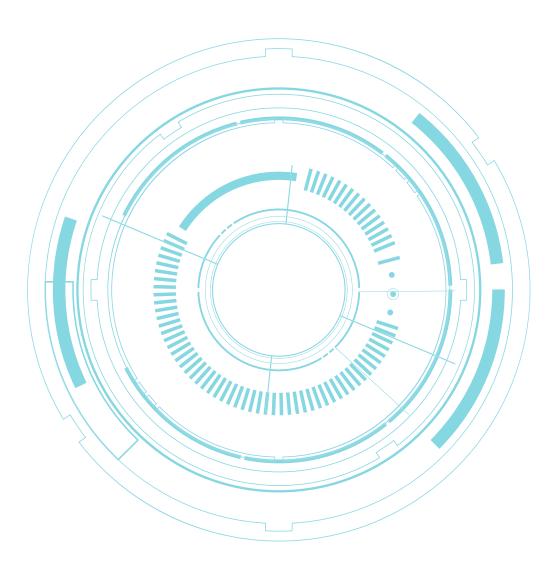


# PENSION FUND

**Annual Report and Financial Statements** for the year ended 31 December 2024



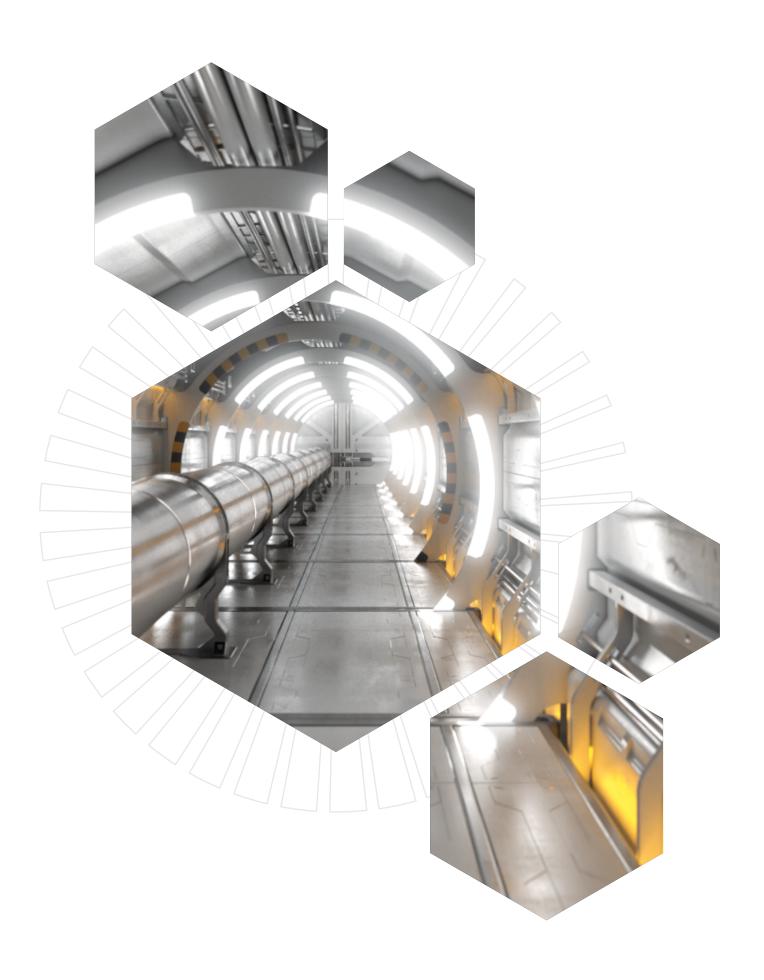


The Financial Statements included in this Report are published in accordance with International Public Sector Accounting Standards (IPSAS) and the Rules and Regulations of the Pension Fund.

# **CONTENTS**



Introduction from the Chair	5
ANNUAL REPORT	
	_
2024 in figures	8
Pension Fund Governing Board	10
Governance	12
Overview of the year 2024	14
Management Commentary	16
Members and Beneficiaries	17
Actuarial Status of the Fund	20
Investment and ESG Report	24
FINANCIAL STATEMENTS	
Audit Opinion	36
Financial Statements	39
Notes to the Financial Statements	44
Extract of the Actuary's Report to the Pension Fund for	
Financial Year-End 2024	65



INTRODUCTION FROM THE CHAIR

As Chair of the Pension Fund Governing Board (PFGB), I am pleased to present the Pension Fund's Annual Report and Financial Statements for the year ended 31 December 2024.

This document provides an overview of the Fund's financial heath, key activities related to our members and beneficiaries and a summary of the investment performance during the year.

The year 2024 has been an engaging one for the Fund. We remain focused on fulfilling our purpose of providing security of benefits to our members, beneficiaries, and their families, particularly in the face of disability, old age or death. I am proud to report that we paid a total of 318 MCHF in benefits to over 3,270 beneficiaries across the world.

A core aspect of the Fund's purpose is the timely and reliable payment of benefits. I am pleased to report that the Council approved important technical updates to the Chapter I of the Fund's Rules, which now enable benefits to be paid outside of Switzerland extending across CERN and ESO Member States, subject to specific operational requirements being met. More details on these changes can be found in the Members and Beneficiaries section of this document.

WE REMAIN FOCUSED ON

FULFILLING OUR PURPOSE OF PROVIDING SECURITY OF BENEFITS TO OUR MEMBERS, BENEFICIARIES.

#### AND THEIR FAMILIES.

Despite the continuing challenges presented by shifting monetary policies and ongoing geopolitical uncertainty, the Fund delivered a strong performance in 2024 and outperformed its target rate of return. Our commitment to integrating Environmental, Social and Governance (ESG) principles into investment decisions remains a key priority. We continue to advance our efforts in managing climate-related risks and opportunities in this evolving area. Detailed insights on the Fund's performance and ESG initiatives can be found in the Investment and ESG section.



Complementing the annual accounting valuation of the Fund under IAS 26, the Fund conducts a comprehensive actuarial review every three years to assess our funding status. The assumptions we make about future expected returns are vital to understanding the Fund's long-term financial health. The next actuarial review will take place in 2025, and we will report the results to the Council in June, followed by communication with members and beneficiaries later in the year.

2024 also saw some new faces join the PFGB. Cristina Biino joined me as the second of two new PFGB members appointed by the CERN Council. Following the conclusion of Vice-Chair Isabelle Mardirossian's mandate, we welcomed Vittorio Parma to the PFGB, appointed by the CERN Staff Association, and Ofelia Capatina as the new Vice-Chair. Marcus Klug also completed his mandate on the Investment Committee and was succeeded by Vittorio Parma. I would like to express my sincere thanks to both Isabelle and Marcus for their invaluable contributions during their tenures.

In conclusion, I would like to extend my gratitude to all the members of the PFGB and its sub committees for their unwavering dedication and commitment. On behalf of the PFGB, I also wish to thank the CEO and his colleagues in the Pension Fund Management Unit (PFMU) for their exceptional service to our members and beneficiaries.

Florin-Dorian Buzatu Chair, Pension Fund Governing Board



# REPORT ANNUAL

# **2024 IN FIGURES**

**Net Asset Value** 

4 620 MCHF

Formed in **1955** 

**2** Sponsor Organisations

**4 431** members

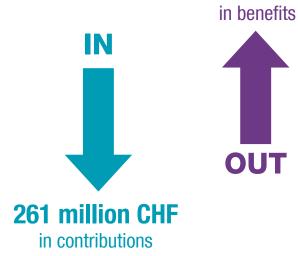
3 691 beneficiaries

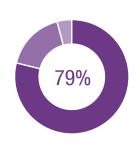
Welcomed **674** new members

"The purpose of the Fund is to insure its members and beneficiaries, as well as members of their families, against the economic consequences of disability, old age and death. (Article I 1.02)."

Supported families of **196** beneficiaries who sadly passed away

### 319 million CHF

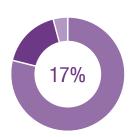




**252 million CHF**Retirement pensions



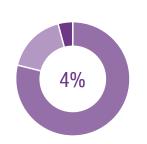
**186 million CHF** Employer contributions



**52 million CHF**Spouse, orphan & disability pensions



**75 million CHF** Member contributions



**14 million CHF**Transfer values

#### **Country of residence of beneficiaries**



# Country of residence of beneficiaries > 10 beneficiaries



**13** Beneficiaries aged over 100

**18** Beneficiaries aged under 21

**46** Countries with beneficiaries

Over 25 Million CHF paid each month

**11** Current beneficiaries with benefits for more than 50 years



Members of the PFGB at CERN for their 20 February 2025 meeting.

#### **Pension Fund Governing Board (PFGB)** Members

Please refer to page 11 for members of the PFGB

#### **Investment Committee (IC) Members**

Raphaël Bello, Chair Georges Hübner Graham Jung Vittorio Parma (as of 01.05.2024) Marcus Klug (until 30.04.2024) Isabelle Mardirossian (until 30.04.2024)

#### **Actuarial and Technical Committee (ATC) Members**

Joanne Segars, Chair Philippe Charpentier Peter Hristov Jan Robinson Kate Yates

#### **Chief Executive Officer (CEO)**

Douglas Heron

#### **Chief Investment Officer (CIO)**

Elena Manola-Bonthond

#### **Chief Operating Officer (COO)**

Kandy Mitchell

#### **Auditors**

#### **CERN External Auditors**

Court of Auditors of Portugal, Lisbon, Portugal

**Internal Audit** 

**CERN Internal Audit Service** 

# Appointed by:

**CERN Council** 

**CERN Council** 

#### **Advisers**

#### **Fund Actuary**

Aon Switzerland Ltd, Nyon, Switzerland

#### Custodian

Northern Trust Global Services SE., Luxembourg

#### **Main Banker**

UBS SA, Nyon, Switzerland

#### **Risk Consultant**

ORTEC Finance AG, Pfäffikon, Switzerland

#### **CERN Consulting Medical Practitioner**

MEDABE SA, Monthey, Switzerland









Ofelia Capatina (as of 01.05.2024)

Cristina Biino

Thomas Groffmann







Raphaël Bello

Vittorio Parma (as of 01.05.2024)

Alain Delorme







Philippe Charpentier

Andreas Hilka

Joanne Segars



PFGB Chair



ATC Chair



Council (CERN/ESO)



**CERN and ESO Pensioners** Association

Vice Chair



IC Chair

CERN Ex-officio

Staff Association (CERN/ESO)

Professional Members



Isabelle Mardirossian until 30.04.2024



#### Council

Supreme supervisory Authority of the Fund

Pension Fund Governing Board Oversight body

Investment Committee/Actuarial and Technical Committee

Chief Executive Officer Management with a dedicated unit (PFMU)

#### **GOVERNANCE STRUCTURE FOR CERN PENSION FUND**

1 The Fund is an integral part of CERN, has no separate legal personality and is under the supreme authority of the Council. The activities of the Fund are part of the official activities of CERN and benefit from privileges and immunities.

2 The Fund has operational autonomy within CERN and shall be managed in accordance with its Rules and Regulations. The Director-General shall have no responsibilities with respect to the management of the Fund.

3 The assets of the Fund shall be held separately from those of CERN and shall be used solely for the purpose of the Fund. Neither CERN nor ESO shall reclaim, borrow or impose a lien upon the assets of the Fund.

4 The oversight of the Fund shall be entrusted to the Governing Board, assisted and advised by the Investment Committee and Actuarial and Technical Committee. The management of the Fund shall be entrusted to the Chief Executive Officer.

#### **CERN COUNCIL AND ITS FUNCTIONS**

- Established the Pension Fund and acts as its supreme authority
- Decides on proposals from the Director-General concerning contributions paid to the Fund and the benefits provided by it
- Decides on proposal from the PFGB concerning changes to Pension Fund Rules and Regulations not relating to contributions and benefits
- Informed of the Fund's investment and operational performance and adopts measures to ensure the actuarial balance of the Fund.

# PENSION FUND GOVERNING BOARD (PFGB) AND ITS FUNCTIONS (ART 1 2.05)

- Informs Council of financial balance of Fund and proposes any measures needed to ensure the actuarial balance of the Fund
- Approves actuarial parameters for periodic actuarial reviews
- Approves Statement of Funding Principles, Risk Limit, Strategic Asset Allocation, Investment Guidelines and Statement of Investment Principles
- Selects the Chief Executive Officer, proposes their appointment by Council and supervises their work
- Decides on proposals from Investment Committee and Actuarial and Technical Committee
- Approves the internal control system of the Fund and the internal audit programme
- Approves the Operational Plan and Budget of the Fund
- Approves the appointment of the Actuary and the custodian of the Fund's assets
- Decides on appeals lodged against individual decisions taken by the Chief Executive Officer
- · Takes any other measures related to its oversight function

Pension Fund Governing Board composition (Art 1 2.06) Two appointed by the Council (at least one Council delegate); one appointed by ESO Council; one ex-officio from CERN Management; two appointed by CERN Staff Association; One appointed by ESO Staff Association; one appointed by ESO and CERN Pensioners Associations; two professional members.

# **INVESTMENT COMMITTEE AND ITS FUNCTIONS** (ART 1 2.10)

- Recommends to the PFGB the Statement of Investment Principles, Investment Guidelines, Risk Limit and Strategic Asset Allocation
- Monitors the implementation of the above
- Monitors the investment performance
- · Approves or recommends to the PFGB, proposals from

- the CEO relating to the appointment of external service providers' involved in the asset management process
- Reports to, and acts on requests from, the Governing Board on investment activities

#### **Investment Committee composition (Art 1 2.11)**

Two members of the PFGB; two external professional experts; any additional members with relevant experience (of PFGB or external expert) as the PFGB may decide to appoint.

# ACTUARIAL AND TECHNICAL COMMITTEE AND ITS FUNCTIONS (ART. 1 2.13)

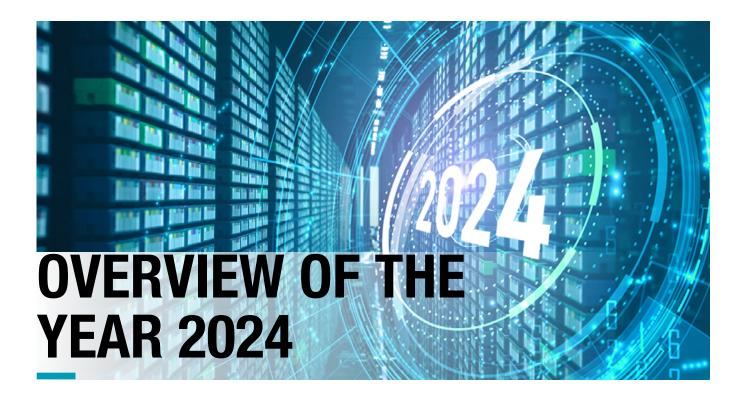
- Selects and proposes the Actuary for appointment by the Governing Board
- Defines and monitors the execution of the Actuary's mandate for the preparation of the Periodic Actuarial Review (PAR)
- Recommends, in agreement with the Actuary, to the Governing Board the actuarial parameters for the PAR
- Verifies the draft PAR and recommends to the Governing Board its submission to the Council
- Monitors the Fund's funding status and advises the Governing Board on any measures aimed at achieving full funding
- Examines proposed changes to the CERN/ESO Staff Rules and Regulations and to the Fund's Rules and Regulations, to determine any impact to the Fund and reports the results to the Governing Board
- Prepares and maintains a Statement of Funding Principles
- Reports to, and acts on requests from, the Governing Board on its activities

# Actuarial and Technical Committee composition (Art 1 2.14)

Two members of the PFGB; two external professional experts; any additional members with relevant experience (of PFGB or external expert) as the PFGB may decide to appoint.

# THE FUNCTIONS OF THE CHIEF EXECUTIVE OFFICER (ART. 1 2.08)

- Acts as the legal representative of CERN for all matters relating to the Fund
- Under oversight of the PFGB, is responsible for the management of the Fund (head of the PFMU)
- Applies and interprets the Rules and Regulations of the Fund
- Implements the decisions of the Governing Board
- Acts as Secretary to the Governing Board, Investment Committee and Actuarial and Technical Committee
- Prepares and submits to the Governing Board the Annual Report and Financial Statements of the Fund
- Appoints external service providers, defines their mandates and monitors their execution



#### PENSION FUND GOVERNING BOARD

The PFGB met on five occasions in 2024. Key matters proceeded during the year included the approval of the Fund's Annual Report and Financial Statements for submission to the CERN Council, as well as the approval of the Fund's investment risk limit and strategic asset allocation.

The PFGB also reviewed the Fund's actuarial "dashboard", presented by the Fund's Actuary, and examined the Fund's annual budget for administrative expenses. In addition, updates were provided on the Fund's key business risks and its Internal Control System. The PFMU presented its mediumterm operating plan and strategic objectives for approval.

Regular discussions also focused on the Fund's internal audit activities, including endorsement of the 2025-2027 internal audit programme and reports on the reviews of arrangements for safeguarding of Fund assets and transfer value payments. The Internal Audit Service provided progress updates on the implementation of outstanding audit recommendations. Over the year, PFGB members received training on a range of topics, including internal audit principles, cybersecurity and actuarial valuations.

#### 2025 Periodic Actuarial Review

A central focus for the PFGB in 2024 was the preparation for the 2025 Periodic Actuarial Review. The PFGB approved the actuarial assumptions proposed by the Actuary following extensive analysis of assumptions, such as mortality, transfer value election and early retirement. The assumptions also incorporated input from the Fund's Risk Consultant, following the Long-term Asset Study, as well as insights from CERN and ESO on expected future personnel policies and practices which could influence member turnover and salary increases.

#### **Definition of Full Funding**

The PFGB reviewed and endorsed a proposal from its working group on the definition of "full funding", in response to a request from the CERN Council. The PFGB's proposed definition, which will be presented to Council in 2025, aims to clarify the Fund's funding target and its long-term financial objectives.

Amendments to the Fund's Rules and Regulations In 2024, the PFGB proposed technical amendments to

Chapter I of the Fund's Rules. These amendments allow benefits to be paid across CERN and ESO Member States, provided that certain operational requirements are met. The amendments were approved by CERN Council in December and became effective on 1 January 2025. The PFGB also received updates from the Working Group on Factors and Parameters, reporting that the implementation of factors for early retirement and the purchase of additional periods of membership had gone smoothly. In addition, the review of factors for transfer values and the young spouse reduction had resumed.

#### **Risk limit and Strategic Asset Allocation**

The PFGB, on the recommendation of the Investment Committee, approved the Fund's strategic asset allocation (SAA) for 2025. Additionally, the PFGB confirmed the Fund's 1 Year 5% Conditional Value at Risk (CvaR) risk limit at -10% for the coming year.

#### **Updates to Council and Finance Committee**

Throughout the year, the PFGB Chair and the CEO provided updates to the Finance Committee and the CERN Council. These updates covered the Fund's financial status, administration activities for members and beneficiaries, and investment performance.

#### **INVESTMENT COMMITTEE**

The Investment Committee (IC) met four times during the year to oversee the Fund's investment activities. The IC received regular reports from the PFMU, assessing the performance of individual asset classes and reviewing actions taken to optimise returns within the approved risk limit and strategic allocation.

#### Long-term asset study

The Fund's Risk Consultant presented an updated Long-Term Asset Study to the IC. This study forms the foundation for defining a target asset allocation that aligns with the Fund's risk limit and long-term return objectives. The study also plays a critical role in setting the expected rate of return assumption for the 2025 Periodic Actuarial Review.

#### **Environmental, Social and Governance**

ESG considerations continued to be a key priority. The committee provided oversight of the completion of an extensive ESG peer survey conducted by the PFMU and received updates on the Fund's carbon footprint. Further details on ESG initiatives are covered in the Investment and ESG section of this document.

