful life are amortized on a straight-line basis over their estimated useful lives:

Asset class	Estimated useful life
Licenses, brands and customer relationships	5–20 years
Software	3–7 years
Other intangible assets	3–7 years

Useful lives are reassessed annually and adjusted if appropriate.

2.2.6 Impairment of non-financial assets

Intangible assets with an indefinite useful life and intangible assets not yet ready for use are tested for impairment annually in the fourth quarter and whenever there is an indication that an asset may be impaired. All other intangible assets and property, plant and equipment are tested for impairment whenever events or changes in circumstances indicate that the carrying amount may not be recoverable. An indication of impairment is assumed when, among other things, the change in an input parameter exceeds the limit at which the headroom was zero in the previous impairment test.

For the purpose of impairment testing, goodwill and intangible assets with indefinite useful life are allocated to cash-generating units ("CGUs"). The carrying value of a CGU is compared to its recoverable amount, which is determined on a value-in-use basis. In assessing value in use, the estimated future cash flows are discounted to their present value using a post-tax discount rate that reflects the current market assessment of the time value of money and the risks specific to the asset or the CGU. If the carrying amount of the assets exceeds the recoverable amount, an impairment equal to the difference between the carrying amount and the recoverable amount is recognized as an impairment loss in the income statement.

2.2.7 Financial liabilities

S.O classifies its financial liabilities either as financial liabilities at amortized cost (AC) or financial liabilities at fair value through profit or loss (FVtPL).

Financial liabilities at amortized cost

Financial liabilities at amortized cost are initially recognized at fair value less directly attributable transaction cost. Transaction costs are mainly relevant for the bonds issued by S.O. Subsequent to initial recognition, such financial liabilities are measured at amortized cost using the effective interest method.

Financial liabilities at FVtPL

Financial liabilities at FVtPL are initially recognized and subsequently measured at fair value.

2.2.8 Hedge accounting

S.O is currently applying net investment hedges for certain investments in subsidiaries. In these cases, S.O designates derivative and non-derivative financial liabilities as hedging instruments to hedge the foreign exchange risk on a net investment in a foreign operation. Gains or losses on the hedging instrument relating to the effective portion of the hedge are recognized in OCI, while any gains or losses relating to the ineffective portion are recognized in the income statement, if any. On disposal of a foreign operation, the cumulative value of any such gains or losses recorded in equity is transferred to the income statement and included in the gain or loss on disposal. The hedge documentation is put together at the inception of the hedging relationship.

2.2.9 Leases

At the inception of a contract, S.O assesses whether a contract is or contains a lease. Arrangements to use space in a data center usually met the definition of a lease if the leased space or cabinet is clearly defined in the contract.

S.O as lessee

S.O is a lessee of premises, IT equipment and vehicles. Leases are accounted for by recognizing a right-of-use asset and a lease liability at the lease commencement date. S.O has elected not to recognize right-of-use assets and lease liabilities for short-term leases that have a lease term of 12 months or less and leases of low-value assets with costs of up to CHF 10,000. The Group recognizes the lease payments associated with these leases as an expense on a straight-line basis over the lease term.

S.O has elected not to separate non-lease components from lease components for all classes of underlying assets.

Lease liabilities are discounted using the incremental borrowing rate available at the contract commencement date, as the interest rates implicit in the leases generally cannot be readily determined. The incremental borrowing rate is determined by using the interest rate swaps for the term and currency of the lease, a lease-specific adjustment depending on the nature and quality of the underlying asset, and the average refinancing spread of S.O.

Right-of-use assets are initially measured at the initial amount of the lease liability, plus initial direct costs, minus lease incentives received. Right-of-use assets are subsequently depreciated using the straight-line method from the commencement date to the end of their useful lives or the end of the lease term, whichever is earlier. The estimated useful lives of right-of-use assets are determined on the same basis as those of property, plant and equipment.

S.O as lessor

S.O is a lessor of business premises. When S.O acts as a lessor, it determines at the inception of a lease whether the lease is a finance or an operating lease. Currently, all lease agreements are classified and recorded as operating leases.

Operating lease equipment is initially carried at its acquisition cost. Leased assets are depreciated on a straight-line basis according to the depreciation policies of S.O for property, plant and equipment. Rental income from operating leases is recognized on a straight-line basis over the term of the lease agreement as part of other operating income.

2.2.10 Provisions and contingent liabilities

Provisions are liabilities of uncertain timing or amount. Provisions are recognized for present legal or constructive obligations arising from past events if there is a probable outflow in settlement that can be reliably estimated. With the exception of contingent liabilities that have been assumed by S.O in a business combination, contingent liabilities do not meet the recognition criteria for provisions. They are disclosed unless the possibility of an outflow in settlement is estimated to be remote.

Asset retirement obligation

If a lease agreement requires S.O to remove any assets it has installed in the leased property (such as interior walls or partitions), the removal obligation arises immediately upon installation. In such a situation, the Group recognizes a provision for the present value of the future cost of removal at the date the assets are installed.

2.2.11 Equity *Ordinary shares*

Ordinary shares in Swiss Options Ltd are classified as share capital.

Treasury shares

Own shares held by Swiss Options Ltd itself and by other entities of the Group are recognized at cost within other reserves and deducted from equity.

2.2.12 Operating revenues

Revenue represents the consideration to which S.O expects to be entitled in exchange for transferring services, net of amounts collected on behalf of third parties. When S.O acts as a principal, revenue is recorded gross. When S.O acts only as an agent, revenue is limited to the commission or fee that it retains. The main indicators that S.O is a principal are the responsibility to provide the promised services and the discretion in establishing prices.

Volume discounts are generally based on the number of transactions within a month or calendar year. During the financial year, the estimated average selling price is recognized as revenue.

Transaction revenues

Transaction revenues are generated from services which relate to a single transaction (e.g. trading in securities, clearing & settlement transactions, payment transactions, ATM transactions, etc.) or services which are triggered and remunerated on an incident or order basis. The performance obligation of a service is satisfied when the transaction or order has been executed. Transaction revenues are recognized at a point in time.

Exchanges and Securities Services recognize transaction fees for trading on the trade date and for clearing & settlement services on the settlement date.

Service revenues

Revenue from providing services is recognized in the period in which the services are rendered (e.g. listing of securities, custody services, providing reference and market data, etc.). Revenue is generally recognized over time.

Exchanges recognize listing fees over the estimated listing period. The estimated listing period of the securities is reassessed on an annual basis to reflect the most recent market developments.

Net interest income from interest margin business

The interest margin business is part of the core business activities of Securities Services and Banking Services. Accordingly, net interest income from interest margin business is presented within operating income. Net interest income from interest margin business is recognized by applying the effective interest method. Negative interest on financial assets is presented within interest expenses from interest margin business, and the related interest earned from the recharge of negative interest is included in interest income from interest margin business.

Other operating income

Other operating income includes income earned from sale of assets and non-standard services such as lease income. Most of the non-standard services are recognized over time. For further details on the accounting for leases, see section 2.2.9.

Contract costs

Costs to obtain a contract

Incremental costs incurred in obtaining a customer contract are recognized as an asset if the Group expects to recover them. They include sales commissions that are amortized over the average contract period, which is based on past experience with services rendered to similar customers in similar circumstances.

Contract balances

Contract liabilities

If the payments received exceed the services rendered, a contract liability is recognized. Among others, this position includes contract liabilities related to listing fees (for further details, see service revenues in 2.2.12).

2.2.13 Employee benefits

S.O maintains a number of different pension plans based on the respective legislation in each country. The retirement benefit plans include both defined benefit and defined contribution plans.

Defined benefit costs consist of three components:

- service costs, curtailments and settlements
- net interest income or expenses
- remeasurements

Defined benefit costs include current and past service costs and are presented within employee benefit expenses. The Group recognizes gains and losses on plan curtailments or settlements in employee benefit expenses when they occur.

Termination benefits

Termination benefits are payable when employment is terminated before the normal retirement date, or when an employee accepts voluntary redundancy in exchange for these benefits. S.O recognizes a liability for termination benefits at the earlier of when S.O can no longer withdraw the offer of those benefits or when the Group recognizes restructuring costs. In the event that an offer is made to encourage voluntary redundancy, the termination benefits are measured based on the number of employees expected to accept the offer. Benefits falling due more than twelve months after the end of the reporting period are discounted to their present value.

Other long-term employee benefits

The Group's obligation in respect of long-term employee benefits is the amount of future benefits that employees have earned in return for their service in the current and prior periods. The liability is determined by applying the projected unit credit method. The actuarial assumptions used are reassessed annually. Remeasurements are recognized in employee benefit expenses in the period in which they arise. Other long-term employee benefits include in particular long-service awards (or "jubilees") and long-term incentive plans.

2.2.14 Interest

Interest income and expenses

For all financial assets and financial liabilities measured at amortized cost, interest income and expenses are recorded using the effective interest method. Negative interest on financial assets is presented within interest expenses. Negative interest on financial liabilities is included in interest income.

2.2.15 Income taxes

The tax expense for the period comprises current and deferred tax. Taxes are recognized in the income statement except to the extent that the underlying transaction is recorded either in other comprehensive income or directly in equity.

S.O has applied the mandatory exception for recognizing and disclosing information about deferred tax assets and liabilities related to Pillar Two income taxes.

Deferred tax assets are recognized for unused tax losses and deductible temporary differences to the extent that it is probable that sufficient future taxable profit will be available within the next three years against which they can be utilized.

2.3 Changes in the Group's accounting policies

New and amended IFRS Accounting Standards and IFRS® Interpretations adopted by S.O

The adoption of the following amendments had no significant impact on the consolidated financial statements of the Group as at 31 December 2023.

- International Tax Reform Pillar Two Model Rules (Amendments to IAS 12)
- Disclosure of Accounting Policies (Amendments to IAS 1 and IFRS Practice Statement 2)
- Definition of Accounting Estimates (Amendments to IAS 8)

2.4 Restatement

Change in presentation of the balance sheet

Management has reviewed the presentation of the balance sheet related to transactions in Securities Services and Banking Services. To enable a better understanding of the balance sheet related to these business units and its movements, the presentation of the balance sheet has been changed. As the adjustments also impact cash and cash equivalents (as defined in note 14), the statement of cash flows has been restated as well. The restatement has had no effect on total equity.

The table below shows the overview of the reclassifications made in the consolidated balance sheet as at 31 December 2022 with additional details included in the corresponding footnotes:

				Restatement	
CHF million	31/12/2022	Adj. of cash and cash equivalents ¹	Adj. of derivatives from C&S ²	Adj. of assets and liabilities from C&S ³	31/12/2022
					restated
Assets					
Cash and cash equivalents	4,320.5	4,400.1			8,720.6
Trade and other receivables	201.9				201.9
Assets from clearing & settlement	4,938.0	-4,400.1	693.9	-46.5	1,185.3
Financial assets	1,314.9		-693.9	46.5	667.5
Current income tax receivables	60.1				60.1
Other current assets	74.2				74.2
Current assets	10,909.6	-	-	-	10,909.6
Non-current assets	6,262.0				6,262.0
Total assets	17,171.7	-	-	-	17,171.7
Liabilities					
Bank overdrafts	472.0				472.0
Trade and other payables	31.7				31.7
Liabilities from clearing & settlement	8,837.5		697.1	-8,327.0	1,207.6
Financial liabilities	723.9		-697.1	8,327.0	8,353.8
Provisions	0.9				0.9
Contract liabilities	16.3				16.3
Current income tax payables	53.2				53.2
Other current liabilities	183.7				183.7
Current liabilities	10,319.2	-	-	-	10,319.2
Non-current liabilities	1,820.0				1,820.0
Total liabilities	12,139.2	-	-	-	12,139.2
Total equity	5,032.5				5,032.5
Total liabilities and equity	17,171.7	-	-	-	17,171.7

¹ Adjustment of cash and cash equivalents

Assets from clearing & settlement previously included investments in reverse repurchase agreements with a contractual maturity of three months or less and cash placed at other custodians as part of the cross-border settlement in Securities Services. In order to consistently present all cash and cash equivalents of S.O, these positions have been reclassified accordingly.

² Adjustment of derivatives from C&S

In Securities Services, derivatives from clearing & settlement include the replacement values of the open trades for which S.O acts as a central counterparty. Previously, these unsettled transactions were included within the financial assets and liabilities. As the settlement of these trades has not been completed, derivatives from C&S have been reclassified to assets and liabilities from clearing & settlement.

³ Adjustment of assets and liabilities from C&S

Short-term credits relate to interim financing provided in the post-trading business to enable efficient settlement. These positions were previously included in assets from clearing & settlement and have been reclassified to financial assets.

Previously, in Securities Services, liabilities from clearing & settlement included deposits of participants and liabilities related to securities financing transactions.

In Banking Services, liabilities from clearing & settlement included deposits of participants in the euro clearing business. These liabilities, for which the funds have already been transferred to S.O, have been reclassified to financial liabilities.

As a result of these adjustments, assets and liabilities from clearing & settlement only include unsettled transactions in Securities Services and Banking Services. Financial assets and liabilities result from cash transactions.

2.5 IFRS Accounting Standards and IFRIC Interpretations® that have been issued but are not yet effective

The following new and/or revised standards and interpretations have been issued but are not yet effective. They have not been applied early in these consolidated financial statements.

Standard/interpretation	Effective date	Planned date of adoption by S.O
Lease Liability in a Sale and Leaseback (Amendment to IFRS 16)	1 January 2024	1 January 2024 ¹
Classification of Liabilities as Current or Non-current (Amendments to IAS 1)	1 January 2024	1 January 2024 ¹
Non-current Liabilities with Covenants (Amendment to IAS 1)	1 January 2024	1 January 2024 ¹
Supplier Finance Agreements (Amendments to IAS 7 and IFRS 7)	1 January 2024	1 January 2024 ¹
Lack of Exchangeability (Amendments to IAS 21)	1 January 2025	1 January 2025 ¹
Sale or Contribution of Assets between an Investor and its Associate or Joint Venture (Amendments to IFRS 10 and IAS 28)	To be determined by the IASB	To be determined by S.O ²

¹ The adoption of the amendment is not expected to have a significant impact on the consolidated financial statements of S.O

² The impact on the consolidated financial statements of S.O has not yet been fully assessed.

3 Use of Judgments and Estimates

The application of some accounting policies requires the use of assumptions, estimates and judgments that may affect the reported assets and liabilities, income and expenses and also the disclosure of contingent assets and liabilities in the reporting period. Additionally, there is a significant risk that these estimation uncertainties could result in material adjustments to the carrying amount of assets and liabilities within the next financial year. The assumptions and estimates are continually reviewed and based on historical experience and other factors, including anticipated developments arising from probable future events. Actual future occurrences may differ from these assumptions and estimates.

Areas that may incorporate a greater number of uncertain assumptions, estimates and judgments are listed below.

Fair value of assets and liabilities recognized in a business combination

In the case of business combinations, assets acquired and liabilities assumed are measured at fair value at the date of acquisition. In determining the fair value and the useful lives of intangible assets acquired, as well as the fair value of liabilities assumed, certain assumptions are made. The measurement is based on projected cash flows and information available at the date of acquisition (see note 29).

Fair value of level 3 instruments

The fair value of financial instruments that are not traded in an active market is determined by using several valuation techniques. S.O uses judgment in determining the valuation methods and makes assumptions in estimating the inputs to the calculations, as the parameters for the calculation of the fair values are not readily available in the markets. The calculations are based on information available as at the reporting date. The estimated fair values for each class of financial instruments and the sensitivity analysis are disclosed in note 26.

Capitalization of development costs

S.O develops various software applications for internal and external use. Development costs for self-developed intangible assets are capitalized if the applicable criteria of IAS 38 are fulfilled. This requires, among others, a positive business case to confirm that a project will generate future economic benefits. Projects are broken down into three main phases. Costs incurred in the inception and transition phase are treated as non-capitalizable, whereas costs incurred in the development phase are treated as capitalizable. Development costs that do not satisfy the requirements for capitalization are expensed as incurred.

In determining the amounts to be capitalized, management makes assumptions regarding the expected future cash flows generated from the project and the discount rates to be applied. The status of the key projects is monitored on a monthly basis by the Executive Board of Swiss Options (ExB).

Utilization of tax losses and recognition of deferred tax assets

Deferred tax assets are recognized for unused tax losses to the extent that it is probable that taxable profit will be available against which the losses can be utilized. Significant management judgment is required to determine the amount of deferred tax assets that can be recognized, based on the estimated future taxable profits within the planning period. At each closing, the entity assesses the recoverability of deferred tax assets, including those recognized in previous periods. Further details on recognized deferred tax assets and unrecognized tax losses are disclosed in note 13.

Assessment of uncertain tax positions

If facts or circumstances change or if new information becomes available, S.O reassesses the judgement or estimate used to determine the accounting for its uncertain tax treatments. When analyzing uncertain tax treatments, S.O must consider whether it is probable that the tax authority would accept the treatment of S.O. The potential effect of the uncertainty is disclosed if it is material. For further details on uncertain tax positions and the potential effect of uncertainty, see note 12.

Measurement of defined benefit obligations

Accounting for defined benefit obligations requires the application of certain actuarial assumptions (e.g. discount rate, salary trend, interest rate on retirement savings capital and life expectancy). Changes in actuarial assumptions can materially affect pension obligations and the expenses arising from employee benefit plans. The actuarial assumptions are reviewed with independent actuaries at each reporting date. A sensitivity analysis of the key factors is presented in note 33.

Impairment of non-financial assets

For the purpose of impairment testing, goodwill and intangible assets with indefinite useful life are allocated to cash-generating units ("CGUs"). The carrying amount of a CGU is compared to its recoverable amount, which is determined on a value-in-use basis.

The value in use is derived from the discounted future free cash flows of a CGU. Cash flow projections are based on the budget and mid-term financial plan approved by the Board of Directors (BoD). The budget and mid-term financial plan cover three years and are updated annually. Cash flows beyond the financial planning period are extrapolated using a perpetual growth rate. Estimating future earnings involves judgment, as the developments in the respective markets

and in the overall macroeconomic environment need to be estimated based on the currently available information. The discount rates are determined by applying the capital asset pricing model. A change in the key assumptions used to determine the recoverable amounts of each CGU may have a significant effect on the result of the impairment test. The key assumptions are tested for sensitivity by applying reasonably possible changes to those assumptions. For a description of the key assumptions, see note 20.

For the impairment test of listed associated companies, the cash flow projections are based on analyst estimates of revenue growth, operating margin and capital expenditures. Estimating future free cash flows involves judgment, as the developments in the respective markets and in the overall macroeconomic environment need to be estimated based on the currently available information. The recoverable amount has been determined based on the value in use. The key assumptions used to calculate the value in use are the discount rate, the terminal value perpetual growth rate, and the sustainable operating margin applied in the terminal year. In order to determine the value in use, a range of values was calculated using sensitivities. To take position within the range, management took other information such as current share price and current target price of analysts into consideration. For further details, see note 28.

Performance for the Year

4 Segment Information

Determination of operating segments

Operating segments are reported in a manner consistent with the internal reporting to the Executive Board of S.O and the chief operating decision maker (CODM). The CODM, who is responsible for allocating resources and assessing the performance of the operating segments, has been identified as the CEO.

For the purpose of the segment reporting, S.O is broken down into five reportable segments (four business units and IT) and Corporate & Others. The latter includes S.O Exchange Regulation and corporate activities that support the Group as a whole, i.e. Risk, Legal & Compliance, Finance & Services, Human Resources and Marketing & Communications. Thus, Corporate & Others does not qualify as a reportable operating segment under IFRS 8.

The reportable segments and Corporate & Others offer the following products and services:

Service	Service description
Exchanges	
Trading	Exchanges generates transaction revenues by providing a cash market for trading in shares, private and public debt, warrants, funds, financial and electricity derivatives and exchange-traded products (ETPs), as well as a securitized derivatives market for structured products and warrants. Transaction revenues are invoiced on a monthly basis. The trading business also generates service revenues from access, admission of securities to trading and ongoing listing.
Data	Exchanges distributes raw market data and index products, which generate service revenues. Depending on the market, service fees are invoiced on a monthly, quarterly or annual basis.
Securities Services	
Custody business	Operating as the central securities depository (CSD) for Switzerland and Spain as well as an international custodian across various markets worldwide, Securities Services delivers comprehensive custody services for Swiss, Spanish and other international securities. Securities Services generates service revenues from issuer services, asset servicing/shareholder services, banking services/cash management, queries and reporting, and tax services. Transaction revenues are generated from settlement services, tax services, repos and fund processing. The custody business also generates interest income from interest margin business. Revenues from the custody business are generally invoiced on a monthly basis.
CCP clearing	Securities Services provides multi-asset clearing services and operates a highly diversified central counterparty (CCP) business with access to multiple trading venues and matching platforms across Europe. Transaction revenues are generated from the clearing of trades and the settlement of transactions. Further revenues are recognized from the transfers and management of pledges on securities and access charges for infrastructures and other facilities. Transaction revenues from clearing and CCP settlements are invoiced monthly and/or quarterly. Interest income from interest margin business is generated from repo transactions.
Securities Finance	Securities Finance Services includes repo trading and collateral management triparty services for various products (repo, TCM, initial margin calls, structured products, securities lending and borrowing) as well as Securities Financing Transactions Regulation (SFTR) reporting. The Securities Finance business generates revenues from trading and post-trading activities, which are invoiced on a monthly basis, except for service revenues related to SFTR, which are invoiced on an annual basis.

Service	Service description
Financial Information	
Reference data & pricing	Financial Information offers procurement, processing and distribution of reference data and pricing information. The business generates service revenues. Subscription fees are generally invoiced on an annual basis.
Market data & display	Financial Information provides procurement, processing and distribution of (real-time) market data and offers display products. The business generates service revenues. Subscription fees are generally invoiced on an annual basis. Royalties for financial data paid to stock exchanges are presented net in service income, as S.O does not control the service.
Tax & regulatory services	Financial Information provides complete reference data required for local and cross-border regulatory and tax compliance. The business generates service revenues. Subscription fees are generally invoiced on an annual basis.
Indices	Financial Information provides index services by calculating indices and offering licenses for S.O indices. The business generates service revenues. Subscription fees for the index services are generally invoiced quarterly for variable fees and annually for fixed fees.
Banking Services	
Billing and payments	Banking Services offers payment transaction processing services between financial institutions through S.O Interbank Clearing Ltd (SIC). SIC processes retail and wholesale payments in Swiss francs on behalf of the Swiss National Bank. It also provides a gateway for euro payments for the Swiss financial community (euroSIC). Banking Services is an infrastructure provider for digital billing in Switzerland with solutions such as eBill and direct debits. The revenues are mainly generated from transaction fees. Service revenues are generated from base fees and consultancy services. Additionally, Banking Services generates interest income from interest margin business. Transaction and service fees are generally invoiced on a monthly basis.
ATM processing and services	Banking Services provides ATM transaction processing and infrastructure services in Switzerland. Banking Services mainly generates transaction revenues through processed transactions and service fees based on the number of ATMs. The location fee received in the ATM business is presented net in transaction income, as S.O does not control the service. Service fees are generally invoiced on an annual basis.
Debit processing and services	Banking Services provides issuing processing services for debit card issuers. Transactions processed generate transaction revenues and issuing service fees. Besides that, Banking Services also generates service revenues by providing operational support to card issuers (e.g. hotline services or fraud management). Service fees are generally invoiced on a monthly basis.
Connectivity and data	Banking Services offers digital solutions for transactions with land registers through S.O Terravis Ltd and operates bLink, an open banking platform that provides standardized interfaces for the exchanges of different types of financial data. The main part of revenues is generated from service revenues based on the volume of registered customer assets at S.O Terravis Ltd. Service fees are generally invoiced on a monthly basis.
IT	
Corporate IT	IT provides corporate services (e.g. Digital Workplace) and operates the IT infrastructure and applications (e.g. trading platforms) for the business units. Service revenues are mainly generated by providing services to associated companies.
Corporate & Others	
Corporate & other services	Corporate activities include Risk, Security & Compliance, Legal & Regulatory, Finance & Services, Human Resources and Marketing & Communications. Corporate & Others also includes S.O Exchange Regulation.

