Pension Ratings Overview

Is the pension sustainable within a budget?

Where they are
- Funded ratio
- Discount rate used to measure liability

Where they’re going
- Minimum Funding Progress / Static Funding
- Actuarially Determined Contribution
  - Methods / assumptions
State Pension Survey Aggregate Funded Ratios

U.S. Pension Funded Ratio 2018

<table>
<thead>
<tr>
<th>State</th>
<th>Best 2018 Funded Ratio</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wisconsin</td>
<td>102.93%</td>
</tr>
<tr>
<td>South Dakota</td>
<td>100.02%</td>
</tr>
<tr>
<td>New York</td>
<td>98.95%</td>
</tr>
<tr>
<td>Washington</td>
<td>93.75%</td>
</tr>
<tr>
<td>Idaho</td>
<td>91.64%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>State</th>
<th>Worst 2018 Funded Ratio</th>
</tr>
</thead>
<tbody>
<tr>
<td>New Jersey</td>
<td>38.41%</td>
</tr>
<tr>
<td>Illinois</td>
<td>38.98%</td>
</tr>
<tr>
<td>Colorado</td>
<td>43.76%</td>
</tr>
<tr>
<td>Kentucky</td>
<td>44.83%</td>
</tr>
<tr>
<td>Connecticut</td>
<td>46.65%</td>
</tr>
</tbody>
</table>

Source: S&P Global Ratings
Copyright © 2019 by Standard & Poor's Financial Services LLC. All rights reserved.
Source: S&P Global Ratings - U.S. State Pension Reforms Partly Mitigate The Effects Of The Next Recession, September 26, 2019
Discount guideline = 6.5%
– Contribution volatility is key
– Liquidity risk and market shock
– Plans and sponsors are unique
  ▪ Risk sharing and capacity
Mature Plans *Compound* Risks of High Discount Rates

**Plan Demographics And Discount Rate - Largest State Plans**

- Avg 2018 discount rate = 7.25%
- discount rate guideline = 6.5%
- Avg 2018 active/beneficiary ratio = 1.31

States with mature plans and elevated discount rates that still have low funded ratios may warrant additional attention with regard to budgetary vulnerability.

Source: S&P Global Ratings
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Source: S&P Global Ratings - U.S. State Pension Reforms Partly Mitigate The Effects Of The Next Recession, September 26, 2019
Funding Discipline

1) Actuarial plan
   - Minimal deferral to future

2) Last year
   - Current costs plus interest (Static)
   - Pay down principal (MFP)
   - Looking forward?
State Plan Aggregate Actual Contribution Funding Progress

- 9 states contributed in excess of MFP
  - 6 of these follow an actuarial plan

- 29 states contributed less than static funding
  - < 50% of these follow an actuarial plan

- Bottom 8 are not following an actuarial plan

*These states typically fully meet required contributions with an actuarial basis. Source: S&P Global Ratings. Copyright © 2019 by Standard & Poor’s Financial Services, LLC. All rights reserved.

Source: S&P Global Ratings - U.S. State Pension Reforms Partly Mitigate The Effects Of The Next Recession, September 26, 2019
Retiree Healthcare (OPEB) Status for States

**Combined Funded Ratio For OPEB Funds**

*States without accumulated assets have been excluded from the chart. Kansas and South Dakota do not report liability for retiree health care benefits.*

**State Plan Aggregate Actual Contribution Funding Progress**

MFP – Minimum funding progress. *For plans that did not disclose schedule of changes to fiduciary net position, we typically counted benefit payments, less administrative expenses, as contributions, when disclosure Kansas and South Dakota do not report liability for retiree health care benefits. Source: S&P Global Ratings. Copyright © 2019 by Standard & Poor’s Financial Services LLC. All rights reserved.*

Source: S&P Global Ratings - U.S. States Are Slow To Reform OPEBs As Decline In Liabilities Masks Increased Risk, December 3, 2019
OPEB – Rising Concerns

73% not accounting for budgetary growth via actuarial recommendation.

Note: Data are based on 48 states; Kansas and South Dakota do not report a liability for retiree medical benefits.
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Source: Retiree Medical Benefits Generate Unique Cost Drivers And Risks For U.S. States, September 17, 2019
OPEB – Rising Concerns

Growth in healthcare costs > growth in personal income & inflation.


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