#### **External service contracts**

The IC also received updates on the extension of key external service providers' contracts, including those related to portfolio and financial risk management systems, counterparty risk assessment, and middle office support services.

#### **ACTUARIAL AND TECHNICAL COMMITTEE**

The Actuarial and Technical Committee (ATC) met four times in 2024. The ATC's agendas included regular items such as the review of the Actuary's year-end report and semi-annual dashboard, which monitor the funding situation.

#### **Onboarding of new Actuary**

The ATC played a crucial role in overseeing the onboarding of the Fund's new Actuary, Aon Switzerland Ltd. The committee reviewed a detailed replication of the results produced by the previous actuary, as well as comprehensive documentation summarising the best estimate assumptions and the main benefit provisions of the Fund.

#### 2025 Periodic Actuarial Review

The preparation for the 2025 Periodic Actuarial Review was a key focus for the ATC. The Actuary's analysis informed

decisions around the Best Estimate actuarial assumptions. The Actuary received input from the Fund's Risk Consultant following the Long-Term Asset Study proposing a revised discount rate of 4.2% reflecting the more favourable economic environment. Mortality assumptions were also updated based on the latest International Civil Servants Life Table (ICSLT2023) and additional analysis was conducted for assumptions relating to transfer value election, spouse age difference and early retirement.

Both sponsoring organizations, CERN and ESO, provided valuable information regarding expected future evolution of the member population and salary trends. In its November meeting, the ATC reviewed and recommended the proposed Best Estimate assumptions to the PFGB for approval.

#### **Amendments to the Fund's Rules**

The ATC also reviewed the technical amendments to the Fund's Rules, particularly those allowing benefits to be paid across CERN and ESO Member States, subject to specific operational requirements being met. These amendments were also endorsed by the ATC.

#### **Benefits Service**

The PFMU provided regular updates on the activities of the Benefits Service, including quarterly dashboards that highlighted key service metrics. Throughout the year, the Benefits Service saw an increase in member requests, particularly following the changes to provisions for purchasing additional periods and early retirement factors. Despite the higher volume of inquiries, the service maintained high standards of quality, particularly in critical areas such as the payment of benefits and transfer values.

A CENTRAL FOCUS FOR THE PFGB IN 2024 WAS THE PREPARATION FOR THE 2025 PERIODIC ACTUARIAL

#### REVIEW

The ATC received updates on the progress of the strategic roadmap to ensure the service's infrastructure and improve communication tools available for members and beneficiaries. Notably an electronic document management system was implemented, with all historical paper documents successfully scanned. As part of its oversight, the ATC also received a report of the due diligence conducted for the external supplier responsible for the scanning process.

Additionally, the ATC was briefed on data quality checks, benefit indexation, and the annual life certificate exercise, as well as receiving the annual report from the Fund's Medical Practitioner.

# **MANAGEMENT COMMENTARY**



#### **REPORT BY THE CEO**

**Introducing our Annual Report and Financial Statements** It is my pleasure to introduce the Annual Report and Financial Statements of the CERN Pension Fund for the past year. This report reflects not only the financial affairs of the Fund but also reports on governance matters and our performance concerning our four principal functions.

In recent years we have made extensive changes to the format of this document with the objective to be transparent about the Fund and to provide you with the key information in an accessible format. I encourage you to visit our website at https://pensionfund.cern.ch/ where you can find further information about our benefits, policies and investment activities.

This report highlights our financial position, governance updates, and ongoing efforts to safeguard members' benefits.

#### **Evaluating our funding status**

The key responsibility of the Pension Fund is to ensure the long-term financial security of pension benefits for our members and beneficiaries. Every three years, or earlier if circumstances require, we conduct a Periodic Actuarial Review to assess the funding ratio, which measures the Fund's ability to meet its present and future obligations concerning benefits it promises to provide. While we disclose an updated funding ratio annually in this report, the triennial review provides a more in-depth evaluation, closely studying the assumptions underlying our projections for cash flows. assets, and liabilities. 2025 is a Periodic Actuarial Review year and the results will be shared with the Council in June and with our beneficiaries through the Annual Information Meetings in October. For the first time, we will also present a projection with the context of our definition of full funding.

#### Listening to beneficiaries to inform our plans and priorities

During the year I was pleased to have the opportunity to meet with several of our members, beneficiaries and beneficiary associations both at CERN and at ESO. These meetings, whether in groups arranged formally, such as our Annual Information Meetings, or the individual opportunistic conversations that take place around the campus, provide my team and me with valuable insights. They help us understand how members and beneficiaries feel about their pension benefits and how the PFMU delivers its functions. This insight forms the basis of our Operating Plan and the work planned for the year ahead and I'm grateful to all of those who took the time to share their views.

#### Overarching strategic indicators



#### Looking ahead

The Operating Plan for this coming year, approved by the Governing Board, charts our path towards enhanced digital communication capability to better serve our beneficiaries, as well as key initiatives in investment management, funding, risk controls, and ESG.

Our purpose is clear and our work is dedicated to our stakeholders. Our purpose is to insure our members and beneficiaries, together with their families, against the financial consequences of disability, old age and death. Delivering this involves four principal functions:



Each colleague in the PFMU plays a crucial role in one or more of these functions. Despite another challenging year, their contributions have been invaluable. I sincerely thank them for their hard work and dedication, and I look forward to another year of progress together.

**Douglas Heron** CEO, CERN Pension Fund

oughs Heran



#### **BENEFITS SERVICE OVERVIEW**

Engaging with our members and beneficiaries
In 2024, our Benefits Service remained focused on prioritising engagement with members and beneficiaries.
We continued to offer informative induction sessions for new members, along with factsheets to help them better understand the Fund's benefits. Additionally, we made a successful visit to ESO, where we had the opportunity to meet with members and beneficiaries in person and provide direct access to our services.

Our annual information sessions at CERN and ESO, which were attended by over 500 members and beneficiaries, either in person or via the webcast, were another key moment of engagement. These sessions provided valuable updates on the Fund's investment performance, governance, and benefits, and also provided an opportunity to look back on 70 years of the Pension Fund. We place great value on these opportunities to connect with you and address any questions and take note of your feedback.

#### Improving the life certificate process

The annual life certificate process is an essential part of ensuring that the benefits we pay are accurate and ensuring that we have up to date information for beneficiaries on file. In 2024, we implemented changes to streamline this process. Certificates were sent one month earlier, in November, to avoid the busy holiday period and we updated the format of the certificate to make it easier to complete.

Additionally, we included a factsheet with frequently asked questions (FAQs) to help to clarify any uncertainties. Many beneficiaries provided positive feedback on these improvements, and we thank you all for taking the time to complete and return your life certificates.

Over **25** million CHF benefits paid each month

Welcomed **674** new members

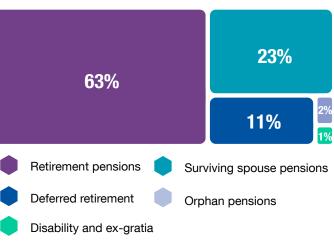
Supported **196** families of beneficiaries who sadly passed away

Converted **19** members to deferred status

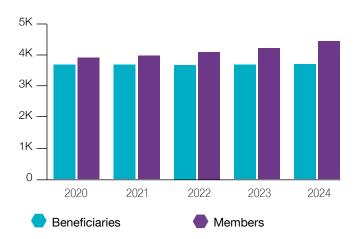
**46** countries with beneficiaries

Processed **59** members to retiree status





#### **Beneficiaries and Members** Evolution over last 5 years



#### **Expanded options for receiving benefits**

We are pleased to announce that, following Council approval of various technical amendments to Chapter I of the Fund's Rules, beneficiaries can now receive their benefits in bank accounts located in CERN or ESO Member States or Associate Member States. This option is available if certain operational requirements are met, including the support for an IBAN (International Bank Account Number) by the banking system. If you are interested in receiving your benefits in a non-Swiss bank account, or if you have any questions, please visit our website (https://pensionfund. web.cern.ch/) or contact our Benefits Service for further information.

#### "THANK YOU VERY MUCH FOR

YOUR DETAILED RESPONSE.

EVERYTHING IS NOW MUCH CLEARER,

AND I APPRECIATE YOUR ASSISTANCE."

PENSION FUND BENEFICIARY

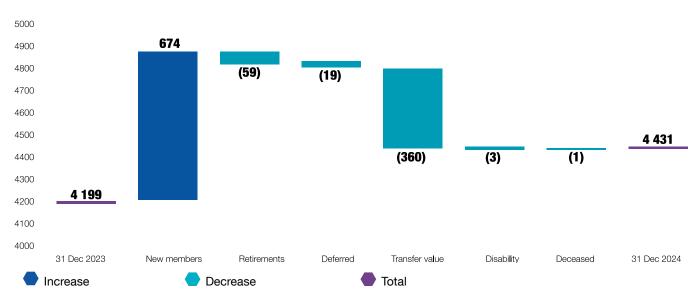
#### **Early retirement factors**

As mentioned in last year's report, 2024 saw the implementation of updated actuarial factors regarding early retirement and the purchase of additional membership periods. These updates, the result of a thorough review by a working group, aim to ensure that the factors are fair, reasonable and in the best interests of the Fund's members and beneficiaries. Specifically, the early retirement factors for members who joined the Fund on or after 1 July 1987 were updated, resulting in an increase in pension payable for early retirements from 1 July 2024.

#### Performance indicators for key activities

Our in-house Benefits Service team works diligently to perform a range of key activities, including the timely payment of benefits to beneficiaries in over 45 countries and the processing of transfer value payments to members who leave the Fund. We also handle the administration of benefits for the families of deceased beneficiaries with care and efficiency.

#### Membership changes during the year



#### Members and beneficiaries by age



To monitor and improve the quality of service, we use key performance indicators (KPIs) to track the timeliness of responses to member and beneficiary requests. Each KPI is evaluated against agreed targets and rated as green, amber or red. A summary of the KPIs by category is included below. Throughout the year, we experienced an increase in requests from our members and beneficiaries, particularly in response to changes in provisions to purchasing additional periods and early retirement factors. This resulted in some KPIs being rated as amber or red, however, despite the higher volume of enquiries, the service maintained its high standards of quality, particularly in key areas such as the timely payment of benefits and transfer values.

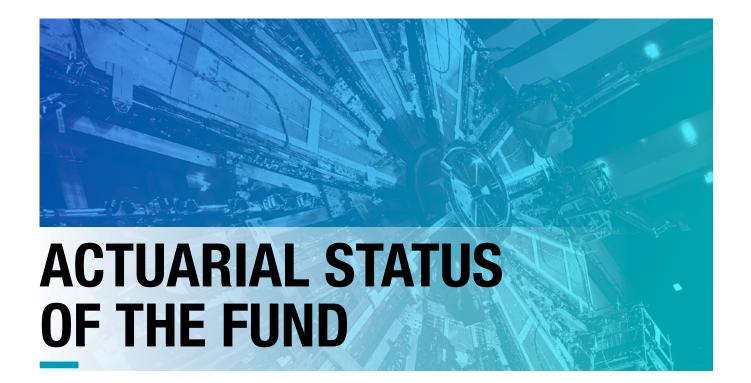
**OUR BENEFITS SERVICE REMAINED** 

FOCUSED ON PRIORITISING

ENGAGEMENT WITH MEMBERS

AND BENEFICIARIES

		2024				
Service	Average quarterly volume	Q1	Q2	Q3	Q4	
Payment of monthly benefits	9 850	•	•	•	•	
Processing of contributions	12 865					
Transfer values	93					
Purchases of additional periods	12					
Handling deaths	49					
Updates of personal/financial data	181					
Attestations	42					
Feedback/complaints	2					



One of the primary indicators for assessing the financial health of a defined-benefit pension fund such as the CERN Pension Fund is the funding ratio. This funding ratio measures the extent to which the Fund's assets cover its current and future liabilities. It is calculated by dividing the net assets owned by the Fund at the balance sheet date with the present value of the liabilities. Liabilities is the financial term used to refer to the obligation to pay benefits that have been promised to members and beneficiaries.

LIABILITY MEASUREMENT

It is important to note that a pension fund's liabilities can be measured in different ways, which can lead to varying funding ratios for the same fund.

The accumulated benefit obligation (ABO) considers liabilities accumulated up to a specific valuation date, based on benefits due to current members and existing beneficiaries as of that date. This measure does not account for future benefit accruals.

In contrast, the **projected benefit obligation (PBO)** method incorporates expected future increases in benefits such as salary growth and pension indexation. The funding

ratio based on the PBO is generally regarded as the most appropriate measure for assessing the financial position, as it reflects future liabilities based on anticipated member benefits.

Liabilities can also be projected forward on either a **closed fund** or **open fund basis**:

- Closed fund projections assume no new members will join the Fund, focusing solely on current members.
- Open fund projections account for new members, assuming future benefit accruals for these new entrants.

The key differences between these liability measures are summarised in Table 1.

A PENSION FUND'S LIABILITIES

CAN BE MEASURED IN DIFFERENT

WAYS, WHICH CAN LEAD TO

VARYING FUNDING RATIOS FOR THE

SAME FUND.

Liability Measure	Accrued Service	Remuneration Indexation	Pension Indexation	New Entrants
ABO	X			
PBO (Closed Fund)	X	X	X	
PBO (Open Fund)	X	X	X	X

Table 1

#### **ACTUARIAL ASSUMPTIONS**

The reliability of any funding ratio is influenced by the actuarial assumptions applied, such as salary increases, pension indexation, longevity and the discount rate. These assumptions are typically based on historical experience and trends. To the extent to which actual experience differs from these actuarial assumptions, adjustments may be made in future actuarial studies to better align with the most up-to-date information.

In cases where an experience study is not feasible, actuarial assumptions may be based on the Fund's investment strategy, current market conditions, publicly available statistics, legislation, or a best estimate of future trends. The Fund's Actuary, appointed by the PFGB, conducts these actuarial studies on an independent basis.

In 2024 the CERN Pension Fund has disclosed information on the financial situation of the Fund based on the following different liability measures:

- The Accounting Measure under International Accounting Standard 26 (IAS 26), using the PBO approach (Closed Fund)
- The Updated Funding Measure, based on Best Estimate assumptions (PBO – Closed Fund)
- The Periodic Actuarial Review as at 1 January 2022, using Best Estimate assumptions (PBO – Open Fund)

The key actuarial assumptions used in these calculations are shown in Table 2. For details on the assumptions applied under IAS 26 and the Updated Funding Measure please refer to the "Extract of the Actuary's Report to the Pension Fund for financial year-end 2024".

Actuarial Assumptions	<b>Accounting Measure</b>	Updated Funding Measure	Periodic Actuarial Review
	31 December 2024	31 December 2024	1 January 2022
Discount rate	AON Swiss AA Corporate Bond Yield Curve (0.79% single equiv. rate)	4.2% (1.25% + 2.95%)	3.7% (1.1% + 2.6%)
Salary increase linked to inflation	1.25%		1.1%
Pension increase linked to inflation	0.85% for active members 1.05% for beneficiaries		1.1% with PPL adjustments
Salary increase linked to career change	1.50%		1.55%
Mortality tables*	ICSLT2023 (Generational)		ICSLT2018 (Generational)

Table 2

#### **DISCOUNT RATE**

The discount rate is a key actuarial assumption in estimating the present value of a future liabilities and different discount rates may be used under different approaches to liability measurement. Given the long-term nature of pension fund liabilities, discount rates can be based on long-term market interest rates or best estimate actuarial assumptions reflecting the long-term expected return on assets. Small variations in the discount rate can significantly impact the value of liabilities and, in turn, the funding ratio.

Under IAS 26, the Fund uses a discount rate based on highquality Swiss corporate bonds. This variable rate can result in considerable volatility in funding ratios from year to year. While this method adheres to accounting standards, it could be seen as conservative and may not fully reflect the Fund's long-term financial health.

In contrast, the Updated Funding Measure uses a discount rate aligned with the Fund's long-term investment return target, reducing the volatility that arises from market fluctuations.



\*Following analysis of the Fund's mortality experience, a scaling adjustment of to the probabilities contained within the ICSLT2023 and ICLST2018 tables was proposed as the best estimate assumption. In 2024 the following adjustments are made to the ICLST2023 tables: male adjustment from 50% at age 99 and female adjustment from 85% at age 65 to 100% at age 99. In 2022 an adjustment of 94% was made to the probabilities contained within the ICSLT2018 tables.



#### **EXPLANATION OF DIFFERENT LIABILITY MEASURES AND ACTUARIAL ASSUMPTIONS**

#### The Accounting Measure (IAS 26)

The Fund's financial statements are prepared in accordance with the International Public Sector Accounting Standards (IPSAS) and International Accounting Standard 26 (IAS 26). The Fund follows IAS 26, which involves using the PBO Closed Fund approach to value liabilities. This approach includes anticipated future salary and pension increases, resulting in higher liability values compared to the ABO method. The discount rate used under IAS 26 reflects the rate for high-quality Swiss corporate bonds, leading to a conservative estimate of the Fund's funding ratio.

#### **Updated Funding Measure**

The Updated Funding measure also uses the PBO closed fund approach but applies a different set of actuarial assumptions reflecting a best estimate of the long-term funding conditions. These assumptions aim to align closely with actual experience, and the discount rate used represents the Fund's long-term investment return target.

This approach provides a more stable funding ratio compared to the accounting measure, which is influenced by market fluctuations.

#### The Periodic Actuarial Review as of 1 January 2022

The Fund conducts a Periodic Actuarial Review every three years, as required by its Rules. The most recent review was carried out as of 1 January 2022. This review projects assets and liabilities forward, considering future contributions, expected investment returns, and service accruals for both current and new members. The PBO method is used, and the review also incorporates stochastic scenarios on the discount rate assumption to illustrate potential future funding ratios, offering a more comprehensive view of the Fund's financial health.

#### **Funding Situation under different Liability Measures**

Table 3 outlines the Fund's funding situation under each of the liability measurement approaches, based on the actuarial assumptions mentioned in Table 2. The prior year funding ratios under the first two measures are provided in the "Extract of the Actuary's Report to the Pension Fund for financial year-end 2024". Funding ratios at 1 January 2041

Liability Measure	Accounting Measure	Updated Funding Measure	Periodic Actuarial Review
	31 December 2024	31 December 2024	1 January 2023
Net assets (MCHF)	4 620	4 620	4 982
Actuarial Liabilities (MCHF)	11 329	6 323	6 464
Surplus/(Deficit) (MCHF)	(6 709)	(1 703)	(1 482)
Funding Ratio at date of measure	40.8%	73.1%	77.1%
Funding Ratio at 1 January 2041	N/A	N/A	97.1%
Funding Ratio at 30 years after the valuation date	N/A	N/A	114.4%

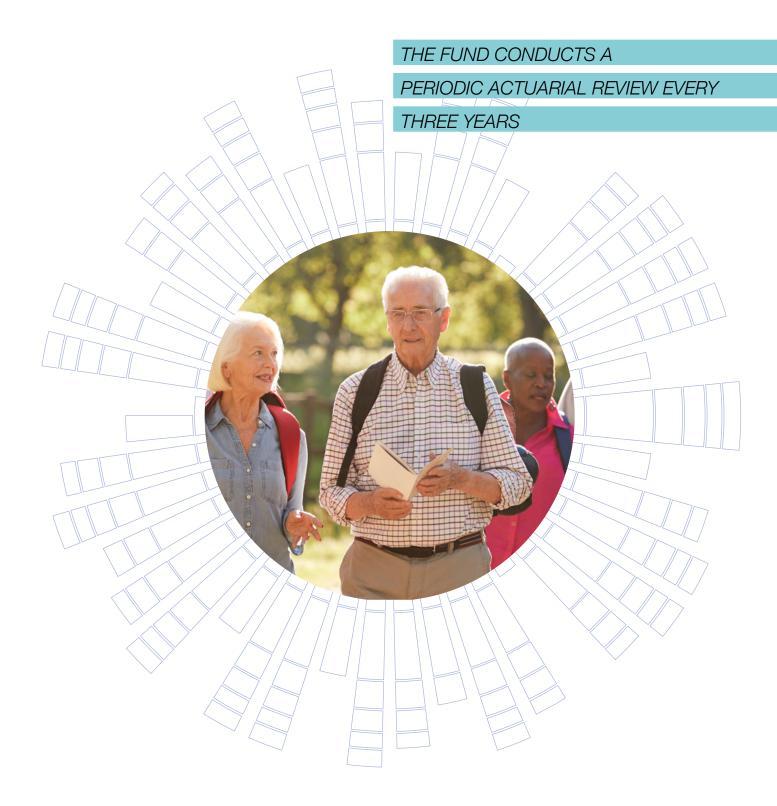
Table 3: Funding situation under each of the liability measurement approaches.

and 30 years after the valuation date are not provided, as this measure is calculated on a closed fund basis.