The performance of business units is measured based on business unit profit as set out in the internal management reports, which are reviewed regularly by the CODM. IT and Corporate & Others are measured based on the operating expenses.

	2023								
CHF million	Exchanges	Securities Services	Financial Information	Banking Services	Total business units	IT	Corporate & Others	Elimination	Total S. O
Revenues from third parties	325.5	513.6	400.1	220.4	1,459.6	42.3	24.1	–	1,526.0
Revenues from intra-Group	7.1	20.3	6.8	–12.7 ¹	21.6	309.5	108.2	–439.4	–
Total operating income	332.6	533.9	406.9	207.8	1,481.2	351.8	132.3	–439.4	1,526.0
Total operating expenses	–250.5	–321.2	–351.9	–209.3	–1,133.0	–322.3	–96.6	439.4	–1,112.5
Earnings before interest, tax, depreciation and amortization (EBITDA)	82.1	212.7	55.0	–1.5	348.2	29.5	35.7	–	413.4
Depreciation, amortization and impairment	–14.0	–20.3	–12.4	–12.6	–59.2	–27.0	–440.1 ²	–	–526.3
Business unit profit/(loss)	68.1	192.4	42.6	–14.1	289.0	2.5	–404.4	–	–112.9
Financial income									51.2
Financial expenses									–814.7 ³
Share of profit or loss of associates									–98.6
Earnings before interest and tax (EBIT)									–975.0
Interest income									7.5
Interest expenses									–5.6
Earnings before tax (EBT)									–973.1
Income tax expenses									–33.1
Group net loss									–1,006.2

¹ Includes net interest income from interest margin business.

² Impairment of goodwill and amortization of PPA intangibles are presented within Corporate & Others. Impairment of goodwill amounts to CHF 339.6 million. For further details, see note 20.

³ Includes impairment on investments in associates of CHF 756.1 million. For further details, see note 9.

									2022
CHF million	Exchanges ¹	Securities Services	Financial Information ¹	Banking Services	Total business units	IT	Corporate & Others	Elimination	Total S.O
Revenues from third parties	361.2	457.1	384.4	223.5	1,426.2	42.3	25.7	–	1,494.1
Revenues from intra-Group	7.4	8.8	7.1	2.1	25.5	285.5	105.5	–416.4	–
Total operating income	368.6	465.9	391.5	225.7	1,451.7	327.7	131.2	–416.4	1,494.1
Total operating expenses	–249.7	–308.6	–336.6	–196.3	–1,091.2	–298.0	–123.6	416.4	–1,096.4
Earnings before interest, tax, depreciation and amortization (EBITDA)	118.9	157.3	54.9	29.3	360.4	29.7	7.6	–	397.7
Depreciation, amortization and impairment	–16.5	–10.1	–12.5	–13.4	–52.6	–21.4	–103.5	–	–177.5
Business unit profit/(loss)	102.4	147.2	42.3	15.9	307.8	8.3	–95.9	–	220.3
Financial income									80.2
Financial expenses									–78.1
Share of profit or loss of associates									21.6
Earnings before interest and tax (EBIT)									243.9
Interest income									0.9
Interest expenses									–8.6
Earnings before tax (EBT)									236.2
Income tax expenses									–51.2
Group net profit									185.0

¹ Prior year figures have been adjusted due to internal reorganizations effective 1 January 2023. The impact on business unit profit was as follows:
Exchanges: CHF +1.2 million, Financial Information: CHF –1.2 million.

Disclosures by geographical area

S.O operates mainly in Switzerland, Spain and in other European countries. The geographical analysis of the operating income from external customers and non-current assets is based on the location of the entity in which the transactions and assets were recorded.

Non-current assets mainly consist of property, plant and equipment, intangible assets, investments in associates and other non-current assets, and exclude financial instruments, deferred tax and post-employment benefit assets in accordance with the provisions of IFRS 8.

CHF million	Total operating income		Non-current assets	
	2023	2022	31/12/2023	31/12/2022
Switzerland	1,048.8	978.8	1,091.6	2,042.0
Spain	251.4	280.2	1,948.8	2,457.3
France	46.4	47.1	13.2	4.2
Luxembourg	39.9	33.6	103.1	128.4
United Kingdom	31.9	27.8	57.5	53.5
Italy	16.0	15.0	0.7	1.0
Germany	15.5	33.6	1.9	1.6
Rest of Europe	35.4	36.9	4.0	3.1
North America	30.4	30.4	3.9	5.0
Asia/Pacific	8.7	9.2	2.8	3.2
North Africa	1.5	1.5	0.1	0.2
Total	1,526.0	1,494.1	3,227.7	4,699.5

Disclosures of major customers

S.O has a large number of customers. In 2023, the revenue from one single external customer exceeded 10% of the Group's revenue. The revenue totaled CHF 167.0 million and was generated by all business units. In 2022, there was no major customer whose revenues represented more than 10% of the Group's revenue.

5 Operating Income

In the following table, revenue is disaggregated by revenue type and by major service lines:

					2023
CHF million	Transaction revenues	Service revenues	Net interest income from interest margin business	Other operating income	Total
Exchanges					
Trading	162.8	70.9	–	0.3	234.0
Data	–	82.7	–	–	82.7
Other services	4.0	4.2	–	0.5	8.7
Total Exchanges	166.8	157.9	–	0.8	325.5
Securities Services					
Custody business	112.6	164.6	79.4	–	356.5
CCP clearing	38.9	7.5	8.0	–	54.4
Securities finance	32.9	10.7	–	–	43.6
Other services	47.6	8.8	1.9	0.7	59.0
Total Securities Services	231.9	191.6	89.3	0.7	513.6
Financial Information					
Reference data & pricing	–	211.1	–	0.1	211.2
Market data & display	–	92.7	–	–	92.7
Tax & regulatory services	–	49.9	–	–	49.9
Indices	–	27.0	–	–	27.0
Other services	–	19.2	–	0.1	19.3
Total Financial Information	–	399.8	–	0.3	400.1
Banking Services					
Billing and payments	54.5	10.3	–9.3	–	55.5
ATM processing and services	32.7	5.2	–	0.5	38.4
Debit processing and services	99.7	10.4	–	–	110.2
Connectivity and data	2.1	11.0	–	0.1	13.2
Other services	–	2.6	–	0.7	3.2
Total Banking Services	189.0	39.5	–9.3	1.3	220.4
IT					
Corporate IT	–	42.3	–	–	42.3
Total IT	–	42.3	–	–	42.3
Corporate & Others					
Corporate & other services	–	1.6	–	22.4	24.1
Total Corporate & Others	–	1.6	–	22.4	24.1
Total operating income	587.8	832.8	80.0	25.4	1,526.0

	2022				
CHF million	Transaction revenues	Service revenues	Net interest income from interest margin business	Other operating income	Total
Exchanges					
Trading	196.4	73.7	–	0.2	270.3
Data	–	81.8	–	–	81.8
Other services	3.3	5.5 ¹	–	0.3	9.1
Total Exchanges	199.6	161.0	–	0.5	361.2
Securities Services					
Custody business	120.5	165.7	24.6	0.1	310.9
CCP clearing	43.2	5.8	14.5	0.0	63.5
Securities finance	23.0	8.4	–	0.1	31.5
Other services	39.3	11.7	–	0.2	51.2
Total Securities Services	225.9	191.6	39.1	0.5	457.1
Financial Information					
Reference data & pricing	–	204.5	–	0.2	204.7
Market data & display	–	91.7	–	–	91.7
Tax & regulatory services	–	43.6	–	–	43.6
Indices	–	26.0	–	–	26.0
Other services	–	18.2 ¹	–	0.1	18.3
Total Financial Information	–	384.1	–	0.3	384.4
Banking Services					
Billing and payments	53.2	11.9	8.1	0.1	73.4
ATM processing and services	32.5	6.2	–	0.3	39.0
Debit processing and services	85.0	8.0	–	–	92.9
Connectivity and data	1.5	10.1	–	0.1	11.7
Other services	–	6.4	–	–	6.4
Total Banking Services	172.2	42.7	8.1	0.6	223.5
IT					
Corporate IT	–	41.5	–	0.8	42.3
Total IT	–	41.5	–	0.8	42.3
Corporate & Others					
Corporate & other services	–	1.8	–	23.8	25.7
Total Corporate & Others	–	1.8	–	23.8	25.7
Total operating income	597.7	822.7	47.2	26.5	1,494.1

¹ Prior year figures have been adjusted due to internal reorganizations effective 1 January 2023. The impact on total operating income was as follows:
Exchanges: CHF +1.2 million, Financial Information: CHF –1.2 million.

Transaction price allocated to the remaining performance obligations

The following table provides information about performance obligations that have already been contractually

agreed upon, but are unsatisfied (or partially unsatisfied) at year-end. Customer contracts with an initial term of 12 months or less and services with transaction-based fees are not included.

CHF million	31/12/2023	31/12/2022 ¹
Within one year	71.7	78.0
Within two years	48.7	54.3
Within three years	41.5	45.1
Thereafter	69.4	106.6
Total	231.3	283.9

¹ 2022 figures have been adjusted.

Contract liabilities

The following table shows a reconciliation from the opening to the closing balances of contract liabilities:

CHF million	2023	2022 ¹
Carrying amount at 1 January	32.7	49.0
Revenue recognized that was included in contract liabilities at 1 January	-22.5	-28.8
Increases due to cash received, excluding amounts recognized as revenue during the period	19.3	13.8
Additions due to changes in the scope of consolidation ²	-	2.0
Disposals due to changes in the scope of consolidation ³	-0.3	-
Translation adjustments	-2.7	-3.2
Carrying amount at 31 December	26.5	32.7
<i>of which current</i>	<i>11.1</i>	<i>16.3</i>
<i>of which non-current</i>	<i>15.4</i>	<i>16.4</i>

¹ 2022 figures have been adjusted.

² The figure includes the net change of contract liabilities during the year related to acquired companies, see note 29.

³ The figure includes the net change of contract liabilities during the year related to sold companies, see note 28.

6 Net Interest Income from Interest Margin Business

CHF million	2023	2022
Interest income from interest margin business	226.1	92.7
Interest expenses from interest margin business	-146.1	-45.5
Net interest income from interest margin business	80.0	47.2

In 2023, interest expenses from interest margin business included interest arising from negative interest rates on financial assets in the amount of CHF 0.4 million (2022: CHF 29.3 million). Interest expenses from interest margin business included CHF 0.8 million related to financial instruments at FVtOCI (2022: CHF 1.5 million).

Net interest income from interest margin business also includes interest earned on bonds and reverse repurchase agreements. In 2023, interest received and interest paid totaled CHF 231.3 million (2022: CHF 103.0 million) and CHF 145.2 million (2022: CHF 44.0 million), respectively.

7 Employee Benefit Expenses

CHF million	2023	2022
Salaries and wages	-490.4	-466.8
Social security expenses	-97.9	-114.1
Others	-28.6	-29.2
Total employee benefit expenses	-617.0	-610.1

Expenses recognized for defined contribution plans are included in social security expenses and amount to

CHF 3.7 million (2022: CHF 3.7 million). For further information on defined benefit plans, see note 33.

8 Other Operating Expenses

CHF million	2023	2022
Contractor costs	-148.9	-151.3
Sales-related costs	-143.9	-135.0
Expenses for IT infrastructure	-98.4	-99.2
Expenses for data procurement and operation	-44.4	-46.9
VAT and tax expenses	-20.4	-19.3
Expenses for building infrastructure	-20.3	-16.9
Marketing and advertising expenses	-11.8	-13.4
Legal and audit fees	-9.7	-9.1
Travel expenses	-8.5	-6.9
Others	-21.2	-20.6
Own work capitalized	31.9	32.3
Total other operating expenses	-495.6	-486.2

Contractor costs primarily include consulting, outsourcing, external staff and software development.

Own work capitalized includes costs incurred for the development and implementation of software and installation of hardware.

CHF million	2023	2022
Total expenses for software development	47.8	53.0
<i>of which capitalized</i>	<i>31.9</i>	<i>32.3</i>

In 2023, 66.9% of the project costs incurred for development and implementation were capitalized (2022: 61.0%). The capitalization ratio mainly depends on the

nature of the costs incurred, the stage of projects and the costs of maintenance projects.

9 Financial Income and Expenses

CHF million	2023	2022
Income from financial instruments at fair value	14.0	4.9
Foreign exchange rate gains	36.6	53.8
Other financial income	0.6	21.5
Total financial income	51.2	80.2
Expenses from financial instruments at fair value	-10.0	-3.4
Expenses from financial instruments at amortized cost	-	-5.5
Foreign exchange rate losses	-37.6	-51.1
Impairment and allowances	-757.2	-
Other financial expenses	-9.9	-18.1
Total financial expenses	-814.7	-78.1

Foreign exchange rate gains and losses comprise gains and losses from financial instruments at amortized cost and financial instruments at fair value. The latter also includes the fair value changes of foreign currency derivatives. In 2023, the net foreign exchange losses amounted to CHF 1.0 million (2022: net foreign exchange gains of CHF 2.7 million), of which CHF 0.1 million relate to financial instruments at amortized cost (2022: net loss of CHF 16.8 million) and CHF 0.9 million to financial instruments at fair value (2022: net gain of CHF 19.5 million).

In 2023, impairment and allowances included impairment of associates of CHF 756.1 million which was mainly related to the impairment on the investment in Worldline SA of CHF 752.8 million, see note 28.

Other financial expenses mainly comprise the deemed disposals of CHF 6.9 million (2022: CHF 5.2 million) arising from new shares issued under employee share purchase plans of Worldline SA. In 2022, other financial expenses also included the loss on the sale of Custodigit of CHF 11.9 million, see note 28.

In 2022, other financial income contained the remeasurement gain related to REGIS-TR of CHF 10.3 million, (see note 29), a remeasurement gain of CHF 5.8 million on the NCI liabilities of Orenda and a gain of CHF 3.7 million from the deconsolidation of F10 Group (see note 28).

In 2022, expenses from financial instruments at amortized cost included losses from disposals of bonds related to a restructuring of the SECB bond portfolio.

10 Interest Income and Expenses

CHF million	2023	2022
Interest income bonds	2.7	0.6
Cash and cash equivalents	3.8	0.2
Others	1.0	0.1
Total interest income	7.5	0.9
Interest expenses bonds	-0.1	-0.5
Cash on bank and overdrafts	-0.6	-4.2
Borrowings	-1.5	-1.1
Interest expenses on lease liabilities	-3.3	-2.8
Others	-0.1	-0.0
Total interest expenses	-5.6	-8.6

In 2023, total interest expenses do not include any interest charges arising from negative interest rates on financial assets (2022: CHF 4.2 million).

11 Earnings per Share

Basic earnings per share are calculated by dividing the profit/(loss) for the year attributable to shareholders of S.O by the weighted average number of shares outstanding during the year.

	Notes	2023	2022
Net profit/(loss) attributable to shareholders of S.O Group Ltd (in CHF million)		-1,006.0	185.4
Weighted average number of shares outstanding	22	18,914,041	18,914,041
Basic earnings per share (in CHF)		-53.19	9.80

There was no dilution of earnings per share in 2023 or 2022.

Income Taxes

12 Income Taxes

Income tax expenses

The major components of income tax expenses for the years ending 31 December 2023 and 31 December 2022 were as follows:

CHF million	2023	2022
Current tax		
Current tax on profits for the year	-71.1	-74.4
Adjustments in respect of prior years	-1.4	-2.4
Total current tax expenses	-72.5	-76.8
Deferred tax		
Origination and reversal of temporary differences	21.3	22.2
Deferred tax on tax losses	18.2	3.4
Other changes in deferred tax	-0.1	-0.1
Total deferred tax benefits/(expenses)	39.4	25.6
Total income tax expenses	-33.1	-51.2

Since 2021, the OECD has published the framework, an extensive commentary and further guidelines regarding the Pillar Two Model Rules (Minimum Taxation). Pillar Two requires multinational enterprises with annual global revenues exceeding EUR 750 million to pay at least 15% income tax per jurisdiction. As S.O this revenue threshold and operates in jurisdictions exceeds which have enacted or substantively enacted the Pillar Two legislation, the legislation will be effective for S.O for the financial year 2024. S.O has an performed assessment of its potential exposure to Pillar Two

income taxes based on the most recent information available regarding the financial performance of the constituent entities in the Group. Based on this assess
- S.O does not expect an exposure to Pillar Two top-up taxes.

As a measure from the Swiss tax reform in 2019, the super-deduction of R&D expenses is used for selected Swiss entities. The recognized income tax expenses are subject to possible adjustments in the final tax assessments.

Tax reconciliation

The following breakdown shows the reconciliation of the income tax expenses reflected in the financial statements and the amount calculated at the weighted average tax rate:

CHF million	2023		2022	
Income from operating activities, gross of tax expenses		-973.1		236.2
Group's weighted average applicable tax rate/ Group's expected tax expenses	20.4%	198.9	19.4%	-45.7
Impact of differences in tax rates and tax bases	0.1%	0.9	-0.3%	0.8
Utilization of previously unrecognized tax losses	0.0%	0.4	-0.7%	1.7
Deferred tax recognized for tax losses of prior years	0.4%	4.2	-1.7%	4.1
Deferred tax not recognized for tax losses of the year	-36.9%	-359.3	13.4%	-31.7
Adjustments of deferred tax for tax losses of prior years	-	-	0.4%	-0.9
Impact of permanent differences	12.4%	120.6	-9.7%	23.0
Adjustments of prior years	-0.1%	-1.2	1.0%	-2.4
Intercompany effects	0.2%	2.3	-0.0%	0.1
Group's effective tax rate/tax expenses	-3.4%	-33.1	21.7%	-51.2

The expected tax expenses at the weighted average applicable tax rate are the result of applying the domestic statutory tax rates to the earnings before tax of each entity in the country in which it operates and of reversing intercompany effects. The change in the weighted average tax rate was mainly due to the impairment on the investment in Worldline SA in 2023.

The impact of tax losses is mainly related to the losses caused by the impairments of investments in subsidiaries and associates in the local accounts of the Swiss-based holding companies and the specific method of participation exemption under Swiss tax law. A deferred tax asset could be recognized only on a minor part of the respective tax loss.

Permanent differences include tax-exempt income, non-deductible expenses and the effects of relevant tax regulations and participation exemptions. In 2023, permanent differences included the tax-deductible impairments of investments in subsidiaries and associates in the local accounts and goodwill impairments. In

2022, permanent differences included the non-taxable share of profit of associates and the tax-deductible impairments on investment in subsidiaries in the local accounts.

Income tax receivables and payables

The estimated amounts of current income tax receivables and payables, including any amounts related to uncertain tax positions, are based on currently known facts and circumstances.

In 2022, the Tax Authorities of the Canton of Zurich have announced a reassessment of the possible tax effects of the disposal of the former cards business on Swiss Options Ltd and S.O Financial Information Ltd in the 2018 tax period. During 2023, there were no relevant developments. The possible tax claim would amount to a maximum of CHF 26.0 million. Management believes that it has strong arguments to defend its current position and that the reassessment will not lead to a payment. Accordingly, no provision for any liability has been made in these financial statements.

13 Deferred Tax Assets and Liabilities

Deferred taxes relating to items in the balance sheet

Deferred tax assets and liabilities relate to the following items:

CHF million	31/12/2023		31/12/2022	
	Assets	Liabilities	Assets	Liabilities
Trade and other receivables	0.1	0.9	0.1	0.8
Financial assets	0.3	2.0	0.0	3.3
Other assets	0.2	0.8	0.2	1.0
Property, plant and equipment	0.0	13.5	0.0	8.7
Intangible assets	0.6	218.8	0.3	251.0
Investments in subsidiaries and associates	–	2.0	–	1.2
Assets from pension fund benefits	–	2.3	0.0	2.3
Provisions	1.7	–	1.0	0.0
Other liabilities	5.2	0.0	5.2	0.0
Financial liabilities	10.5	0.1	6.0	0.1
Pension fund liabilities	4.0	–	4.2	–
Tax loss carryforwards	23.3	–	5.1	–
Total deferred tax assets/liabilities	45.9	240.5	22.1	268.6
Offsetting	–14.1	–14.1	–6.4	–6.4
Deferred tax assets/liabilities on the balance sheet	31.8	226.4	15.7	262.2

Net deferred tax assets and liabilities changed as follows:

CHF million	Notes	2023	2022
Carrying amount at 1 January		–246.5	–284.9
Business combinations	29	–	–21.1
Changes affecting the income statement		39.4	25.6
Changes affecting OCI		1.2	21.0
Translation adjustments		11.2	12.9
Carrying amount at 31 December		–194.6	–246.5
<i>of which deferred tax assets</i>		<i>31.8</i>	<i>15.7</i>
<i>of which deferred tax liabilities</i>		<i>–226.4</i>	<i>–262.2</i>

Expiry dates of recognized and unrecognized unused tax loss carryforwards

The gross values of recognized and unrecognized unused tax loss carryforwards, with their expiry dates, are as follows:

CHF million	31/12/2023			31/12/2022		
	Not recognized	Recognized	Total	Not recognized	Recognized	Total
One year	12.1	2.7	14.7	15.0	–	15.0
Two years	2.2	2.5	4.7	14.7	–	14.7
Three years	42.3	2.3	44.6	4.7	–	4.7
Four years	55.7	7.9	63.6	43.5	–	43.5
Five years	60.8	10.2	70.9	55.1	7.9	63.0
Six years	142.6	4.0	146.6	55.9	8.8	64.7
More than six years	1,837.8	71.7	1,909.5	167.9	7.5	175.4
Total	2,153.5	101.2	2,254.7	356.9	24.2	381.1
Potential tax saving	425.8		425.8	57.1		57.1

No deferred tax assets have been recognized for tax loss carryforwards of CHF 2,153.5 million (31 December 2022: CHF 356.9 million), as it is uncertain whether the losses will be utilized in the future. As at 31 December 2023, the potential tax saving from unrecognized tax loss carryforwards was CHF 425.8 million (31 December 2022: CHF 57.1 million).

As at 31 December 2023, tax loss carryforwards of CHF 101.2 million (31 December 2022: CHF 24.2 million) were recognized, resulting in deferred tax assets of CHF 23.3 million (31 December 2022: CHF 5.1 million).

Assets, Equity and Liabilities

14 Cash and Cash Equivalents

CHF million	31/12/2023	31/12/2022 restated ¹
Cash at central banks	3,096.3	3,600.3
Cash at other banks and on hand	1,048.7	1,126.1
Short-term deposits	3,213.8	3,994.2
Cash and cash equivalents	7,358.8	8,720.6

¹ See note 2.4 for further information on the restatement.

Cash at other banks includes cash held with commercial banks and, in the post-trading business, cash held with other custodians for cross-border settlements.

Short-term deposits consist primarily of reverse repurchase agreements and fixed deposits with a contractual maturity of three months or less.

