



Enterprise Risk Management (ERM) Annual Update

March 21, 2024

- **ERM Program Framework**
- **Risk Assessment Process**
- **Risk Assessment Examples**
- **STRS Ohio ERM Assessment**
- **Key Risk Mitigation Tools**
- **Fiduciary Audit Recommendations**
- **Executive Summary**

- **The purpose of this presentation is to help the board understand:**
 - The largest risks facing the system
 - What the board and staff are doing to manage and mitigate those risks
 - Our best estimates of the risk that remains despite that mitigation
- **To the extent that the board is comfortable with the current mitigation efforts and the remaining risks, all that is required is ongoing monitoring**
- **If the board is not comfortable with the level of a given risk, staff can follow up if there are additional measures that could potentially further mitigate that risk and the costs and benefits of those measures**

- **ERM is an ongoing and comprehensive discipline to identify, evaluate, prioritize, mitigate and report key risks affecting STRS Ohio**
- **Staff monitors and proactively manages risks to ensure continuity of STRS Ohio's operations and ability to meet its mission, vision and strategic goals**
- **Staff continually reviews and adjusts business processes, internal controls and resources to mitigate key risks**
- **Risk considerations are part of the system's decision-making; Sustainable Benefit Enhancement Plan (SBEP) is one key example**
- **Internal and external factors are constantly considered as they could be catalysts for emerging risks**

- **Periodic reexamination and reassessment of risks is critical**
- **The landscape changes constantly and new risks emerge periodically**
- **“Risk” does not necessarily mean a negative, just uncertainty**
- **For example, the decision to pursue additional employer contributions – in our assessment, this effort has significant impacts on four risks we are managing**
 - This decision could be considered a mitigating effort regarding
 - The risk plan changes are implemented for short-term benefits that are unsustainable in the long run
 - The risk the plan is unable to adjust to an emerging funding gap
 - On the other hand, it may heighten other risks
 - The risk that Defined Benefit Plan enrollment declines
 - Legislative/Regulatory risk

- **STRS Ohio's enterprise risk is governed by the board's fiduciary oversight**
- **The executive director is responsible for managing enterprise risks**
- **Senior leadership has responsibility for ongoing management and reporting of risks in the team's respective departments**
- **Risks covering all areas of the organization are assessed**

- **Meetings with the CFO and chief actuary were held with each deputy and department director**
- **Each risk was cataloged separately and includes:**
 - Description of the risk
 - Risk profile before mitigation efforts
 - Key mitigation efforts
 - Risk profile after mitigation efforts
- **Every cataloged risk was reassessed; only a few had significant changes from last year**
- **The risk profile includes estimates of how likely the risk is, how big the impact could be, and how fast it could emerge**

Risk profile was quantified as:

- **Impact**
 - Low – less than \$0.5 billion
 - Medium – \$0.5 to \$2.0 billion
 - High – more than \$2.0 billion
- **Probability**
 - Low – less than 15% chance
 - Medium – 15% to 30% chance
 - High – greater than 30% chance
- **Time frame**
 - Short – risk emerges in less than two years
 - Medium – risk emerges over two to 10 years
 - Long – risk takes 10+ years to emerge

Risk example – Ability to attract and retain staff possessing the necessary professional capabilities and experience

Description: The ability for the organization to carry out its mission depends on retaining staff with the appropriate and necessary capabilities. Should staff expertise fall short of needs due to high associate turnover, the management and administration of the plan benefits could be compromised.

- **Characteristics before mitigation**
 - Impact: Medium
 - Probability: Medium
 - Time frame: Medium
- **Mitigation efforts**
 - Succession planning
 - Continuing education and certification support for staff
 - Recruiting capability
 - Benefits, compensation and related policies
- **Characteristics after mitigation**
 - Impact: Medium
 - Probability: Medium
 - Time frame: Medium

Risk example – Plan changes implemented that prove to be unsustainable in the long term

Description: Benefit enhancements and/or contribution decreases that have may appear to have a small impact in the short term could prove to be unsustainable in the long term. The biggest threats are due to unanticipated experience and moral hazard.

- **Characteristics before mitigation**
 - Impact: High
 - Probability: High
 - Time frame: Medium
- **Mitigation efforts**
 - Outside actuary review of planned changes prior to implementation (SBEP)
 - Plan funding policy
 - Plan funding scorecard and dashboard
 - Plan design change lever report prepared by outside actuary with each valuation
 - Stochastic modeling of plan under varying investment returns
- **Characteristics after mitigation**
 - Impact: Medium
 - Probability: Medium
 - Time frame: Short

STRS Ohio ERM Assessment 2023

PROBABILITY OF THE EVENT

High
(>30% chance)

Medium
(15-30% chance)

Low
(<15% chance)

High
(>\$2.0 billion)