#### **Summary**

The measurement of a pension fund's liabilities depends on the methodology used, which can lead to different assessments of the Fund's financial situation. The most appropriate measure for evaluating the Fund's funding status is the PBO in an open Fund scenario, as determined in the three-yearly Periodic Actuarial Review.

The Periodic Actuarial Review as of 1 January 2025
The upcoming Periodic Actuarial Review, effective 1 January 2025, will also use Best Estimate assumptions. These assumptions represent the most likely outcomes, with an equal probability of actual experience being better or worse than the estimates. The PFGB approved these Best Estimate assumptions, determined by the Fund's Actuary, at its meeting on 21 November 2024, and they will be used in the Periodic Actuarial Review to assess the Fund's financial position.





#### Current asset allocation % and total asset value

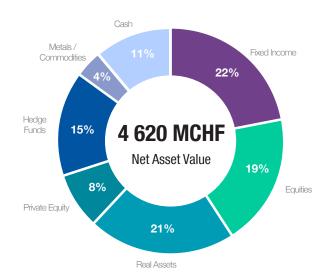
#### MACROECONOMIC HIGHLIGHTS

In 2024, global economic activity continued to expand, with the IMF1 estimating global GDP growth at 3.2%, broadly unchanged from 2023. However, economic activity varied across regions. The United States exhibited strong growth, while the eurozone and China experienced more moderate expansions.

The US economy grew by an estimated 2.8%, largely supported by resilient consumer spending, maintaining momentum from the previous year. In contrast, eurozone GDP expanded by just 0.8%, up from 0.4% in 2023 but still below potential. Meanwhile, China's economy slowed to 4.8%, down from 5.2%, reflecting weaker domestic demand and structural challenges.

Labour markets remained robust across most major economies, with unemployment rates staying low. However, the US saw a modest increase in unemployment as the labour market came into better balance.

Despite sustained economic growth, inflation continued to decline, albeit at a slower pace, and remained above pre-pandemic levels in many countries. The IMF estimated global CPI inflation at 5.8%, down from 6.7% in 2023. The decline was more pronounced in advanced economies, where disinflation was led by easing goods prices, while services inflation remained persistent. However, in the latter half of the year, signs emerged that core inflation had stopped declining in the US and the eurozone, raising concerns about the challenges involved in bringing inflation fully back to target.



In response to slowing inflationary pressures, most major central banks began cutting interest rates. Both the European Central Bank and the US Federal Reserve lowered rates by 100 bps, while the People's Bank of China reduced key lending rates and reserve requirements along with implementing a significant stimulus package. In contrast, the Bank of Japan raised interest rates for the first time since 2007, shifting away from its long-standing ultra-loose policy amid heightened inflationary pressures.

Economic uncertainty remained high in 2024, driven by geopolitical events and the US presidential election in November. These developments contributed to some volatility in asset prices and commodities, particularly in gold, which saw a notable rise in value. At the same time, optimism around artificial intelligence continued to buoy valuations in the technology sector.

<sup>1.</sup> All economic figures in this section are from the International Monetary Fund's World Economic Outlook, October 2024

Overall, 2024 was marked by resilient economic growth, receding inflationary pressures and the easing of monetary policies across major economies. However, regional divergences persisted, with geopolitical uncertainty and economic policy shifts playing a significant role in shaping market dynamics.

#### RISK MANAGEMENT AND ASSET ALLOCATION

The Fund's risk management and asset allocation policy is set out in the Statement of Investment Principles, which has been approved by the PFGB. It is based on an annual risk limit and an annual strategic asset allocation (SAA), and on managing the current asset allocation (CAA) in a manner compatible with both the risk limit and the investment return objective.

The Fund's return objective is to meet or exceed the actuarial best-estimate discount rate, adjusted for Geneva inflation, over the long term. Since 2022, the best-estimate real-rate assumption has stood at 2.60% per annum.

In January 2024, the Risk Consultant (Ortec Finance) formally recommended removing the CVaR error margin that had first been implemented on 12 March 2020, in accordance with the risk framework approved by the PFGB in November 2017. For 2024, the PFGB set the 5% Conditional Value-at-Risk (CVaR) limit at -10%.

The SAA for 2024, which was drawn up by the PFMU in collaboration with the Risk Consultant and was subsequently endorsed by the Investment Committee and approved by

Asset class	CAA as at 31-12-2024	SAA 2024	SAA 2023
Fixed Income	21.22%	25.50%	26.50%
Equities	(21.16%) 19.43% (19.26%)	17.00%	17.00%
Real Estate	15.94%	19.00%	19.00%
Infrastructure Timber/Farmland	1.75% 2.81%	2.50%	2.50%
Private Equity	8.67%	6.00%	6.00%
	(7.61%)		
Hedge Funds	15.09%	13.00%	11.00%
Precious metals/ Commodities	3.81%	4.50%	5.50%
Cash and Overlay	11.26%	10.00%	10.00%

Table 4: CAA as at 31-12-2024, SAA 2024 and SAA 2023. Note: The numbers in brackets show the exposure net of cash held at asset class level.

the PFGB, is shown in Table 4 below. In the SAA 2024 the FX hedging policy for the USD was lowered from 100% to 90%. The actual (CAA) exposure by asset class as at 31 December is shown in the first column.

The risk level of the SAA remained relatively constant during 2024, at a level of approximately -9%. In 2024, inflation reduced further in comparison to the previous years but did so at a slower pace than had been expected by the markets at the beginning of the year. In most regions, inflation levels are still clearly above central bank targets and, due to anticipated upward fiscal spending pressures associated with the energy transition and elevated geopolitical risks, this is not expected to change quickly. This high inflation expectations impacted the development of both the short and the long end of interest rate curves. Central banks started to cut interest rates to support growth but subsequently reduced the pace of these cuts due to persistent inflation. At the long end of the curve, interest rates declined from April to September, but this pattern reversed when markets started to expect that it could take longer for inflation to get back to central bank targets. The continued high levels of interest rates led to greater interest rate volatility, which increased the risk for fixed income. Risks for equity remained significant due to the combination of high valuations, relatively moderate growth expectations, high financing costs and significant geopolitical uncertainty.

Throughout the year, the Fund's risk, as estimated by the Risk Consultant using the disequilibrium scenarios, remained within the one-year 5% CVaR limit of -10%. It is recalled that the use of short-term scenarios - which model business cycle behaviour - is dictated by the Fund's risk limit, which is expressed in terms of a one-year time horizon. These scenarios take into account the current policies of central banks, which tend to prevent the level of risk from rising to the level of the long-term expectation.

# IN 2024, THE FUND RETURNED A PERFORMANCE OF 5.02%

#### **PORTFOLIO PERFORMANCE IN 2024**

In 2024, the Fund returned a performance of 5.02%, net of external management and custody fees, as reported by the external performance-monitoring reporting service (APEX) as at 31 December. This performance, which is calculated using a time-weighted rate of return to eliminate the impact of external cash flows and the associated timings, does not include the governance and internal management/ operations costs², which are evaluated at approximately 0.23 percentage points, unchanged from 2023. Geneva inflation stood at 0.48%.

<sup>2.</sup> Includes PFGB, ATC and IC expenses, Actuary, CERN services, Risk Consultant, PFMU staff, temporary labour and external service providers related to the investment process, such as due diligence providers, data providers, real-estate appraisal service and performance-reporting services.

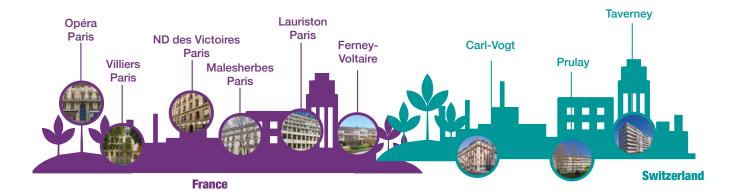


Figure 1 shows the Fund's cumulative returns compared to the return objective since December 2011, as reported by APEX. The return objective corresponds to the best-estimate real rate, which has stood at 2.60% per annum since 2022. In 2024, the Fund's real return was 1.92 percentage points above the best-estimate real rate. As at 31 December 2024, the Fund's cumulated real returns exceeded the objective by 18.86 percentage points.

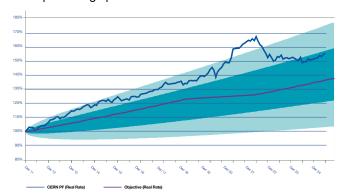


Figure 1: Cumulative Real Return vs. Objective (Real Rate)

#### **Currency Hedging Policy**

Throughout the year, the PFMU maintained a prudent currency hedging policy, staying close to a 90% hedge for the USD and a 100% hedge for the other currency exposure. The rate differential between Switzerland and both the US and the eurozone led to a historically high FX hedging cost (approximately 2.5% for EUR and 4.1% for USD). The CHF saw a 1.20% depreciation against the EUR and a 7.35% depreciation against the USD.

#### **Fixed Income**

The fixed-income portfolio returned -2.05% after currency hedging costs.

The year remained challenging for bond markets, despite the central banks' accommodative monetary policies. The bond market refrained from pricing in the ability of central banks to deliver continued monetary easing and reach inflation targets in a sustainable manner. The high volume of government financing was an additional headwind for the bond markets. A large fraction of the actively managed positions was replaced by passive instruments to facilitate the alignment with the benchmarks.

#### **Equities**

The equity portfolio returned +10.42% after currency hedging costs.

The year saw robust performance for the equity markets in developed economies. The S&P 500 index registered a 24.6% increase in USD, the Japanese Topix index advanced by 20% in JPY while the MSCI Europe index posted an 7.9% gain in EUR. High valuations and significant market concentration contributed to the strong performance of the US markets, driven by optimism around artificial intelligence. The tactical overweight allocation to US equity, coupled with the exposure to Japanese equity within the Asian allocation, proved to be a significant driver of the Fund's performance. In addition, a shift from active managers to several passive instruments facilitated improved alignment with the benchmarks.

#### Real Assets: Real Estate - Timber and Farmland -Infrastructure

The real-assets portfolio comprises the following three subportfolios: real estate (directly owned properties and realestate funds), timber/farmland and infrastructure.

#### **Real Estate**

The real-estate portfolio returned +3.40% after currency hedging costs.

This positive return largely reflects the increase in the annual valuation of the Fund's directly held properties compared to their level at the end of 2023. The 2024 valuation exercise was performed by the same appraiser as the previous year and with the same methodology, the discounted cash flow model (DCF). Directly held properties account for 94% of the Fund's real-estate portfolio.

No investments or divestments were made during the year.

#### **Timber and Farmland**

The timber and farmland portfolio returned +2.72% after currency hedging costs.

The positive performance of the portfolio was largely driven by the increase in the capital value of the directly owned forests (which represent close to 2/3 of the portfolio),



particularly in the value of the oak trees and the soil. These forests are managed according to the irregular forest management<sup>3</sup> technique, which is deemed to be the best suited to maintaining ecological diversity.

During the year, the Fund supplemented its current exposure with some additional purchases.

#### Infrastructure

The infrastructure portfolio ended the year at +3.11% after currency hedging costs.

The portfolio is exposed to brown and greenfield investments in developed markets. The infrastructure portfolio is largely composed of private funds, including some funds with a focus on renewable energies.

During the year, no new investments or divestments were made.

#### **Private Equity**

In 2024, the private equity portfolio returned -1.03% after currency hedging costs.

This result primarily stemmed from the negative performance of some buyout funds, which offset the positive returns from growth funds.

It was an unfavourable year for private equity due to still elevated interest rates, a weak exit environment and subdued merger and IPO activity. In response, some managers turned to the secondaries market to generate liquidity, while others chose to hold the companies in their portfolio for longer, awaiting more favourable conditions. As a result, net distributions for the private equity portfolio were negative.

The Fund continued to commit funds to private equity across different strategies at the planned pace.

#### **Hedge Funds**

In 2024, the hedge fund portfolio returned +8.32% after currency hedging costs.

While the performance was satisfactory across the main sub-categories, the portfolio was readjusted through full redemptions of underperforming managers, the proceeds of which were reinvested into high-conviction managers who are typically hard-closed for extended periods.

The funds in the risk overlay portfolio delivered a negative performance as these strategies tend to underperform during periods of strong equity market returns.

#### **Commodities/Precious Metals**

In 2024, the commodities and precious metals portfolio delivered a positive performance of +33.99% after currency hedging costs.

The portfolio is 95% allocated to an exchange-traded fund (ETF) backed by physical gold. The strong rally in gold observed in 2024 was likely driven by central bank activities.

#### **UPDATE ON OPERATIONAL INFRASTRUCTURE**

In 2024 the performance attribution capabilities of the Portfolio Management System (PMS) started to be deployed.

#### **CONCLUSIONS – MACRO OUTLOOK**

While the global economy has shown resilience, the macroeconomic and financial landscape remains challenging. The gradual easing of inflationary pressures and the decline in interest rates should support financial markets and economic activity going forward. Additionally, the supply side reforms under consideration by some governments and the potential of Al-driven advancements provide encouraging long-term growth prospects.

That said, significant uncertainties persist. Elevated technology sector equity valuations may weigh on medium-term returns, while persistently elevated inflation, rising

public indebtedness and geopolitical risks could contribute to heightened market volatility.

#### **UPDATE ON THE IMPLEMENTATION OF THE ESG POLICY**

In November 2021, the Pension Fund Governing Board (PFGB) adopted an ESG policy as an integral part of the Fund's Statement of Investment Principles. At the same time, the PFGB approved an ESG implementation work plan, with an explicit focus on addressing climate-related risks and opportunities, with substantial steps forward taken during 2022. Within this framework, the Fund ran a second peer survey - the ESG peer survey 2023-24 with an enlarged peer group. The progress achieved in 2024 is reported in the next section. The ESG plan itself is updated on an annual basis.

In parallel, the Fund continued to participate in collective engagement activities. In 2024, it participated in 11 initiatives on various ESG topics led by Ethos Engagement Pool International (EEPI).

#### MANAGEMENT OF CLIMATE RELATED RISKS AND **OPPORTUNITIES: PROGRESS REPORT**

This section summarises the work carried out in 2024 to strengthen the Fund's management of climate-related risks and opportunities. It is organised according to the guidelines of the Task Force on Climate-Related Financial Disclosures (TCFD), as reproduced below, around the pillars of governance, strategy, risk management and metrics/targets.

AN ESG IMPLEMENTATION WORK PLAN. WITH AN EXPLICIT FOCUS ON ADDRESSING CLIMATE-RELATED

#### I. Governance

Describe the oversight of the climate-related risks and opportunities. Describe management's role in assessing and managing climate-related risks and opportunities.

The Fund acknowledges that climate risk can have a systemic impact on the value of its investments. Climate change is expected to be a source of increased physical risks (e.g. climate events) and transition risks (e.g. tighter regulatory requirements, legal risks, stranded assets, social unrest).

The Fund is on a path of progressively integrating the management of climate risks into its global investment risk management framework. While the responsibility for this integration lies within the remit of the CEO and the CIO, the progress is continuously monitored by the Investment Committee and the PFGB.

#### II. Strategy

In 2024 the Fund completed its first Long-Term Asset Study where climate change considerations were fully integrated in the process of setting long-term asset return and inflation assumption. These climate-aware assumptions were subsequently used as an input to the Periodic Actuarial Review 2025.

In parallel, the Fund continued monitoring its carbon footprint and searching for investment opportunities with climate transition theme. This combination of top-down and bottom-up approaches is deemed to be appropriate, given the complexity of the matter and the inherent uncertainties.

Also in 2024, the Fund conducted an extensive survey of ESG practices implemented by the peers. The findings of this survey were used to establish the ESG Workplan for 2025 which will include exploring the impact of possible exclusion policies and consideration of possible enhancement of the stress scenario framework.





Figure 2: The 2024 climate scenarios. Source: Ortec Finance.

Describe the climate-related risks and opportunities the organisation has identified over the short, medium and long term. Describe the resilience of the organisation's strategy, taking into consideration different climate-related scenarios, including a 2°C or lower scenario.

As mentioned above, the Fund's long term asset return and inflation expectations were determined with full integration of climate change consideration. These long-term expectations were aligned with reference climate scenarios in a 2 to 3°C global warming range, see Figure 2.

The 2024 climate scenarios are reported in Figure 2.

The climate change is mostly impacting in the long-term outlook for inflation (CPI) exerting an upward pressure during the transition period. Both physical and transition risk were considered:

- The physical risks mainly driven by more extreme weather – will be relevant for Switzerland as this may have impact on the tourism industry, as well as the insurance industry. In all cases the physical risk will lead to higher cost (of either prevention, mitigation or 'repair'). The amount of additional cost and the (long term) impact of this on CPI differs per climate pathway.
- The transition risks and cost are related to the transition of a more carbon neutral economy. General consensus is that transition comes with additional cost, especially for carbon intense industries/countries. As the Swiss economy is not heavily dependent on mining, the impact on CH inflation will be lower than in countries like Canada and Australia. The impact also differs per climate pathway – the more that a society steers towards a lower temperature increase, the higher the transition costs.

In the reference climate scenarios in the 2 to 3°C global warming range, the combined impact of transition and physical risks is expected to contribute with approximately 25bps on annual inflation for the next decade.

As mentioned in the preamble of this section, the Fund strives to identify opportunities to invest in climate-focused assets. During the reporting period, the Fund participated in a co-investment in a company developing fusion energy technology, supporting sustainable energy solutions. Additionally, the Fund committed capital to two Article 8-compliant funds. Parallel to that, the Fund has been focused on a real estate project aiming at increasing the energetic efficiency of a property.

The Fund continues to invest in the timber asset class, both through direct ownership and through investment funds. The directly owned forests in the portfolio have been managed since inception according to the "irregular forest management" approach<sup>4</sup>.

#### III. Risk Management

Describe the organisation's process for identifying, assessing and managing climate-related risks. Describe engagement activity with investee companies to encourage better disclosure and practices related to climate-related risks. Describe how processes for identifying, assessing and managing climate-related risks are integrated into the organisation's overall risk management.

The Fund delivered on its commitment to incorporate physical and transition risks in the Long-Term Asset Study 2024 for the purpose of providing robust long-term return and inflation assumptions for the Periodic Actuarial Review 2025. In addition, the Fund continued monitoring its carbon footprint and transition pathway figures.

#### IV. Metrics and targets

Describe the metrics used by the organisation to assess climate-related risks and opportunities in line with its strategy and risk management process.

