State and Local Pensions 101

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 State and Local Government Pension Plans: Economic Downturn Spurs Efforts to Address Costs and Sustainability," U.S. Govern-

mental Accountability Office, March 2012

1 November 2012

Government pension plans have been in the news often lately, usually attached to dire predictions and inflammatory language. News reports warn about looming unfunded liabilities while many entities are discussing or have implemented pension reforms. In extreme cases, some local governments have even filed for bankruptcy or declared a fiscal emergency in order to amend pension benefits.

Pension liabilities represent significant long-term obligations for governmental entities. In recent years, many governments have been required to increase their annual contributions substantially to fund these future liabilities that have added additional budgetary pressure to already stressed fiscal profiles. This combination makes pensions an important element to understand when determining an entity's credit quality.

Government actions on pensions also can have a sizable impact on a substantial segment of the national population. According to a recent report from the U.S. Government Accountability Office, more than 27 million employees and beneficiaries are part of state or local government pension plans¹. These plans represent a considerable portion of retirement planning for these individuals.



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Despite the importance of pensions on both the governmental and individual level, they are often poorly understood. With this in mind, Morningstar aims to shed some light on pensions and their potential impact on state and local governments.

What are Public Pension Plans?

Pension plans provide post-retirement monetary benefits for eligible retirees. Benefits are determined by the type of the plan, discussed further below, while actual benefits can vary widely both between plans and within a single plan based on a number of factors. Plans typically are managed by a board of trustees that is responsible for investment management.

Why Do Governments Offer Them?

State and local governments offer pension benefits for a variety of reasons. Generally, compensation tends to be less than in the private sector during the working years of the employee². Generous pension benefits, as well as other post-retirement benefits, are used to offset a portion of this wage gap, allowing governments to remain competitive in attracting a skilled work force. Benefits allow beneficiaries to achieve a measure of financial security in their post-retirement years. In some cases, government workers are not eligible for Social Security benefits, making their pension all the more important to ensure they have sufficient revenue for their retirement years.

Why are State Pension Plans Particularly Important?

State pension plans often have wide-ranging effects. State plans frequently serve as umbrella plans covering employees for local governments. The majority of these local governments are required to make annual contributions to the state plans. Plan contributions are influenced by market returns, actuarial assumptions and methodology as well as the number and type of employees attributable to each governmental participant. The state often dictates required contributions for plan members, based on annual legislation, statutory requirements, or actuarial projections. These contributions can place budgetary stress on participating governments. Additionally, if the state government does not require adequate annual contributions, the unfunded liability increases, leading to what can be a considerable financial pressure to the participating governments in future years.

State pension plans that solely cover state employees can also have a notable influence on local governments within the state. As states provide substantial aid to school districts and other local governments, financial pressure on state governments, including strain stemming from increasing pension costs, can lead to reductions in intergovernmental aid to local governments.

What Can Be the Impact for Governments?

Morningstar notes that many governments have been able to manage their pension liabilities while continuing to maintain adequate fiscal solvency. However, state and local governments have been facing

2 Alicia Munnell, et al., "Comparing Compensation: State-Local Versus Private Sector Workers," Center for Retirement Research at Boston College, September 2011



considerable budgetary pressure for the past few years. Labor-related costs, including pension payments, continue to account for a significant portion of total government spending. Required pension payments have escalated in many places as plans have absorbed investment losses associated with the recession, adding further stress to a government's fiscal profile. Investment losses have also increased unfunded pension liabilities, which can create a looming fiscal obstacle that will have to be funded in future years. Failure to adequately manage pension obligations has led to a decline in overall credit quality for some entities.

Why Have Government Pensions Been in the News So Often Lately?

Governments across the nation have dealt with rising pension costs and liabilities in a variety of manners. As revenue declined in recent years with the recession, governments have been forced to reduce spending and take a hard look at any large cost drivers. This has led to many governments trying to implement changes to their pension plans. Changes typically include anything from increasing the employee contribution rate, adjusting the cost of living formula, or revising the benefit formula. In some cases, the type of pension plan is changed from a defined benefit, or DB, plan^{*3} to a defined contribution, or DC, plan^{*}, or a hybrid plan.

These measures are frequently required to be voted on by the Legislature and are often opposed by government employees. In some areas, agreement from labor unions is necessary for implementation. The combination of the impact on the government's budget coupled with, at times, vocal opposition by affected employees has led to pensions being in the news more frequently over the past few years. In very rare cases, unsustainable pension costs have led a few local governments to file for Chapter 9 bankruptcy. These cases have been heavily covered by news organizations, intensifying the focus on the issue of pensions.

How Does Accounting for Pension Plans Work?

A governmental entity, usually the employer, and often the employee make contributions to the plan that, combined with investment earnings, are expected to fund future benefits. Contributions are determined by either an actuary or through legislative and/or statutory guidelines. These contributions are then invested with the total of contributions and earnings accounting for the plan's assets. Annual gains or losses on the value of investments are incorporated into total assets, depending on the actuarial methodology, discussed in the following section. Contributions and their respective investment earnings are generally placed in trusts and are irrevocable with assets dedicated to providing pension benefits to plan members.

Upon retirement, retirees and beneficiaries are entitled to annual payouts, which are determined by plan type (defined benefit versus defined contribution).