Cash and cash equivalents include the following items for the purposes of the statement of cash flows:

CHF million	31/12/2023	31/12/2022 restated ¹
Cash and cash equivalents	7,358.8	8,720.6
Bank overdrafts	-0.0	-472.0
Cash and cash equivalents in the statement of cash flows	7,358.8	8,248.7

¹ See note 2.4 for further information on the restatement.

As at 31 December 2022, SECB used its securities portfolio to obtain liquidity from Deutsche Bundesbank as

part of a Lombard transaction due to temporary withdrawals of deposits of participants.

15 Trade and Other Receivables

CHF million	31/12/2023	31/12/2022
Trade receivables	159.8	148.6
Unbilled receivables	26.6	26.9
Other receivables	16.3	26.4
Total trade and other receivables	202.8	201.9

The exposure of S.O in relation to credit risk and details of expected credit losses on trade and other receivables are disclosed in note 25. The maximum exposure to credit risk at the reporting date corresponds to the carrying amount.

Trade and other receivables due from related parties are disclosed in note 34.

16 Assets and Liabilities from Clearing & Settlement

CHF million	31/12/2023	31/12/2022 restated ¹
Receivables from open margin calls ²	33.7	69.2
Receivables from clearing & settlement of derivatives ²	5.9	39.4
Receivables from ATM and debit processing ³	520.9	382.6
Other receivables from clearing & settlement ²	1.8	0.2
Total receivables from clearing & settlement	562.4	491.3
Equities and fixed income forwards ²	72.7	242.4
Options and energy derivatives ²	173.9	451.5
Total derivatives from clearing & settlement	246.6	693.9
Total assets from clearing & settlement	809.0	1,185.3
Payables from open margin calls ²	13.2	86.2
Payables from clearing & settlement of derivatives ²	5.9	39.4
Payables from ATM and debit processing ³	518.0	371.0
Other payables from clearing & settlement ²	26.4	13.9
Total payables from clearing & settlement	563.5	510.6
Equities and fixed-income forwards ²	73.2	245.6
Options and energy derivatives ²	173.9	451.5
Total derivatives from clearing & settlement	247.1	697.1
Total liabilities from clearing & settlement	810.6	1,207.6

¹ See note 2.4 for further information on the restatement.

² Securities Services

³ Banking Services

Assets and liabilities from clearing & settlement – Securities Services

Assets and liabilities from clearing & settlement in the post-trading area derive from unsettled transactions when S.O acts as a central counterparty (CCP) or a central securities depository (CSD) for securities trading.

Open margin calls are cash collaterals to be received or paid out on the following business day due to updated margin requirements on unsettled transactions.

Receivables and payables from the clearing & settlement of derivatives include unsettled variation margins and option premiums. Unsettled variation margins comprise fair value changes of derivatives with daily settlements. As the cash settlements are carried out through S.O in its role as the central counterparty, the variation margins

and option premiums are exchanged between the trade parties on the following business day.

Derivatives from clearing & settlement include the following items:

- Equities and fixed income: The settlement of instruments and the settlement of cash take place two days after the trade date if the buyer and seller fulfill their obligations. The fair value of unsettled transactions is presented as equities and fixed-income forwards.
- Derivatives: The settlement of derivative instruments takes place on the trade date. If the daily fair value changes are not cash-settled on a daily basis, the fair values are presented as options and energy derivatives from clearing & settlement.

The positive replacement values of derivatives from clearing & settlement represent the amount that S.O would receive if the derivative contracts were settled in full on the reporting date. The negative replacement values, on the other hand, represent the amount that S.O would need to pay if the derivative instruments were settled in full on the reporting date.

Receivables and payables from clearing & settlement – Banking Services

Receivables and payables from clearing & settlement in Banking Services derive from the processing of ATM and debit card transactions. Receivables are due from banks and card schemes. Payables from clearing & settlement include payables due to ATM providers, card schemes and acquirers.

17 Financial Assets and Liabilities (Current and Non-current)

CHF million	31/12/2023	31/12/2022
		restated ¹
Current and non-current financial assets		
Bonds at amortized cost	1,609.7	1,783.6
Bonds at FVtOCI	100.6	200.8
Short-term credits	60.9	46.5
Other debt instruments	150.0	111.5
Equity instruments	83.7	43.4
Units in investment funds	186.4	2.3
Financial instruments from settlement business	32.3	11.8
Derivative financial assets	2.0	0.9
Total	2,225.6	2,200.9
<i>of which current</i>	<i>521.2</i>	<i>667.5</i>
<i>of which non-current</i>	<i>1,704.4</i>	<i>1,533.3</i>
Current and non-current financial liabilities		
Deposits of participants	7,281.6	8,241.3
Liabilities from borrowed securities	58.4	67.0
Payables from repurchase agreements	–	18.7
Lease liabilities	175.6	151.1
Borrowings	1,227.5	1,273.5
Derivative financial liabilities	5.8	0.3
Other financial liabilities	106.1	96.9
Total	8,855.0	9,848.7
<i>of which current</i>	<i>7,370.2</i>	<i>8,353.8</i>
<i>of which non-current</i>	<i>1,484.9</i>	<i>1,494.9</i>

¹ See note 2.4 for further information on the restatement.

Bonds at amortized cost

In 2023, bonds at amortized cost decreased by CHF 173.8 million. This decrease mainly resulted from adverse foreign currency effects of CHF 85.8 million (2022: CHF 100.6 million), which largely resulted from translating the assets of foreign operations and

were accordingly recognized on Group level in other comprehensive income, net disposals of CHF 84.5 million (2022: net disposals of CHF 81.6 million), and amortization of premiums paid of CHF 3.0 million (2022: CHF 5.2 million).

Bonds at FVtOCI

Bonds at FVtOCI include government bonds which are held to fulfill the interoperability collateral requirements of S.O x-clear Ltd against other central counterparties. The objective of the business model is achieved both by collecting contractual cash flows and by selling bonds. In 2023, bonds at FVtOCI decreased by CHF 100.2 million mainly due to disposals.

Short-term credits

S.O SIS Ltd. grants short-term financing to other central counterparties and participants of the CSD. These funds are used for settlement activities. Additionally, short-term credits include reverse repurchase agreements with a contractual duration of more than three months. All items are covered with collaterals.

Other debt instruments

Other debt instruments include loans, fixed deposits with a maturity of more than three months and funds blocked for sanctioned persons. In 2023, other debt instruments increased mainly due to a new cash deposit related to regulatory requirements of CHF 23.2 million and higher funds blocked for sanctioned persons of CHF 9.4 million.

Equity instruments at FVtPL

Equity instruments at FVtPL comprise listed and unlisted shares held by S.O. The increase in 2023 resulted from investments made to build up a strategic investment portfolio.

Units in investment funds

Units in investment funds contain mainly investments in listed funds. The increase in 2023 resulted from investments made to build up a strategic investment portfolio.

Financial instruments from settlement business

These financial instruments represent listed financial instruments that S.O acquires in its role as a CCP as a result of a failure by a counterparty to deliver its side of the transaction. Usually, this occurs when the securities of a trade are only partially delivered on the intended settlement date. In such cases, the delivered securities

are acquired by S.O. Upon delivery of the remaining securities, the trade is completely settled and the securities are derecognized.

Deposits of participants

In Securities Services, participants hold deposits with S.O. To ensure that participants meet all their obligations, a portion of the deposits is blocked as cash collateral. As at 31 December 2023, participant deposits amounted to CHF 5,904.1 million (31 December 2022: CHF 7,345.9), of which cash collaterals received totaled CHF 4,738.3 million (31 December 2022: CHF 5,586.9 million). For further information on collaterals received, see note 25.

In Banking Services, where S.O acts as a correspondent bank through its subsidiary SECB, deposits of participants amounted to CHF 1,377.5 million as at 31 December 2023 (31 December 2022: CHF 895.4 million) and are held at Deutsche Bundesbank or invested in bonds.

Liabilities from borrowed securities

Liabilities from borrowed securities relate to transactions in the clearing & settlement business of Securities Services. In trades in which the seller fails to deliver the required securities at the intended settlement date, S.O borrows the securities and transfers them to the buyer. A corresponding liability to return the borrowed securities is recognized until the seller delivers the securities.

Lease liabilities

In 2023, the lease liabilities increased mainly due to new leases, extension of leases and index adjustments totaling CHF 43.0 million (2022: CHF 5.6 million). The increase was partially offset by the amortization of CHF 15.9 million (2022: CHF 18.9 million).

Borrowings

Borrowings include bonds issued by S.O and non-interest-bearing loans. In 2022, the increase in loans was mainly due to a vendor loan for the purchase of hardware, software and services. Details of movements are provided below under "Changes in liabilities from financing activities".

The key terms of the bonds were as follows:

CHF million						Carrying amount	
Instruments	Issuer	Year of issuance	Nominal value in millions	Maturity	Effective interest rate	31/12/2023	31/12/2022
0.0% bond ¹ ISIN ES0305523005	S.O (Luxembourg) SA	2020	EUR 650.0	02/12/2025	0.04%	606.1	638.6
0.125% dual part bond Part A: ISIN CH1142754337 Part B: ISIN CH1142754345	Swiss Options Ltd	2021	CHF 150.0	27/11/2026	0.21%	149.6	149.5
0.2% bond ISIN CH1132966347	Swiss Options Ltd	2021	CHF 450.0	28/09/2029	0.21%	449.8	449.8
Total						1,205.6	1,237.9

¹ This bond has been designated as a hedging instrument for a net investment hedge to hedge the foreign currency exposure. For further details on hedge accounting, see note 25.

Other financial liabilities

Other financial liabilities include, in particular, liabilities due to non-controlling interests and liabilities to pass on the funds received for sanctioned persons (see

“Other debt instruments” above). The NCI liabilities result from the acquisition of Ultumus Limited and totaled CHF 2.4 million as at 31 December 2023 (31 December 2022: CHF 2.7 million).

Changes in liabilities arising from financing activities

The following table provides a reconciliation of the liabilities arising from financing activities.

				2023
CHF million	Lease liabilities	Borrowings / Bonds	Borrowings / Loans	Total
Carrying amount at 1 January	151.1	1,237.9	35.6	1,424.5
Cash paid	-15.9	0.0	-13.6	-29.6
Changes in scope of consolidation	-0.1	-	-	-0.1
Changes through P&L	0.0	0.4	2.2	2.7
Other non-cash	43.0	-	-2.2	40.7
Translation adjustments	-2.4	-32.7	-	-35.1
Carrying amount at 31 December	175.6	1,205.6	22.0	1,403.2
<i>of which current</i>	<i>16.6</i>	<i>-</i>	<i>7.7</i>	<i>24.4</i>
<i>of which non-current</i>	<i>159.0</i>	<i>1,205.6</i>	<i>14.2</i>	<i>1,378.8</i>

CHF million	2022 ¹			
	Lease liabilities	Borrowings / Bonds	Borrowings / Loans	Total
Carrying amount at 1 January	165.8	1,270.6	3.8	1,440.2
Cash paid	-18.9	-	-20.2	-39.1
Changes in scope of consolidation	0.5	-	-1.2	-0.8
Changes through P&L	-	0.4	6.3	6.7
Other non-cash	5.6	-	46.9	52.5
Translation adjustments	-1.9	-33.1	-0.0	-35.0
Carrying amount at 31 December	151.1	1,237.9	35.6	1,424.5
<i>of which current</i>	<i>12.9</i>	<i>-</i>	<i>13.6</i>	<i>26.5</i>
<i>of which non-current</i>	<i>138.1</i>	<i>1,237.9</i>	<i>22.0</i>	<i>1,398.0</i>

¹ Prior year figures have been reclassified to conform to the current year's presentation.

18 Other Assets (Current and Non-current)

CHF million	Notes	31/12/2023	31/12/2022
Prepaid expenses		40.8	47.1
Accrued interest		12.4	11.9
Receivables from other taxes		17.1	12.1
Other short-term assets		0.5	3.0
Total other current assets		70.8	74.2
Services to be received		16.4	25.3
Assets from pension fund benefits	33	12.4	13.6
Costs to obtain a contract		6.8	7.6
Other long-term assets		18.1	20.3
Total other non-current assets		53.6	66.8

Receivables from other taxes primarily relate to receivables from withholding, value added and capital taxes.

Services to be received include maintenance services for a period of up to five years which are financed through loans.

Other long-term assets primarily include prepaid expenses.

19 Property, Plant and Equipment

2023

CHF million	Land, buildings and leasehold improvements	Technical facilities	IT hardware	Other tangible assets	Total
Historical cost at 1 January	657.7	210.5	136.4	28.8	1,033.4
Additions	34.6	10.6	31.6	2.4	79.2
Disposals	-10.1	-0.4	-4.1	-1.2	-15.9
Reclassifications	5.5	-0.0	-6.0	0.4	-
Translation adjustments	-6.5	-0.7	-2.6	-0.3	-10.1
Historical cost at 31 December	681.2	220.0	155.4	30.2	1,086.7
Accumulated depreciation at 1 January	-364.6	-162.6	-89.3	-21.0	-637.5
Annual depreciation on assets owned	-6.2	-7.7	-19.9	-2.6	-36.4
Annual depreciation on right-of-use assets	-15.7	-	-2.5	-0.2	-18.5
Disposals	8.9	0.4	3.9	1.1	14.3
Reclassifications	-0.1	-	0.1	-0.0	-
Translation adjustments	2.9	0.2	1.8	0.2	5.0
Accumulated depreciation at 31 December	-374.8	-169.7	-106.0	-22.6	-673.1
Net carrying amount at 31 December	306.3	50.3	49.4	7.6	413.6
<i>of which assets owned, used by S.</i>	<i>121.7</i>	<i>41.0</i>	<i>39.7</i>	<i>6.7</i>	<i>209.1</i>
<i>of which assets owned, subject to an operating lease</i>	<i>31.7</i>	<i>9.2</i>	<i>-</i>	<i>0.3</i>	<i>41.2</i>
<i>of which right-of-use assets</i>	<i>153.0</i>	<i>-</i>	<i>9.7</i>	<i>0.6</i>	<i>163.3</i>

						2022
CHF million	Notes	Land, buildings and leasehold improvements	Technical facilities	IT hardware	Other tangible assets	Total
Historical cost at 1 January		671.7	208.4	141.8	27.2	1,049.0
Additions		4.5	6.3	32.4	2.8	45.9
Disposals		-13.3	-1.2	-38.2	-0.8	-53.6
Business combinations	29	0.4	-	0.1	-0.1	0.3
Reclassifications		-	-2.5	2.5	-0.0	-
Translation adjustments		-5.6	-0.4	-2.1	-0.2	-8.3
Historical cost at 31 December		657.7	210.5	136.4	28.8	1,033.4
Adjusted accumulated depreciation at 1 January		-356.9	-157.1	-106.2	-18.9	-639.1
Annual depreciation on assets owned		-6.2	-7.3	-17.8	-2.9	-34.2
Annual depreciation on right-of-use assets		-15.4	-	-1.2	-0.2	-16.9
Disposals		11.3	1.2	35.0	0.8	48.3
Disposals due to changes in the scope of consolidation		-	-	0.0	0.1	0.1
Reclassifications		-	0.5	-0.5	0.0	-
Translation adjustments		2.6	0.1	1.5	0.1	4.3
Accumulated depreciation at 31 December		-364.6	-162.6	-89.3	-21.0	-637.5
Net carrying amount at 31 December		293.1	47.9	47.1	7.8	395.9
<i>of which assets owned, used by S.O</i>		<i>127.9</i>	<i>36.1</i>	<i>41.3</i>	<i>7.1</i>	<i>212.5</i>
<i>of which assets owned, subject to an operating lease</i>		<i>30.8</i>	<i>11.7</i>	<i>0.0</i>	<i>0.3</i>	<i>42.8</i>
<i>of which right-of-use assets</i>		<i>134.5</i>	<i>-</i>	<i>5.7</i>	<i>0.4</i>	<i>140.6</i>

Additions

In 2023, additions to property, plant and equipment primarily related to leases of office space included in buildings and IT hardware and totaled CHF 79.3 million (2022: CHF 45.9 million). Non-cash additions included right-of-use assets of CHF 44.4 million and leasehold improvements of CHF 0.5 million (2022:

right-of-use assets of CHF 6.7 million and IT hardware CHF 6.3 million). For further details of the leases, see note 32.

As at 31 December 2023, property, plant and equipment under construction totaled CHF 1.8 million (31 December 2022: CHF 1.3 million).

20 Intangible Assets

	2023						
	Indefinite useful life		Finite useful life				
	Goodwill	Trademarks, licenses and others	Customer relation- ships	Acquired software	Internally generated software	Other intangible assets	Total
CHF million							
Historical cost at 1 January	1,615.4	281.2	627.0	109.0	948.8	17.2	3,598.7
Additions	–	0.0	–	13.3	29.6	–	42.9
Disposals	–	–	–	–3.2	–1.0	–	–4.2
Disposals due to changes in scope of consolidation	–2.1	–	–	–0.0	–8.2	–	–10.3
Reclassifications	–	–	–	1.6	–1.6	–	–
Translation adjustments	–83.8	–14.4	–32.1	–0.6	–15.3	–0.1	–146.3
Historical cost at 31 December	1,529.5	266.9	594.9	120.2	952.2	17.1	3,480.8
Accumulated amortization at 1 January	–8.6	–0.1	–99.1	–89.4	–632.7	–12.7	–842.5
Annual amortization	–	–	–41.0	–9.6	–73.7	–1.0	–125.2
Impairments, net	–339.6	0.1	–	–2.8	–3.8	–	–346.2
Disposals	–	–	–	2.1	1.0	–	3.2
Disposals due to changes in scope of consolidation	2.1	–	–	0.0	5.4	–	7.6
Translation adjustments	4.1	–	6.7	0.5	7.3	0.1	18.5
Accumulated amortization at 31 December	–342.1	–0.0	–133.4	–99.2	–696.4	–13.6	–1,284.6
Net carrying amount at 31 December	1,187.5	266.8	461.5	21.1	255.8	3.5	2,196.2

								2022
CHF million	Notes	Indefinite useful life		Finite useful life				Total
		Goodwill	Trademarks, licenses and others	Customer relationships	Acquired software	Internally generated software	Other intangible assets	
Historical cost at 1 January		1,654.0	293.0	583.4	106.6	940.9	17.4	3,595.3
Additions		–	0.1	–	13.2	35.2	–	48.5
Disposals		–	–	–	–9.6	–24.8	–	–34.4
Business combinations	29	41.3	2.7	76.0	–	12.4	–	132.3
Disposals due to changes in the scope of consolidation		–	–	–	–0.6	–	–0.1	–0.7
Reclassifications		–	–	–	–0.1	0.1	–	–
Translation adjustments		–79.9	–14.6	–32.3	–0.5	–15.0	–0.1	–142.4
Historical cost at 31 December		1,615.4	281.2	627.0	109.0	948.8	17.2	3,598.7
Accumulated amortization at 1 January		–7.2	–	–61.6	–88.6	–587.4	–11.8	–756.7
Annual amortization		–	–	–41.4	–8.9	–70.1	–1.0	–121.4
Impairments, net		–1.4	–0.1	–	–0.3	–3.3	–	–5.0
Disposals		–	–	–	6.1	24.6	–	30.7
Disposals due to changes in the scope of consolidation		–	–	–	0.6	–	0.1	0.7
Reclassifications		–	–	–	1.2	–1.2	–	–
Translation adjustments		–	–	3.9	0.5	4.7	0.1	9.3
Accumulated amortization at 31 December		–8.6	–0.1	–99.1	–89.4	–632.7	–12.7	–842.5
Net carrying amount at 31 December		1,606.8	281.2	527.9	19.7	316.1	4.5	2,756.2

Software and other intangible assets

Additions

Expenses for development projects are capitalized when they meet the recognition criteria. Intangible assets under construction as at 31 December 2023 amounted to CHF 29.7 million (31 December 2022: CHF 28.8 million). Non-cash additions amount to CHF 6.7 million (2022: CHF 3.3 million).

Intangible assets with indefinite useful life

Besides goodwill, S.O. owns trademarks and which have an indefinite useful life. The trademarks licenses and licenses assets were recognized upon the acquisition of S.O. and REGISTR. The licenses are needed to maintain the trading and post-trading business of S.O. as well as the trade repository business of REGISTR.

The following table provides a breakdown of the carrying amount of intangible assets with indefinite useful life per cash generating unit.

CHF million	31/12/2023			31/12/2022		
	Goodwill	Trademark, licenses and others	Total	Goodwill	Trademark, licenses and others	Total
Cash-generating unit						
Exchanges (Spain)	593.4	173.5	766.8	960.2	182.8	1,143.0
Securities Services (Spain)	504.0	90.6	594.6	531.9	95.5	627.5
Financial Information (Spain)	2.1	0.2	2.3	2.2	0.2	2.4
12H Ltd	15.8	–	15.8	16.6	–	16.6
Financial Information (Ultumus Limited)	45.6	–	45.6	50.0	–	50.0
REGIS-TR	20.1	2.4	22.5	39.3	2.5	41.8
Others	6.6	0.2	6.7	6.6	0.1	6.7
Total	1,187.5	266.8	1,454.3	1,606.8	281.2	1,888.0

Impairment test for CGUs containing intangible assets with indefinite useful life

Goodwill and other intangible assets with indefinite useful life are subject to an annual impairment test conducted in the fourth quarter of each year. If events or a change of circumstances indicate a possible

impairment, the test is carried out more frequently to determine whether the carrying amount of the relevant organizational unit exceeds its recoverable amount. The following table provides the carrying amount and the key assumptions used in the impairment testing for material CGUs.

CHF million	31/12/2023				
	Carrying amount	Projection period	Perpetual growth rate	Discount rate	Method
Cash-generating unit					
Exchanges (Spain)	1,051.7	3 years	2.0%	9.8%	Value in use
Securities Services (Spain)	714.2	3 years	2.0%	9.4%	Value in use
Financial Information (Spain)	3.1	3 years	2.0%	9.0%	Value in use
12H Ltd	23.5	3 years	1.1%	6.3%	Value in use
Financial Information (Ultumus Limited)	159.3	3 years	1.1%	8.8%	Value in use
REGIS-TR	89.5	3 years	2.0%	8.9%	Value in use
Total	2,041.2				

CHF million	31/12/2022				
Cash-generating unit	Carrying amount	Projection period	Perpetual growth rate	Discount rate	Method
Exchanges (Spain)	1,487.5	3 years	1.5%	7.2%	Value in use
Securities Services (Spain)	745.7	3 years	1.5%	7.1%	Value in use
Financial Information (Spain)	5.4	3 years	1.5%	9.7%	Value in use
12H Ltd	25.9	3 years	0.4%	7.4%	Value in use
Financial Information (Ultimus Limited)	188.5	3 years	0.4%	8.2%	Value in use
REGIS-TR	124.2	3 years	1.0%	6.6%	Value in use
Total	2,577.1				

The recoverable amounts for the CGUs have been determined based on a value in use calculation using the discounted cash flow method (DCF). These calculations use post-tax cash flow projections based on financial projections approved by the BoD. The impairment tests performed in 2023 resulted in impairments of CHF 339.6 million attributable to S.O. Group. The impairments mainly relate to the following two CGUs.

Exchanges (Spain)

The CGU Exchanges (Spain) includes the Spanish exchange business. Higher discount rate, mainly driven by the higher risk-free interest rate and low trading volumes have led to an impairment of goodwill of the Exchange (Spain) CGU in the amount of CHF 321.5 million (31 December 2022: none).