<sup>4</sup> Also called 'uneven-aged forest management'. This approach can be defined as "managing and using forests and woodlands in a manner and with an intensity that allow them to maintain their ecological diversity, productivity, regeneration capacity and vitality and their ability to fulfil, now and in the future, relevant ecological, economic and social issues, locally and globally, and that they cause no impediment to other ecosystems" (Ministerial Conferences for the Protection of Forests in Europe – Strasbourg 1990, Helsinki 1993)

The Fund assesses the climate impact of the securities it holds by measuring their carbon footprint. For this purpose, it used the methodology and data provided by S&P Trucost for the combined corporate bonds and listed equity holdings as of September 2024, which accounted for 25% of the NAV excluding cash. It is to be noted that corporate carbon reporting is still improving in quality and has yet to reach full maturity. Complementary figures were calculated by scaling absolute emissions, relative to the portfolio's value (C/I) or the revenues (C/R) of the underlying firm. The TCFD recommends using the weighted-average carbon intensity (WACI), which measures the average carbon-to-revenue ratio across individual portfolio holdings according to their individual weights.

THE FUND ASSESSES THE CLIMATE IMPACT OF THE SECURITIES IT HOLDS BY MEASURING THEIR CARBON

#### **FOOTPRINT**

The data used to evaluate emissions is backwardlooking by its nature. For this reason, the Fund used a complementary metric for carbon footprinting, namely the Implied Temperature Rise (ITR)5, which the TCFD defines as an attempt to estimate the global temperature rise associated with the greenhouse emissions of a single entity (company, fund, etc.). However, the ITR is more dependent on assumptions and models.

Using the same S&P Trucost service, the Fund separately measured the carbon intensity of its direct real-estate holdings, which account for 16% of NAV of September 2024 excluding cash. For this portfolio, the alignment with the decarbonisation pathway envisaged for the real-estate sector under the International Energy Agency 2°C scenario was evaluated using the Carbon Risk Real Estate Monitor (CRREM) global pathway.

The Fund's approach to climate-related opportunities is bottom-up, as discussed in the previous section. No specific metrics has been developed in this regard.

Disclose Scope 1, Scope 2 and, if appropriate, Scope 3 greenhouse gas (GHG) emissions and the related risk. Disclose weighted average carbon intensity (WACI) for each product or investment strategy where data and methodology so allow.

In absolute terms, the 2024 carbon footprint of the Fund's combined corporate and listed equity holdings (henceforth the "aggregate portfolio") is estimated at 77.5k tCO2 e. In accordance with the TCFD recommendation, this calculation includes Scope 1 and Scope 2 emissions. Figure 3 reports these carbon footprint emissions and WACI for the aggregate portfolio for 2023 and 2024.

If Scope 3 "Non-electricity first tier of the supply chain" emissions<sup>6</sup> are also included, the footprint rises to 100.9k tCO2 e. In absolute terms, this measure declined by 9.4k tCO2 e between 2023 and 2024. This decrease is largely attributed to the reduced apportioned emissions of the corporate bond portfolio (-29k tCO2 e) while the listed equity portfolio saw a net increase of approximately 19.6k tCO2 e. The reduction of emissions of the corporate bond portfolio is largely a consequence of the divestment of high emitters and the purchase of ETFs, the latter being less exposed to high emitting sectors.

In 2024, the WACI of the aggregate portfolio's Scope 1 and Scope 2 emissions is 174 tCO2 e/ MCHF. The C/R, C/I and WACI of the aggregate portfolio - Scope 1, Scope 2 and Scope 3 - are 252, 102 and 214 tCO2 e/MCHF, respectively.

Compared to 2023, the reductions in carbon intensity measures (C/R and C/I), including Scopes 1, 2 and 3, are mostly a consequence of the lower total apportioned amount of tCO2 e, i.e. of the numerator of the ratio.

#### Carbon footprint and WACI (Scope 1 and Scope 2 emissions)



Figure 3: Carbon footprint and WACI, Scope 1 and Scope 2 emissions, CERN Pension Fund corporate and listed equity portfolio. Source: S&P Trucost for CERN Pension Fund.

5 ITR incorporates current GHG emissions or other data and assumptions to estimate expected future emissions associated with the selected entities. Then, the estimate is translated into a projected increase in global average temperature (in °C) above preindustrial levels that would occur if all companies in corresponding sectors had the same carbon intensity as the selected assets (source: TCFD internal documentation)

Calculations of GHG emissions are presented in metric tonnes of carbon equivalent, which weights each greenhouse gas by its Global Warming Potential.

Scope 1 emissions are greenhouse gases generated by direct company operations (i.e. emissions generated by electricity production, burning fuel in corporate fleet). Scope 2 emissions are those generated by purchased electricity, heat or steam. Scope 3 emissions are those that are indirectly generated by a company's activities either "upstream" (i.e. by suppliers) or "downstream" (i.e. through the use of sold products). Scope 3 emissions are subject to far greater uncertainty compared to Scope 1 and 2 emissions.

6 CO2 e emissions generated by companies providing goods and services in the first tier of the supply chain.

<sup>\*</sup> Includes all direct emissions



Asset owners should describe the extent to which their assets under management and products and investments strategies, where relevant, are aligned with a well below 2°C scenario, using whichever approach or metrics best suit their organisational context or capabilities.

Figure 4 shows the path of the Fund's combined corporate bond and listed equity portfolio emissions, according to three different temperature paths, using firm-level estimates provided by S&P Trucost. The implied temperature path of the portfolio is measured to be in the 1.5-2 °C range, which is within the goals of the Paris agreement. This implied temperature path is represented by the cumulative sum of carbon emissions from 2012 to 2030.

TO INVEST IN CLIMATE
TRANSITION THEMES

# Carbon trajectories under three temperature paths (Scope 1 and Scope 2 emissions)

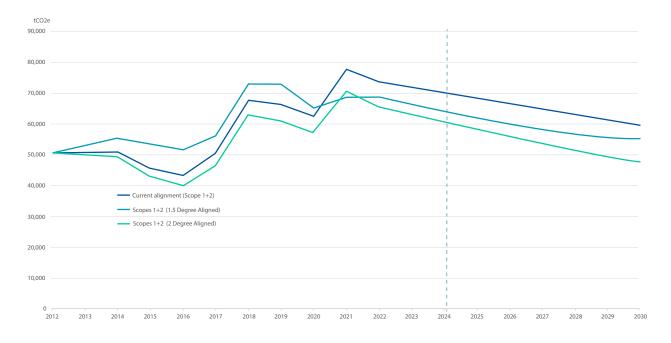


Figure 4. Carbon trajectories according to three temperature paths, Scope 1 and Scope 2 emissions, CERN Pension Fund corporate and listed equity portfolio. Source: S&P Trucost for CERN Pension Fund.

Figure 5 shows the portfolio's carbon intensity against the 2°C Aligned Carbon Intensity Path. The carbon intensity of the Fund's direct real-estate portfolio is 12 kg CO2 e/m2, with a WACI value of 11 kg CO2 e/m2 compared to 8 kg CO2 e/m2 for both measures in 2023. This increase is mainly due to improvement of reporting by property managers. In particular, in 2024, an estimation related to the consumption of private residential surfaces of the Swiss assets, which was previously not considered, was included. Despite this increase, the current portfolio appears to be well positioned with respect to the CRREM milestones in 2030 and in 2040.

Describe the targets used by the organisation to manage climate-related risks and opportunities and performance against targets.

The Fund may consider setting targets for the management of the portfolio in the medium term, after having thoroughly assessed the drivers of its carbon footprint and temperature alignment performance.

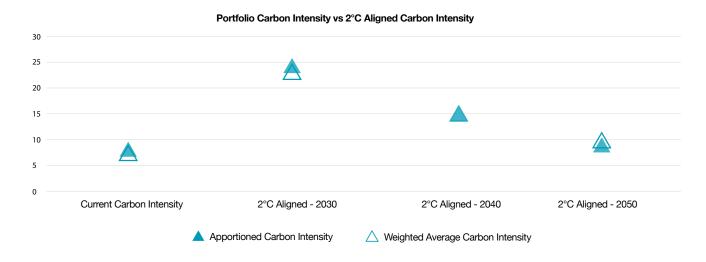
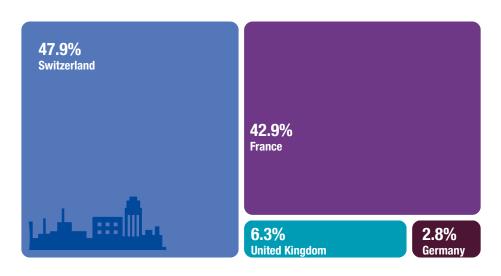


Figure 5. Direct Real Estate: Portfolio carbon intensity vs CRREM 2°C Aligned Carbon Intensity Milestones. Source: S&P Trucost for CERN Pension Fund.

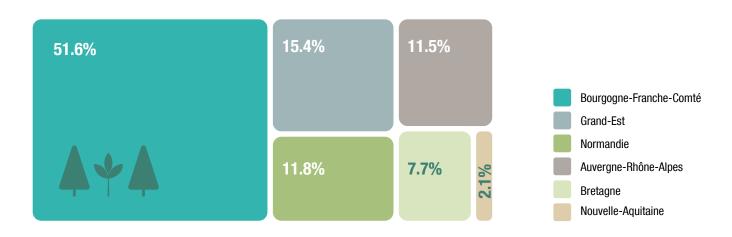




#### 2024 - PROPERTIES (EXCLUDING FORESTS) HELD BY COUNTRY



#### 2024 - FORESTS HELD BY FRENCH REGIONS





# STATEMENTS FINANCIAL



#### **External Auditors' Opinion**

on the Financial Statements of the Pension Fund of the European Organization for Nuclear Research (CERN-PF) for the year ended 31 December 2024

#### to the Council of CERN

#### **OPINION**

The Portuguese Court of Auditors has audited the financial statements of the Pension Fund of the European Organization for Nuclear Research (CERN-PF) for the year ended 31 December 2024. These financial statements comprise the statement of financial position, statement of the financial performance, cash flow statement, statement of changes in net assets available for benefits as well as the notes to the financial statements.

#### Unqualified Opinion of financial statements

In our opinion, the financial statements present a true and fair view, in all material aspects of the Pension Fund of the European Organization for Nuclear Research as of 31 December 2024 of its financial performance and of its cash flows for the year ended, in accordance with International Public Sector Accounting Standards (IPSAS) and International Accounting Standard 26.

#### **BASIS FOR OPINION**

As the External Auditor, we conducted the audit in accordance with the International Standards of Supreme Audit Institutions (ISSAIs) issued by the International Organization of Supreme Audit Institutions (INTOSAI), and the International Standards on Auditing (ISAs).

These standards require that we comply with ethical requirements and plan and perform the audit to obtain reasonable assurance as to whether the accounts of the CERN-PF are free from material misstatement and the transactions underlying them are legal and regular.

All the rules, instructions, procedures, documentation and other evidence, as well as the information and explanations required have been provided timely and adequately.

#### MANAGEMENT'S RESPONSIBILITY

The CERN-PF Management is responsible for the preparation and fair presentation of the financial statements in accordance with IPSAS and for such internal control as it determines to be necessary to allow the preparation of financial statements that are free from material misstatement, whether due to fraud or error.

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

Those charged with governance are responsible for overseeing the financial reporting process of the Organization.

#### AUDITOR'S RESPONSIBILITY

We operated independently and performed such audit as deemed necessary to meet financial audit obligations regarding the Finance Committee and the Council.

Our objectives are to obtain reasonable assurance as to whether the Pension Fund (PF) financial statements as a whole are free from material misstatements, whether due to fraud or due to error, and to issue an audit report that includes our opinion. Reasonable assurance means a high level of assurance, but it is not a guarantee that an audit conducted in accordance with the ISSAIs will always detect a material misstatement when it exists. Misstatements can arise from fraud or error and are considered material if, individually or considered together, they could reasonably be expected to influence the economic decisions of users taken based on these financial statements.

As part of an audit in accordance with the International Standards of Supreme Audit Institutions (ISSAIs), we exercise professional judgment and maintain professional skepticism throughout the audit. We also:

- Identify and assess the risks of material misstatement in the financial statements, whether due to fraud or error, design and perform audit procedures that are responsive to those risks and obtain audit evidence that is sufficient and appropriate to provide a basis for our opinion. The risk of not detecting a material misstatement resulting from fraud is higher than the risk of not detecting one resulting from error, as fraud may involve collusion, forgery, intentional omission, misrepresentation or the overriding of internal control;
- Obtain an understanding of internal control relevant to the audit in order to design audit procedures that are appropriate
  in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the internal control of
  CERN-PF;
- Evaluate the appropriateness of accounting policies used and the reasonableness of accounting estimates and related disclosures made by the Management;
- Draw conclusions as to the appropriateness of the Management's use of the going-concern basis of accounting and, based on the audit evidence obtained, whether a material uncertainty exists in relation to events or conditions that may cast significant doubt on the ability of CERN-PF to continue as a going concern. If we conclude that a material uncertainty exists, we are required to draw attention in our audit report to the related disclosures in the financial statements or, if such disclosures are inadequate, to modify our opinion. Our conclusions are based on the audit evidence obtained up to the date of our audit report. However, future events or conditions may cause CERN-PF to cease operations as a going concern;
- Evaluate the overall presentation, structure and content of the financial statements, including the disclosures, and
  whether the financial statements represent the underlying transactions and events in a manner that achieves a fair
  presentation.

The audit involved performing procedures to obtain sufficient and appropriate evidence about the amounts and disclosures in the financial statements to provide a basis for our opinion. The procedures selected relied on the Auditor's judgment, including the assessments of the risks of material misstatements of the Financial Statements, whether due to fraud or error. In making those risks assessments, the Auditor considered the internal control system relevant to the entity's preparation of the financial statements in order to design audit procedures that are appropriate in the circumstances.

We believe that the audit evidence 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 current period. We do not provide a separate opinion on these matters.

#### Internal Control System

Being the second year of our mandate as External Auditor, our focus regarding the internal control system has been to deepen our understanding of the organization's existing internal controls and assess its effectiveness.

As part of our audit work, we have reassessed the overall internal control environment, reviewed internal audit reports, conducted follow-up interviews with key personnel, and performed additional procedures on benefits payments, financial asset valuation, and cash and cash equivalents.

At this stage, we have no new observations or recommendations in this area.

#### Contributions and Benefits Payable

In 2024, the net membership activities cost was negative 57 MCHF, resulting from 262 MCHF in contributions received and 318 MCHF in benefits paid.

On this domain, the audit team has carried out a reassessment of the Benefits Service policies and procedures, segregation of duties, payroll process and controls, tested internal controls, and interviewed key personnel in the Benefits Service.

In this domain, the External Auditor has no observations or recommendations.

#### Estimations and External Expert Assessments

The Pension Fund's Financial Statements rely significantly on estimates based on assessments and appraisals made by external experts to determine the valuation of certain items. These estimates play a critical role regarding the content of Financial Statements, as they involve – professional - judgments about future events or conditions that cannot be precisely measured nor anticipated.

Given their inherent unpredictability and their susceptibility to external factors, the External Auditor has evaluated these estimates to ensure their reasonableness, proper and sound documentation, and compliance with relevant accounting standards.

During 2024, the Fund undertook the preparation of the 2025 Periodic Actuarial Review, during which key financial and demographic best estimate assumptions were reassessed by the Actuary for the purposes of estimating the value of benefit obligations. This review incorporated various inputs, including analysis from the Risk Consultant, demographic data from CERN and ESO, and the latest ICSLT Mortality Table1. These updates have been used in the accounting (IAS 26) actuarial valuation and have had an effect on the actuarial present value of benefit obligations presented in the 2024 financial statements. However, the most significant increase to the IAS 26 obligation was caused by the decrease in the accounting discount rate, an assumption which references high-quality Swiss corporate bonds and can result in considerable volatility from year to year.

There are no observations or recommendations at this level.

#### OTHER INFORMATION

CERN Pension Fund Management is responsible for the other information included in the Pension Fund Annual Report, which comprises the Pension Fund Governing Board Report and an Extract of the Actuary's Report on the Fund as of 31 December 2024, as well as the financial statements and our auditor's report thereon.

Our opinion on the financial statements does not cover the other information and we do not express any form of assurance conclusion thereon. However, in connection with our audit of the financial statements, our responsibility is to read the other information and, in doing so, to consider if the other information is materially inconsistent with the financial statements or if our knowledge obtained in the audit or otherwise appears to be materially misstated. Whenever 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.

### REPORT ON OTHER LEGAL AND REGULATORY REQUIREMENTS

Based on the procedures we performed, nothing has come to our attention as part of our audit of the financial statements that cause us to believe that the CERN Pension Fund's transactions have not been made, in all significant respects, in accordance with the relevant Pension Fund regulations.

#### COMMUNICATION TO MANAGEMENT

We communicated with managers charged with governance regarding, among other matters, the planned scope and timing of the audit and significant audit findings, including any significant deficiencies in internal control that we identified during our audit.

#### LONG FORM REPORT

We issued a long-form report on the audit of the CERN-PF Annual Accounts for the year 2024, where a more detailed presentation of the audit issues can be found.

We conclude that there are no material issues to draw the attention of the Council.

Lisbon, 16 April 2025.

#### THE EXTERNAL AUDITOR

Filipa Urbano Calvão

President of the Portuguese Court of Auditors

Maria da Luz Carmezim,

Member of the Portuguese Court of Auditors Herris de dus Cornegon Rodoso de Fris

- Mr. Nuno Miguel Martins Lopes (Auditor-Chief).
- Mr. João Carlos Cardoso (IT Manager).
- Mr. João Paulo Amado (IT Manager).
- Mrs. Marisa Vieira (Auditor).
- Mr. Joel Gustavo Silva Ribeiro (Auditor).