- Long-term actual returns slightly short of expected median returns

- **Legislative/regulatory/litigation/governance action with negative impact**
- Plan unable to adjust to emerging funding gap
- Medium-term actual returns moderately short of expected median returns
- Assumed actuarial returns higher than expected median returns
- Long-term sovereign deficit and debt issues
- Short-term plan design changes unsustainable in the long term

- **Investment diversification ineffective**
- **Short-term actual returns well short of expected median returns**
- **Extended period of elevated inflation**

Medium
(\$0.5-2.0 billion)

- **Sensitivity to cyber incidents/financial and confidential member data vulnerability**
- **Reputational risk**
- **Recession**
- **DB plan enrollment declines**

Managed at senior staff and department level

Low
(<\$0.5 billion)

Managed at senior staff and department level

Managed at senior staff and department level

- **A total of 33 risks were identified and documented across the organization**
- **Reassessment led to four board-level risks changing (one risk intensified, three lessened)**
- **One risk was elevated to be highlighted to the board; one was reduced below the level of board highlighting; the other two were downgraded but remain significant enough to call to the board’s attention**
- **In the end, there were 14 “board-level” risks identified in 2024, the same number as last year**

STRS Ohio ERM Assessment 2024 – Risk Changes



PROBABILITY OF THE EVENT

High
(>30% chance)

Medium
(15-30% chance)

Low
(<15% chance)

High
(>\$2.0 billion)

Medium
(\$0.5-2.0 billion)

Low
(<\$0.5 billion)

- ~~• Plan unable to adjust to emerging funding gap~~
- ~~• Short-term plan design changes unsustainable in the long term~~

- **Recession**
- Plan unable to adjust to emerging funding gap
- Ability to attract and retain staff
- Short-term plan design changes unsustainable in the long term

Managed at senior staff and department level

Managed at senior staff and department level

Managed at senior staff and department level

Red – short time horizon, <2 years

Orange – medium time horizon, 2-10 years

Yellow – long time horizon, >10 years

STRS Ohio ERM Assessment 2024



PROBABILITY OF THE EVENT

IMPACT OF THE EVENT

| | High (>30% chance) | Medium (15-30% chance) | Low (<15% chance) |
|-------------------------------|--|--|---|
| High (>\$2.0 billion) | <ul style="list-style-type: none"> • Long-term actual returns slightly short of expected median returns | <ul style="list-style-type: none"> • Legislative/regulatory/litigation/governance action with negative impact • Medium-term actual returns moderately short of expected median returns • Assumed actuarial returns higher than expected median returns • Long-term sovereign deficit and debt issues | <ul style="list-style-type: none"> • Investment diversification ineffective • Short-term actual returns well short of expected median returns • Extended period of elevated inflation |
| Medium (\$0.5-2.0 billion) | | <ul style="list-style-type: none"> • Sensitivity to cyber incidents/financial and confidential member data vulnerability • Reputational risk • Plan unable to adjust to emerging funding gap • Ability to attract and retain staff • DB plan enrollment declines • Short-term plan design changes unsustainable in the long term | <p>Managed at senior staff and department level</p> |
| Low (<\$0.5 billion) | | <p>Managed at senior staff and department level</p> | <p>Managed at senior staff and department level</p> |

Red – short time horizon, <2 years **Orange** – medium time horizon, 2-10 years **Yellow** – long time horizon, >10 years 14

Examples of ongoing policies, processes and internal controls that provide risk mitigation and monitoring:

1. Board policies and governance
2. Annual external and ongoing internal audits
3. Annual independent actuarial valuations and analysis
4. Independent investment and governance consultants
5. Asset-liability and actuarial experience studies
6. Statement of Investment Objectives & Policy
7. Segregation of duties
8. Annual external performance verification
9. Associate Guidelines, staff capabilities and succession planning
10. Communications with various stakeholders
11. External IT monitoring, access controls and disaster recovery capabilities

- The fiduciary audit made a number of recommendations regarding Enterprise Risk Management
- The recommended changes were very substantial and would require extensive board involvement and engagement
- These issues were raised at the November 2022 review of the fiduciary audit
- Staff is generally supportive of the recommendations
- Developing this framework would be somewhat similar to the development of the pension plan funding policy (an effort that took several years), but would involve a much wider range of metrics
- The board's governance consultant, Aon, will be addressing these recommendations

- **STRS Ohio staff continue to identify, assess and manage enterprise-level risks, including emerging risks that may impact STRS Ohio's ability to accomplish its mission and strategic goals**
- **STRS Ohio's risk profile remains stable; overall, one new risk was added and some existing risks were lowered due to good mitigation or current assessment**
- **All organizations face significant, constantly changing risks; an ERM program helps us better navigate through these risks and improve resilience**
- **Mitigation efforts are effective in reducing risk levels for most identified risks**



Questions?

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