REGIS-TR

The CGU REGIS-TR includes the business operations of the entities REGIS-TR SA and REGIS-TR UK Ltd. The impairment of goodwill of the REGIS-TR CGU amounting to CHF 17.4 million (31 December 2022: none) mainly results from elevated discount rates arising from the prevailing interest rate environment.

Key assumptions

The calculation of value in use is most sensitive to the following assumptions:

Cash flows within the projection period

The free cash flows of the first year of the plan are based on the budgets of the CGUs. For the second and third year of the plan, the free cash flows are calculated using growth rates from the mid-term financial plan of the respective business unit to which the CGU belongs.

Perpetual growth rate

Cash flows beyond the financial plan period are extrapolated using a perpetual growth rate which is the lower of risk-free rate and long-term inflation rate of the region in which the CGU operates.

Discount rate

The discount rate calculation is derived from the capital asset pricing model and is based on the specific circumstances of S.O and its operating segments. In 2023, it considers the spot rate of the risk-free interest rate based on long-term government bond yields and market risk premiums. In 2022, an average of the risk-free rate was applied in order to address the short-term fluctuations on the interest rate markets at that time. The discount rate used also takes into consideration the specific risks relating to the cash-generating unit. Beta and equity/ debt ratio have been derived from peer groups.

Key assumptions used to determine the recoverable amounts of each CGU are tested for sensitivity by applying a reasonably possible change to those assumptions. Undiscounted free cash flows available to shareholders were changed by 10%, the discount rate by 1%, and the perpetual growth rate by 1%. Management believes that no reasonably possible change in any of the above key assumptions would cause the carrying amount of any cash-generating unit to exceed its recoverable amount except for the CGU Exchanges (Spain) and REGIS-TR. As the recoverable amount of these CGUs equal their carrying amount after impairment, any unfavorable change in a key assumption would result in a further impairment.

21 Capital Management

S.O capital management ensures adequate equity to maintain shareholder and market confidence, as well as sufficient capital to drive the future development of the business, while complying with regulatory capital requirements for the relevant Group entities.

In December 2023, Standard & Poor's Global Ratings (S&P) affirmed the issuer credit ratings of Swiss Options Ltd (A/A-1)

and its operating subsidiaries, S.O x-clear Ltd and S.O SIS (A+/A-1). The outlook was revised from stable to negative.

S.O considers both equity and debt as relevant components of funding. S.O uses the equity ratio and net to adjusted EBITDA ratio to monitor capital and leverage, debt and the return on equity to monitor the financial performance. These ratios are reported to the Executive Board and the Board of Directors on a regular basis through the internal financial reporting.

The ratios are shown in the following table:

CHF million	2023	2022
Return on equity		
Group net profit/(loss)	-1,006.2	185.0
Adjustment for goodwill impairment	339.6	-
Value adjustment of Worldline SA	862.3	-
Tax effect on value adjustment of Worldline SA	-14.7	-
Adjusted Group net profit for the year	181.1	185.0
Total equity (average previous 12 months)	4,920.8	5,092.0
Pro-rata adjustment of impairment and value adjustment (net of tax)	98.9	-
Total adjusted equity (average previous 12 months)	5,019.7	5,092.0
Adjusted return on equity	3.6%¹	3.6%
Equity ratio		
Total liabilities (average previous 12 months)	11,414.9	14,532.8
Adjustment of average for C&S positions from Banking Services and Securities Services	-9,238.6	-12,264.4
Total adjusted liabilities (average previous 12 months)	2,176.3	2,268.4
Total adjusted equity (average previous 12 months)	5,019.7	5,092.0
Adjusted equity ratio	69.8%²	69.2%
Net debt to adjusted EBITDA		
Lease liabilities	175.6	151.1
Borrowings	1,227.5	1,273.5
Other debt	8.8	9.4
Total debt	1,412.0	1,433.9
Free unencumbered cash	-764.5	-736.0
Net debt	647.5	697.9
EBITDA	413.4	397.7
Adjustments	5.4	1.6
Adjusted EBITDA	418.8	399.3
Net debt to adjusted EBITDA	1.5	1.7

¹ Without adjustments, the return on equity amounts to -20.4%.

² As at 31 December 2023, the equity ratio (calculated at the balance sheet date and with the unadjusted equity) amounts to 64.2%.

For the calculation of the net debt to adjusted EBITDA ratio, S.O follows the methodology applied by S&P Global Ratings. Other debt includes the defined benefit pension obligations net of tax. Free unencumbered cash comprises unpledged cash net of bank overdrafts, cash equivalents and securities, minus net positions from clearing & settlement, operating cash reserves and cash restricted due to regulatory requirements, respectively. The EBITDA adjustments include in particular dividend income from equity investments. S.O remains committed to deleveraging over the mediumterm.

The dividend policy of S.O takes into account the local requirements of each subsidiary to make dividend payments. On 8 May 2023, the Annual General Meeting approved the distribution of a dividend of CHF 5.10 (2022: CHF 4.75) per registered share. The total amount distributed to holders of outstanding shares was CHF 96.5 million (2022: CHF 89.8 million). The dividend was recorded against retained earnings as in the previous year.

For the year ending 31 December 2023, the Board of Directors has proposed an ordinary dividend of CHF 5.20, corresponding to a total of CHF 101.5 million for 2023. No dividend will be paid on treasury shares held directly by Swiss Options Ltd. There are no tax consequences. The dividend proposal will be submitted for approval by the Annual General Meeting to be held in the second quarter of 2024.

Regulatory capital requirements

The Group is not subject to regulatory capital requirements. However, regulatory capital adequacy requirements apply to the following entities of the Group: S. O SIS Ltd, S.O x-clear Ltd, S.O Digital Exchange Ltd, S.O. Clearing SAU, Iberclear, SECB, REGIS- TR SA and REGIS- TR UK Ltd. The regulatory capital requirements are monitored by the management of the respective group entities.

	Minimum requirement	31/12/2023	31/12/2022
Capital fulfillment ratio			
S.O SIS	110.0%	153.7%	164.2%
S.O x-clear	110.0%	178.9%	169.2%
S.O Digital Exchange	110.0%	143.8%	154.1%
S.O. Clearing	110.0%	242.0%	314.9%
SAU Iberclear	110.0%	508.0%	593.0%
Basel III capital ratio			
SECB Swiss Euro Clearing Bank GmbH	16.8%	39.7%	56.6%

The CSDs S.O SIS Ltd, S.O Digital Exchange Ltd and the CCP S.O x-clear Ltd are obliged to fulfill requirements arising from the Financial Market Infrastructure Act and Ordinance (FMIA / FMIO). Eligible capital must be available to support business activities, in accordance with both the internal assessment of the Company and the requirements of the regulators, in particular those of the lead regulators, FINMA and the SNB. These capital requirements contain all elements of the Basel III framework pertaining to credit, non-counterparty, market and operational risks, as well as additional FMI-specific capital requirements for recovery capital, wind-down, intraday credit risks and potential defaults of participants. To calculate the capital requirements for credit risks, market risks and operational risks, FMIs may choose from a number of different approaches under Basel III. S.O SIS Ltd, S.O x-clear Ltd and S.O Digital Exchange Ltd use the international Basel III standard approach (SA-BIZ) for credit risks, the standard approach for market risks and the basic Indicator approach for operational risks. S.O is supervised by the National Securities and Market Commission (CNMV) and Banco de España. The capital requirements of S.O are based on Spanish law and European Parliament Regulations related to trading, CSD and CCP business. The EU regulations for CSDs and CCPs require that the capital covers the risks stemming from the activities of the CSD/CCP and shall be at all times sufficient to ensure adequate protection against credit, counterparty, market, operational, legal, custody, investment and business risks so

that the CSD/CCP can continue to provide its services and, if required, ensure an orderly winding-down or restructuring.

SECB has a banking license and is regulated by the Federal Financial Supervisory Authority (BaFin). The bank is obliged to fulfil the capital requirements according to the European Union Capital Requirements Regulation (CRR). To calculate the capital requirements, SECB uses the standard approach according to CRR for credit risk and the basic indicator approach for operational risk.

REGIS-TR SA is supervised by the European Markets and Securities Authority (ESMA) and REGIS-TR UK Ltd is supervised by the Financial Conduct Authority (FCA). In accordance with article 21 (b) of the EU delegated regulation 150/2013, REGIS-TR SA has to maintain an amount of liquid net assets funded by equity sufficient to cover potential general business losses in order to continue providing services as a going concern, and an assessment of the sufficiency of its financial resources to cover operational costs in a wind-down or reorganization of critical operations and services over at least a six month period with respect to its continuance as a trade repository company within the EU. The regulatory requirement has been fully adopted by the FCA and therefore also applies to REGIS-TR UK Ltd. At 31 December 2023, the regulatory own fund requirements for REGIS-TR amounted to CHF 10.7 million (31 December 2022: CHF 9.8 million). The coverage ratio of own funds was 107.6% (31 December 2022: 186.9%).

22 Capital and Reserves

Share capital

Number of shares	31/12/2023	31/12/2022
Shares issued	19,521,905	19,521,905
Treasury shares	-607,864	-607,864
Shares outstanding	18,914,041	18,914,041

As at 31 December 2023, the total number of shares issued remained unchanged from the prior year at

19,521,905 and corresponds to the number of authorized shares. All shares issued have a par value of CHF 1.00 and are fully paid up.

The shares rank equally with regard to the Company's residual assets.

The holders of the shares are entitled to one vote per share at the shareholders' meeting of Swiss Options Ltd. The proposed dividend per share for financial year 2023 is disclosed in note 21.

Other reserves

CHF million	2023			2022		
	Treasury shares	Translation reserves	Total other reserves	Treasury shares	Translation reserves	Total other reserves
Balance at 1 January	-23.3	-422.9	-446.3	-23.3	-227.7	-251.0
Translation adjustment of foreign operations	-	-149.4	-149.4	-	-144.9	-144.9
Translation adjustment of associates	-	-62.6	-62.6	-	-76.3	-76.3
Translation adjustment reclassified to income statement	-	0.9	0.9	-	0.9	0.9
Gains/(losses) on net investment hedges	-	33.0	33.0	-	33.2	33.2
Income taxes on gains/(losses) on net investment hedges	-	-8.2	-8.2	-	-8.5	-8.5
Less: translation adjustment of non-controlling interests	-	0.2	0.2	-	0.3	0.3
Balance at 31 December	-23.3	-609.1	-632.4	-23.3	-422.9	-446.3

Treasury shares

The reserve for own shares comprises the cost of the shares held by S.O. At 31 December 2023, S.O. held 607,864 shares directly or indirectly via its subsidiaries. There was no change in the number of treasury shares compared with 31 December 2022.

Translation reserve

Reserves arising from foreign currency translation adjustments comprise the differences arising from the foreign currency translation of the financial statements of subsidiaries and associated companies from their respective functional currencies into Swiss francs.

Retained earnings

The total amount of dividends distributed to holders of outstanding shares was CHF 96.5 million (2022: CHF 89.8 million), which has been recorded against retained earnings as in the prior year.

23 Provisions (Current and Non-current)

	2023				2022
CHF million	Provisions for legal claims	Provisions for employment law claims	Provisions for asset retirement obligations	Other provisions	Total
Carrying amount at 1 January	3.6	–	3.0	6.8	13.4
Increase in provisions	0.0	6.8	0.5	–	7.3
Business combinations	–	–	–	–	–
Financial cost related to the unwinding of discount rates	–	–	0.1	–	0.1
Dissolution	–0.4	–	–0.2	–2.9	–3.5
Usage	–0.0	–0.0	–	–0.2	–0.2
Translation adjustments	–0.0	–0.2	–0.0	–0.1	–0.4
Carrying amount at 31 December	3.2	6.5	3.4	3.6	16.6
<i>of which current</i>	<i>–</i>	<i>2.9</i>	<i>0.0</i>	<i>0.0</i>	<i>2.9</i>
<i>of which non-current</i>	<i>3.2</i>	<i>3.6</i>	<i>3.3</i>	<i>3.6</i>	<i>12.4</i>

Provisions for legal claims

S.O is involved in legal and judicial proceedings and claims arising from the ordinary business activities. Provisions and contingencies in connection with these matters are periodically assessed based on the latest information available, usually with the assistance of lawyers and other specialists.

Provisions for employment law claims

The increase of CHF 6.8 million in 2023 is related to a voluntary redundancy plan which includes early retirement benefits. The estimated benefits will be provided until 2027.

Provisions for asset retirement obligations

The provisions for asset retirement obligations mainly relate to cost estimates for the decommissioning of leasehold improvements in Switzerland, France and the UK.

Other provisions

Other provisions mainly concern risks relating to the financial information business.

24 Other Liabilities (Current and Non-current)

CHF million	Notes	31/12/2023	31/12/2022
Accruals for staff-related costs		88.1	92.1
Accrued expenses		55.4	51.0
Liabilities from other taxes		26.6	30.6
Other short-term liabilities		17.2	10.0
Total other current liabilities		187.4	183.7
Pension fund liabilities	33	11.8	12.5
Other employee benefit liabilities		21.3	21.6
Total other non-current liabilities		33.0	34.1

Accruals for staff-related expenses are for vacation leave, overtime, jubilees and bonuses. The long-term portion of liabilities for jubilees and bonuses is

included in other employee benefit liabilities. The methods used to measure pension fund liabilities are explained in note 33.

Financial Instruments

25 Financial Risk Management

The Group's general risk management framework and guidelines are described in the Risk section of the Annual Report 2023. Specifically in relation to financial instruments, the Group is exposed to various risks based on the nature of its operations.

Credit risk

General

Counterparty credit risk is defined as the risk of a loss caused by a counterparty not fulfilling its contractual obligations or commitments. Given the nature of its core business activities, S.O monitors the counterparty default risk for all its major risk-related activities, in particular for the following financial – cash at banks and short-term deposits positions:

- trade and other receivables
- assets from clearing & settlement
- short-term credits
- derivatives
- bonds
- other debt instruments

Within the post-trading area of the Securities Services business unit, credit exposures mainly relate to short-term interim financing undertaken for the purpose of settling securities transactions and to cash management activities. With the exception of S.O affiliates, all short-term financing is fully covered by collateral in the form of cash and repo-eligible securities. For further details, see also the section on collateral management below.

At the traditional trading venues such as S.O Swiss Exchange and Bolsas y Mercados Españoles, trading and settlement are separate transactions. For example, settlement in equities and fixed income markets usually takes place two days after the trading. Between trading and settlement, S.O has to manage counterparty risks. The exposure related to open clearing & settlement transactions is reflected in the derivatives from the clearing & settlement business. As S.O acts as a CCP, positive replacement values generally equal negative replacement values. At SDX, settlement is an integral part of the trading process. The trading venue verifies that participants have sufficient assets or funds available for the planned transaction before confirming it. As a result, no counterparty risk needs to

be managed after the trade is completed and there are no financial risks stemming from clearing & settlement.

In the Securities Services business unit, credit risk management is executed via limits granted to the customers by the relevant bodies within S.O, in accordance with the competency rules. Each participant with a credit limit is subject to an initial credit risk assessment and rating assignment, as well as a periodic review. No credit limits are granted without a prior risk assessment and rating assignment. Credit limits are continuously monitored to ensure that the risk profile is always in line with the risk appetite and credit risk policy. Based on the amount of risk-equivalent limits and the creditworthiness, each counterparty is assigned to a risk group, which defines the depth and frequency of the review. Counterparties in higher risk groups (high "risk-equivalent limits", low credit rating) are reviewed more frequently and monitored more closely than those in lower risk groups.

In businesses other than post-trading, counterparty credit risk arises in particular from investments of operating liquidity of S.O, which primarily takes the form of cash deposits with banks or fixed-income investments. As in the post-trading business area, such credit exposures are constrained by investment limits, which vary in size depending on the creditworthiness of the counterparty. Risk Management is responsible for monitoring exposures against investment limits and tracks counterparty risk indicators on a daily basis.

As at 31 December 2023, the bond portfolio of SECB amounted to CHF 1,414.0 million (31 December 2022: CHF 1,680.6 million) and was composed of bonds rated as investment grade with an average remaining term of 2.2 years (31 December 2022: 2.4 years). New portfolio investments are subject to different levels of approval based on the counterparty rating and bond type.

In the context of strategic investments, S.O has an investment policy in place that imposes minimum credit ratings for direct and indirect investments in bonds. Treasury regularly monitors strict compliance with this policy.

With regard to trade and other receivables, S.O. has a large number of debtors, which are internationally dispersed. The credit risks in this respect are considered insignificant. The creditworthiness is assessed by either the operating business unit or the local finance departments, taking into account the customer's financial strength, past experience and other factors.

Acting as the first line and overseen by the second line of defense, each business unit has primary responsibility for managing and monitoring its credit risks.

Aggregated credit risk exposures are closely monitored against the risk appetite thresholds of S.O. and regularly reported to the ExB and the BoD.

The gross carrying amounts of financial assets measured at amortized costs, bonds measured at FVtOCI and the related credit ratings of the counterparties are summarized in the following table. The net carrying amounts (net of loss allowances) represent the maximum exposure to credit risk.

CHF million	31/12/2023					
	Investment grade	Non-investment grade	Not rated	Gross carrying amount	Loss allowance	Net carrying amount
Exposure for which loss allowance equals 12-month ECL (Stage 1)						
Cash and cash equivalents ¹	6,553.1	1.6	803.3	7,358.0	-0.0	7,358.0
Receivables from clearing & settlement	521.4	0.9	40.1	562.4	-0.1	562.4
Bonds	1,712.3	-	-	1,712.3	-2.0	1,710.3
Others	188.2	-	6.2	194.4	-0.1	194.4
Total	8,975.1	2.5	849.6	9,827.2	-2.2	9,825.0

CHF million	31/12/2022 (restated) ²					
	Investment grade	Non-investment grade	Not rated	Gross carrying amount	Loss allowance	Net carrying amount
Exposure for which loss allowance equals 12-month ECL (Stage 1)						
Cash and cash equivalents ¹	7,562.2	2.1	1,155.4	8,719.7	-0.0	8,719.6
Receivables from clearing & settlement	451.9	12.2	27.3	491.3	-0.0	491.3
Bonds	1,985.9	-	-	1,985.9	-1.5	1,984.4
Others	137.2	-	9.3	146.5	-0.0	146.5
Total	10,137.2	14.2	1,192.0	11,343.4	-1.6	11,341.8

¹ The balances exclude cash on hand.

² See note 2.4 for further information on the restatement.

The following table shows the gross carrying amounts of trade and other receivables and the related past due status. The net carrying amounts (net of loss allowances) represent the maximum exposure to credit risk.

						31/12/2023
		Lifetime ECL (Stage 2)		Lifetime ECL credit impaired (Stage 3)		
				Receivables with objective evidence of impairment		
CHF million	Not past due	Within 6 months	From 6 to 12 months	More than 12 months		Total
Trade and other receivables, gross	176.8	22.6	4.2	1.6	2.1	207.3
Loss allowance	-0.0	-0.0	-1.2	-1.2	-2.1	-4.5
Net carrying amount	176.8	22.6	3.1	0.3	-	202.8

						31/12/2022
	Lifetime ECL (Stage 2)		Lifetime ECL credit impaired (Stage 3)			
					Receivables with objective evidence of impairment	
CHF million	Not past due	Within 6 months	From 6 to 12 months	More than 12 months		Total
Trade and other receivables, gross	170.3	27.9	4.5	2.7	0.8	206.2
Loss allowance	-0.0	-0.0	-1.1	-2.3	-0.8	-4.2
Net carrying amount	170.3	27.9	3.4	0.4	-	201.9

Collateral management

As part of short-term interim financing for the purpose of settling securities transactions, S.O SIS Ltd provides intraday credit lines and securities lending and borrowing services to its counterparties to increase settlement efficiency and reduce settlement failures. Intraday credit and lending services rendered to counterparties are established on a fully collateralized basis, and collateral is provided by S.O SIS Ltd participants in the form of cash or highly liquid repo-eligible securities. Interim financing provided to participants is fully collateralized in the form of highly liquid repo-eligible securities. In order to protect S.O x-clear Ltd and S.O Clearing SAU, which act as central counterparties, against the risk of default by a clearing member before it has settled its outstanding transactions, clearing members are required under the applicable version of the clearing terms to provide collateral in the form of cash or highly liquid repo-eligible securities under a full-title transfer regime. The margin requirement includes an initial

margin for possible future price fluctuations, a variation margin for actual changes in value and certain add-ons that are called in periods of higher market volatility according to the rulebook. In addition, all counterparties are required to contribute to a default fund to cover the potential risk that is not covered by the margin model (confidence level of at least 99%) in the event of a member's default. The margin model is regularly calibrated and back-tested.

In the debit card and ATM processing services business of Banking Services, S.O is exposed to a counterparty risk as payments are made to schemes before S.O receives the funds from the issuing banks. In order to address this counterparty risk, S.O collects collaterals from the issuer banks through its existing collateral management setup at S.O SIS Ltd. These collaterals are either cash or highly liquid repo-eligible securities, without an unconditional right to repledge or sell these securities. The required level of collaterals may vary depending on the expected level of debit card transactions.

The following table shows the collateral received:

CHF million	Notes	31/12/2023	31/12/2022
Cash collateral	16	4,738.3	5,586.9
Fair value of securities received with a right to repledge or sell		6,471.8	5,139.0
<i>of which related to reverse repurchase transactions</i>		3,206.0	3,813.8
Fair value of securities received without a right to repledge or sell		55.0	–
Total fair value of collateral received		11,265.1	10,725.9

Cash collateral is recognized on the balance sheet, whereas collateral received in the form of securities are off-balance sheet items. As at 31 December 2023, S.O has repledged securities received as collaterals in the amount of CHF 1,034.7 million (31 December 2022: CHF 910.0 million). Due to the collateral received and the potential to pass on losses to market participants in the CSD business, the Group has not designated expected credit losses on any financial assets from clearing & settlement of the Securities Services business unit.

Expected credit losses measurement *Significant increase in credit risk*

In order to assess a significant increase in credit risk, the Group applies a low credit risk threshold equivalent to the “investment grade” and past due status information. When the credit risk increases significantly, the loss allowance is measured at an amount equal to the lifetime ECL (i.e. Stage 2).

Definition of default

S.O considers a financial asset to be in default when a counterparty is unable or likely to be unable to fully meet its financial obligation when due.

In assessing whether a counterparty is in default, the following information is considered:

- qualitative, e.g. the counterparty has been declared in default; and/or
- quantitative, i.e. overdue status

The assessment of whether a financial asset is in default may vary by instrument type. The following reasons give rise to a default event for the respective financial assets:

- Trade and other receivables: A default situation occurs when receivables are more than 180 days past due. The Group performs an analysis showing that 90 days past due is not an appropriate default definition for trade and other receivables and rebuts the 90 days past due presumption. This rebuttal is reviewed on an annual basis.
- All other debt instruments: A default situation occurs when (re-)payments of interests and/or notional amounts are not received in full on time.

In the opinion of management, the above events best represent the default situations of the respective financial assets. A default event results in a transfer to the credit-impaired financial asset category (i.e. Stage 3).

Measuring expected credit losses

The measurement of expected credit losses for financial assets at amortized costs – except for trade and other receivables – is a function of the probability of default (PD), the exposure at default (EAD) and loss given default (LGD):

- The PD represents the likelihood of a counterparty defaulting on its financial obligation either over 12 months or over the remaining lifetime of the obligation. The PDs are generally derived from internally developed statistical models and are updated at least annually. The Group has established global PDs per rating classes which are applied to the exposures based on the counterparty rating (i.e. exposures are grouped by counterparty rating). PDs are based on credit default swaps (CDS) spreads observed in the market. These CDS spreads include the market expectation of default (i.e. forward-looking information). The 12 month PDs are adjusted when the contractual period is less than 12 months (i.e. on-demand deposits have a

contractual period of 1 day). If no rating is available for the counterparty, the PD level is assumed to be in the sub-investment grade range.