1 International Civil Servants Life Table.



# STATEMENT OF FINANCIAL POSITION

#### As at 31 December

(in kCHF)	Note	2024	2023
Assets			
Cash and Cash Equivalents	5	697 985	780 670
Short-Term Deposits	6	40 000	60 000
Settlements Receivable		15 490	2 670
Sundry Debtors	7	6 226	5 844
Other Receivables	8	14 921	12 086
Derivatives	9	29 960	169 303
Bonds	10	165 150	638 841
Equities	11	132 793	311 661
Investment Funds	12	2 916 001	1 822 134
Total Financial assets		4 018 526	3 803 209
Investment Property	13	751 726	693 388
Total Non-Financial assets		<b>751 726</b>	693 388
Total assets		4 770 252	4 496 597
Liabilities			
Settlements Payable		2 533	279
Sundry Creditors	14	14 815	14 845
Other Payables	15	3 747	4 856
Derivatives	9	129 322	16 256
Total liabilities		150 417	36 236
Net assets available for benefits		4 619 835	4 460 361

#### As at 31 December

(in kCHF)	Note	2024	2023
Vested pension capital *			
Benefit Obligation in respect of members		6 103 477	5 038 813
Benefit Obligation in respect of beneficiaries		5 225 308	5 099 204
Vested pension capital		11 328 785	10 138 017
Technical deficit		(6 708 950)	(5 677 656)

<sup>\*</sup> See Extract of Actuary's Report

# STATEMENT OF FINANCIAL PERFORMANCE

(in kCHF)	Note	2024	2023
Investment Income			
Financial Assets			
Dividend Income	16	39 499	53 451
Interest Income	17	34 104	33 236
Unrealised Gains/(Losses) on Financial Assets at Fair Value Through Profit & Loss	18	404 402	(44 943)
Realised Gains/(Losses) on Financial Assets at Fair Value Through Profit & Loss	19	48 211	(9 264)
Non-Financial Assets			
Investment Property Income and Gains/(Losses)	20	64 618	(158 171)
Foreign Exchange (Losses)/Gains	21	(262 916)	154 676
Total Investment Income		327 918	28 985
Investment Expenses			
Financial Assets			
Investment Management Fees	22	89 309	60 225
Custody Fees and Administration of Securities		432	464
Transaction Costs		524	768
Taxation		242	449
Non-Financial Assets			
Investment Property Expenditure	23	10 658	10 996
Investment Related Expenditure		2 463	2 489
Total Investment Expenses		103 628	75 391
Net Investment Income/(Loss)		224 290	(46 406)
Other Expenses			
Bank Charges		20	26
Other Financial Expenses	24	1 188	1 035
Administration Costs	25,32	6 683	6 021
Total Other Expenses		7 891	7 082
Change in Net Assets before Membership Activities		216 399	(53 488)

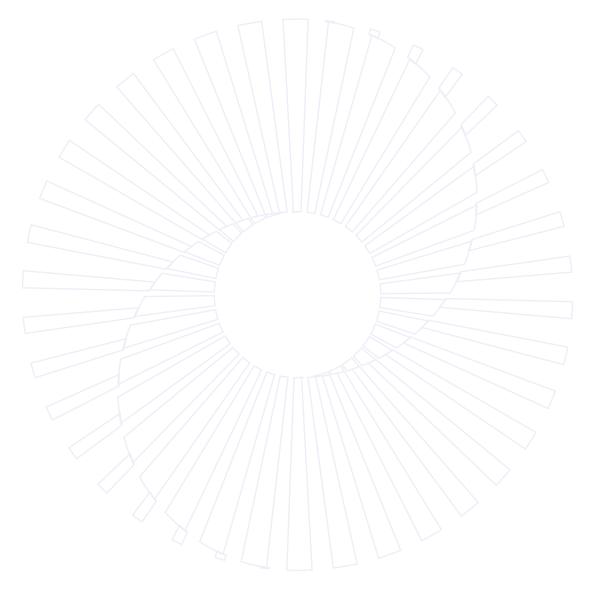
(in kCHF)	Note	2024	2023
Membership Activities	26		
Contributions			
Member Contributions		71 746	69 442
Employer Contributions		125 073	122 909
Employer Special Contributions		61 400	61 400
Purchase of additional years of membership		2 674	2 736
Indemnities received from third parties		-	96
Compensations	27	302	952
Procurement of entitlement to pension for surviving spouse paid by members		322	240
Total Contributions		261 517	257 775
Benefits and Payments			
Retirement pensions		240 200	243 018
Disability pensions		2 097	1 830
Surviving spouse pensions		48 588	47 268
Orphans pensions		1 440	1 276
Family allowances		12 171	12 515
Ex gratia payments granted		66	66
Transfer values paid to members	28	12 518	12 832
Transfer values paid to other schemes	29	2 057	2 706
Amounts pending selection from members	30	(778)	697
Contributions paid to other schemes		83	90
Total Benefits and Payments		318 442	322 298
Net Membership Activities Cost		(56 925)	(64 523)
Net Increase/(Decrease) in Net Assets During Year		159 474	(118 011)
Net Assets Available for Benefits at Beginning of Year		4 460 361	4 578 372
Net Assets Available for Benefits at End of Year		4 619 835	4 460 361

# **CASH FLOW STATEMENT**

(in kCHF)	2024	2023
Cash flows from membership activities		
Contributions and other receipts	261 504	256 567
Benefits and other payments	(318 424)	(318 349)
Net cash flows from membership activities	(56 920)	(61 782)
Cash flows from investing activities		
Financial Assets		
Purchases of Bonds	(371 981)	(179 905)
Purchases of Equities	(153 468)	(250 832)
Purchases of Investment Funds	(1 002 127)	(472 158)
Purchases of short-term deposits	-	(60 000)
Proceeds from sale of short-term deposits	20 000	-
Proceeds from sale of Bonds	877 601	167 542
Proceeds from sale of Equities	351 594	326 283
Proceeds from sale of Investment Funds	203 684	352 924
Net (payments)/receipts from Derivatives	(25 358)	85 550
Dividends received	40 656	63 077
Net Interest received	26 972	26 519
Non-Financial Assets		
Investment Property payments	(18 117)	(18 626)
Purchases of Investment Property	(21 474)	(12 562)
Investment Property receipts	33 134	32 523
Net tax receipts/(payments)	372	(914)
Management and Custody Fees paid	(1 613)	(5 154)
Administrative and other Operating expenses paid	(11 778)	(9 113)
Net cash flows from investing activities	(51 903)	45 154
Net (decrease) in cash and cash equivalents	(108 823)	(16 628)
Cash at beginning of the year	780 670	829 629
Unrealised Gains/(Losses) on Cash and Cash Equivalents	26 138	(32 331)
Cash at end of the year	697 985	780 670

# STATEMENT OF CHANGES IN NET ASSETS AVAILABLE FOR BENEFITS

(in kCHF)	2024	2023
Balance as at 1 January	4 460 361	4 578 372
Employer Contributions	125 073	122 909
Member Contributions	71 746	69 442
Employer Special Contributions	61 400	61 400
Purchase of additional years	2 674	2 736
Indemnities and Compensations	302	1 048
Procurement of Entitlement to pension for surviving spouse paid by members	322	240
Benefits paid	(304 562)	(305 973)
Transfer values and contributions paid to others schemes	(13 880)	(16 325)
Investment Income	327 918	28 985
Investment Expenses	(103 628)	(75 391)
Other Expenses	(7 891)	(7 082)
Balance as at 31 December	4 619 835	4 460 361





## 1. GENERAL INFORMATION

#### 1.1. FUND DESCRIPTION

Under Chapter IV of the CERN Staff Rules and Regulations, the European Organization for Nuclear Research (hereafter referred to as "CERN"), which has its seat in Geneva, is responsible for the social insurance coverage of its staff. Thus it set up in 1955 a pension fund which constitutes the CERN personnel's social protection for disability, old age and death. The legal entity ("the Organization") encompasses both CERN and the Fund.

The governance structure of the Fund and its relations with the Council and the Director General of CERN are defined in the Rules of the Pension Fund ("the Rules," available at: https://pensionfund.cern.ch). The Rules and Regulations of the Fund are approved by CERN Council.

The Rules state that "The purpose of the Fund is to insure its members and beneficiaries, as well as the members of their families, against the economic consequences of the disability and old age of its members and of the death of its members and beneficiaries" (Art. I 1.01).

With respect to the status of the Fund within the Organization, according to the Rules, "The Fund is an integral part of CERN, and, as such, has no separate legal personality and is under the supreme authority of Council" (Art. I 2.01). In addition, "The Fund shall enjoy operational autonomy within CERN and shall be managed in accordance with the framework set out in the Rules and Regulations". (Art. I 2.02).

The fact that the Fund and CERN are a single legal entity is primarily the result of an exceptional legal framework

deriving from the international status of the Organization. Without this constraint, two separate legal entities would have been established. As it is, CERN and the Fund function as two distinct economic entities, and the Fund is operationally autonomous and is separately governed in accordance with the Rules and Regulations of the Pension Fund.

Given the needs of the users of the different financial statements and considering the distinct purposes of the Fund and CERN, and the differences in sources of funding, conditions of membership and governing bodies, separate financial statements are produced for the Fund.

Regarding the oversight and management of the Fund, Article I 2.04, states that

- "1. The oversight of the Fund shall be entrusted to the Governing Board, assisted and advised by the Investment Committee and the Actuarial and Technical Committee.
- 2. The management of the Fund shall be entrusted to the Chief Executive Officer of the Fund, hereinafter referred to as "the Chief Executive Officer."

Article I 2.03 of the Rules further provides that the assets of the Fund shall be held separately from those of CERN and shall be used solely for the purpose of the Fund.

The Fund operates as a defined-benefit scheme. The members of the personnel of CERN and the members of the personnel of the European Southern Observatory (ESO), which has its seat in Munich, are members of the CERN Pension Fund. Conditions relating to the admission of ESO staff to the Fund are set out in the CERN/ESO Agreement.

Pensions are calculated in the following manner:

For members who joined the Fund on or before 31 December 2011, 2% of the Basis for the Calculation of Benefits, as set out in Article II 1.08 of the Rules, for each year of membership, up to a maximum of 35 years;

#### For members who joined the Fund on or after

**1 January 2012**, 1.85% of the Basis for the Calculation of Benefits, as set out in Article II 1.08, of the Rules, for each year of membership, up to a maximum of 37 years and 10 months.

#### The retirement age is as follows:

- i. For members who joined the Fund on or before 31 December 2011: 65 years;
- ii. For members who joined the Fund on or after 1 January 2012: 67 years.

The entitlement to a pension begins after a minimum of five years' contributions.

#### 1.2. FUNDING ARRANGEMENTS

According to the Rules, the resources of the Fund derive from (a) contributions from CERN and ESO, (b) contributions from its members, (c) the income from the investment of its assets, and (d) gifts and legacies. The contributions are expressed as a percentage of each member's reference salary, which is equal to the basic remuneration for 40 hours' work per week multiplied by a coefficient set out in Annex A to the Rules.

Contributions are apportioned between the member and the participating Organizations as follows:

Contributions are apportioned between the member and the participating Organizations as follows:

- For members who joined the Fund on or before 31 December 2011: member: 11.33%; Organization: 22.67%; total: 34%;
- ii. For members who joined the Fund on or after 1 January 2012: member: 12.64%; Organization: 18.96%; total: 31.6%.

# 1.3. TERMINATION TERMS

When membership of the Fund terminates before the applicable age of retirement for a reason other than death or total disability, a transfer value is calculated on the basis of the reference salary at the date of termination:

- Less than five years of service: where the member has less than five years of service, the transfer value is paid into another pension scheme or to the member;
- ii. Between five and ten years of service: the member has the choice between a deferred retirement pension, or payment into another pension scheme, or, if the latter option is not possible, to the member;
- iii. Ten or more years of service: the member has the choice between a deferred retirement pension, and payment into another pension scheme, or, if the latter option is not possible, into a private insurance scheme offering comparable guarantees.

Payment of a transfer value extinguishes any right to a pension, except that for partial disability that is already being paid.

#### 1.4. SIGNIFICANT ACTIVITIES FOR THE PERIOD

There were no significant activities during the year.

#### 1.1.1. Beneficiaries

As at 31 December 2024 the number of beneficiaries was 3,691 (3,674 as at 31 December 2023).

#### 1.1.2. Members

As at 31 December 2024 the number of members of the Fund was 4,431 (CERN: 3,885 and ESO: 546) compared to 4,199 (CERN: 3,669 and ESO: 530) as at 31 December 2023.

#### 1.5. INVESTMENT POLICY

The Fund's principles governing the investment policy are set out in the Statement of Investment Principles CERN/ PFGB/90.6c/A/Rev. which is approved by the PFGB.

The Fund strives to maximise returns while remaining below a maximum level of risk. The maximum level of allowable risk is referred to as the "risk limit".

The Fund's portfolio is constructed and managed with the objective of remaining at all times within the risk limits approved by the PFGB, while striving to attain the Fund's investment return objective.

When selecting and managing investments, the Fund considers adapting the time horizon to the market conditions or to the circumstances of the Fund. In addition, the requirement for active management and the sensitivity of the risk and return to market cycles are also considered.

The Fund may invest in a wide range of asset classes including listed equity, government and non-government debt, currencies, money market instruments, property, commodities, private equity/debt. The Fund may also invest in strategies with absolute return focus. Investments may be undertaken directly (internally), or indirectly (e.g. via funds or investment agreements), in physical assets or derivatives.

# 2. SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

#### 2.1. BASIS OF PREPARATION

The CERN Pension Fund Financial Statements for the financial year ended 31 December 2024 have been prepared on a going-concern basis and pursuant to Article I 4.02 of the Rules of the Pension Fund, in accordance with International Public Sector Accounting Standards (IPSAS) and International Accounting Standard 26, Accounting and Reporting by Retirement Benefit Plans, as there is no such equivalent IPSAS. The preparation of financial statements in conformity with IPSAS requires the use of certain critical accounting estimates. It also requires the Fund to exercise its judgement in the process of applying the Pension Fund's accounting policies. The areas involving a higher degree of judgement or complexity, or areas where assumptions and estimates are significant to the financial statements are disclosed under note 3. If such estimates and assumptions deviate from the actual circumstances, the original estimates and assumptions will be modified as appropriate in the year in which the circumstances change.

Whilst the accounts of the Fund are maintained to the nearest Swiss franc, these financial statements are expressed in thousands or millions of Swiss francs. Some rounding differences may therefore occur.

At its meeting on 16 April 2025 the PFGB approved the submission of the CERN Pension Fund Annual Report and Financial Statements for 2024 to CERN Council, via the Finance Committee, for approval and discharge.

The accounting policies set out below have been applied consistently by the Fund and throughout all periods presented in these financial statements.

The following new standards, that are issued but not yet effective, up to the date of issuance of the Fund's financial statements, are disclosed below. The Fund intends to adopt these standards, if applicable, when they become effective:

- IPSAS 43, Leases effective January 1, 2025
- IPSAS 44, Non-current Assets Held for Sale and Discontinued Operations - effective January 1, 2025
- iii. IPSAS 45, Property, Plant and Equipment - effective January 1, 2025
- iv. IPSAS 46, Measurement effective January 1, 2025
- v. IPSAS 47, Revenue effective January 1, 2026
- vi. IPSAS 48, Transfer Expenses effective January 1, 2026
- vii. IPSAS 49, Retirement Benefit Plans effective January 1, 2026
- viii. IPSAS 50, Exploration for and Evaluation of Mineral Resources, and Stripping Costs in the Production Phase of a Surface Mine - effective January 1, 2027

Once effective, the above standards are not expected to have any effect on the amounts in the Statement of Financial Position, Statement of Financial Performance, Cash Flow Statement nor the Statement of Changes in Net Assets Available for Benefits.

## 2.2. MEASUREMENT BASE

The measurement base adopted is that of historical cost as modified by the revaluation of financial assets and financial liabilities (including derivative financial instruments) and investment property at fair value through profit or loss.

#### 2.3. FOREIGN CURRENCY TRANSLATION

#### 2.3.1. Functional and presentation currency

Pursuant to Article I 4.02 of the Rules of the Pension Fund, the unit of account of the Pension Fund is the Swiss franc which is the functional and presentation currency.

#### 2.3.2. Transaction and balances

At each balance sheet date monetary assets and liabilities that are denominated in foreign currencies are translated into Swiss francs at the exchange rates ruling on that date. Foreign currency transactions are accounted for at the exchange rates prevailing at the date of the transaction. Gains and losses arising on translation are shown separately in the Statement of Financial Performance for the period.

#### 2.4. CLASSIFICATION OF ASSETS AND LIABILITIES

The CERN Pension Fund is an entity that, inter alia, manages assets used to pay pensions. As such, the assets and liabilities are disclosed in the Statement of Financial Position in an order that broadly reflects their relative liquidity.

#### 2.5. CASH AND CASH EQUIVALENTS

Cash and cash equivalents include cash in hand, deposits held at call with banks and other short-term highly liquid investments with original maturities of three months or less, as well as margin accounts with brokers that cover margin calls on derivative positions.

## 2.6. FINANCIAL ASSETS

Financial assets are recognised on the Fund's Statement of Financial Position when the Fund becomes a party to the contractual provisions of the instrument.

The Fund classifies its financial assets in the following categories: at fair value through profit or loss and loans and receivables. The classification depends on the purpose for which the financial assets were acquired. Management determines the classification of its financial assets at initial recognition.

**2.6.1. Financial assets at fair value through profit or loss** The Fund's business is investing in assets with a view to profiting from their total return in the form of interest, dividends, distributions and increases in fair value.

#### A. Classification

The Fund classifies its investments in cash and cash equivalents, debt, equity securities, investment funds and derivatives as financial assets at fair value through profit or loss. Cash and cash equivalents, bonds, equities and investment funds are designated by the Fund at fair value through profit or loss. Derivatives are classified as assets held for trading.

The portfolio of investment funds is categorised as financial assets designated at fair value through profit or loss at inception and is shown under Investment Funds on the Statement of Financial Position.

#### B. Recognition and derecognition

Purchases and sales of unquoted and quoted investments are recognised and derecognised on trade date where a purchase or sale is made under a contract whose terms require delivery within the timeframe established by the market concerned.

Financial assets are derecognised when the rights to receive cash flows from the investments have expired or have been transferred and the Fund has transferred substantially all risks and rewards of ownership.

#### C. Measurement

Financial assets at fair value through profit or loss are initially recognised at acquisition cost. Transaction costs are expensed in the Statement of Financial Performance. Subsequent to initial recognition, all financial assets at fair value through profit or loss are measured at fair value which is based on the last reported bid price (sales price) at the balance sheet date. Unrealised gains and losses arising from changes in the fair value of the "financial assets at fair value through profit or loss" category are presented in the Statement of Financial Performance in the period in which they arise.

Interest, dividends and investment management fees arising from financial assets are shown separately in the Statement of Financial Performance and are not included in Unrealised or Realised Gains/(Losses) on Financial Assets at Fair Value Through Profit and Loss.

#### 2.6.2. Loans and receivables

Loans and receivables are non-derivative financial assets with fixed or determinable payments that are not quoted in an active market. Sundry debtors include recoverable withholding tax levied at source on dividends and reimbursable value added tax paid on investment property transactions, investment property debtors and other due amounts.

Settlements receivable represent amounts due to the Fund for securities sold or purchased that have been contracted for but not yet settled or delivered at the balance sheet date.

Other receivables include accrued interest on cash and shortterm deposits, dividends receivable and outstanding receipts.

These amounts which do not carry any interest are expected to be received within twelve months and are accordingly stated at their nominal value. Loans and receivables are subsequently carried at amortised cost using the effective interest method less any impairment losses.

#### 2.7. IMPAIRMENT OF FINANCIAL ASSETS

Financial Assets carried at amortised costs are Loans and Receivables.

The Fund assesses at the end of each reporting period whether there is objective evidence that this group of financial assets is impaired. A financial asset or a group of financial assets is impaired and impairment losses are incurred only if there is objective evidence of impairment as a result of one or more events that occurred after the initial recognition of the asset (a "loss event") and that loss event (or events) has an impact on the estimated future cash flows of the financial asset or group of financial assets that can be reliably estimated.

Evidence of impairment may include indications that the debtors or a group of debtors is experiencing significant financial difficulty, default or delinquency in interest or principal payments, the probability that they will enter bankruptcy or other financial reorganisation, and where observable data indicates that there is a measurable decrease in the estimated future cash flows, such as changes in arrears or economic conditions that correlate with defaults.

For loans and receivables, the amount of loss is measured as the difference between the asset's carrying amount and the present value of the estimated future cash flows (excluding future credit losses that have not been incurred) discounted at the financial asset's original effective interest rate. The carrying amount of the asset is reduced and the amount of the loss is recognised in the Statement of Financial Performance.

#### 2.8. OFFSETTING FINANCIAL INSTRUMENTS

Financial assets and liabilities are offset and the net amount reported in the Statement of Financial Position when there is

a legally enforceable right to offset the recognised amounts and there is an intention to settle on a net basis or realise the asset and settle the liability simultaneously.

#### 2.9. NON-FINANCIAL ASSETS

Those assets where there is no contractual right to receive cash or another financial asset are listed under this heading.

#### 2.9.1. Investment property

Investment property is defined as land, buildings and forests held to earn rental income and capital appreciation and is not occupied by the Fund.

Investment property is measured initially at its cost, including related transaction costs. After initial recognition investment property is carried at fair value, representing open market value determined annually by external valuators with professional qualifications and experience. Fair value is based on active market prices, adjusted, if necessary, for any difference in the nature, location or condition of the specific asset. If the information is not available, the Fund uses alternative valuation methods such as recent prices on less active markets or discounted cash flow projections. Changes in fair values are recorded in the Statement of Financial Performance, as part of Investment Property Income.

The costs of the day-to-day running of the properties, e.g. repairs and maintenance, are recognised in the Statement of Financial Performance as incurred. Expenditure incurred in the replacement or renovation of part of an existing investment property that is 5% or more of the value of that property is recognised in the carrying amount, only when it is probable that future economic benefits associated with the item will flow to the Fund and the cost of the item can be reliably measured.

