CERN Pension Fund

Overview

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Pension schemes

Capitalized scheme
1st generation accumulated capital: income = contributions + capital gain: "capital investment management"

Budgetised scheme
Payments are made from the cash-flow: income = contributions: "contract between generations"
Why a CERN Pension fund?

- CERN is an International Organisation (Nation + employer)
- Must be independent of Member states
  - Must guarantee equal treatment between all staff members, independently of origin. This applies in particular to the pension rights
  - Staff members are no longer part of a national social insurance scheme

CERN Pension scheme

- The CERN pension fund is based on a defined benefit scheme
  - The level of benefits is defined upfront and the contributions are calculated to insure that the Fund will be able to pay them:
    - “Guarantee on pensions”
      - Risk shared between (staff member) and sponsor
- The CERN pension fund is a capitalised scheme
  - Funding are contributions and return on investments
  - No legal obligation to reach full funding, but a Council decision following new governance in 2007: “the fund must be fully funded”
- Investment objectives
  - Return: 3% above Geneva inflation over the long term (3 years)
  - Risk: 5% CVaR (Conditional Value-at-Risk) limit of – 8%
Structure of the Pension Fund

• Status (art. I 2.01)
  • CERN PF is integral part of CERN
  • Under supreme authority of CERN Council
  • Administration + management independent of CERN/ESO

• Assets (art. I 2.02)
  • Deposited and held in fund separately from CERN/ESO
  • To be used exclusively for paying benefits to PF members

• Bodies (art. I 2.03)
  • Governing Board
  • Investment Committee/Actuarial Technical Committee
  • Administrator (also called CEO)
  • Consulting actuaries, auditors

Governing Board

• Functions (art. I 2.04)
  • Apply policy of CERN Council
  • Supervise and monitor management of Fund
  • Define investment policy of assets
  • Submit proposals/opinions to CC and FC concerning PF

• Composition (art. I 2.05, since 1 Nov. 2007) Mandate ≤ 6 yrs
  • Two nominated by CERN Council
  • One nominated by ESO Council
  • One nominated by DG of CERN
  • Two nominated by CERN Staff Association
  • One nominated by ESO Staff Association
  • One nominated by CERN/ESO pensioners
  • Two professional experts nominated by CERN Council with voting right
**Liability and Membership Overview at 01/07/2017**

- Total Liability: CHF 5,628 million
- Total membership: 7,541
- 66% of the liability is in respect of beneficiaries, 54% of these are retirees who joined the Fund before 1 July 1987.
- Members who joined post 30 June 1987 represent 26% of the liability but 48% of the total membership.

**Funding Level at 01/07/2017**

The funding level at 1 January 2016 was 73.0%. At 1 July 2017 it was 73.2%.

The deficit has been reduced from CHF 1.512 bn as at 1 January 2016 by CHF 50 m to CHF 1.507 bn at 1 July 2017, and the funding level has increased by 0.2%.
### Strategic Asset Allocation

<table>
<thead>
<tr>
<th>Asset class</th>
<th>2017</th>
<th>2016</th>
<th>2015</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fixed Income</td>
<td>36.5%</td>
<td>30.0%</td>
<td>35.0%</td>
</tr>
<tr>
<td>Equities</td>
<td>15.0%</td>
<td>25.0%</td>
<td>20.0%</td>
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<tr>
<td>Real Estate</td>
<td>20.0%</td>
<td>20.0%</td>
<td>20.0%</td>
</tr>
<tr>
<td>Timberland/Farmland</td>
<td>3.5%</td>
<td>5.0%</td>
<td>0.0%</td>
</tr>
<tr>
<td>Private Equity</td>
<td>6.0%</td>
<td>5.0%</td>
<td>5.0%</td>
</tr>
<tr>
<td>Hedge Funds</td>
<td>8.0%</td>
<td>10.0%</td>
<td>10.0%</td>
</tr>
<tr>
<td>Commodities/Gold</td>
<td>4.0%</td>
<td>0.0%</td>
<td>0.0%</td>
</tr>
<tr>
<td>Cash</td>
<td>7.0%</td>
<td>5.0%</td>
<td>10.0%</td>
</tr>
</tbody>
</table>

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### Projection of the Funding Level to 01/01/2041

The above projections allow for the following assumptions:

- 1.0% p.a. until 2024 and 1.5% from 2025 onwards for pension and inflationary increases
- 83% VZ 2010 Generational mortality
- Withdrawals of active members from the Fund of 0.92% p.a. on average for all members
- 4.0% p.a. investment return until 2019, 4.5% p.a. investment return from 2020 to 2024 and 5.0% p.a. investment return from 2025 onwards
- Special contributions of CHF 61.3 m p.a., based on current levels of ESO special contributions (which are under review)
Pension Fund Performance 31/08/17

Return (YTD): 3.48%
Risk (5% CVaR): -7.5% (above the limit of -8%)

CERN Pension Fund

- The projection of the Funding Level to 01/01/2041 remains above full funding, as planned and expected;
- The performance rate YTD stands at 3.48% which is in line with the objective of 3% annual performance above inflation;
- WG on the guarantee of pensions in the event of the dissolution of the Organization started its work, discussion for including also the Health Insurance coverage;
- No present difficult discussions;
- The next triennial actuarial study will be held next year and could lead to new discussions.
Working Group on the PF Governance

- **Mandate:** achieve a comprehensive review of the Fund’s Rules;
- **Members** – CERN Council: 1, ESO Council: 1, SA: 1, GAC: 1, external: 1, SACA: 1, 2 external experts;
- The draft is essentially completed;
- **Most important remaining item to be addressed:** the composition of PFGB to be discussed during the next three meetings

- The SA asks to comment the final version of the working group report after its submission to the Council for comments;
- The SA defends the principle of joint representation within the PFGB
  - voting rights reserved for stakeholders.

Thank you for your attention

Any questions?

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