- EAD is based on the amounts outstanding at the time of default. S.O assumes that the EAD is equal to the gross carrying amount.
- LGD represents the expectation of S.O regarding the extent of loss on a defaulted exposure. LGD considers the availability of and collaterals the potential to pass on losses to market received participants in the CSD business.

The expected credit losses for trade and other receivables are based on historical loss rate data adjusted for current conditions and future expectation. The loss rate is applied to the gross carrying amount of these assets. Generally, trade and other receivables overdue by more than 180 days are considered to be C-rated, and the corresponding PD is applied to them in order to calculate the impairment amount. Exposures which are more than 360 days past due are generally considered to be D-rated. D-rated assets are fully credit impaired. The policy described above may be adapted by entities for specific conditions on local markets.

The expected credit losses as at 31 December 2023 and 31 December 2022 are presented in the General section above.

Liquidity risk

General

Liquidity risk is the risk that S.O will encounter difficulties in meeting current and future obligations arising from its financial liabilities. Specific to the post-trading business area of S.O, liquidity risk exists mainly as a result of day-to-day operational flows, such as repayments of cash collateral to clearing members and provision of liquidity to facilitate settlement.

Liquidity management is governed by the treasury policy of S.O. Its main purpose is to provide subsidiaries with financial resources at any time so that they are able to meet their payment obligations. The continuous monitoring of liquidity at Group level and the allocation of resources allow Treasury to maintain a sound level of liquidity at all times. The liquidity status is reported on a monthly or quarterly basis to various committees. S.O maintains credit lines with a limited number of financial institutions to cover exceptional liquidity

requirements. The total amount of credit lines as at 31 December 2023 was CHF 723.8 million (31 December 2022: CHF 691.9 million). Additionally, S.O SIS Ltd has foreign currency settlement limits in connection with the cross-border business in the amount of CHF 4,749.9 million (31 December 2022: CHF 2,987.7 million). As at 31 December 2023, none of these financing facilities had been utilized (31 December 2022: none). Liquidity is managed for various currencies. The main currencies are the Swiss franc, euro and US dollar.

The Group's operational liquidity as at 31 December 2023 was CHF 7,358.8 million (31 December 2022: CHF 8,248.7 million). The operational liquidity is deposited with appropriate investment limits at commercial banks, the Swiss National Bank (SNB) and European central banks. Operational liquidity of the Swiss and various foreign subsidiaries, with the exception of S.O SIS Ltd, S.O x-clear Ltd, the S.O. entities and SECB, is held and managed centrally at S.O as part of a cash pool. Treasury is responsible for the management of the cash pool. The liquidity in excess of operational liquidity required by the subsidiaries is provided by Treasury to cover any short to medium-term structural liquidity requirements.

Liquidity management is one of the main operating activities of Securities Services. Liquidity risk in the post-trading business area is managed by ensuring that the expected inflows match the expected outflows in the respective currency. On a day-to-day basis, the Collateral and Liquidity Management team is tasked with ensuring that the Group can meet its financing needs at all times, in particular to ensure that the business continues to operate smoothly in the event of default by a clearing member. In Securities Services, liquidity is mainly placed with other custodians or invested in reverse repurchase transactions with contractual maturity of three months or less.

SECB reported a liquidity of CHF 541.0 million as at 31 December 2023 (31 December 2022: bank overdraft of CHF 472.0 million). The liquidity risk (also during the day) is observed to the extent that current accounts of customers should generally be held with credit balances. In the event of an unexpected liquidity bottleneck, the securities portfolio held by SECB can be used at any time to obtain liquidity from Deutsche Bundesbank as part of Lombard transactions.

Once a year, the liquidity strategy of the Group is reviewed by the Chief Financial Officer and approved by the Board of Directors. Treasury monitors the implementation and execution of the liquidity strategy.

Maturity analysis for financial liabilities

The following table shows the contractual maturities of the financial liabilities held by S.O at the reporting and in the previous year.

	31/12/2023					
CHF million	Within 3 months	Between 3 and 12 months	Between 1 and 5 years	More than 5 years	Total contractual cash flows	Carrying amount
Liabilities						
Bank overdrafts	0.0	–	–	–	0.0	0.0
Trade and other payables	41.8	0.3	–	–	42.0	42.0
Payables from clearing & settlement	563.5	–	–	–	563.5	563.5
Borrowings	3.2	4.6	771.4	455.2	1,234.3	1,227.5
Lease liabilities	5.1	15.1	72.0	106.0	198.2	175.6
Deposits of participants	7,281.6	–	–	–	7,281.6	7,281.6
Liabilities from borrowed securities	58.4	–	–	–	58.4	58.4
Derivative financial liabilities	5.8	–	–	–	5.8	5.8
Other financial liabilities	–	–	2.4	103.6 ¹	106.1	106.1
Total financial liabilities	7,959.4	19.9	845.8	664.8	9,490.0	9,460.7

¹ Includes funds received for sanctioned persons, which cannot be accessed until the sanctions are lifted.

	31/12/2022 (restated) ²					
CHF million	Within 3 months	Between 3 and 12 months	Between 1 and 5 years	More than 5 years	Total contractual cash flows	Carrying amount
Liabilities						
Bank overdrafts	472.0	–	–	–	472.0	472.0
Trade and other payables	31.0	0.7	–	–	31.7	31.7
Payables from clearing & settlement	510.6	–	–	–	510.6	510.6
Borrowings	–	13.6	812.1	456.1	1,281.8	1,273.5
Lease liabilities	5.1	11.3	56.4	101.0	173.8	151.1
Deposits of participants	8,241.3	–	–	–	8,241.3	8,241.3
Liabilities from borrowed securities	67.0	–	–	–	67.0	67.0
Payables from repurchase agreements	18.7	–	–	–	18.7	18.7
Derivative financial liabilities	0.3	–	–	–	0.3	0.3
Other financial liabilities	–	–	2.7	94.3 ¹	96.9	96.9
Total financial liabilities	9,345.9	25.6	871.2	651.3	10,894.0	10,862.9

¹ Includes funds received for sanctioned persons, which cannot be accessed until the sanctions are lifted.

² See note 2.4 for further information on the restatement.

The fair value of the derivative financial liabilities best represents the cash flows that would have to be paid if these positions had to be settled or closed.

Market risk

General

Market risk is the risk of losses on financial assets arising from movements in market prices. With regard to S.O, market prices carry three types of risk: foreign currency risk, interest rate risk and other price risk.

Foreign currency risk

Foreign currency risk is the risk that the fair value or future cash flows of financial instruments will fluctuate because of changes in foreign exchange rates. The risk arises mainly from revenues, expenses, financial investments and borrowings denominated in foreign currencies. The foreign currency risk affects mainly the Group entities in Switzerland. Treasury and S.O SIS Ltd

manage the exposure to foreign currency risk by using forwards and swaps.

A significant portion of the Group's earnings are generated from foreign operations, such as the entities of S.O.. This exposes S.O to a foreign currency risk, as the income statement of foreign operations is translated into CHF on a monthly basis. The BoD of S.O has defined the maximum foreign currency risk appetite S.O is willing to take. The foreign currency exposures are monitored monthly to ensure they do not exceed the defined thresholds.

Further, S.O is exposed to a foreign currency translation risk due to the translation of net assets of foreign operations. Net investments in foreign operations are partially hedged by using financial liabilities. The carrying amount of items designated as hedging instruments for net investment hedges were as follows:

CHF million	31/12/2023	31/12/2022
Bonds	606.1	638.6
Borrowings	606.1	638.6
NCI liabilities	2.4	2.7
Other financial liabilities	2.4	2.7
Total carrying amount	608.6	641.3

The net investment hedge using the EUR senior bond as a hedging instrument will be maintained until the bond expires in 2025. For further details on the bond, see note 17.

S.O established a hedge ratio of 100% for all net investment hedges. The investments in the foreign operations and the designated hedging instruments are in the

same currency for all hedging relationships. There are no imbalances in the net investment hedges that would create ineffectiveness. To maintain the hedge effectiveness, S.O ensures that the designated liabilities do not exceed the value of the net investment during the term of the hedging relationship. Gains and losses on hedging instruments recognized in OCI were as follows:

CHF million	31/12/2023	31/12/2022
Gains/(losses) on net investment hedges recognized in the current/previous year, net of tax	24.8	24.7
Accumulated gains/(losses) held in the translation reserve, net of tax	66.7	41.9
<i>of which continuing net investment hedges</i>	<i>74.6</i>	<i>49.6</i>
<i>of which terminated net investment hedges</i>	<i>-7.9</i>	<i>-7.7</i>

The table below illustrates the hypothetical sensitivity of earnings before tax to changes in foreign exchange rates at year-end due to the revaluation of financial instruments and assuming that all other variables

remain unchanged. The changes in exchange rates used for 2023 and 2022 are based on historical volatility. Positive figures represent an increase in earnings before tax.

Amounts in CHF million	2023			2022		
	Change in exchange rate ¹	Effect on earnings before tax		Change in exchange rate ¹	Effect on earnings before tax	
	+/-	+	-	+/-	+	-
CHF/EUR	4.0%	1.2	-1.2	6.3%	0.1	-0.1
CHF/USD	7.3%	1.6	-1.6	9.1%	0.7	-0.7
Total		2.7	-2.7		0.8	-0.8

¹ A positive change in the exchange rate represents a strengthening of the foreign currency.

Interest rate risk

S.O is exposed to the interest rate risk due to the volatility of market interest rates. The interest rate risk is the risk of market price movements of interest-bearing assets and liabilities due to changes in interest rates.

In the interest margin business, interest rate changes could have a major impact on earnings, especially when there is a mismatch in the maturity of assets and liabilities. The cash received from business partners presented as deposits of participants is invested in overnight interest-bearing accounts, short-term financial instruments or secured reverse repos with a term to maturity of less than one year, and in current and non-current bonds. It is mainly the non-current portion of the bond portfolio of SECB that carries interest rate risk due to the maturity mismatch of assets and liabilities with the deposit side and the fixed interest rate nature of the bond portfolio itself. To mitigate this risk, SECB has started to invest in bonds with variable coupons. From the interest earned, S.O may pay interest less a margin to its business partners for the

deposits on their ordinary cash vostro accounts. For simplicity, this interest margin has not been considered in the interest risk sensitivity below.

For the purpose of the sensitivity analysis, non-current investments and liabilities at amortized cost with fixed interest rates have been excluded, since fair value fluctuations, which would reflect a change in market interest rates, are not recognized in the income statement for these instruments. For current investments and liabilities, it is assumed that the contracts must be renewed in the near future. Therefore, the exposures have been considered in the sensitivity analysis. The effect on other comprehensive income related to bonds measured at FVtOCI has been included, as the fair value of these instruments is affected by the fluctuation in interest rates. The table below illustrates the hypothetical sensitivity of earnings before tax and other comprehensive income before tax to a reasonably possible change of a +/-50 basis points in the parallel shift of the yield curves. Positive figures represent an increase in earnings and other comprehensive income before tax.

Amounts in CHF million	2023				
	Change in interest rate +/-	Effect on earnings before tax		Effect on other comprehensive income before tax	
		+	-	+	-
Cash and cash equivalents	50 bps	36.8	-36.8		
Financial assets	50 bps	3.8	-3.8	-0.8	0.8
Financial liabilities	50 bps	-36.4	36.4		
Total		4.2	-4.2	-0.8	0.8

Amounts in CHF million	2022 (restated) ¹				
	Change in interest rate +/-	Effect on earnings before tax		Effect on other comprehensive income before tax	
		+	-	+	-
Cash and cash equivalents	50 bps	43.6	-43.6	-	-
Financial assets	50 bps	2.7	-2.7	-1.3	1.3
Bank overdrafts	50 bps	-2.4	2.4	-	-
Financial liabilities	50 bps	-41.2	41.2	-	-
Total		2.8	-2.8	-1.3	1.3

¹ See note 2.4 for further information on the restatement.

Other price risk

Other price risk is the risk that S.O incurs losses on financial assets due to changes in market prices, other than foreign currency risk and interest rate risk. This risk is mainly associated with investments in listed financial assets, where S.O is exposed to fluctuations of the market prices. In 2023, S.O has established a strategic investment portfolio which is managed by several professional external asset managers. The portfolio mainly consists of listed shares, bonds and units in investment funds. As most of these financial assets are measured at fair value through profit or loss, fluctuations of market prices have an impact on the consolidated income statement of S.O.

The investment policy of S.O establishes limits on the level of risk in the invested portfolio. Investment limits helped the professional external asset managers to ensure that the investment portfolio was sufficiently diversified and that it remained exposed to an acceptable

level of risk. The performance of the portfolio was compared with the defined benchmarks.

The table below illustrates the hypothetical sensitivity of earnings before tax to increases and decreases in the respective indices, assuming all other variables remain unchanged. The sensitivity rate is based on historical volatility using the yearly standard deviation. In the prior year, the potential impact on earnings before tax from listed financial assets was negligible, hence no sensitivity analysis was provided. Debt instruments measured at amortized cost are not included in the sensitivity analysis, as fluctuations in prices have no direct impact on earnings before tax. Similarly, financial instruments from the settlement business are not included as the market risk is borne by the market participants. The effects on other comprehensive income related to bonds measured at FVtOCI are described below the table.

Amounts in CHF million	2023		
	Change in index	Effect on earnings before tax	
	+/-	+	-
Index			
SPI ESG®	11.4%	4.4	-4.4
MSCI World ex CH®	12.9%	6.4	-6.4
SBI®	4.1%	1.9	-1.9
SPDR Bonds CHF®	5.5%	3.0	-3.0
SXI®	9.5%	4.2	-4.2
Total		20.0	-20.0

The change in the SBI® would also have an effect on the fair value of bonds classified at FVtOCI. An increase in the SBI® of 4.1% would result in higher other comprehensive income (before tax) of CHF 4.1 million (31 December 2022: an increase of 8.1% would have resulted in higher other comprehensive income (before tax) of CHF 16.3 million). With a decrease in the index, the effect on other comprehensive income would have been the opposite in both years.

Other price risk also occurs with the holding of unlisted equity investments. S.O invests in minority share-holdings for strategic and financial reasons. For this purpose, S.O has established a framework for corporate investment management in addition to the Group's competency rules.

Depending on the size and type of a minority investment, investment decisions are taken by the S.O Fintech Ventures Investment Committee (i.e. for unlisted start-up companies), the ExB, the Chairman or the Board of Directors of S.O. Ultimate responsibility for the execution of the corporate investment management framework lies with the CFO of S.O. It includes the involvement of particular

specialist functions in order to maintain the appropriate level of investment oversight, collection of relevant financials, adherence to disclosure requirements and maintenance of relevant documents by S.O. For each investment, responsibility is assigned to one ExB member.

The investments that fall within the scope of the corporate investment management framework are regularly reviewed by the ExB and the BoD/AC. Finance and Services, in coordination with a relevant business unit, is responsible for tracking the financial and operational performance. In the case of material performance deviations, the situation is escalated in the first place to the relevant ExB member, who shall decide whether to bring it to the attention of the ExB and/or BoD. Ultimately, the BoD may decide to introduce additional governance measures including, but not limited to additional management and/or BoD oversight of the particular investment.

No sensitivity analysis is presented for unlisted equity investments as the fair value of these companies tends to be dominated by factors specific to the investee company.

26 Fair Value of Financial Instruments

Classification of financial instruments

The table below shows the classification for each class of financial instruments and, if applicable, the fair value level.

							31/12/2023
CHF million	Notes	At fair value				At amor- tized cost	Total
		Level 1	Level 2	Level 3	Total		
Assets							
Cash and cash equivalents	14				–	7,358.8	7,358.8
Trade and other receivables	15				–	202.8	202.8
Assets from clearing & settlement	16	–	246.6	–	246.6	562.4	809.0
<i>Receivables from clearing & settlement</i>					–	562.4	562.4
<i>Derivatives from clearing & settlement</i>		–	246.6	–	246.6	–	246.6
Current and non-current financial assets	17	348.3	29.3	44.1	421.7	1,803.9	2,225.6
<i>Bonds</i>		100.6	–	–	100.6	1,609.7	1,710.3
<i>Short-term credits</i>					–	60.9	60.9
<i>Other debt instruments</i>		–	–	16.7	16.7	133.3	150.0
<i>Equity instruments</i>		57.7	–	26.0	83.7	–	83.7
<i>Units in investment funds</i>		157.7	27.3	1.4	186.4	–	186.4
<i>Financial instruments from settlement business</i>		32.3	–	–	32.3	–	32.3
<i>Derivative financial assets</i>		–	2.0	–	2.0	–	2.0
Total carrying amounts ¹		348.3	275.9	44.1	668.3	9,927.8	10,596.1
Bonds		12.5	1,543.4	–	1,555.9		
Fair values of financial assets measured at amortized cost		12.5	1,543.4	–	1,555.9		
Liabilities							
Bank overdrafts	14				–	0.0	0.0
Trade and other payables					–	42.0	42.0
Liabilities from clearing & settlement	16	–	247.1	–	247.1	563.5	810.6
<i>Payables from clearing & settlement</i>		–	–	–	–	563.5	563.5
<i>Derivatives from clearing & settlement</i>		–	247.1	–	247.1	–	247.1
Current and non-current financial liabilities	17	–	64.2	2.4	66.6	8,788.4	8,855.0
<i>Deposits of participants</i>					–	7,281.6	7,281.6
<i>Liabilities from borrowed securities</i>		–	58.4	–	58.4	–	58.4
<i>Lease liabilities</i>					–	175.6	175.6
<i>Borrowings</i>					–	1,227.5	1,227.5
<i>Derivative financial liabilities</i>		–	5.8	–	5.8	–	5.8
<i>Other financial liabilities</i>		–	–	2.4	2.4	103.6	106.1
Total carrying amounts ¹		–	311.3	2.4	313.7	9,394.0	9,707.7
Borrowings		–	1,147.4	–	1,147.4		
Fair values of financial liabilities measured at amortized cost		–	1,147.4	–	1,147.4		

¹ Accrued interests are presented within other assets and other liabilities (in accrued expenses).

							31/12/2022
		At fair value				restated ²	
CHF million	Notes	Level 1	Level 2	Level 3	Total	At amor- tized cost	Total
Assets							
Cash and cash equivalents	14				–	8,720.6	8,720.6
Trade and other receivables	15				–	201.9	201.9
Assets from clearing & settlement	16	–	693.9	–	693.9	491.3	1,185.3
<i>Receivables from clearing & settlement</i>					–	491.3	491.3
<i>Derivatives from clearing & settlement</i>		–	693.9	–	693.9	–	693.9
Current and non-current financial assets	17	228.2	0.9	41.7	270.8	1,930.1	2,200.9
<i>Bonds</i>		200.8	–	–	200.8	1,783.6	1,984.4
<i>Short-term credits</i>					–	46.5	46.5
<i>Other debt instruments</i>		–	–	11.5	11.5	99.9	111.5
<i>Equity instruments</i>		13.3	–	30.2	43.4	–	43.4
<i>Units in investment funds</i>		2.3	–	–	2.3	–	2.3
<i>Financial instruments from settlement business</i>		11.8	–	–	11.8	–	11.8
<i>Derivative financial assets</i>		–	0.9	–	0.9	–	0.9
Total carrying amounts ¹		228.2	694.8	41.7	964.7	11,344.0	12,308.7
Bonds		9.0	1,679.9	–	1,688.8		
Fair values for financial assets measured at amortized cost		9.0	1,679.9	–	1,688.8		
Liabilities							
Bank overdrafts	14				–	472.0	472.0
Trade and other payables					–	31.7	31.7
Liabilities from clearing & settlement	16	–	697.1	–	697.1	510.6	1,207.6
<i>Payables from clearing & settlement</i>					–	510.6	510.6
<i>Derivatives from clearing & settlement</i>		–	697.1	–	697.1	–	697.1
Current and non-current financial liabilities	17	–	67.3	2.7	69.9	9,778.8	9,848.7
<i>Deposits of participants</i>					–	8,241.3	8,241.3
<i>Liabilities from borrowed securities</i>		–	67.0	–	67.0	–	67.0
<i>Payables from repurchase agreements</i>					–	18.7	18.7
<i>Lease liabilities</i>					–	151.1	151.1
<i>Borrowings</i>					–	1,273.5	1,273.5
<i>Derivative financial liabilities</i>		–	0.3	–	0.3	–	0.3
<i>Other financial liabilities</i>		–	–	2.7	2.7	94.3	96.9
Total carrying amounts		–	764.3	2.7	767.0	10,793.0	11,560.0
Borrowings		–	1,140.7	–	1,140.7		
Fair values for financial liabilities measured at amortized cost		–	1,140.7	–	1,140.7		

¹ Accrued interests are presented within other assets and other liabilities (in accrued expenses). ² See note 2.4 for further information on the restatement.

S.O assumes that the carrying amount approximates fair value for all financial assets and liabilities measured at amortized cost, except for bonds and borrowings.

Fair value valuation methods for financial assets and liabilities

The following methods and assumptions were used to estimate the fair values:

Level 1 instruments (i.e. quoted financial instruments in an active market)

- Bonds, equity instruments, investment funds and financial instruments from settlement business: The fair value is determined by reference to published price quotations at the reporting date. Bonds are considered to be listed on an active market if the trading frequency and volume generally exceed the defined minimum levels.

Level 2 instruments (i.e. financial instruments with no regular market pricing, but with observable valuation inputs)

- Derivatives from clearing & settlement: All derivatives from clearing and settlement are categorized as level 2 instruments.
 - For equities, fixed-income and energy derivatives as underlying, the fair value is determined as the difference between the trade price and its fair value at the reporting date.
 - For options as underlying, the fair value is determined based on the Black-Scholes model and the Binomial Option Pricing model for American options and European options, respectively. The inputs to the calculation of both models include share price, implied volatility, strike price, risk-free interest rate and expected dividends.
- Bonds and units in investment funds:
 - The fair value of bonds and investment funds listed on an inactive market is determined by reference to published price quotations at the reporting date.
 - The fair value of unlisted bonds such as promissory notes is determined by discounting the expected future payments at a risk and maturity-adjusted discount rate.
- Derivative financial assets and liabilities: Foreign exchange swaps and forwards are not traded publicly. The inputs to the calculation include foreign exchange spot rates and interest rates.
- Liabilities from borrowed securities: The fair value is determined by reference to published price quotations of the borrowed securities at the reporting date.

- Borrowings: For bonds issued by S.O listed on an inactive market, the fair value is determined by reference to published price quotations at the reporting date. For other borrowings, such as loans, it is generally assumed that the fair value approximates the carrying amount.

Level 3 instruments (i.e. financial instruments with no observable valuation inputs)

- Other debt instruments and equity instruments:
 - The fair value of unlisted shares – which may be classified as equity instruments at FVtPL or debt instruments at FVtPL, depending on the rights attached to the instrument – is derived from the proportionate net asset value of the entity. If the net asset value were to increase, the price per share would increase proportionately. The fair value of these investments tends to be dominated by factors specific to the investees.
 - For other debt instruments at FVtPL such as convertible loans, the fair value is determined by discounting the expected future payments at a risk-adjusted discount rate. An increase or decrease of 10% in the estimated cash flows would lead to an increase or decrease of approximately 10% in the fair value. The estimated fair value would increase if the risk-adjusted discount rate were lower.
- Units in investment funds: Private equity funds are not actively traded. The valuation is obtained from quarterly net asset value information from the fund manager. S.O has only limited insight into the specific valuation inputs used by the fund manager. Therefore, no sensitivity analysis can be provided.
- Other financial liabilities: For NCI liabilities the fair value is determined by using probability-weighted forecasts. The inputs into the calculation include in particular revenue or cash flow forecast scenarios and the probability of each scenario. The forecast scenarios are reviewed at least bi-annually and are based on the business plans prepared by management.