#### 2.10. OTHER FINANCIAL LIABILITIES

Other financial liabilities include Settlements Payable, Sundry Creditors and Other Payables.

Settlements payable represent amounts due by the Fund for securities purchased that have been contracted for but not yet settled or delivered at the balance sheet date.

These amounts are not interest-bearing and are due within twelve months. They are initially recognised at their fair value and subsequently measured at amortised cost using the effective interest method.

# 2.11. DERIVATIVE FINANCIAL INSTRUMENTS AND **HEDGING ACTIVITIES**

The Fund's activities expose it to the financial risks such as foreign currency risk, interest rate risk and credit risk.

Therefore, the Fund may use derivative instruments such as foreign exchange forward contracts, interest rate swap contracts and credit default swaps to hedge these exposures. The Fund may also use derivative instruments for investment purposes, principally to gain exposure to specific markets.

Derivatives are initially recognised at fair value on the date on which a derivative contract is entered into and are subsequently re-measured at fair value. Any gains and losses arising from changes in the fair value are recognised in the Statement of Financial Performance. The Fund does not apply hedge accounting.

Derivatives are carried as financial assets when the fair value is positive and as financial liabilities when the fair value is negative.

The Fund may, at a given time, hold the following derivative instruments:

#### A. Forward contracts

Forward contracts are contractual obligations to buy or sell financial instruments on a future date at a specified price. A forward contract is a non-standardised contract written by the Fund and the counterparty to the agreement. The contracts are collateralised by cash and changes in the forward contracts' value are settled on reset, rollover or closure of the contract. The forward contracts are settled on a gross basis.

#### **B.** Options

An option is a contractual arrangement under which the seller (writer) grants the purchaser (holder) the right, but not the obligation, either to buy (a call option) or sell (a put option) at or by a set date or during a set period, a specific amount of securities or a financial instrument at a predetermined price. The seller receives a premium from the purchaser in consideration for the assumption of the future securities price. Options are settled on a gross basis.

#### C. Swaps

Swaps are contracts to exchange cash (flows) on or before a specified future date based on the underlying value of currencies/exchange rates, bonds/interest rates, commodities, stocks or other assets.

#### D. Futures

Future contracts are contractual obligations to buy or sell financial instruments on a future date at a specified price established in an organised market. The futures contracts are collateralised by cash and changes in the futures contracts' value are settled daily with the exchange. Futures are settled on a net basis.

#### E. Credit default swaps

Credit default swaps are contractual obligations under which the seller receives a premium or interest-related payments in return for agreeing to compensate the buyer in the event of a credit event on an underlying reference obligation. Credit events usually include bankruptcy and payment default.

#### 2.12. PROVISIONS

Provisions are recognised when the Fund has a present obligation (legal or constructive) as a result of a past event, it is probable that an outflow of resources embodying economic benefits or service potential will be required to settle the obligation and a reliable estimate can be made of the amount of the obligation.

#### 2.13. ACTUARIAL LIABILITIES

The PFGB approves the significant actuarial assumptions for the calculation of the actuarial present value of promised retirement benefits at the end of the period, taking advice from an independent actuary concerning the appropriateness of the assumptions. The actuarial present value of promised retirement benefits at the end of the period is included in the Statement of Financial Position under the heading "Vested pension capital".

The actuarial present value of the promised retirement benefits, based on projected remuneration and capitalised pension indexation, is disclosed to indicate the magnitude of the potential obligation on a going concern basis.

In accordance with IAS 26, the actuarial method used to calculate the actuarial commitments is the projected unit credit method (PUC method). The projected unit credit method considers that each service period allows for an additional unit of benefits rights and evaluates each of these units separately to obtain the final value of the liability.

#### 2.14. REVENUE RECOGNITION

**2.14.1. Revenue from exchange transactions**Interest income is recognised on time proportionate basis using the effective interest method;

Rental income is recognised over the term of the lease on a straight line basis;

Dividend income is recognised when the right to receive payment is established.

**2.14.2.** Revenue from non-exchange transactions
The Fund does not recognise revenue from non-exchange transactions. Non-exchange transactions include

administrative support and office accommodation provided free of charge by CERN.

# 3. CRITICAL ACCOUNTING ESTIMATES AND JUDGEMENTS

The Fund makes estimates and assumptions that affect the reported amounts of assets and liabilities. Estimates and judgements are continually evaluated by the Fund, with input from independent experts, and are based on historical experience and other factors, including assumptions about future events that are believed to be reasonable under the circumstances. The resulting accounting estimates will, by definition, seldom equal the related actual results.

The most significant estimates made during the period are outlined below.

#### 3.1. ACTUARIAL ASSUMPTIONS

The liabilities of the Fund, in respect of promised benefits to be paid, have been determined using methods relying on actuarial estimates and assumptions. These assumptions reflect the long-term nature of future benefits. Changes in these estimates and assumptions could materially affect liabilities in respect of benefits.

The basis for the Fund's actuarial assumptions is set out under note 2. "Summary of Significant Accounting Policies".

The table hereafter shows the significant actuarial assumptions proposed by the Fund's Actuary and approved by the PFGB at its meeting of 20 February 2025 (CERN/ PFGB/115.5a) and also those used in the corresponding period. The reference discount rate as at 31 December 2024 is the AON Swiss AA Corporate Bond Yield Curve. As a result, the discount rate applied for 2024 is 0.79% when expressed as a single equivalent rate. In 2023, the rate was 1.33%, when expressed as a single equivalent spot rate. All other assumptions used as at 31 December 2024 are the same as those approved by the PFGB for the 1 January 2025 Periodic Actuarial Review. The assumptions used for 31 December 2023 other than discount rate, inflation rate and inflation-related assumptions are the same as those approved by the PFGB for the 1 January 2022 Periodic Actuarial Review. The assumptions are presented as single equivalent spot rates or a liability-weighted average for simplicity.



Actuarial Assumptions	2024	2023
Discount Rate <sup>1</sup>	0.79%	1.33%
Salary increase linked to inflation	1.25%	1.25%
Indexation of pensions linked to inflation	0.85% for active members 1.05% for beneficiaries	1.25% with PPL adjustments <sup>4</sup>
Salary increase linked to career change <sup>2</sup>	1.50%	1.55%
Mortality and disability tables <sup>3</sup>	ICSLT2023 (Generational)	ICSLT2018 (Generational)

<sup>&</sup>lt;sup>1</sup> The underlying best estimate assumption is the AON Swiss AA Corporate Bond Yield Curve. The single equivalent spot rate approximates this underlying curve.

Aon Switzerland Ltd is the Fund's Actuary. An extract of the Actuary's Report on the Fund as at 31 December 2024 is included at the end of this document for information purposes.

The sensitivity of results to changes in the key actuarial assumptions as at 31 December 2024 is set out in the extract of the Actuary's report.

In 2024, the Fund's Actuary did not propose any change to the reference used for the discount rate assumption, however the yield curve data was different compared to 2023. In 2024 the discount rate used to determine the present value of future promised benefits was 0.79% when expressed as a single equivalent rate (1.33% in 2023). The effect of this change was an increase in liabilities of 1,111 MCHF.

Total liabilities, as at 31 December 2024, were 11,329 MCHF (10,138 MCHF as at 31 December 2023).

#### 3.2. FAIR VALUE OF INVESTMENT PROPERTY

The fair value of the Fund's investment property is considered to be its market value. As at 31 December 2024 the fair value of Investment Property was 751,726 kCHF (693,388 kCHF as at 31 December 2023).

The fair values of the Investment Property were determined based on valuations performed by independent valuers, as at 31 December 2024 and 2023. In compliance with IPSAS 16, and in order to arrive at the most reliable estimate of the fair value within a range of reasonable fair value estimates, the fair values of the properties (excluding the forests) have been determined using a discounted cash flow method. The independent valuers use assumptions that are mainly based on market conditions existing at each balance sheet date. The fair values of the forests have been determined by an expert in the forest industry, using market practice for valuing forest land i.e. taking into account current market prices for forest land and inventory.

The principal considerations underlying the estimation of fair value are those related to:

- Current or recent prices of similar properties;
- Appropriate discount rates ranging from 3.60% to 9.05% (3.90% to 9.05% in 2023);
- The receipt of contractual rentals;
- Expected future market rentals;
- Void periods;
- Maintenance requirements;
- Current market prices for forest inventory.

These valuations are regularly compared to actual market yield data, and actual transactions and those reported by the market. The expected future market rentals are determined on the basis of current market rentals for similar properties in the same location and condition.

## 3.3. FAIR VALUE OF FINANCIAL ASSETS NOT OUOTED IN **AN ACTIVE MARKET**

In arriving at the fair value of financial assets not quoted in an active market, the Fund considers factors such as industry performance, company performance, quality of management, the price of the most recent financing round, exit opportunities which are available, liquidity preference, comparable market transactions, discounted cash-flows, earnings multiples and net present value analysis. The maximum use of market inputs is made with as little reliance as possible on entity-specific inputs.

#### 3.3.1. Investment Funds

As at 31 December 2024 the Fund had holdings in investment funds totalling 1,456,775 kCHF (1,287,628 kCHF in 2023) that are not quoted in an active market. Many of these investment funds have the same reporting period as the Fund. Consequently, in many cases, audited financial statements attesting, inter alia, to the value of the Fund's investments in these funds were not available at the reporting date. Where audited statements were not in evidence, the Fund used unaudited statements as at 31 December 2024 provided by the independent administrators or fund. In other cases, unaudited statements as at 30 September 2024 were used, as adjusted for capital movements between the last received statements and 31 December 2024.

<sup>&</sup>lt;sup>2</sup> Remuneration increase linked to career change is 1.50% p.a. (2023: 1.55% p.a.) when expressed as a liability-weighted average
<sup>3</sup> In 2024 the following adjustments are made to the probabilities contained within the ICLST2023 tables: male adjustment from 50% at age 65 to 100% at age 99 and female adjustment from 85% at age 65 to 100% at age 95. In 2023 an adjustment of 94% was made to the probabilities contained within the ICSLT2018 tables.

The pension increase rate was defined to reflect application of the Purchasing Power Loss ('PPL') adjustments according to plan rules based on the projected funded status of the Fund.

The Fund has the following outstanding commitments to Private Equity, Real Estate and Private Debt funds as at 31 December:

	2024		2023	3
(in kCHF)	Total Net Asset Value	Outstanding Commitment	Total Net Asset Value	Outstanding Commitment
US Private Equity	225 192	122 370	180 070	114 814
European Private Equity	180 440	53 049	176 915	51 782
Real Estate Funds	81 304	7 095	83 773	11 820
Private Debt	98 883	54 324	92 428	56 112
Total	585 819	236 838	533 186	234 528

#### 3.3.2. Over- the-counter derivatives instruments

The fair value of over-the-counter derivatives instruments is determined using quoted prices at the balance sheet date. When an instrument or its equivalent does not have a market price, its valuation is determined using a valuation model that is based on observable market inputs.

# 4. FINANCIAL RISKS

## 4.1. FINANCIAL RISK FACTORS

The Pension Fund's activities expose it to a variety of financial risks: market risk (including price risk, foreign exchange risk, interest rate risk), credit risk and liquidity risk. The Fund's overall risk management programme seeks to maximise the returns derived for the level of risk to which the Fund is exposed and seeks to minimise potential adverse effects on the Fund's financial performance. The Fund uses derivative financial instruments to both hedge and to create certain risk exposures.



All securities investments present a risk of loss of capital. The maximum loss of capital on bonds, equities, investment funds and purchased options is limited to the fair value of those positions. The maximum loss of capital on written put options, long futures and forward currency contracts is limited to the notional contract values of those positions. On written call options and short future positions the maximum loss of capital can be unlimited.

The management of these risks is carried out by the Fund in line with investment guidelines approved by the PFGB. The Fund uses different methods to measure and manage the various types of risk to which it is exposed; these methods are explained below.

#### 4.1.1. Market risk

The risk management policy of the Fund is defined in the Statement of Investment Principles. It is based on setting a risk measure, an annual risk limit and managing the asset allocation exposure compatible with the risk limit and with the return objective.

The Fund uses CVaR (Conditional Value at Risk) to measure and monitor its market risk. The CVaR of a certain confidence level measures the expected return of the corresponding tail of the return distribution. 1 Year 5% CVaR is defined as the annual expected return in the worst 5% of the return distribution of a portfolio. CVaR is also called expected shortfall.

The risk measure of 1 Year 5% CVaR is approved by the PFGB, based on the recommendation of the IC. The annual 1 Year 5% CVaR risk limit of -10% for 2024 was set by the PFGB taking into account the actuarial return considerations. The risk exposure of the Strategic Asset Allocation (SAA) and the Fund is estimated by the independent risk consultant on a bi-weekly basis and reported to the IC on a quarterly basis and compared to the risk limit set by the PFGB. In addition, the Fund's Risk Manager monitors the expected risk relative to the risk limit daily.

During 2024 all quarterly evaluations of the estimated 1 Year 5% CVaR showed that the Fund was within the risk limit of -10%. As at 31 December 2024, the estimated 1 Year 5% CVaR of the Fund was -9.5% (-7.4% as at 31 December 2023), according to data provided by the Fund's independent risk consultant (and not the data included in these Financial Statements).

#### A. Price Risk

The Fund is exposed to securities and derivative price risk. This arises from investments held by the Fund for which prices in the future are uncertain.

Where assets of the Fund are denominated in currencies other than the Swiss franc, the price initially expressed in foreign currency and then converted into Swiss franc will also fluctuate because of changes in foreign exchange rates. Paragraph B: "Foreign exchange risk" sets out how this component of price risk is managed and measured.

Some of the Funds' financial assets and liabilities are exposed to market price risk. The fair value of these assets as at 31 December is as follows:

(in kCHF)	2024	2023
Assets		
Bonds	165 150	638 841
Equities	132 793	311 661
Investment Funds	2 916 001	1 822 134
Derivatives	29 960	169 303
Total Financial assets	3 243 904	2 941 939
Liabilities		
Derivatives	129 322	16 256
Total Financial liabilities	129 322	16 256

#### B. Foreign exchange risk

The Fund is exposed to foreign exchange risks arising essentially upon investments in assets denominated in foreign currencies as outlined in the table below. As a general policy, the Fund hedges its exchange rate risk to the level of 100% of its exposure but may alter its hedge ratio as per its annual SAA review. The Fund uses three month rolling forward foreign exchange contracts and currency options to cover the currency exposure of existing and anticipated investments in foreign currency. The value of currency forward contracts as at 31 December 2024 is disclosed in note 9 "Derivatives".

As at 31 December 2024, given a shift of 10% in foreign currency rates against the Swiss Franc with all other variables held constant, the Statement of Financial Performance would have shown a higher/lower result of 18,911 kCHF (5,768 kCHF as at 31 December 2023). In 2024 this sensitivity result is predominantly caused by exposure to the US dollar as the Fund reduced the level of hedging against the US dollar from 100% to 90% of its exposure.

The table below summarises the Fund's net assets that are denominated in a currency other than the Swiss franc. The table excludes the forward foreign exchange contracts that are used to hedge foreign exchange rate exposure:

(in kCHF)	2024	2023
US dollar	2 523 147	1 709 625
Euro	1 345 670	1 476 692
Pound sterling	135 548	165 635
Japanese yen	101 538	95 742
New Zealand dollar	29 475	28 880
Swedish krona	17 232	17 526
Other currencies	26 315	32 963
Total	4 178 925	3 527 063

The Fund uses year-end exchange rates supplied by its custodian. The source of these rates is Reuters World Markets.

The table below shows the rates used by the Fund at 31 December to covert the major currencies in the Fund's portfolio to the Swiss franc:

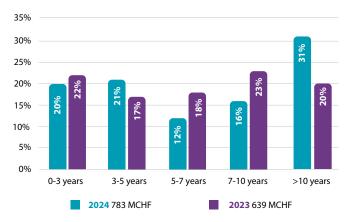
Currency	2024	2023
Euro	0.938	0.930
Pound sterling	1.135	1.073
US dollar	0.906	0.842

#### C. Cash flow and fair value interest rate risk

Fair value interest rate risk arises from the effects of fluctuations in the prevailing levels of market interest rates on the fair value of financial assets and future cash flows. The Fund holds some fixed income investments and cash

on short-term deposits. The duration of the fixed income investments is regulated by investment guidelines. The Fund may use derivatives to hedge interest rate exposure.

The analysis below summarises the maturity range of the Fund's bond portfolio at 31 December and is a measure of the sensitivity of the fair value of the Fund's fixed interest securities to changes in market interest rates:



The analysis above includes the Fund's direct investments in Bonds and its investments in exchange-traded fixed income funds, which total to an amount of 782,754 kCHF as at 31 December 2024 (2023: 638,841 kCHF). In respect of the exchange-traded fixed income funds, the maturities of the underlying bonds within the funds have been included in the analysis.

During the year ended 2024 the Fund divested from a proportion of its actively managed bond portfolio and invested into exchange-traded fixed income funds. The value of direct investments in Bonds as at year end was 165,150 kCHF (2023: 638,841 kCHF) and the value of exchange-traded fixed income funds was 617,604 kCHF (2023: Nil).

In addition, the Fund continues to hold investments in non-exchange-traded fixed income funds, which have a value as at the year end of 75,728 kCHF (2023: 58,883 kCHF).

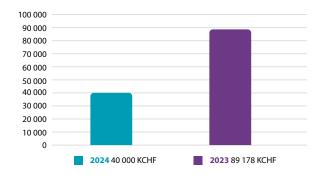
Indirect interest rate risk arises on investment funds where the fund invests in assets which are exposed to interest rate risk. This indirect risk arises on both exchange-traded and non-exchange-traded fixed income investment funds.

The duration of the above securities, which is the weighted-average term to maturity of the cash flows, was 6.50 years at 31 December 2024 (2023: 6.78 years).

The Fund also holds cash, a limited number of floating rate debt and derivatives that expose the Fund to cash flow interest rate risk.

As at 31 December 2024, if interest rates on these investments had been 1 percentage point higher with all other variables held constant, the net assets available for benefits at the end of the year would have been higher by 7,391 kCHF (8,541 kCHF higher as at 31 December 2023).

The following table indicates the Fund's exposure to fair value interest rate risk in respect of cash and short-term deposits:



#### 4.1.2. Credit risk

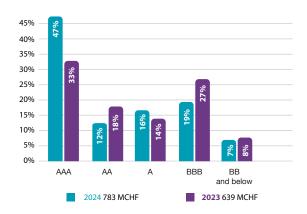
The Fund is exposed to credit risk, which is the risk that the counterparty will be unable to pay amounts in full when they fall due.

Credit risk arises from cash and cash equivalents short-term deposits, derivative financial instruments and bonds, as well as credit exposures including outstanding receivables and committed transactions.

All transactions in listed securities are contracted using approved brokers and settled/paid for upon delivery. The risk of default is considered minimal, as delivery of the securities sold is only made once the custodian has received payment. Payment is made on a purchase once the securities have been received by the custodian. The trade will fail if either party fails to meet its obligation.

The Fund invests in fixed income securities issued by various bodies such as governments, agencies or corporations. These holdings are managed in line with the investment guidelines to ensure issuer quality and diversification. In addition, the Fund limits the amount of credit exposure to any financial institution through diversification of its counterparties and strict monitoring of open receivables on derivatives instruments. If a derivative position is showing a profit, the Fund may ask for collateral or force the reset of the position.

The analysis below summarises the issuer quality of the Fund's principal fixed income portfolio at 31 December:



The analysis above includes the Fund's direct investments in Bonds and its investments in exchange-traded fixed income funds, which total to an amount of 782,754 kCHF as at 31 December 2024 (2023: 638,841 kCHF). In respect of the exchange-traded fixed income funds, the credit ratings of the underlying bonds within the funds have been included in the analysis.