Transfers between levels

S.O recognizes transfers between the levels of the fair value hierarchy at the date of the event or change in circumstances that caused the transfer. In 2023 and 2022, there were no transfers between level 1 and level 2 or between level 2 and level 3.

Movements in level 3 financial assets and liabilities

CHF million	31/12/2023		31/12/2022	
	Financial assets	Financial liabilities	Financial assets	Financial liabilities
Carrying amount at beginning of year	41.7	-2.7	27.0	-9.6
Additions	7.6	-	19.2	-
Disposals	-	-	-	1.0
Disposals due to changes in the scope of consolidation	-	-	-2.8	-
Reclassifications from / to associates	-	-	0.7	-
Gains (losses) recognized in the income statement ¹	-4.9	-	-2.1	6.0
Gains (losses) recognized in other comprehensive income ²	-	0.2	-	0.0
Translation adjustments	-0.2	-	-0.3	-
Carrying amount at closing	44.1	-2.4	41.7	-2.7
Income/expenses on holdings at closing				
Unrealized gains (losses) recognized in the income statement ¹	-4.9	-	-2.1	6.0
Unrealized gains (losses) recognized as other comprehensive income ²	-	0.2	-	0.0

¹ Gains (losses) were recognized as financial income and financial expenses.

² Gains (losses) were recognized as gains/(losses) on net investment hedges.

S.O invests directly and through private equity funds in fintech companies for strategic and financial reasons. These investments are classified as financial instruments at fair value (equity or debt instruments) or as associates. During 2023, S.O invested CHF 7.6 million

(2022: CHF 19.2 million) in fintech companies. In 2022, the gains recognized in the income statement on financial liabilities mainly included the remeasurement gain of the NCI liability of Orenda (see note 9).

27 Offsetting

The following tables show the effects of offsetting on the balance sheet and the related amounts not offset for financial assets and financial liabilities that are subject to enforceable netting arrangements:

31/12/2023								
CHF million	Assets subject to enforceable netting arrangements							
	Effects of offsetting on balance sheet			Related amounts not offset				Balance sheet total ¹
	Gross assets before balance sheet netting	Balance sheet netting with gross liabilities	Net assets reported on the balance sheet ¹	Financial liabilities	Collateral received ²	Assets after consideration of netting potential	Assets not subject to enforceable netting arrangements ¹	
Cash and cash equivalents	6,379.1	–	6,379.1	–3.6	–6,369.6	5.9	979.7	7,358.8
<i>Cash</i>	3,182.1	–	3,182.1	–3.6	–3,172.6	5.9	962.9	4,145.0
<i>Short-term deposits</i>	3,197.0	–	3,197.0	–	–3,197.0	–	16.8	3,213.8
Assets from C&S	1,415.4	–1,072.4	343.1	–37.1	–306.0	–	465.9	809.0
<i>Receivables from C&S</i>	308.1	–211.6	96.5	–	–96.5	–	465.9	562.4
<i>Derivatives from C&S</i>	1,107.4	–860.8	246.6	–37.1	–209.5	–	–	246.6
Financial assets (current and non-current)	297.6	–	297.6	–45.3	–191.5	60.7	1,928.0	2,225.6
<i>Short-term credits</i>	60.9	–	60.9	–45.3	–15.5	–	–	60.9
<i>Financial instruments from settlement business</i>	32.3	–	32.3	–	–32.3	–	–	32.3
<i>Bonds</i>	100.7	–	100.7	–	–40.0	60.7	1,609.6	1,710.3
<i>Other current and non-current financial assets</i>	103.6	–	103.6	–	–103.6	–	318.4	422.1
Total assets	8,092.1	–1,072.4	7,019.8	–86.1	–6,867.0	66.6	3,373.6	10,393.3

¹ The balance sheet total is the sum of “Net assets reported on the balance sheet” that are subject to enforceable netting arrangements and “Assets not subject to enforceable netting arrangements”.

² Financial collateral is reflected at its fair value, but has been limited to the net balance sheet exposure so as not to include any over-collateralization.

31/12/2022 (restated) ³								
CHF million	Assets subject to enforceable netting arrangements							
	Effects of offsetting on balance sheet			Related amounts not offset				
	Gross assets before balance sheet netting	Balance sheet netting with gross liabilities	Net assets reported on the balance sheet ¹	Financial liabilities	Collateral received ²	Assets after consideration of netting potential	Assets not subject to enforceable netting arrangements ¹	Balance sheet total ¹
Cash and cash equivalents	7,994.3	–	7,994.3	–	–7,987.9	6.3	726.3	8,720.6
<i>Cash</i>	4,070.4	–	4,070.4	–	–4,064.0	6.3	656.1	4,726.5
<i>Short-term deposits</i>	3,923.9	–	3,923.9	–	–3,923.9	–	70.3	3,994.2
Assets from C&S	3,604.5	–2,801.8	802.7	–77.4	–725.3	–	382.6	1,185.3
<i>Receivables from C&S</i>	424.4	–315.6	108.8	–0.2	–108.6	–	382.6	491.3
<i>Derivatives from C&S</i>	3,180.2	–2,486.2	693.9	–77.2	–616.7	–	–	693.9
Financial assets (current and non-current)	390.5	–	390.5	–21.1	–171.5	197.9	1,810.4	2,200.9
<i>Short-term credits</i>	46.5	–	46.5	–21.1	–25.5	–	–	46.5
<i>Financial instruments from settlement business</i>	11.8	–	11.8	–	–11.8	–	–	11.8
<i>Bonds</i>	237.9	–	237.9	–	–40.0	197.9	1,746.5	1,984.4
<i>Other current and non-current financial assets</i>	94.3	–	94.3	–	–94.3	–	63.9	158.1
Total assets	11,989.3	–2,801.8	9,187.5	–98.5	–8,884.8	204.2	2,919.3	12,106.7

¹ The balance sheet total is the sum of “Net assets reported on the balance sheet” that are subject to enforceable netting arrangements and “Assets not subject to enforceable netting arrangements”.

² Financial collateral is reflected at its fair value, but has been limited to the net balance sheet exposure so as not to include any over-collateralization.

³ See note 2.4 for further information on the restatement.

31/12/2023

CHF million	Liabilities subject to enforceable netting arrangements							
	Effects of offsetting on balance sheet			Related amounts not offset				Balance sheet total ¹
	Gross liabilities before balance sheet netting	Balance sheet netting with gross assets	Net liabilities reported on the balance sheet ¹	Financial assets	Collateral pledged ²	Liabilities after consideration of netting potential	Liabilities not subject to enforceable netting arrangements ¹	
Liabilities from C&S	1,365.0	-1,072.4	292.6	-37.1	-215.9	39.6	518.0	810.6
<i>Payables from C&S</i>	<i>257.1</i>	<i>-211.6</i>	<i>45.5</i>	<i>-0.0</i>	<i>-5.9</i>	<i>39.6</i>	<i>518.0</i>	<i>563.5</i>
<i>Derivatives from C&S</i>	<i>1,107.9</i>	<i>-860.8</i>	<i>247.1</i>	<i>-37.1</i>	<i>-210.0</i>	<i>-</i>	<i>-</i>	<i>247.1</i>
Financial liabilities (current and non-current)	6,064.1	-	6,064.1	-49.0	-195.8	5,819.4	2,790.9	8,855.0
<i>Deposits of participants</i>	<i>5,902.1</i>	<i>-</i>	<i>5,902.1</i>	<i>-49.0</i>	<i>-33.7</i>	<i>5,819.4</i>	<i>1,379.5</i>	<i>7,281.6</i>
<i>Liabilities from borrowed securities</i>	<i>58.4</i>	<i>-</i>	<i>58.4</i>	<i>-</i>	<i>-58.4</i>	<i>-</i>	<i>-</i>	<i>58.4</i>
<i>Other current and non-current financial liabilities</i>	<i>103.6</i>	<i>-</i>	<i>103.6</i>	<i>-</i>	<i>-103.6</i>	<i>-</i>	<i>1,411.4</i>	<i>1,515.0</i>
Total liabilities	7,429.1	-1,072.4	6,356.7	-86.1	-411.7	5,858.9	3,308.9	9,665.7

31/12/2022 (restated)³

CHF million	Liabilities subject to enforceable netting arrangements							
	Effects of offsetting on balance sheet			Related amounts not offset				Balance sheet total ¹
	Gross liabilities before balance sheet netting	Balance sheet netting with gross assets	Net liabilities reported on the balance sheet ¹	Financial assets	Collateral pledged ²	Liabilities after consideration of netting potential	Liabilities not subject to enforceable netting arrangements ¹	
Liabilities from C&S	3,638.4	-2,801.8	836.6	-77.2	-659.3	100.1	371.0	1,207.6
<i>Payables from C&S</i>	<i>455.1</i>	<i>-315.6</i>	<i>139.5</i>	<i>-</i>	<i>-39.4</i>	<i>100.1</i>	<i>371.0</i>	<i>510.6</i>
<i>Derivatives from C&S</i>	<i>3,183.3</i>	<i>-2,486.2</i>	<i>697.1</i>	<i>-77.2</i>	<i>-619.9</i>	<i>-</i>	<i>-</i>	<i>697.1</i>
Financial liabilities (current and non-current)	7,523.7	-	7,523.7	-21.3	-249.1	7,253.3	2,325.1	9,848.7
<i>Deposits of participants</i>	<i>7,343.8</i>	<i>-</i>	<i>7,343.8</i>	<i>-21.3</i>	<i>-69.2</i>	<i>7,253.3</i>	<i>897.6</i>	<i>8,241.3</i>
<i>Liabilities from borrowed securities</i>	<i>67.0</i>	<i>-</i>	<i>67.0</i>	<i>-</i>	<i>-67.0</i>	<i>-</i>	<i>-</i>	<i>67.0</i>
<i>Other current and non-current financial liabilities</i>	<i>112.9</i>	<i>-</i>	<i>112.9</i>	<i>-</i>	<i>-112.9</i>	<i>-</i>	<i>1,427.5</i>	<i>1,540.4</i>
Total liabilities	11,162.1	-2,801.8	8,360.3	-98.5	-908.4	7,353.5	2,696.1	11,056.4

¹ The balance sheet total is the sum of "Net liabilities reported on the balance sheet" that are subject to enforceable netting arrangements and "Liabilities not subject to enforceable netting arrangements".

² Financial collateral is reflected at its fair value, but has been limited to the net balance sheet exposure so as not to include any over-collateralization.

³ See note 2.4 for further information on the restatement.

Enforceable netting arrangements

In the post-trading business, enforceable netting arrangements are in place. S.O x-clear Ltd and S.O. Clearing SAU operate as central counterparties. A CCP is an entity that interposes itself between trading partners to become a buyer to every seller and a seller to every buyer, thereby ensuring settlement even if one of the original trading partners fails to meet their obligations. In order to protect the CCPs against the potential losses in the event of a participant's default, S.O requires the participants to provide collateral and to make contributions to a collective default fund. The transactions are subject to netting arrangements, which are part of the clearing rules of S.O x-clear Ltd and S.O. Clearing SAU. S.O SIS Ltd and Iberclear act as CSDs. CSDs may provide short-term financing to their clients and hold cash placements with custodians. These assets are covered by the credit balances of the clients and by collaterals which are subject to netting arrangements (i.e. member agreements). Additionally, short-term deposits from reverse repurchase transactions are subject to enforceable netting agreements, such as the Swiss Master Agreement for Repo Trades and/or Global Master Repurchase Agreement. Further information on collateral management is included in note 25.

Balance sheet netting

Assets and liabilities from clearing and settlement are offset to the extent that netting is legally enforceable, based on the respective clearing rules. For equities and fixed income, the maximum netting which can be applied is on a counterparty and instrument level. For derivatives, the unsettled positions are shown net on a margin account level.

Related amounts not offset

Cash and cash equivalents

Reverse repurchase agreements stipulate that all outstanding transactions with the same counterparty can be offset, and close-out netting applies across all outstanding transactions covered by the agreements if a default event or another predetermined event occurs. The arrangements, however, do not provide a legally enforceable right in the normal course of business. Financial collateral typically comprises highly liquid securities which may be liquidated in the event of counterparty default.

Deposits at other custodians for cross-border settlements are covered by the credit balances of the clients and by collaterals which may be realized in a default event or if another predetermined event occurs.

Receivables and payables from C&S

The offsetting of receivables and payables from clearing & settlement of derivatives cannot exceed the level of margin account in the normal course of business. These amounts are covered by collaterals which may be realized in a default event or if another predetermined event occurs.

Derivatives from C&S

The netting agreements for clearing transactions stipulate that close-out netting applies across all outstanding transactions with the same clearing member and the same currency if a default event or another predetermined event occurs. Such arrangements, however, do not provide a legally enforceable right in the normal course of business. The collateral may be realized in a default event or if another predetermined event occurs.

Group Composition

28 Interests in Other Entities

Subsidiaries

The list below shows Swiss Options Ltd and its subsidiaries. The share capital of all subsidiaries consists solely of ordinary shares and the ownership interest held by S.O equals the share of voting rights. All subsidiaries are consolidated in the Group's financial statements.

Name of entity	Principal place of business	Principal activities	Share capital in 1,000		31/12/2023	31/12/2022
					Equity interest in %	
Swiss Options	Zurich	Holding company	CHF 19,522		–	–
Swiss Options	Zurich	Provider of low-latency solutions	CHF 100		100.0	100.0
S.O. Clearing	Madrid	Clearing	EUR 18,030		100.0	100.0
S.O. LATAM	Bogota	Consulting services	COP 150,000		100.0	100.0
S.O. Post Trade Services	Madrid	Services for Group companies and third parties	EUR 757		100.0	100.0
S.O. Regulatory Services	Madrid	Regulatory compliance services	EUR 60		100.0	100.0
S.O. Servicios Corporativos	Madrid	Services for Group companies	EUR 25,000		100.0	100.0
Bolsas y Mercados Españoles, Sociedad Holding de Mercados y Sistemas Financieros SA	Madrid	Holding company	EUR 250,847		100.0	100.0
Bolsas y Mercados Españoles Group Services SAU	Madrid	Services for Group companies	EUR 5,560		100.0	100.0
Bolsas y Mercados Españoles InnTech SAU	Madrid	IT and consulting services	EUR 331		100.0	100.0
Bolsas y Mercados Españoles Market Data SA	Madrid	Financial information services	EUR 4,165		100.0	100.0
Bolsas y Mercados Españoles Renta Fija SAU	Madrid	Fixed income exchange	EUR 3,005		100.0	100.0
Bolsas y Mercados Españoles Sistemas de Negociación SA	Madrid	Stock exchange and stock exchange services	EUR 60		100.0	100.0
Finaccess S.O Financial Information	Casablanca	Financial information services	MAD 8,548		55.0	55.0
Instituto Bolsas y Mercados Españoles SLU SA	Madrid	Financial training	EUR 10		100.0	100.0
LATAM Exchanges Data Inc.	Miami	Financial information services	USD 6,382		51.0	51.0
MEFF Sociedad Rectora del Mercado de Productos Derivados SAU	Madrid	Derivatives exchange	EUR 6,650		100.0	100.0
MEFF Tecnología y Servicios SAU	Barcelona	Electricity market CCP	EUR 60		100.0	100.0
Open Finance SL	Valencia	Consultancy services to financial entities	EUR –		–	100.0
Orenda Software Solutions Inc.	Membertou	ESG and alternative data services	CAD –		–	62.6
REGIS-TR SA	Luxembourg	Trade repository	EUR 3,600		100.0	100.0
REGIS-TR UK Ltd	London	Trade repository	GBP 1,641		100.0	100.0
SDX Trading Ltd	Zurich	Digital exchange services	CHF 1,000		100.0	100.0
SDX Web3 Ltd	Zurich	Digital exchange services	CHF 100		100.0	100.0
SECB Swiss Euro Clearing Bank GmbH	Frankfurt a. M.	Clearing services	EUR 30,000		100.0	100.0
S.O BBS	Zurich	Banking services	CHF 100		100.0	100.0
S.O Digital Exchange	Zurich	Digital exchange services	CHF 5,500		100.0	100.0
S.O Exchange Group	Zurich	Holding company	CHF 10,000		100.0	100.0
S.O Exchange Regulation	Zurich	Exchange regulation	CHF 100		100.0	100.0
S.O Exfeed	Zurich	Distribution of financial information	CHF 1,100		100.0	100.0
S.O Finance (Luxembourg)	Leudelange	Financing services	EUR 31		100.0	100.0
S.O Financial Information Belgium	Brussels	Financial information services	EUR 505		100.0	100.0
S.O Financial Information Denmark A/	Copenhagen	Financial information services	DKK 1,600		100.0	100.0

Name of entity	Principal place of business	Principal activities	Share capital in 1,000		31/12/2023	31/12/2022
					Equity interest in %	
S.O Financial Information Deutschland	Frankfurt a. M.	Financial information services	EUR	512	100.0	100.0
S.O Financial Information España	Madrid	Financial information services	EUR	424	100.0	100.0
S.O Financial Information France	Paris	Financial information services	EUR	44,900	100.0	100.0
S.O Financial Information Hong Kong	Hong Kong	Inactive	HKD	4,000	100.0	100.0
S.O Financial Information Italia	Milan	Financial information services	EUR	100	100.0	100.0
S.O Financial Information Japan	Tokyo	Financial information services	JPY	40,000	100.0	100.0
S.O Financial Information	Zurich	Financial information services	CHF	5,400	100.0	100.0
S.O Financial Information Luxembourg	Leudelange	Financial information services	EUR	31	100.0	100.0
S.O Financial Information Monaco	Monaco	Financial information services	EUR	150	100.0	100.0
S.O Financial Information Nederland	Amsterdam	Financial information services	EUR	250	100.0	100.0
S.O Financial Information Nordic	Stockholm	Financial information services	SEK	100	100.0	100.0
S.O Financial Information Singapore Pte	Singapore	Financial information services	SGD	25	100.0	100.0
S.O Financial Information UK	London	Financial information services	GBP	500	100.0	100.0
S.O Financial Information USA	Stamford	Financial information services	USD	0	100.0	100.0
S.O Global Services Ltd	Zurich	Services for Group companies and third parties	CHF	100	100.0	100.0
Swiss Options	Zurich	IT and management services	CHF	11,550	100.0	100.0
Services Ltd	Zurich	Indices services	CHF	100	100.0	100.0
S.O Interbank Clearing	Zurich	Interbank payment services	CHF	1,500	100.0	100.0
S.O NCS	Zurich	Banking services	CHF	100	100.0	100.0
S.O Repo	Zurich	Swiss money market trading platform	CHF	1,000	100.0	100.0
S.O Securities Services	Zurich	Holding company	CHF	26,000	100.0	100.0
S.O SIS	Olten	Settlement and custody	CHF	26,000	100.0	100.0
S.O SIS Singapore Private	Singapore	Settlement and custody	SGD	1,000	100.0	100.0
S.O SIS USA	Stamford	Settlement and custody	USD	1	100.0	100.0
S.O Swiss Exchange	Zurich	Stock exchange and stock exchange services	CHF	10,000	100.0	100.0
S.O Terravis	Zurich	Real estate information portal	CHF	4,100	100.0	100.0
S.O Trade Repository	Zurich	Trade repository	CHF	500	100.0	100.0
S.O x-clear	Zurich	Clearing	CHF	30,000	100.0	100.0
Sociedad de Bolsas SA Ltd	Madrid	Stock exchange and stock exchange services	EUR	8,414	100.0	100.0
Sociedad de Gestión de los Sistemas de Registro, Compensación y Liquidación de Valores SAU (Iberclear)	Madrid	Settlement and custody	EUR	114,380	100.0	100.0
Sociedad Rectora de la Bolsa de Valores de Barcelona SAU	Barcelona	Stock exchange and stock exchange services	EUR	8,564	100.0	100.0
Sociedad Rectora de la Bolsa de Valores de Bilbao SAU	Bilbao	Stock exchange and stock exchange services	EUR	2,957	100.0	100.0
Sociedad Rectora de la Bolsa de Valores de Madrid SAU	Madrid	Stock exchange and stock exchange services	EUR	21,348	100.0	100.0
Sociedad Rectora de la Bolsa de Valores de Valencia SAU	Valencia	Stock exchange and stock exchange services	EUR	4,111	100.0	100.0
Ultimus (SGP) Pte Ltd	Singapore	Index and ETF services	SGD	0	94.5	94.5
Ultimus (US) Inc.	Wilmington	Index and ETF services	USD	0	94.5	94.5
Ultimus Limited	London	Index and ETF services	USD	0	94.5	94.5

Changes in the composition of the Group during 2023

In January 2023, Orenda Software Solutions Inc. was deconsolidated as S.O lost control due to the initiation of bankruptcy proceedings. The deconsolidation had no material effect on the income statement.

In July 2023, Open Finance SL was sold without any material effect on the income statement.

Changes in the composition of the Group during 2022

REGIS-TR

In March 2022, S.O established control of REGIS-TR SA and REGIS-TR UK Ltd (REGIS-TR) by acquiring the remaining stake of 50.0%. For further details, see note 29.

Tenity (former F10 Group)

In April 2022, a partial management buyout and capital increase was carried out, which resulted in a change of control for F10 (Switzerland) and its subsidiaries. Since then, S.O has maintained a significant influence

with a stake of 43.4% in F10 (Switzerland) Ltd, which is accounted for under the equity method. As a result of the transaction, S.O recognized a gain in financial income of CHF 3.7 million, CHF 2.5 million of which was attributable to the investment retained, see note 9.

Cash and cash equivalents in the entities over which S.O lost control totaled CHF 2.0 million.

Other changes

In 2022, the following entities were incorporated as fully owned subsidiaries:

- SDX Web3 Ltd: The purpose is to provide services in the area of distributed ledger and Web3 technology.
- S.O Exchange Group Ltd: The purpose is to hold the Group entities except for Banking Services.

In January 2022, S.O Paynet Ltd was merged with S.O BBS Ltd. The merger had no impact on the Group's consolidated figures as at 31 December 2022.

In December 2022, SWISSTRADINGBOX Ltd was sold without any material effect on the income statement.

Significant associates

Name of entity	Principal place of business	Principal activities	Share capital in 1,000	31/12/2023	31/12/2022
				Equity interest in %	
Worldline SA	Bezons	Electronic payment and transactional services	EUR 192,423	10.5 ¹	10.6 ¹

¹ Voting rights as at 31 December 2023: 18.3% (31 December 2022: 18.4%).

Impairment testing

The significant and prolonged negative decline of the share price of Worldline triggered an impairment test of the investment.

The recoverable amount of Worldline has been determined based on a value in use calculation using the DCF method. The calculation is based on post-tax cash flow projections that are derived from analyst estimates which were used in particular to estimate revenue growth, operating margin and capital expenditures. Furthermore, management has taken into account other quantitative and qualitative factors, such as peer group analyst estimates, to verify the appropriateness of the inputs utilized in the cash flow projections. The projection period of the calculation covers three years. The discount rate calculation is based on the specific circumstances of the investment. It is derived from the capital asset pricing model and considers the spot rate of the risk-free interest rate based on long-term government bond yields and market risk premiums. The beta and equity/debt ratio are derived from a peer group. To derive the value in use of Worldline, a pre-tax discount rate of 11.1% was assumed for the calculation. The terminal year perpetual growth rate reflects the lower of risk-free rate and long-term inflation rate. The sustainable operating margin used in the terminal value is based on the average margin applied over the projection period.

A range of values was calculated using sensitivities. Management's position within the range resulted in a recoverable amount of CHF 557.2 million. After applying the equity valuation, an impairment loss of CHF 752.8 million was recognized in financial expenses (see note 9). The main reasons for the impairment are the higher discount rate, mainly driven by the higher risk-free interest rate and lower free cash flows due to macroeconomic slowdown.

Changes during 2023

In 2023, there were no significant changes.

Changes during 2022

REGIS-TR

In March 2022, S.O established control over REGIS-TR SA and REGIS-TR UK Ltd (REGIS-TR) by acquiring the remaining stake of 50.0%. For further details, see note 29.

Custodigit Ltd

In September 2022, S.O sold its shares in Custodigit Ltd. The transaction resulted in a loss of CHF 11.9 million which has been included in other financial expenses (see note 9).

The following table presents the carrying amount and share of total comprehensive income and other changes in equity of individually material associates, and in the aggregate for individually non-material associates:

CHF million	31/12/2023			31/12/2022		
	Worldline	Others	Total	Worldline	Others	Total
Carrying amount	557.2	19.4	576.7	1,472.4	21.7	1,494.1
Share of profit or loss of associates	-93.5	-5.1	-98.6	24.2	-2.7	21.6
Share of other comprehensive income incl. currency translation adjustments	-59.6	-0.1	-59.8	-74.2	-0.3	-74.5
Share of total comprehensive income	-153.2	-5.2	-158.4	-50.0	-2.9	-52.9
Share of other changes in equity of associates	-3.0	-	-3.0	1.1	-	1.1

The following table summarizes financial information for material associates:

CHF million	Worldline SA	
	31/12/2023	31/12/2022
Current assets	8,294.8	7,674.5
Non-current assets	11,986.5	13,826.6
Current liabilities	-7,890.6	-6,936.3
Non-current liabilities	-3,464.9	-4,199.0
Non-controlling interests	-923.1	-1,135.8
Net assets attributable to shareholders	8,002.7	9,230.0
S.O share of associates' net assets	844.3	977.9
Goodwill and other adjustments	-287.1	494.5
Total carrying amount	557.2	1,472.4
Revenues	4,480.8	4,388.1
Net profit/(loss) from continuing operations	-932.3	216.0
Net profit/(loss) from discontinued operations	-	89.0
Net profit/(loss)	-932.3	305.0
<i>of which attributable to shareholders of Worldline SA</i>	<i>-794.3</i>	<i>300.8</i>
Other comprehensive income	21.8	-0.1
Total comprehensive income	-910.6	304.9
<i>of which attributable to shareholders of Worldline SA</i>	<i>-766.4</i>	<i>317.9</i>
Fair value of investment	436.6	1,072.7

29 Acquisitions of Subsidiaries

Acquisitions in 2023

In 2023, there were no acquisitions.

Acquisitions in 2022

REGIS-TR

In March 2022, S.O established control of REGIS-TR SA and REGIS-TR UK Ltd (REGIS-TR) by acquiring the remaining stake of 50.0%. Since then, S.O has fully owned the capital and voting rights. At closing, S.O transferred a cash consideration of CHF 64.5 million.

Previously, S.O had held an interest of 50.0% and accounted for the investment by applying the equity method. The fair value of the interest previously held was CHF 64.5 million. The remeasurement gain recognized in financial income amounted to CHF 10.3 million (see note 9).

REGIS-TR is a leading trade repository that offers reporting services covering all major European trade

repository obligations. The trade repository has long been an integral part of the portfolio of S.O, constituting an important business line adjacent to the core S.O Securities Services. The full consolidation of the business represents an opportunity for S.O to further integrate and deliver services to customers across Europe.

From the date of acquisition, the business has contributed CHF 18.9 million of Group revenues and positively impacted Group earnings before tax by CHF 5.9 million for the period ended on 31 December 2022. Assuming that the acquisition had taken place on 1 January 2022, management estimates that Group revenues and Group earnings before tax would have been CHF 6.8 million and CHF 1.3 million higher, respectively.

The transaction costs of the acquisition amounted to CHF 0.4 million, CHF 0.1 million of which was included in other operating expenses and personnel expenses in 2022.

Identifiable assets acquired and liabilities assumed

The following table summarizes the assets acquired and liabilities assumed on the acquisition date:

CHF million	Fair value recognized on acquisition
Cash and cash equivalents	17.4
Trade and other receivables	5.0
Other current assets	2.1
Current assets	24.5
Intangible assets	91.1
Other non-current assets	1.0
Non-current assets	92.1
Total assets	116.6
Trade and other payables	2.6
Contract liabilities	2.0
Other current liabilities	1.6
Current liabilities	6.1
Deferred tax liabilities	21.6
Other non-current liabilities	1.1
Non-current liabilities	22.8
Total liabilities	28.9
Net assets acquired	87.7
Goodwill	41.3
Fair value of pre-existing interest	-64.5
Total purchase price	64.5
<i>of which cash considerations</i>	<i>64.5</i>

Trade and other receivables

The fair value of acquired trade and other receivables was CHF 5.0 million. The gross contractual amount for trade and other receivables was CHF 5.1 million, CHF 0.2 million of which was expected to be uncollectible.

Customer relationships

The multi-period excess earnings method (MEEM) was applied to assess the fair value of customer relationships. The aggregate fair value of customer relationships constituted a total of CHF 76.0 million.

Other intangible assets

The relief from royalty method was applied to assess the fair value of brands and software. The aggregated fair value of brands amounted to CHF 2.7 million and the fair value of software totaled CHF 12.4 million.

Goodwill

The recognized goodwill of CHF 41.3 million represented the growth potential and the acquired workforce. REGIS-TR is considered to be a cash-generating unit (CGU) and the goodwill was allocated entirely to the CGU. None of the goodwill recognized was expected to be deductible for income tax purposes.

Additional Information

30 Assets Pledged or Restricted in Use

The following table presents the carrying amount of assets pledged or restricted in use:

CHF million	31/12/2023	31/12/2022 ¹
Cash and cash equivalents	2,581.1	3,709.8
Bonds at amortized cost	–	490.4
Bonds at FVtOCI	–	43.8
Other debt instruments	128.5	96.3
Total	2,709.6	4,340.3

¹ 2022 figures have been adjusted.

As at 31 December 2023, cash and cash equivalents of CHF 2,581.1 million (31 December 2022: CHF 3,709.8 million) relate to collaterals received in the Securities Services business. These cash and cash equivalents are restricted in use, as they are not available for other business purposes.

S.O holds funds at correspondent banks which originate from corporate actions and are linked to securities of sanctioned persons. The funds cannot be accessed until the sanctions are lifted. As at 31 December 2023, the sanctioned accounts amounted to CHF 103.6 million (31 December 2022: CHF 94.3 million). Additionally, S.O

has pledged assets and provided cash deposits as security for operating lease agreements and due to regulatory requirements. These amounts are included in other debt instruments.

As at 31 December 2022, S.O x-clear Ltd had pledged bonds in the amount of CHF 62.2 million for the in-teroperability and the intraday credit facility used in connection with the Norwegian equities settlement. Additionally, SECB had pledged bonds in the amount of CHF 472.0 million and used its securities portfolio to obtain liquidity from Deutsche Bundesbank as part of a Lombard transaction.

31 Contingent Liabilities

During the reporting period, S.O invested in a private equity fund in which it committed to continue investing in future capital calls. As of 31 December 2023, uncalled capital commitments amounted to CHF 13.5 million.

As of 31 December 2023, the Group had other firm commitments to invest in its associated companies amounting to CHF 10.3 million (31 December 2022: none).

For uncertainties regarding the final tax assessment, see note 12.

32 Leases

S.O as lessee

In particular, S.O leases office space, vehicles and IT equipment.

Leases of office space are negotiated on an individual basis and contain a wide range of different terms and conditions. Typically, they run for periods up to 13 years and may include an option to renew the lease for an additional period and/or to terminate the lease early. Some office leases include variable lease payments that depend on local price indices.

The leases of vehicles and IT equipment typically run for periods of three to five years. Some leases of IT equipment may lead to variable lease payments depending on the usage. The leases of printers are usually leases of low-value items. The Group has elected not to recognize right-of-use assets and lease liabilities for these leases.

Right-of-use assets

For the quantitative disclosures on the right-of-use assets, see note 19.

Lease liabilities

The maturity analysis of the contractual undiscounted cash flows is set out in note 25.

Extension and termination options

Some leases of office space contain extension or termination options only exercisable by S.O. The termination options are subject to a termination fee of up to 14 monthly rentals. S.O assesses at lease commencement whether it is reasonably certain to exercise the extension option or not to exercise a termination option and performs a reassessment if there is a significant event or significant change in the circumstances within its control.

CHF million	Notes	31/12/2023	31/12/2022
Amounts recognized in the income statement			
Income from subleasing of right-of-use assets		0.0	0.4
Interest expenses on lease liabilities	10	-3.3	-2.8
Expenses related to variable lease payments		-0.4	-0.3
Amounts recognized in the statement of cash flows			
Lease payments directly recognized in the income statement		0.5	0.5
Interest expenses on lease liabilities		3.3	2.8
Payment of lease liabilities		15.9	18.9
Lease commitments and undiscounted potential future lease payments not included in the lease liabilities			
Future lease payments related to leases not yet commenced to which S.O is committed		-	3.0
Termination options not reasonably certain to be exercised		0.9	0.5

S.O as lessor

S.O partially leases out some office buildings owned. These leases are classified as operating leases, because they do not transfer substantially all the risk and rewards incidental to ownership of the assets.

Operating lease income also includes fees earned for the renting of conference rooms and the income from recharges of ancillary costs. In 2023, the operating lease income totaled CHF 10.9 million (2022: CHF 10.8 million).

The table below sets out a maturity analysis of the future undiscounted lease payments:

CHF million	31/12/2023	31/12/2022
Within one year	7.4	7.0
Between one and five years	26.5	24.5
More than five years	0.1	5.6
Total	33.9	37.1

The breakdown of property, plant and equipment in assets used by S.O and assets leased to third parties is provided in note 19.

33 Defined Benefit Plans

Defined benefit plans are in place for Switzerland, Spain and France. S.O has established its own pension plan in Switzerland. Outside of Switzerland, S.O uses different, generally legally independent pension providers. Independent actuarial valuations for the plans are performed as required for the defined benefit plans. The defined benefit plan for Switzerland represents more than 98% of the total present value of the defined benefit obligation. For this reason, S.O does not present the defined benefit plans in Spain and France separately.

Swiss pension plan

The Swiss pension plan covers all S.O employees in Switzerland and exceeds the minimum benefit requirements under the Swiss law (BVG). The benefits covered include retirement, disability and death benefits. Pension plan contributions are paid by the employees and the employer and calculated as a percentage of the covered salary. The rate of employer contribution depends on the employee's age.

The Swiss plan provides employees with a choice between three saving plans: the budget plan, the standard plan and the maximum plan. The three plans differ only in the amount of employee contributions. At retirement, the employees' individual savings capital is multiplied by the conversion rate, which is defined by the pension

fund regulations, and can be paid out as either a lifetime annuity or a lump-sum payment. In the event of disability, the pension plan pays a disability pension until the ordinary retirement age. In the event of death, the surviving spouse, registered partner or life partner is entitled to receive a pension.

Although the Swiss pension plan is a defined contribution plan under Swiss pension law, it qualifies and is therefore accounted for as a defined benefit plan under IAS 19 *Employee Benefits*.

The employer contributions expected to be made to the Swiss pension plan in 2024 are CHF 40.6 million.

Plan assets and defined benefit obligation

The overall investment policy and strategy for the Swiss defined benefit plans are guided by the objective of achieving an investment return which, together with the contributions paid, is sufficient to maintain reasonable control over the various funding risks of the plan. The foundation board is responsible for determining the mix of asset types and target allocations. Actual asset allocation is determined by a variety of current and expected economic and market conditions and in consideration of specific asset class risks, the risk profile and the maturity pattern of the plan.

The plan assets of the Group comprise the following:

CHF million	31/12/2023	31/12/2022
Listed equity instruments	479.5	418.4
Listed debt instruments	639.4	572.9
Listed real estate	336.1	337.6
Cash and cash equivalents	26.8	35.9
Other financial investments	160.1	190.1
Total plan assets	1,641.9	1,555.0

All equity and most of the debt instruments have quoted prices in active markets. Most of the government bonds have investment grade ratings.

An asset-liability matching (ALM) study is performed periodically by an external investment advisor to analyze the consequences of strategic investment policies. The strategic investment policy of the Swiss pension fund for 2023 can be summarized as follows:

- The strategic asset allocation comprises 24.0% to 40.0% (neutral: 32.0%) for equity instruments; 28.0% to 52.0% (neutral: 38.0%) for debt instruments and cash; and 19.0% to 39.0% (neutral: 30.0%) for other investments (e.g. real estate and alternative investments).
- The interest rate risk is not managed actively, but the pension plan is underweighted in duration.
- The foreign currency risk of the main currencies is managed by a currency overlay program or foreign currency hedge directly in the funds.

The following table summarizes the changes in the present value of the defined benefit obligation:

CHF million	2023	2022
Present value of obligation at 1 January	-1,386.8	-1,631.6
Effect of business combinations and disposals	-	-0.7
Interest expenses on defined benefit obligation	-30.9	-5.8
Current service costs (employer)	-34.4	-54.0
Employee contributions	-30.6	-30.9
Benefits paid	52.0	85.4
Plan curtailments and settlements	0.7	-
Actuarial gains/(losses)	-63.4	250.2
Administration costs	-0.7	-0.8
Translation adjustments	1.0	1.4
Present value of obligation at 31 December	-1,493.0	-1,386.8

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

CHF million	2023	2022
Fair value of plan assets at 1 January	1,555.0	1,744.5
Effect of business combinations and disposals	–	0.3
Employer contributions	41.7	42.1
Employee contributions	30.6	30.9
Interest income on assets	34.5	6.1
Return on plan assets (excl. contributions in interest income)	33.7	–183.2
Benefits paid	–53.1	–85.3
Translation adjustments	–0.5	–0.4
Fair value of plan assets at 31 December	1,641.9	1,555.0

Changes in the effect of the asset ceiling were as follows:

CHF million	2023	2022
Asset ceiling at 1 January	–167.1	–
Interest expense/(income) on effect of asset ceiling	–3.7	–
Change in effect of asset ceiling excl. interest income/(expenses)	22.6	–167.1
Asset ceiling at 31 December	–148.3	–167.1

Amounts recognized in the balance sheet:

CHF million	31/12/2023	31/12/2022
Present value of defined benefit obligation	–1,493.0	–1,386.8
Fair value of plan assets	1,641.9	1,555.0
Overfunding/(underfunding)	148.9	168.2
Adjustment to asset ceiling	–148.3	–167.1
Recognized pension assets/(liabilities)	0.6	1.1
<i>of which presented as pension assets</i>	<i>12.4</i>	<i>13.6</i>
<i>of which presented as pension fund liabilities</i>	<i>–11.8</i>	<i>–12.5</i>

All benefits were vested at the end of the reporting period. The weighted average duration of the defined benefit obligation at the reporting date was 13 years (31 December 2022: 12 years).

The following table provides information on pension costs for defined benefit plans:

CHF million	2023	2022
Current service costs	-34.4	-54.0
Plan curtailments and settlements	0.7	-
Net interest income/(expenses)	-0.1	0.3
Administration costs	-0.7	-0.8
Total pension expense for the period	-34.4	-54.5

Remeasurements recognized in other comprehensive income:

CHF million	2023	2022
Actuarial gains/(losses)	-63.4	250.2
Return on plan assets excl. interest income	33.7	-183.2
Change in effect of asset ceiling excl. interest income/(expenses)	22.6	-167.1
Total income/(expense) recognized in OCI	-7.2	-100.2

The actuarial gains/(losses) arising from changes in financial assumptions totaled CHF -95.1 million (2022: CHF 321.2 million).

Assumptions used to determine the defined benefit obligation

The following were the principal actuarial assumptions at the reporting date for the Swiss pension plan:

	31/12/2023	31/12/2022
Discount rate	1.60%	2.20%
Salary trend	2.00%	2.50%
Interest rate on retirement savings capital	1.50%	1.50%
Mortality tables	BVG 2020 GT	BVG 2020 GT

Sensitivity analysis

The calculation of the defined benefit obligation is sensitive to the assumptions set out above. The following

table summarizes the positive or negative impact on the defined benefit obligation at the reporting date as a result of a change in the principal actuarial assumptions.

CHF million	Present value of defined benefit obligation	
	31/12/2023	31/12/2022
Defined benefit obligation based on current actuarial assumptions	-1,493.0	-1,386.8
Discount rate		
Change in actuarial assumption – decrease of 50 bps	-1,590.8	-1,474.2
Change in actuarial assumption – increase of 50 bps	-1,406.7	-1,309.4
Salary trend		
Change in actuarial assumption – decrease of 25 bps	-1,488.0	-1,382.9
Change in actuarial assumption – increase of 25 bps	-1,497.8	-1,390.7
Interest rate on retirement savings capital		
Change in actuarial assumption – decrease of 50 bps	-1,466.3	-1,362.2
Change in actuarial assumption – increase of 50 bps	-1,520.7	-1,412.5
Life expectancy		
Change in actuarial assumption – decrease of 1 year	-1,464.4	-1,361.7
Change in actuarial assumption – increase of 1 year	-1,521.0	-1,411.3

The above sensitivities are based on the average duration of the benefit obligation as determined at the date of the last full actuarial valuation in 2023 and are applied to adjust the defined benefit obligation at the reporting date

based on the related assumptions. While the analysis does not take into account the full distribution of cash flows expected under the plan, it does provide an approximation of the sensitivity to the assumptions shown.

34 Related Party Disclosures

S.O defines related parties as:

- shareholders that have significant influence by delegating a member into the Board of Directors of S.O
- associated companies that are significantly influenced by S.O
- post-employment benefit plans for S.O employees
- key management personnel

S.O shares are held by 120 banks. The shares are widely distributed, i.e. no bank category has an absolute majority. All shareholders are bound by a shareholders' agreement.

Transactions with related parties and companies are conducted on terms equivalent to those that prevail in arm's length transactions. The price schedules for transactions with third parties also apply to transactions with related parties.

Transactions and outstanding balances with related parties of S.O are summarized in the tables below

	2023			
CHF million	Qualifying shareholders	Associates	Post-employment benefit plans	Total
Income statement				
Operating income	289.0	48.0	–	337.1
Other operating expenses	–0.5	–32.0	–	–32.5
Net financial expenses	–0.1	–764.1	–	–764.1
Net interest income	–	0.0	–	0.1
Contributions	–	–	–41.3	–41.3

	2022			
CHF million	Qualifying shareholders	Associates	Post-employment benefit plans	Total
Income statement				
Operating income	264.9	50.0	–	314.9
Other operating expenses	–0.5	–33.5	–	–34.0
Net financial expenses ¹	–0.2	–0.7	–	–1.0
Net interest expenses	–1.6	0.0	–	–1.6
Contributions	–	–	–41.8	–41.8

¹ 2022 figures have been adjusted.

	31/12/2023			
CHF million	Qualifying shareholders	Associates	Post-employment benefit plans	Total
Balance sheet				
Cash and cash equivalents	688.8	–	–	688.8
Trade and other receivables	27.3	16.2	–	43.4
Assets from clearing & settlement	7.2	–	–	7.2
Financial assets	37.2	4.8	–	42.1
Trade and other payables	0.0	1.9	–	2.0
Liabilities from clearing & settlement	42.5	310.5	–	353.0
Financial liabilities current	639.5	–	–	639.5
Other liabilities	3.0	16.0	–	19.0

	31.12.2022 (restated) ¹			
CHF million	Qualifying shareholders	Associates	Post-employment benefit plans	Total
Balance sheet				
Cash and cash equivalents	309.2	–	–	309.2
Trade and other receivables	22.7	16.1	–	38.8
Assets from clearing & settlement	18.2	–	–	18.2
Financial assets	45.9	3.4	–	49.3
Liabilities from clearing & settlement	36.1	262.6	–	298.7
Financial liabilities current	735.9	–	–	735.9
Other liabilities	2.2	12.4	–	14.7

¹ See note 2.4 for further information on the restatement.

Operating income with associates included, in particular, office rental income and infrastructure as a service (IAAS) revenues with an associated company. Operating expenses with associates included mainly debit card and ATM processing fees paid to an associated company. The IAAS and processing fees are fixed and adjusted annually if the business volume changes.

S.O requires related parties to provide collaterals for transactions in the business unit Securities Services and Banking Services. A detailed description of the collateral management is included in note 25. No loss allowance for doubtful receivables (i.e. lifetime expected credit losses under Stage 3 of the impairment model) for amounts due from related parties were recorded as at 31 December 2023 or 31 December 2022.

Compensation paid to key management personnel

Key management personnel are defined as members of the Board of Directors and the Executive Board. This definition is based on the requirements of IAS 24 *Related Party Disclosures*.

The members of the Board of Directors and the Executive Board and their immediate relatives do not have any ownership interest in the Group's companies.

Apart from the compensation paid and the regular contributions to the pension fund institutions, no transactions with key management personnel took place. The amounts disclosed in the table are the amounts recognized as an expense during the reporting period.

CHF million	2023	2022
Salaries and other short-term employee benefits	-14.2	-13.9
Other long-term benefits	-3.1	-3.0
Total compensation to key management	-17.3	-16.9

35 Events after the Balance Sheet Date

The change of the share price of Worldline in 2024 triggers an update of the impairment test which will be performed in the first half-year of 2024.

As at 7 March 2024, the date of approval for issue of the financial statements by the Board of Directors, the Group had undergone no other subsequent events warranting a modification of the value of the assets and liabilities or an additional disclosure.

Report of the Statutory Auditor



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To the General Meeting of
Swiss Options Ltd,
Zurich

Zurich, 8 March 2024

Report of the statutory auditor

Report on the audit of the consolidated financial statements

Opinion

We have audited the consolidated financial statements of Swiss Options Ltd and its subsidiaries (the Group), which comprise the consolidated balance sheet as at 31 December 2023, the consolidated income statement, the consolidated statement of comprehensive income, the consolidated statement of changes in equity and the consolidated statement of cash flows for the year then ended, and notes to the consolidated financial statements, including material accounting policy information.

In our opinion, the consolidated financial statements (pages 58 to 144) give a true and fair view of the consolidated financial position of the Group as at 31 December 2023 and of its consolidated financial performance and its consolidated cash flows for the year then ended in accordance with IFRS Accounting Standards and comply with Swiss law.

Basis for opinion

We conducted our audit in accordance with Swiss law, International Standards on Auditing (ISA) and Swiss Standards on Auditing (SA-CH). Our responsibilities under those provisions and standards are further described in the "Auditor's responsibilities for the audit of the consolidated financial statements" section of our report. We are independent of the Group in accordance with the provisions of Swiss law, together with the requirements of the Swiss audit profession, as well as those of the International Ethics Standards Board for Accountants' *International Code of Ethics for Professional Accountants (including International Independence Standards)* (IESBA Code), and we have fulfilled our other ethical responsibilities in accordance with these requirements.