During the year ended 31 December 2024 the Fund divested from a proportion of its actively managed bond portfolio and invested into exchange-traded fixed income funds. As a result, the value of Bonds as at year end has reduced to 165,150 kCHF (2023: 638,841 kCHF) and the value of exchange-traded fixed income funds has increased to 617,604 kCHF (2023: Nil).

In addition, the Fund continues to hold investments in nonexchange-traded fixed income funds, which have a value as at the year end of 75,728 kCHF (2023: 58,883 kCHF).

Indirect credit risk arises on investments funds where the fund invests in assets which are exposed to credit risk. This indirect risk arises on both exchange-traded and nonexchange-traded fixed income investment funds.

The maximum exposure to credit risk at 31 December is set out below:

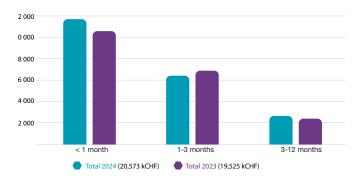
(in kCHF)	2024	2023
Bonds	165 150	638 841
Cash and Cash Equivalents	697 985	780 670
Fixed Income funds	693 332	58 883
Private Debt	98 883	92 428
Short Term Deposits	40 000	60 000
Derivatives	29 960	169 303
Settlements Receivable	15 490	2 670
Other assets	21 147	17 930
Total	1 761 947	1 820 725

No material financial assets were past due as at 31 December 2024.

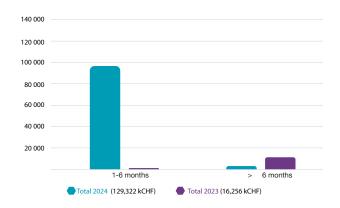
#### 4.1.3. Liquidity risk

Liquidity risk is the risk that the Fund may not be able to generate sufficient cash resources to settle its obligations in full as they fall due or can only do so on terms that are materially disadvantageous. In addition to its commitments to pay monthly benefits, the Fund is exposed to the periodic settlement of margin calls and gains and losses on derivative positions. The hedging of exchange rate risk can generate substantial cash flows that are difficult to predict. Therefore, the Fund aims to maintain sufficient levels of cash and cash equivalents to meet its short-term liabilities. The Fund does not take leveraged positions on the market.

The following graph analyses the Fund's financial liabilities (excluding the derivative financial instruments in a loss position) into relevant maturity groupings, based on the remaining period at the balance sheet date to the contractual maturity date:



The following graph analyses the Fund's derivative financial instruments in a loss position that will be settled on a gross basis into relevant maturity groupings based on the remaining period at the balance sheet to the contractual maturity date:





#### 4.2. FAIR VALUE ESTIMATION

The fair value of financial assets traded in active markets (such as trading securities) is based on quoted market prices at the close of trading on the reporting date.

An active market is a market in which transactions for the asset take place with a sufficient frequency and volume to provide pricing information on an on-going basis.

The fair value of assets not traded in an active market is determined using valuation techniques. The Fund uses a variety of methods and makes assumptions that are based on market conditions existing at each year end date. Valuation techniques include the use of recent arm's length transactions, reference to other instruments that are substantially the same, discounted cash flow analysis, and option pricing models, making maximum use of market inputs and relying as little as possible on entity-specific inputs.

The carrying amounts of the financial assets and liabilities not measured at fair value in the Statement of Financial Position approximate their fair value.

Specific valuation techniques used to value financial instruments include:

- Quoted market prices or dealer quotes for similar instruments;
- **ii.** Prices sourced from broker quotes, inter-dealer prices or other reliable pricing services;
- iii. The present value of the estimated future cash flows using observable yield curves, prices and other available

market information;

- iv. The latest available valuation received from fund administrators:
- v. Other techniques, such as discounted cash flow analysis.

The fair value hierarchy has the following levels:

- Level 1 inputs are quoted prices (unadjusted) in active markets for identical assets that the Fund can access at the measurement date;
- Level 2 inputs are inputs other than quoted prices included within Level 1 that are observable for the asset or liability, either directly, or indirectly;
- Level 3 inputs are based on unobservable market inputs for the asset or liability.

The level in the fair value hierarchy within which the fair value measurement is categorised in its entirety is determined on the basis of the lowest level input that is significant to the fair value measurement in its entirety. For this purpose the significance of an input is assessed against the fair value measurement in its entirety. If a fair value measurement uses observable inputs that require significant adjustment based on unobservable inputs, that measurement is a Level 3 measurement. Assessing the significance of a particular input to the fair value measurement in its entirety requires judgement, considering factors specific to the asset.

The determination of what constitutes "observable" requires significant judgement by the Fund. The Fund considers observable data to be that market data that is readily available, regularly distributed or updated, reliable and verifiable, not proprietary, and provided by independent sources that are actively involved in the relevant market.

The following table analyses within the fair value hierarchy the Fund's assets measured at fair value at 31 December 2024:

(in kCHF)	Level 1	Level 2	Level 3	Total
Assets				
Financial assets designated at fair value through profit or loss:				
Cash and Cash Equivalents	129 553	-	-	129 553
Equities	125 122	-	7 671	132 793
Bonds	-	164 357	793	165 150
Investment Funds	1 459 226	-	1 456 775	2 916 001
Sub total	1 713 901	164 357	1 465 239	3 343 497
Financial assets held for trading:				
Derivatives	-	29 960	-	29 960
Sub total	-	29 960	-	29 960
Total assets at fair value through profit or loss	1 713 901	194 317	1 465 239	3 373 457
Liabilities				
Financial liabilities held for trading:				
Derivatives	-	129 322	-	129 322
Total liabilities at fair value through profit or loss	-	129 322	-	129 322

The following table analyses within the fair value hierarchy the Fund's assets measured at fair value at 31 December 2023:

(in kCHF)	Level 1	Level 2	Level 3	Total
Assets				
Financial assets designated at fair value through profit or loss:				
Cash and Cash Equivalents	299 316	-	-	299 316
Equities	311 335	-	326	311 661
Bonds	-	638 104	737	638 841
Investment Funds	534 506	-	1 287 628	1 822 134
Sub total	1 145 157	638 104	1 288 691	3 071 952
Financial assets held for trading:				
Derivatives	1 912	167 391	-	169 303
Sub total	1 912	167 391	-	169 303
Total assets at fair value through profit or loss	1 147 069	805 495	1 288 691	3 241 255
Liabilities				
Financial liabilities held for trading:				
Derivatives	213	16 043	-	16 256
Total liabilities at fair value through profit or loss	213	16 043	-	16 256

Investments whose values are based on quoted market prices in active markets, and are therefore classified within Level 1, include money market funds, listed equities, exchange-traded derivatives and exchange-traded funds.

Financial instruments that trade in markets that are not considered to be active but are valued based on quoted market prices, dealer quotations or alternative pricing sources supported by observable inputs are classified within Level 2. These include government bonds, corporate bonds, and over the counter derivatives. As Level 2 investments include positions that are not traded in active markets and/or subject to transfer restrictions, valuations may be adjusted

to reflect illiquidity and/or non-transferability, which are generally based on available market information.

Investments classified within Level 3 have significant unobservable inputs, as they trade infrequently. Level 3 instruments include unlisted investment funds, over the counter derivatives and unlisted equities. As observable prices are not available for these securities, the Fund has used valuation techniques to derive the fair value.

There were no transfers between levels during the year ended 31 December 2024. (During the year ended 31 December 2023: One transfer of 2,718 kCHF). During the

year ended 31 December 2024 one Level 3 asset of value 4,149 kCHF has been reclassified from investment funds to equities to better reflect the nature of the financial instrument. (During the year ended 31 December 2023: No transfers between asset classes).

The following table presents the movement in Level 3 instruments for the year ended 31 December 2024 by class of financial instrument:

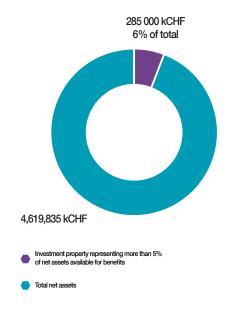
(in kCHF)	Equities	Derivatives	Bonds	Investment Funds	Total
Opening balance	326	-	737	1 287 628	1 288 691
Purchases	523	-	-	140 471	140 994
Sales	-	-	-	(119 419)	(119 419)
Transfers into Level 3	-	-	-	-	-
Transfers between asset classes	4 649	-	-	(4 649)	-
Unrealised Gains/(Losses) on Financial Assets a Fair Value Through Profit & Loss	2 173	-	56	160 066	162 295
Realised Gains/(Losses) on Financial Assets at Fair Value Through Profit & Loss	-	-	-	(7 322)	(7 322)
Closing balance	7 671	-	793	1 456 775	1 465 239

The following table presents the movement in Level 3 instruments for the year ended 31 December 2023 by class of financial instrument:

(in kCHF)	Equities	Derivatives	Bonds	Investment Funds	Total
Opening balance	353	-	774	1 285 443	1 286 570
Purchases	-	-	-	117 832	117 832
Sales	-	-	-	(35 331)	(35 331)
Transfers into Level 3	-	-	-	2 718	2 718
Unrealised Gains/(Losses) on Financial Assets at Fair Value Through Profit & Loss	(27)	-	(37)	(89 892)	(89 956)
Realised Gains/(Losses) on Financial Assets at Fair Value Through Profit & Loss	-	-	-	6 858	6 858
Closing balance	326	-	737	1 287 628	1 288 691

# 4.3.INVESTMENTS EXCEEDING FIVE PERCENT OF NET ASSETS AVAILABLE FOR BENEFITS

The Fund was invested in one Investment Property with a fair value of 285,000 kCHF representing five percent or more of net assets available for benefits as at 31 December 2024. (As at 31 December 2023: one Investment Property with a fair value of 270,830 kCHF).



The Fund was invested in the following number of investments, each representing five percent or more of their total asset class, and in combination totalling the amounts presented below.

	2024	2024	2024	2023	2023	2023
(in kCHF)	Quantity	Total fair value	Total fair value of asset class	Quantity	Total fair value	Total fair value of asset class
Investment property	5	516 588	751 726	5	489 819	693 388
Investment funds	4	769 634	2 916 001	4	523 028	1 822 134
Bonds	2	26 898	165 150	-	-	638 841
Equities	1	7 312	132 793	-	-	311 661
Derivative assets	2	11 102	29 960	1	70 640	169 303
Derivative liabilities	2	(122 331)	(129 322)	3	(12 229)	(16 256)

# **5. CASH AND CASH EQUIVALENTS**

For the purposes of the cash flow statement, cash and cash equivalents comprise the following balances with original maturity of 90 days or less:

(in kCHF)	2024	2023
Current accounts	471 493	446 870
Money Market funds	129 553	299 316
Deposit accounts	-	29 178
Margin accounts with brokers	96 939	5 306
Total	697 985	780 670

The amounts under the heading "Margin accounts with brokers" concern cash collateral pledged with derivative counterparties of the Fund. The cash is held in segregated accounts with the brokers and is callable by the Fund to the extent that collateral balances are in excess of the net fair value liability amount of the open derivative positions held with each broker.

During the year ended 31 December 2024 the Fund redeemed Money Market funds in order to post collateral with derivative counterparties.

# 6. SHORT-TERM DEPOSITS

Short-term deposits are made for varying periods, depending on the immediate cash requirements of the Fund and earn interest at the respective short-term rate. The deposits are made for more than 3 months and hence are classified as short-term deposits.

# 7. SUNDRY DEBTORS

(in kCHF)	2024	2023
Recoverable taxes	2 997	3 190
Investment property debtors	2 923	2 406
Other due amounts	306	248
Total	6 226	5 844

# 8. OTHER RECEIVABLES

(in kCHF)	2024	2023
Accrued interest	2 944	2 663
Dividends receivable	1 581	1 185
Outstanding receipts	125	111
Payments in advance	10 271	8 127
Total	14 921	12 086

# 9. DERIVATIVES

The following table shows the types of derivative contracts held by the Fund as at 31 December:

	2	2024	2	2023
(in kCHF)	Assets	Liabilities	Assets	Liabilities
Forwards:				
Currency Overlay programme	3 872	(125 408)	152 694	(1 180)
Other	16 511	-	-	-
Credit default swap	-	-	192	(215)
Swaps	9 575	(3 914)	10 795	(12 862)
Futures	-	-	520	(213)
Options	2	-	5 102	(1 786)
Total	29 960	(129 322)	169 303	(16 256)

# **10. BONDS**

The fair value of investments in bonds, 165,150 kCHF as at 31 December 2024 (638,841 kCHF as at 31 December 2023) is as follows:

(in kCHF)	2024	2023
Europe, Middle East and Africa	153 947	283 927
Emerging Markets	10 362	32 074
Asia	841	56 353
North America	-	266 487
Total	165 150	638 841

Source of geographical data: country of risk data provided by Custodian

The decrease in bonds during the year includes 25,383 kCHF in relation to an increase in fair value (23,180 kCHF increase in 2023) and a decrease of 499,074 kCHF in respect of reduced allocation to bonds (29,471 kCHF reduced allocation in 2023).

The exposure of bonds to market and credit risk is described under note 4.1. "Financial Risk Factors".

# 11. EQUITIES

The fair value of investments in equities, 132,793 kCHF as at 31 December 2024 (311,661 kCHF as at 31 December 2023) is as follows:

(in kCHF)	2024	2023
Europe, Middle East and Africa	125 818	242 615
North America	6,975	69 046
Total	132 793	311 661

Source of geographical data: country of risk data provided by Custodian

The decrease in equities during the year includes 10,064 kCHF in relation to an increase in fair value (4,748 kCHF increase in 2023) and a decrease of 188,932 kCHF in respect of reduced allocation to equities (75,263 kCHF reduced allocation in 2023).

The exposure of equities to market risk is described under note 4.1. "Financial Risk Factors".

# 12. INVESTMENT FUNDS

The fair value of Investment Funds, 2,196,001 kCHF as at 31 December 2024 (1,822,134 kCHF as at 31 December 2023) is as follows:

(in kCHF)	2024	2023
Exchange-traded funds		
Equity funds	793 744	469,322
Fixed Income funds	617 604	-
Total	1 411 348	469,322
Non-exchange-traded funds		
Hedge funds	792 302	692,841
Private Equity	405 632	356,985
Private Debt	98 883	92,428
Real Estate funds	81 304	83,773
Fixed Income funds	75 728	58,883
Equity funds	50 804	67,902
Total	1 504 653	1,352,812
Total investment funds	2 916 001	1,822,134

During the year ended 2024 the Fund divested from a proportion of its actively managed equities and fixed income portfolios and invested into exchange-traded equities and fixed income funds. The increase in exchange-traded funds during the year includes 113,286 kCHF in relation to an increase in fair value (28,135 kCHF decrease in 2023) and an

increase of 808,740 kCHF in respect of increased allocations to exchange-traded funds (497,456 kCHF increased allocation in 2023).

# 13. INVESTMENT PROPERTY

The fair value of Investment Property, 751,726 kCHF as at 31 December 2024 (693,388 kCHF as at 31 December 2023) is as follows:

(in kCHF)	2024	2023
As at 1 January	693 388	865 351
Purchases	21 426	13 119
Net gain/(loss) for fair value adjustments (price)	31 712	(155 177)
Net gain/(loss) for fair value adjustments (foreign exchange)	5 200	(29 905)
As at 31 December	751 726	693 388

During the year, there were three purchases of Investment Property in France representing three parcels of forest land. (There were four purchases of parcels of forest land in France in 2023).

Included in Investment Property under the heading Net gain/(loss) for fair value adjustments (price) totalling 31,712 kCHF are increases of 17,010 kCHF for properties in France, 15,510 kCHF for Properties in Switzerland, 806 kCHF for properties in the United Kingdom and a decrease of 1,614 kCHF for the property in Germany.

# 14. SUNDRY CREDITORS

Sundry creditors include rent guarantee deposits, rents received in advance, amounts due to members leaving the Fund and value added tax payable.

(in kCHF)	2024	2023
Members and Beneficiaries	7 323	7 879
Investment property deposits	2 659	2 431
Taxes payable	137	255
Investment property creditors	4 177	3 825
Deferred Income	519	455
Total	14 815	14 845

# 15. OTHER PAYABLES

Other Payables include transfer values to members leaving the Fund (totalling 1,640 kCHF) and amounts due mainly in respect of management and custody fees (totalling 2,107 kCHF).

(in kCHF)	2024	2023
Transfer Value Payments Outstanding	1,640	2 027
Payments Outstanding	2 107	2 829
Total	3 747	4 856

# 16. DIVIDENDS

(in kCHF)	2024	2023
Investment Funds	35 450	44 600
Equities	4 049	8 851
Total	39 499	53 451

Included under the heading Investment Funds are dividends totalling 14,003 kCHF (39,092 kCHF as at 31 December 2023) received from Private Equity investments and dividends totalling 18,106 kCHF (4,879 kCHF as at 31 December 2023) received from exchange-traded investment funds.

# 17. INTEREST INCOME

(in kCHF)	2024	2023
Cash and Cash Equivalents	18 095	15 305
Bonds	16 009	17 931
Total	34 104	33 236

The increase in Interest Income under the heading "Cash and Cash Equivalents" during the year was largely as a result of an increase in interest rates paid on cash balances at the Custodian and other banks.

# 18. UNREALISED GAINS/(LOSSES) ON FINANCIAL ASSETS AT FAIR VALUE THROUGH PROFIT & LOSS

The following table shows the amount of unrealised gains/ (losses) on financial assets at fair value through profit and loss and discloses the gains and losses arising as a result of changes in price and changes in foreign exchange currency movements for the money market funds included within Cash and Cash Equivalents, Bonds, Equities, Investment Funds and Derivatives. The Fund hedges the foreign exchange exposure it has to assets denominated in non-Swiss franc currencies.

The unrealised gains/(losses) arising as a result of changes in price and changes in foreign exchange currency movements on derivative products are on a best estimate basis.

			2024			2023
(in kCHF)	Price	Currency	Total	Price	Currency	Total
Cash and Cash Equivalents	4 857	1 155	6 012	5 542	(16 794)	(11 252)
Bonds	(1 004)	(1 494)	(2 498)	24 199	(47 120)	(22 921)
Equities	6 448	2 498	8 946	22 489	(14 464)	8 025
Investment Funds	283 086	102 477	385 563	117 687	(133 751)	(16 064)
Derivatives	5 738	641	6 379	(1 784)	(947)	(2 731)
Total	299 125	105 277	404 402	168 133	(213 075)	(44 943)

# 19. REALISED GAINS/(LOSSES) ON FINANCIAL ASSETS AT FAIR VALUE THROUGH PROFIT & LOSS

The following table shows the amount of realised gains/(losses) on financial assets at fair value through profit and loss and discloses the gains and losses arising as a result of changes in price and changes in foreign exchange currency movements for Bonds, Equities, Investment Funds and Derivatives. The Fund hedges the foreign exchange exposure it has to assets denominated in non-Swiss franc currencies.

			2024			2023
(in kCHF)	Price	Currency	Total	Price	Currency	Total
Cash and Cash Equivalents	997	5 285	6 282	753	(668)	85
Bonds	(3 569)	31 450	27 881	2 429	(2 688)	(259)
Equities	527	2 712	3 239	1 118	(4 395)	(3 277)
Investment Funds	19 347	(1 262)	18 085	24 139	(9 483)	14 656
Derivatives	(7 360)	84	(7 276)	(19 850)	(620)	(20 469)
Total	9 942	38 269	48 211	8 590	(17 854)	(9 264)

The realised gains/(losses) arising as a result of changes in price and changes in foreign exchange currency movements on derivative products are on a best estimate basis.