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

Key audit matters

Key audit matters are those matters that, in our professional judgment, were of most significance in our audit of the consolidated financial statements of the current period. These matters were addressed in the context of our audit of the consolidated financial statements as a whole, and in forming our opinion thereon, and we do not provide a separate opinion on these matters. For each matter below, our description of how our audit addressed the matter is provided in that context.

We have fulfilled the responsibilities described in the "Auditor's responsibilities for the audit of the consolidated financial statements" section of our report, including in relation to these matters. Accordingly, our audit included the performance of procedures designed to respond to our assessment of the risks of material misstatement of the consolidated financial statements. The results of our audit procedures, including the procedures performed to address the matters below, provide the basis for our audit opinion on the consolidated financial statements.



2

Valuation of goodwill and purchased intangible assets

Risk As at 31 December 2023 Swiss Options holds intangible assets in the amount of CHF 2'196.2 million, corresponding to 15.7% of the total assets. These relate predominantly to goodwill and purchased intangible assets (trademarks & licenses, customer relationships and internally generated software acquired in a business combination).

We focused on this area due to the significance on the balance sheet and because of the judgements and assumptions used by management for the purpose of impairment testing. Impairment testing is performed on an annual basis or more frequently if indicators for impairment are present by comparing the carrying value of a cash-generating unit (CGU) to its recoverable amount. This assessment involves judgements and assumptions on key parameters within the valuation models, such as on future free cash flows, long-term growth rates and discount rates.

The applied accounting policies for goodwill and purchased intangible assets are described in note 2 and further details are disclosed in note 3 and note 20 to the consolidated financial statements.

Our audit response We have confirmed our understanding of the impairment testing process and assessed the design effectiveness of key controls, concluding that a substantive audit approach should be adopted. We evaluated, with the support of our valuation experts, the reasonableness of the valuation models and the appropriateness of the significant assumptions related to the valuation parameters. Specifically, we verified the calculation method for the determination of the discount rates and long-term growth rates and compared the rates with market- and industry specific reference values.

Furthermore, we assessed the projected cash flows and compared these forecasts to the business plans approved by the Board of Directors and appraised the reliability of the forecasts in previous years by back testing. Based on discussions with management we also gained an understanding about the budgeting process. We inspected the sensitivity analysis performed by management and performed our own sensitivity analysis on the key valuation parameters, understanding the impact that reasonably possible changes to these key inputs would have on the overall carrying value of the goodwill and purchased intangible assets at the balance sheet date.

In addition, we assessed the appropriateness of the relevant disclosures for this focus area in the consolidated financial statements.

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



3

Valuation of the investment in the associated entity Worldline SA

Risk As at 31 December 2023 the carrying amount of the equity-accounted investment in the associated entity Worldline SA amounts to CHF 557.2 million, following a loss from associate of CHF 93.5 million and an impairment of CHF 752.8 million recognized in the period ending 31 December 2023.

In accordance with IAS 28, an entity is required to perform an impairment test for an investment in associate if there is objective evidence of impairment. Objective evidence of impairment includes, among other elements, a significant or prolonged decline in the fair value of an investment in an equity instrument below its carrying amount. Based on these provisions, management with the support of an independent valuation specialist carried out an impairment assessment by determining the recoverable amount through the discounted cash flow valuation method and the value-in-use principles.

We focused on this area due to the significance on the balance sheet and because the assessment of the recoverable amount requires significant management judgement and assumptions on future cash flows, long-term growth rates and discount rates.

The applied accounting policies for the valuation of investments in associates are described in note 2 and further details are disclosed in note 3 and note 28 to the consolidated financial statements.

Our audit response We obtained an understanding and assessed the design effectiveness of management controls over the valuation of the investment in Worldline SA. With the involvement of internal valuation specialists, we assessed the methodology applied to determine the recoverable amount as required by IAS 36, tested the completeness and accuracy of the underlying data and recalculated the valuation amounts.

Furthermore, we assessed the judgmental aspects of the key assumptions and input parameters applied by management to determine the recoverable amount, assessed the sensitivity of the data and compared it with observable market- and sector-specific reference data.

In addition, we assessed the appropriateness of the relevant disclosures for this focus area in the notes to the consolidated financial statements.

Our audit procedures did not lead to any reservations regarding the valuation of the equity investment in Worldline SA.

Other information

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

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



4

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

If, based on the work we have performed, we conclude that there is a material misstatement of this other information, we are required to report that fact. We have nothing to report in this regard.

Board of Directors' responsibilities for the consolidated financial statements

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

In preparing the consolidated financial statements, the Board of Directors is responsible for assessing the Group's ability to continue as a going concern, disclosing, as applicable, matters related to going concern, and using the going concern basis of accounting unless the Board of Directors either intends to liquidate the Group or to cease operations, or has no realistic alternative but to do so.

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

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

A further description of our responsibilities for the audit of the consolidated financial statements is located on EXPERTsuisse's website at: <https://www.expertsuisse.ch/en/audit-report>. This description forms an integral part of our report.

Report on other legal and regulatory requirements

In accordance with Art. 728a para. 1 item 3 CO and PS-CH 890, we confirm that an internal control system exists, which has been designed for the preparation of the consolidated financial statements according to the instructions of the Board of Directors.

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

Ernst & Young Ltd

 Bruno Patusi
(Qualified Signature)
Bruno Patusi
Licensed audit expert
(Auditor in charge)

 Slaven Cosic
(Qualified Signature)
Slaven Cosic
Licensed audit expert

S.O Group Ltd

Financial Statements 2023

1 Balance Sheet

CHF million	Notes	31/12/2023	31/12/2022
Assets			
Cash and cash equivalents	3.2.2	204.7	292.7
Current financial assets	3.2.3	283.5	14.4
Other receivables	3.2.4	130.7	398.2
Accrued income and prepaid expenses		12.5	13.1
Current assets		631.4	718.4
Non-current financial assets	3.2.3	230.2	132.9
Investments in subsidiaries and associated entities	3.2.5	5,826.4	6,730.0
Non-current assets		6,056.6	6,862.9
Total assets		6,687.9	7,581.3
Liabilities			
Current interest-bearing liabilities	3.2.6	511.4	255.3
Other current liabilities	3.2.7	1.2	9.8
Accrued expenses and deferred income		1.8	12.4
Current liabilities		514.4	277.5
Non-current interest-bearing liabilities	3.2.8	1,229.9	1,264.0
Non-current provisions		2.8	3.2
Non-current liabilities		1,232.7	1,267.2
Total liabilities		1,747.1	1,544.7
Equity			
Share capital		19.5	19.5
Legal capital reserves			
Reserves from capital contributions		230.2	230.2
Reserves for indirectly held treasury shares		23.3	23.3
Free reserves			
Profit carried forward		5,664.0	5,488.9
Profit/(loss) for the year		-996.2	274.6
Treasury shares	3.2.10	-0.0	-0.0
Total equity		4,940.8	6,036.6
Total liabilities and equity		6,687.9	7,581.3

2 Income Statement

CHF million	Notes	2023	2022
Dividend income from investments		7.6	266.2
Other trade revenues		24.5	24.0
Financial income	3.2.12	87.1	79.6
Total operating income		119.2	369.9
Value adjustments on shareholdings and loans	3.2.11	-1,041.3	-21.2
Other operating expenses		-16.6	-23.1
Financial expenses	3.2.12	-57.3	-50.5
Total operating expenses		-1,115.2	-94.8
Taxes		-0.1	-0.5
Profit/(loss) for the year		-996.2	274.6

3 Notes to the Financial Statements

3.1 Principles of the financial statements

3.1.1 General principles

These financial statements were prepared according to the principles of the Swiss Law on Accounting and Financial Reporting (32nd title of the Swiss Code of Obligations). Where not prescribed by law, the significant accounting and valuation principles applied are described below. The financial statements may be influenced by the creation and release of hidden reserves.

Amounts stated in the financial statements are rounded numbers. The total may therefore differ from the sum of the individual amounts, which have been calculated including the decimal point.

3.1.2 Foreign currency translation

Transactions in foreign currencies are recorded at the current exchange rates. Monetary items are translated using the closing rates. Non-monetary items are translated using historical exchange rates. Exchange rate gains and losses are credited or debited to the income statement.

Foreign currency positions were translated into CHF using the following closing rates:

Foreign currency	31/12/2023	31/12/2022
EUR	0.9333	0.9837
USD	0.8415	0.9237

3.1.3 Investments in subsidiaries and associated entities

Investments in subsidiaries and associated entities are carried at cost less accumulated impairment losses.

3.1.4 Financial assets

This position includes bonds, loans, investment funds and equity instruments. Bonds are measured at amortized cost less impairment losses. Loans are carried at nominal value less accumulated impairment losses. Quoted investment funds and equity instruments are measured at market value. Non quoted investment funds and equity instruments are measured at cost. Financial assets which are due within one year or quoted are presented within current assets.

3.1.5 Derivative financial instruments

Derivative instruments are used to manage exposures to foreign currency risks. Subsequent to initial recognition derivatives are measured at market value. Unrealized gains and losses are recognized on the balance sheet as accrued income and prepaid expenses and accrued expenses and deferred income, respectively. Corresponding gains and losses resulting from fair value changes are recognized in financial income and financial expenses, respectively.

3.1.6 Treasury shares

At initial recognition, treasury shares are recognized at cost as a negative position within equity. Gains or losses that occur upon a subsequent sale are recognized as financial income or expense.

3.1.7 Revenue recognition

Revenues for services are recognized when they are invoiced. This occurs when they have been provided. Dividend income is recognized when the right to receive payment is established, it is probable that the economic benefits associated with the dividend will flow to the entity, and the amount of the dividend can be measured reliably.

3.1.8 Voluntary change of presentation

Swiss Options Ltd has re-aligned the presentation to the purpose of the entity. The new presentation structure highlights the holding character of the entity.

Old format	New format
Positive replacement values of derivatives	Accrued income and prepaid expenses
Trade receivables	Other receivables
Trade payables	Other current liabilities
Negative replacement values of derivatives	Accrued expenses and deferred income
Service revenue	Other revenues
Consulting and other professional fees, marketing and advertising expenses	Other operating expenses
Impairment and losses on financial assets and participations	Value adjustments on shareholdings and loans

Reversals of impairments are considered to be part of the ordinary holding activity and are not shown as an extraordinary income anymore.

3.2 Disclosure on balance sheet and income statement items and other information

3.2.1 Number of full-time equivalents

The annual average number of full-time equivalents in the reporting year was nil (2022: nil).

3.2.2 Cash and cash equivalents

CHF million	31/12/2023	31/12/2022
Due from third parties	5.2	5.5
Due from shareholders	199.5	287.3
Cash and cash equivalents	204.7	292.7

3.2.3 Financial assets

CHF million	31/12/2023	31/12/2022
Quoted Investment Funds	182.4	–
Quoted Shares	44.7	–
Loans	4.6	4.0
Bonds	51.7	10.4
Total current assets	283.5	14.4
Loans due from Group and associated entities	94.3	93.7
Loans due from third parties	4.7	4.6
Investment Funds	1.4	–
Shares	15.4	9.8
Bonds	114.5	24.9
Total non-current assets	230.2	132.9
Total financial assets	513.6	147.3

3.2.4 Other receivables

CHF million	31/12/2023	31/12/2022
Due from third parties	1.3	0.2
Due from Group and associated entities	129.4	398.0
Other receivables	130.7	398.2

3.2.5 Investments in subsidiaries and associated entities

A list of direct and significant indirect Group companies held by Swiss Options AG with the percentage of capital controlled is included in the Consolidated Financial Statements of the Swiss Options in note 28.

3.2.6 Current interest-bearing liabilities

CHF million	31/12/2023	31/12/2022
Due to Group and associated entities	511.4	255.3
Due to shareholders	0.0	0.0
Current interest-bearing liabilities	511.4	255.3

3.2.7 Other current liabilities

CHF million	31/12/2023	31/12/2022
Due to third parties	0.5	7.3
Due to Group and associated entities	0.7	2.5
Other current liabilities	1.2	9.8

3.2.8 Non-current interest-bearing liabilities

CHF million	31/12/2023	31/12/2022
Due to third parties	600.0	600.0
<i>thereof 0.125% dual part bond</i> <i>ISIN CH1142754337 / CH1142754345</i> <i>Maturity: 27/11/2026</i>	<i>150.0</i>	<i>150.0</i>
<i>thereof 0.2% bond</i> <i>ISIN CH1132966347</i> <i>Maturity: 28/09/2029</i>	<i>450.0</i>	<i>450.0</i>
Due to Group and associated entities ¹	629.9	664.0
Non-current interest-bearing liabilities	1,229.9	1,264.0

¹ Related to the issuance of EUR 650m Senior Bond by S.O Finance (Luxembourg) SA

3.2.9 Contingent liabilities

CHF million	31/12/2023	31/12/2022
Total amount of guarantees and warranty obligations		
Group and associated obligors	713.9	750.7
Joint liability from consolidated value added tax filing status	p.m.	p.m.

In 2022, the Tax Authorities of the Canton of Zurich have announced a reassessment of the possible tax effects of the disposal of the former cards business on Swiss Options Ltd in the 2018 tax period. There has been no relevant development since then. The possible tax claim would amount to a maximum of CHF 6 million. Management believes that it has strong arguments to defend its current position and that the reassessment will not lead to a payment. Accordingly, no provision has been made in the financial statements.

Apart from that, differences of legal opinion may arise between the Company and third parties (contractual partners, authorities, etc.) in the course of business, which could possibly lead to legal disputes. The Company assesses the corresponding risks and recognizes provisions when it considers these risks probable. No provisions are recognized for risks that the Company currently considers to be unlikely or highly unlikely to occur. However, it cannot be ruled out that risks will be assessed differently in the future as a result of new findings and that there will be cash outflows. This is particularly the case because the assessment of legal uncertainties involves a degree of discretion and legal developments may also lead to new assessments.

Group and associated obligors include:

- CHF 47.0 million (2022: CHF 47.0 million) guarantee in the event of insolvency of a cash pooling member
- CHF 0.01 million (2022: CHF 0.01 million) guarantee related to Direzione A.I.L
- nil (2022: CHF 2.1 million) contingent liability related to rental agreements granted to Group entities
- CHF 36.3 million (2022: CHF 13.6 million) guarantee related to the VISA license for S.O BBS Ltd
- CHF 606.6 million (2022: CHF 664.0 million) guarantee related to the issue of EUR Senior Bond by S.O Finance (Luxembourg) SA
- CHF 24.0 million (2022: CHF 24.0 million) guarantee related to Worldline Switzerland Ltd

3.2.10 Treasury shares including treasury shares held by Group entities

Values in CHF million	31/12/2023		31/12/2022	
	Number	Value	Number	Value
Held by Swiss Options	10	0.0	10	0.0
Held by subsidiaries Ltd	607,854	23.3	607,854	23.3

There were no transactions with treasury shares in the reporting and in the previous year.

3.2.11 Value adjustments on shareholdings and loans

CHF million	2023	2022
Positive value adjustments	3.0	20.1
Negative value adjustments and losses	–1,044.3	–41.3
Valuation adjustments on shareholdings and loans	–1,041.3	–21.2

In the reporting year, an impairment loss of CHF 1,040.8 million was recognized on the investment in Worldline (2022: nil).

3.2.12 Financial result

CHF million	2023	2022
Foreign exchange gains	67.9	76.6
Interest income	7.5	2.1
Other financial income	11.7	0.9
Financial income	87.1	79.6
Foreign exchange losses	-47.6	-42.1
Interest expenses	-7.6	-4.9
Other expenses	-2.1	-3.5
Financial expenses	-57.3	-50.5

3.2.13 Hidden reserves released

There are no hidden reserves (2022: nil).

3.2.14 Significant events after the balance sheet date

None.

4 Statement of Changes in Equity

CHF million	Share capital	Legal capital reserves	Legal retained earnings	Free reserves		Total equity
		Reserves from capital contributions	Reserves for treasury shares	Profit carried forward	Treasury shares	
Balance at 1 January 2022	19.5	230.2	23.3	5,581.6	-0.0	5,854.7
Dividends paid	-	-	-	-92.7	-	-92.7
Profit for the year	-	-	-	274.6	-	274.6
Balance at 31 December 2022	19.5	230.2	23.3	5,763.5	-0.0	6,036.6
Dividends paid	-	-	-	-99.6	-	-99.6
Loss for the year	-	-	-	-996.2	-	-996.2
Balance at 31 December 2023	19.5	230.2	23.3	4,667.8	-0.0	4,940.8

The share capital consists of 19,521,905 registered shares with a par value of CHF 1.00 each.

An ordinary dividend of CHF 5.10 per registered share was paid during the reporting period.

5 Appropriation of profit carried forward

CHF million	2023	2022
Profit carried forward from previous year	5,664.0	5,488.9
Profit/(loss) for the year	-996.2	274.6
Available profit carried forward	4,667.8	5,763.5
Dividend of CHF 5.20 per registered share of CHF 1.00 nominal value (previous year: CHF 5.10)	101.5	99.6
Profit carried forward to the following year	4,566.3	5,664.0

The Board of Directors proposes to the General Meeting of Shareholders that the profit be appropriated in accordance with the table above.

Report of the Statutory Auditor



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CH-8010 Zurich

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To the General Meeting of
Swiss Options Ltd,
Zurich

Zurich, 8 March 2024

Report of the statutory auditor

Report on the audit of the financial statements

Opinion

We have audited the financial statements of Swiss Options Ltd (the Company), which comprise the balance sheet as at 31 December 2023, the income statement for the year then ended, notes to the financial statements, including a summary of significant accounting policies and a statement of changes in equity.

In our opinion, the financial statements (pages 150 to 157) comply with Swiss law and the Company's articles of incorporation.

Basis for opinion

We conducted our audit in accordance with Swiss law and Swiss Standards on Auditing (SA-CH). Our responsibilities under those provisions and standards are further described in the "Auditor's responsibilities for the audit of the financial statements" section of our report. We are independent of the Company in accordance with the provisions of Swiss law and the requirements of the Swiss audit profession, and we have fulfilled our other ethical responsibilities in accordance with these requirements.

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

Key audit matters

Key audit matters are those matters that, in our professional judgment, were of most significance in our audit of the financial statements of the current period. These matters were addressed in the context of our audit of the financial statements as a whole, and in forming our opinion thereon, and we do not provide a separate opinion on these matters. For each matter below, our description of how our audit addressed the matter is provided in that context.

We have fulfilled the responsibilities described in the "Auditor's responsibilities for the audit of the financial statements" section of our report, including in relation to these matters. Accordingly, our audit included the performance of procedures designed to respond to our assessment of the risks of material misstatement of the financial statements. The results of our audit procedures, including the procedures performed to address the matters below, provide the basis for our audit opinion on the financial statements.



2

Valuation of investments in subsidiaries

Risk	<p>As at 31 December 2023 Swiss Options Ltd holds investments in subsidiaries in the amount of CHF 5'262.5 million, corresponding to 78.7% of the total assets, which are accounted for at acquisition cost less accumulated impairment losses.</p> <p>We focused on this area due to the significance on the balance sheet and because of the judgements and assumptions over the valuation of investments in subsidiaries. Where indicators of impairment are identified, management assesses the potential need of impairment of each subsidiary individually by comparing the carrying amount of the investment in subsidiary with the recoverable amount, which is calculated based on the value of capitalized earnings. This calculation involves several judgements including assumptions on future free cash flows, discount rates and long-term growth rates.</p> <p>The applied accounting policy for this position is described in note 3.1.3 and further details related to investments in subsidiaries are disclosed in note 3.2.5 and note 3.2.11 to the financial statements.</p>
Our audit response	<p>We have confirmed our understanding of the impairment assessment process and assessed the design effectiveness of key controls, concluding that a substantive audit approach should be adopted. To test the appropriateness of management's assessment, we evaluated the impairment indicators identified. In case indicators were present, we compared the carrying amount of the investment with the amount of capitalized earnings. In respect to the value of capitalized earnings, we have assessed the valuation model used. We verified, with the support of our valuation experts, the key assumptions used, including the discount rate and long-term growth rate.</p> <p>In addition, we assessed the appropriateness of the relevant disclosures for this focus area in the financial statements.</p> <p>Our audit procedures did not lead to any reservations regarding the valuation of investments in subsidiaries.</p>



3

Valuation of the investment in Worldline SA

Risk

As at 31 December 2023 the carrying amount of the investment in the associated entity Worldline SA amounts to CHF 557.2 million and is accounted for at acquisition cost less recognized impairment losses.

In accordance with the Swiss Code of Obligations, an entity is required to perform an impairment test, if there is objective evidence of overvaluation of an asset. Objective evidence includes, among other elements, declining developments in the economic or technical environment of the asset. Based on these provisions, management carried out with the support of an independent valuation specialist an impairment assessment by determining the recoverable amount through the discounted cash flow valuation method and the value-in-use principles.

We focused on this area due to the significance on the balance sheet and because the assessment of the recoverable amount requires significant management judgement and assumptions on future cash flows, long-term growth rates and discount rates.

The applied accounting policies for the valuation of investments in associated entities are described in note 3.1.3 and further details are disclosed in note 3.2.5 and note 3.2.11 to the financial statements.

Our audit response

We obtained an understanding and assessed the design effectiveness of management controls over the valuation of the investment in Worldline SA. With the involvement of internal valuation specialists, we assessed the methodology applied to determine the recoverable amount as required by the Swiss Code of Obligations, tested the completeness and accuracy of the underlying data and recalculated the valuation amounts.

Furthermore, we assessed the judgmental aspects of the key assumptions and input parameters applied by management to determine the recoverable amount, assessed the sensitivity of the data and compared it with observable market- and sector-specific reference data.

In addition, we assessed the appropriateness of the relevant disclosures for this audit focus area in the notes to the financial statements.

Our audit procedures did not lead to any reservations regarding the valuation of the investment in Worldline SA.

Other information

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

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

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



4

If, based on the work we have performed, we conclude that there is a material misstatement of this other information, we are required to report that fact. We have nothing to report in this regard.

Board of Directors' responsibilities for the financial statements

The Board of Directors is responsible for the preparation of the financial statements in accordance with the provisions of Swiss law and the Company's articles of incorporation, and for such internal control as the Board of Directors determines is necessary to enable the preparation of financial statements that are free from material misstatement, whether due to fraud or error.

In preparing the financial statements, the Board of Directors is responsible for assessing the Company's ability to continue as a going concern, disclosing, as applicable, matters related to going concern, and using the going concern basis of accounting unless the Board of Directors either intends to liquidate the Company or to cease operations, or has no realistic alternative but to do so.

Auditor's responsibilities for the audit of the financial statements

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

A further description of our responsibilities for the audit of the financial statements is located on EXPERTsuisse's website at: <https://www.expertsuisse.ch/en/audit-report>. This description forms an integral part of our report.

Report on other legal and regulatory requirements

In accordance with Art. 728a para. 1 item 3 CO and PS-CH 890, we confirm that an internal control system exists, which has been designed for the preparation of the financial statements according to the instructions of the Board of Directors.

Furthermore, we confirm that the proposed appropriation of available earnings complies with Swiss law and the Company's articles of incorporation. We recommend that the financial statements submitted to you be approved.

Ernst & Young Ltd



Bruno Patusi
(Qualified Signature)
Bruno Patusi
Licensed audit expert
(Auditor in charge)



Slaven Cosic
(Qualified Signature)
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Licensed audit expert

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Design and Realization

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