# 20. INVESTMENT PROPERTY INCOME AND GAINS/(LOSSES)

The following table shows Investment Property Income arising from both rental income and non-rental income:

(in kCHF)	2024	2023
Rental Income:		
Residential Property	13 053	12 931
Commercial Property	13 860	13 445
Non-Rental Income:		
Forests	793	536
Changes in fair value	36 912	(185 083)
Total	64 618	(158 171)

Gains of 31,712 kCHF for fair value price adjustments and gains of 5,200 kCHF for fair value adjustments as a result of foreign exchange movements, are included in "Changes in fair value" above. The corresponding amounts in 2023 were losses of 155,177 kCHF and losses of 29,905 kCHF respectively.

With regard to its Investment Property the Fund is a lessor of operating leases and as such is required to make the following disclosures in respect of future minimum lease payments.

(in kCHF)	2024	2023
Not later than 1 year	25 453	24 527
Between 1 and 5 years	80 383	80 413
Later than 5 years	16 649	15 754
Total	122 485	120 694

The Fund has leases that are contracted for remaining periods of between one and ten years. Some of the operating leases include break clauses.

# 21. FOREIGN EXCHANGE (LOSSES)/GAINS

(in kCHF)	2024	2023
Currency Overlay programme	(293 253)	176 229
Other exchange rate movements	30 337	(21 553)
Total	(262 916)	154 676

Foreign Exchange (Losses)/Gains includes losses of 293,253 kCHF (gains of 176,229 kCHF in 2023) relating to trades executed as part of the Currency Overlay programme that is used by the Fund to hedge its foreign exchange rate risk. This is largely due to the significant weakening of the Swiss Franc against the US dollar during the period.

# 22. INVESTMENT MANAGEMENT FEES

#### 22.1. RECORDED INVESTMENT MANAGEMENT FEES

The following table shows Investment Management Fees recognised in the Statement of Financial Performance.

(in kCHF)	2024	2023
Reported Investment Management Fees	88 897	58 973
Calculated Investment Management Fees	412	1 252
Total	89 309	60 225

The above Recorded Investment Management fees also include performance fees.

The increase in the amount of Recorded Investment Management Fees of 29,084 kCHF in 2024 (354 kCHF in 2023) was largely due to an increase in the performance of Investment Funds during the year.

#### 22.2. NON-RECORDED INVESTMENT MANAGEMENT FEES

For less than 4% of Total Financial assets (less than 3% in 2023) there was insufficient information available regarding Investment Management Fees. As a result no Investment Management Fees have been disclosed for these assets that are all Private Equity/Debt funds. The total carrying value of these assets as at 31 December 2024 was 154,218 kCHF (112,035 kCHF as at 31 December 2023).

Carried interest payable in the future to the general partners of Private Equity funds has not been disclosed as there was insufficient information available.

# 23. INVESTMENT PROPERTY EXPENDITURE

(in kCHF)	2024	2023
Residential Property	5 792	5 585
Commercial Property	4 455	5 179
Forests	411	232
Total	10 658	10 996

The above Investment Property Expenditure includes amounts totalling 5,696 kCHF due to renovation work on Residential and Commercial Property (5,715 kCHF in 2023).

# 24. OTHER FINANCIAL EXPENSES

Other Financial Expenses were 1,118 kCHF for the year ended 31 December 2024 (1,035 kCHF in 2023) in relation to the interest paid by the Fund on cash collateral deposited by counterparts at the Custodian.

# 25. ADMINISTRATION COSTS

Administration costs totalled 6,683 kCHF in the year ended 31 December 2024 (6,021 kCHF for the year ended 31 December 2023). In the year ended 31 December 2024 office refurbishment costs are included in Operating Expenses of 2,104 kCHF. (No office refurbishment costs were included in Operating Expenses of 1,328 kCHF for the year ended 31 December 2023).



# 26. MEMBERSHIP ACTIVITIES

This heading shows the contributions of the members of the Fund and the participating Organisations and other amounts received, as well as the various benefits and other amounts paid during the period.

# 27. COMPENSATIONS

The Fund is compensated by CERN for the additional cost associated with Administrative Circular No. 22 A (Rev.1) "Award of additional periods of membership in the Pension Fund for long-term shift work". No compensations were

received for the year ended 31 December 2024 (663 kCHF for the year ended 31 December 2023). In addition, the Fund is compensated by CERN for members participating in the progressive retirement programme. In the year ended 31 December 2024 the total compensations received in relation to this were 302 kCHF (289 kCHF for the year ended 31 December 2023).

# 28. TRANSFER VALUES PAID TO MEMBERS

According to Article II 1.11 of the Fund's Rules, members with less than ten years of service may, under certain circumstances, receive a transfer value directly into their bank account. Alternatively, members can select to have the transfer value paid to another pension scheme.

# 29. TRANSFER VALUES PAID TO OTHER SCHEMES

Upon leaving the Fund, members can choose to have a transfer value paid into another pension scheme.

# 30. AMOUNTS PENDING SELECTION FROM MEMBERS

Members who are entitled to a transfer value have one year to inform the Fund of their selection (Article II 1.11). Depending on the number of years of service, a member may elect to be paid a transfer value to another scheme or to the member. A member with at least five years of service may also elect to become a deferred beneficiary.

# 31. LITIGATIONS AND CLAIMS

As at 31 December 2024, there were two pending claims against CERN in respect of the Fund (in 2023 there was one pending claim). Nothing is recognised in the Financial Statements since CERN and the Fund considers the legal position to be well substantiated, and only a future event, such as a negative judgement, will confirm existence of an obligation.

# 32. RELATED-PARTY TRANSACTIONS

Parties are considered to be related if one party has the ability to control the other party or exercise significant influence over the other party in making financial or operational decisions.

Related parties of the Fund during the period were:

I. Professional members appointed by the CERN Council to act as experts in the PFGB and professional members

appointed by the PFGB to the IC and ATC. These professional members provide advice on governance, investment and actuarial issues respectively. Fees in 2024 totalled 90 kCHF (72 kCHF in 2023);

- II. Key personnel are the Chair of the PFGB, Chair of the IC, Chair of the ATC and the Chief Executive Officer of the Fund. The aggregate remuneration paid to the remaining key personnel includes salaries, allowances and other entitlements paid in accordance with the Staff Rules and Regulations;
- III. CERN contributes a significant portion of the Fund's financing. While the Fund is an autonomous operating entity without separate legal identity, for the purposes of IPSAS 20 disclosure requirements, CERN is considered a related party. Although the Fund assumes the charges for its operating expenses, CERN provides some central support services and office accommodation free of charge.

During the year the Fund received employer contributions, employer special contributions and compensations from CERN for an amount of 169,026 kCHF (167,045 kCHF in 2023).

During the year the Fund paid the following amounts to CERN:

- Finance and Administrative Processes department: 316 kCHF for IT support and maintenance (295 kCHF in 2023).
- Industry, Procurement and Knowledge Transfer department: 130 kCHF for procurement services (85 kCHF in 2023).
- Internal Audit Service: 107 kCHF for internal audit services (114 kCHF in 2023).
- Legal Service: 102 kCHF (102 kCHF in 2023).

Contributions from CERN to the Fund and recovery of charged amounts to CERN from the Fund are transferred on a monthly basis.

In 2024 the Fund did not grant any loan or pay any other remuneration (except for the abovementioned amounts) to the key management personnel or to their close family members. This was also the case in 2023.

# 33. EVENTS AFTER THE REPORTING DATE

There were no material events after the reporting date.



# EXTRACT OF THE ACTUARY'S REPORT TO THE PENSION FUND FOR FINANCIAL YEAR-END 2024

The Fund's Actuary has provided technical assessments of the Fund in line with the requirements of IAS 26, using two different sets of assumptions for distinct purposes.

The first set of assumptions, used for the Statement of Financial Position under IAS 26, is based on accounting standards to allow users of the accounts to have a consistent basis of comparability between pension schemes. Actuarial results under IAS 26 can change significantly depending on market conditions. The actuarial present value of benefits is linked to yields on AA-rated corporate bonds, and changing markets in conjunction with discount rate volatility will lead to volatility in the funded status of the Pension Fund.

The second set, outlined in the Actuary's "Report to the Pension Fund for the Financial Year-End 2024", reflects Best Estimate assumptions which are not as sensitive to change in market bond yields due to the discount rate being set as a long-term assumption.

Due to the different purposes, the two sets of assumptions can lead to different movements in the fund's financial position. While IAS 26 assumptions may fluctuate with market conditions, Best Estimate assumptions offer a more stable, long-term view. The actuarial present value of benefit obligations in both cases are based on actuarial assumptions that may be different from actual experience.

The full report from the Actuary provides additional details on the key assumptions and methods used in the calculations.



# **IAS 26 SUMMARY**

The actuarial present value of benefit obligations for IAS 26 reflects the benefits promised by the Pension Fund based on membership rendered before the valuation date and projected salaries on a going concern basis. Actuarial assumptions for this purpose are ratified by the PFGB as best estimates of the variables that will determine the ultimate cost of providing benefits, and the discount rate for IAS 26 reflects the time-value of money based on the Aon Swiss AA corporate bond yield curve as of 31 December 2023. The following table shows the funding level under IAS 26.

nancial Year	Current	Current
	Financial Year	Financial Year
	31 December 2024	31 December 2023
rrency CHF x 1000		
Amounts at Year-End According to IAS 26 Assumptions		
Total assets of the Fund	4,619,835	4,460,361
Actuarial present value of benefit obligations	(11,328,785)	(10,138,017)
Surplus / (Deficit) of the Fund at year-end	(6,708,950)	(5,677,656)
Funded status at year-end	40.8%	44.00%
Benefit obligation in respect of members	(6,103,477)	(5,038,813)
Benefit obligation in respect of beneficiaries	(5,225,308)	(5,099,204)
Actuarial present value of benefit obligations	(11,328,785)	(10,138,017)
Key Financial Assumptions for IAS 26 Valuations		
Single Equivalent Discount Rate at End of Year	0.79%	1.33%
Average Salary Increase Rate at End of Year <sup>1</sup>	2.75%	2.80%
Inflation Rate at End of Year	1.25%	1.25%

# CHANGE IN IAS 26 FUNDING LEVEL OVER THE CURRENT YEAR

The funding level decreased to 40.8% at 31 December 2024 (previously 44.0% at 31 December 2023). The deficit increased by CHF 1,031.3 million during the year.

The main reasons for an improvement in the funding level were:

- 1. Special contributions of CHF 61.4 million were paid into the Fund during the year.
- 2. The investment performance contributed to an increase to the asset value of CHF 216.4 million.

The main reasons for a deterioration in the funding level were:

- Normal contributions paid into the Fund were CHF 107.0 million lower than the IAS 26 value of benefits earned during the year.
- 4. Interest on the present value of benefit obligations was CHF 132.7 million during the year.
- Actuarial assumptions used to measure actuarial present value of benefit obligations have changed, resulting in a 5. CHF 1,068.8 million increase to the obligations.
- Membership changes and other experience on actuarial present value of benefit obligations different from assumed resulted in a CHF 0.6 million increase to the obligations.

<sup>1</sup> The average salary increase rate includes an increase linked to career change (average 1.50% for the current financial year and average 1.55% for the previous financial year) and an increase linked to inflation (1.25%)



# **ANALYSIS OF CHANGES TO IAS 26 ASSUMPTIONS**

The following table shows the impact on the IAS 26 actuarial present value of benefit obligations of changing key assumptions from the assumptions used at the prior year-end.

Financial Year	Assumption at	Assumption at	(Increase) / Decrease	
Currency : CHF x 1000	31-Dec-24	31-Dec-23	to Obligations	
Mortality table	Adjusted ICSLT 2023	Adjusted ICSLT 2018	+184,935	
Turnover rates	Best estimate 2025	Best estimate 2022	(54,202)	
Disability rates	Best estimate 2025	Best estimate 2022	+5,104	
Early retirement rates	Best estimate 2025	Best estimate 2022	+52,696	
Spouse age differences	VZ2020	+/- 3years	(106,208)	
Portion married	VZ2020+10%	VZ2010+5%	(50,181)	
Transfer value election	Best estimate 2025	Best estimate 2022	(6,857)	
Pension increase rate	0.85% / 1.05%	Individual PPL	(13,188)	
Salary increase rate	Average 2.70%	Average 2.75%	+30,372	
Discount Rate	0.79%	1.33%	(1,111,269)	

The full report provides further details on the key assumptions and methods used in the calculations.

# SENSITIVITY OF IAS 26 ACTUARIAL PRESENT VALUE OF BENEFIT OBLIGATIONS TO CHANGES IN KEY ASSUMPTIONS

The sensitivity of the IAS 26 actuarial present value of benefit obligations at 31 December 2024 to changes in the key

	Actuarial Present Value of Benefit Obligations	(Increase) / Decrease	Impact due to
Currency : CHF x 1000	at Year-End	in Obligations	change
Baseline	(11,328,785)		
Discount Rate + 0.5%	(10,247,707)	1,081,078	-9.5%
Discount Rate - 0.5%	(12,595,347)	(1,266,562)	11.2%
Inflation Rate + 0.5%	(12,540,023)	(1,211,238)	10.7%
Inflation Rate - 0.5%	(10,281,264)	1,047,521	-9.2%
Salary Increase linked to career change + 0.5%	(11,663,102)	(334,317)	3.0%
Salary Increase linked to career change - 0.5%	(11,019,735)	309,050	-2.7%

The above sensitivity analyses are based on a change in one assumption while holding all other assumptions constant (except the sensitivities analysis related to the inflation rate). In practice, this is unlikely to occur as changes in some of the assumptions may be correlated.

The salary increase rate assumption includes both an increase linked to career change and an increase linked to inflation. The sensitivity on inflation rate includes a change in all inflation-related assumptions (salary increase rate, pension increase rate).

When calculating the sensitivity of the actuarial present value of benefit obligations to significant assumptions, the same method has been applied as when calculating the amount recognised in the statement of financial position.



# **BEST ESTIMATE SUMMARY**

The actuarial present value of benefit obligations for the Best Estimate valuation reflects the benefits promised by the Pension Fund based on membership rendered before the valuation date and projected salaries on a going concern basis. Actuarial assumptions for this purpose are ratified by the PFGB as best estimates of the variables that will determine the ultimate cost of providing benefits, and the discount rate represents the expected future return on the Fund's assets with respect to its long-term investment strategy. The following table shows the funding level under Best Estimate assumptions.

Financial Year	Current	Previous
	Financial Year	Financial Year
Currency: CHF x 1000	31-Dec-24	31-Dec-23
Amounts at Year-End According to Best Estimate Assumptions		
Total assets of the Fund	4,619,835	4,460,361
Actuarial present value of benefit obligations	(6,323,317)	(6,619,973)
Surplus / (Deficit) of the Fund at year-end	(1,703,482)	(2,159,612)
Funded status at year-end	73.1%	67.4%
Benefit obligation in respect of members	(2,683,631)	(2,731,264)
Benefit obligation in respect of beneficiaries	(3,639,686)	(3,888,709)
Actuarial present value of benefit obligations	(6,323,317)	(6,619,973)
Key Financial Assumptions for Best Estimate Valuations		
Discount Rate at End of Year <sup>1</sup>	4.20%	3.85%
Average Salary Increase Rate at End of Year <sup>2</sup>	2.75%	2.80%
Inflation Rate at End of Year	1.25%	1.25%

## CHANGE IN BEST ESTIMATE FUNDING LEVEL OVER THE CURRENT YEAR

The funding level increased to 73.1% at 31 December 2024 (previously 67.4% at 31 December 2023). The deficit decreased by CHF 456.1 million during the year.

The main reasons for an improvement in the funding level were:

- Normal contributions paid into the Fund were CHF 41.0 million greater than the Best Estimate value of benefits earned during the year.
- 2. Special contributions of CHF 61.4 million were paid into the Fund during the year.
- 3. The investment performance contributed to an increase to the asset value of CHF 216.4 million.
- Actuarial assumptions used to measure actuarial present value of benefit obligations have changed, resulting in a CHF 377.5 million decrease to the obligations.
- 5. Membership changes and other experience on actuarial present value of benefit obligations different from assumed resulted in a CHF 8.6 million decrease to the Fund obligations.

The main reasons for a deterioration in the funding level were:

Interest on the actuarial present value of benefit obligations was CHF 248.7 million during the year.

<sup>2</sup> The average salary increase rate includes an increase linked to career change (average 1.50% for the current financial year and average 1.55% for the previous financial year) and an increase linked to inflation (1.25%)



<sup>1</sup> The Best Estimate discount rate assumption includes a real expected future return component (2.95% for the current financial year and 2.60% for the previous financial year) and an inflation component (1.25%)

# **ANALYSIS OF CHANGES TO BEST ESTIMATE ASSUMPTIONS**

The following table shows the impact on the Best Estimate actuarial present value of benefit obligations of changing key assumptions from the assumptions used at the prior year-end.

Financial Year	Assumption at	Assumption at	(Increase) / Decrease	
Currency : CHF x 1000	31-Dec-24	31-Dec-23	to Obligations	
Mortality table	Adjusted ICSLT 2023	Adjusted ICSLT 2018	+89,707	
Turnover rates	Best estimate 2025	Best estimate 2022	(13,154)	
Disability rates	Best estimate 2025	Best estimate 2022	+3,080	
Early retirement rates	Best estimate 2025	Best estimate 2022	+13,464	
Spouse age differences	VZ2020	+/- 3years	(27,947)	
Portion married	VZ2020+10%	VZ2010+5%	(11,299)	
Transfer value election	Best estimate 2025	Best estimate 2022	(1,158)	
Pension increase rate	0.85% / 1.05%	Individual PPL	(15,043)	
Salary increase rate	Average 2.70%	Average 2.75%	+16,805	
Discount Rate	4.20%	3.85%	+323,050	

The full report provides further details on the key assumptions and methods used in the calculations.

# SENSITIVITY OF BEST ESTIMATE ACTUARIAL PRESENT VALUE OF BENEFIT OBLIGATIONS TO CHANGES IN KEY ASSUMPTIONS

The sensitivity of the Best Estimate actuarial present value of benefit obligations at 31 December 2024 to changes in the key assumptions is as follows.

	Actuarial Present Value of Benefit Obligations	(Increase) / Decrease	Impact due to
Currency : CHF x 1000	at Year-End	in Obligations	change
Baseline	(6,323,317)		
Discount Rate + 0.5%	(5,898,941)	424,376	-6.7%
Discount Rate - 0.5%	(6,802,692)	(479,375)	7.6%
Inflation Rate + 0.5%	(6,318,877)	4,440	-0.1%
Inflation Rate - 0.5%	(6,328,121)	(4,804)	0.1%
Salary Increase linked to career change + 0.5%	(6,444,172)	(120,855)	1.9%
Salary Increase linked to career change - 0.5%	(6,210,278)	113,039	-1.8%

The above sensitivity analyses are based on a change in one assumption while holding all other assumptions constant (except the sensitivity analysis related to the inflation rate). In practice, this is unlikely to occur as changes in some of the assumptions may be correlated.

The discount rate assumption includes both a real expected future return component and an inflation component, and the salary increase rate assumption includes both an increase linked to career change and an increase linked to inflation. The sensitivity on inflation rate includes a change in all inflation-related assumptions (discount rate, salary increase rate, pension increase rate).

When calculating the sensitivity of the actuarial present value of benefit obligations to significant assumptions, the same method has been applied as when calculating the amount recognised in the statement of financial position.

CERN 1211 Geneva 23, Switzerland http://home.cern

©Copyright 2025, CERN

Graphic Design & Layout: CERN

Graphic Design and Visual Identity Service

Images: Shutterstock, Unsplash,

Adobe Stock

Didier Gauducheau, Voltalia CERN: all other images

ISBN: 978-92-9083-694-0 (Printed version) ISBN: 978-92-9083-695-7 (Online version)

CERN Pension Fund: Annual Report and Financial Statements 2024