3 Terms with an asterisk are defined in the Glossary of Terms appendix (Page 9).



In order to determine the long-term obligations of the DB plan, the municipality hires an actuary to conduct a valuation of the plan. This is typically done on an annual basis. The actuary considers a number of variables and assumptions that cover three major categories: work force, demographics, and economics. Work force data includes current and anticipated work force levels as well as current and projected age of employees. Demographic variables incorporate anticipated mortality and disability rates in addition to projected rate and age at retirement. Economic assumptions involve salary growth assumptions, the expected rate of return for investments and inflation (cost of living) adjustments over time. The actuary uses this information to come up with the expected long-term liabilities of the plan as well as an annual actuarial required contribution*, or ARC, equal to the level of annual funding necessary for projected assets to meet projected liabilities over time.

Participants of defined contribution plans are entitled to payments based on the actual contributions and investment income with no obligation by the government to make set payout amounts.

How are Pensions Analyzed From a Credit Perspective?

Morningstar analyzes pension plans based on three main pillars: plan structure, plan management, and plan funding. The discussion below is based on current pension accounting standards. As detailed later in the report, new accounting standards will lead to changes in how pensions are analyzed over the next few years.

Plan Structure

Benefit Type

Public pensions are divided into groups based on whether their benefit provisions are defined benefit, defined contribution, or hybrid.

Single-employer or Multi-employer Plan

Participants of a plan are either all related to one employer or can be from multiple employers, the latter of which is often the case with state pension plans.

Types of Multiple-employer Plans

Multiple-employer plans come in two types: cost-sharing multiple employer*, or CSME, plans and agent multiemployer plans*. CSME plans are the more common of the two types. Participants in CSME plans have a higher level of risk from other members than in the agent plans.

Tiers

Governments engaging in pension reforms often create a new tier for future and at times current employees with recently adopted pension legislation applying to the newly created tier.



Who is Covered, is it Required, and Who is Responsible for Contributions?

For multiple-employer plans it should be noted who is covered in the plan and if it is required for those entities to participate in the plan. States may require one type of entity (counties, and so on) to participate but make participation optional for other local forms of government. Additionally, states often operate plans where they make contributions on behalf of other governments (often school districts for teacher retirement plans) as well as act as the administrator for plans to which they are not liable for contributions. Analysts should determine if an entity is required to participate in the current plan, and which governmental entity is required to make payments. If possible with multiemployer plans, analysts should try to determine the percent of the total liability for which each government is responsible.

Plan Management

Pension Plan Changes

Any enacted or proposed changes to benefits or contribution levels are analyzed for their impact on the plan's overall liability as well any effect on government contributions.

Investment Portfolio

Investment portfolio analysis looks at the diversity and allocation of investments. The portfolio is examined in terms of historical returns for each asset class as well as for relative risk levels.

Investment Assumptions

The assumed investment return over the life of the plan is examined in terms of how it compares with actual historical returns, assuming the current asset allocation, as well as how it measures up against the assumed rate of rate of other plans. A lower assumed rate than actual returns would inflate the liability while a higher assumed rate would present a plan in artificially positive light.

Plan Funding/Accounting

Liability and Funding Levels

The actuarial value of assets*, or AVA; actuarial accrued liability*, or AAL; unfunded actuarial accrued liability*, or UAAL, and funded ratio* are the main aspects in analyzing a plan's financial position. Definitions and calculations for these data points are included in the Glossary of Terms appendix. The UAAL is looked at relative to the size of the population and government spending while the funded ratio allows analysts to compare pension plans effectively without regard for size disparities. A low relative UAAL and a high funded ratio are considered credit positives while the reverse would be a credit negative.

Contributions

Contributions to pension plans are important for a variety of reasons. When analyzing the strength of the pension plan, analysts look to see if current contribution levels, coupled with investment earnings,



are expected to fund the plan to a level that will be able to meet its pension obligations. Under current accounting standards, the annual required contribution, or ARC*, is a good basis for this analysis. In short, paying the ARC annually is expected to produce a fully funded pension plan. Analysts monitor if the entity is fully funding the ARC annually. How contribution levels are determined is also important. Depending on the entity, contribution levels can be set by the actuary (the ARC) or by legislative or statutory regulations. Several states have historically prohibited local entities as well as themselves from making contributions equal to the full ARC through legal constraints⁴. Any gap in payment between the ARC and actual payments results in growth in the plans' unfunded liability.

Contributions are also examined for their impact on the entity's budget. Government contributions are looked at annually as a percentage of total spending. The higher the percentage of total spending accounted for by pension payments, the less overall financial flexibility an entity has. Additionally, any sizable changes in the growth rate of contributions are also important as it indicates an increase in total pension liabilities as well as further potential budgetary pressure if rapid escalation in contribution levels continues. A final detail to consider is if employees are responsible for any portion of total contribution levels. A combination of employer and employee contributions reduces government liabilities and contributions.

Asset Valuation Method*

The actuarial value of the plan recognizes gains and losses in the market value of plan assets dependent on the asset valuation method. These returns are used to determine the AVA and compared with prior assumptions to form the AAL, UAAL, and actuarial-required funding for the upcoming year. There are two types of methods: market value* and smoothing*, with smoothing being the more common of the two.

In the long run, actual assets and liabilities for a plan remain unchanged no matter which method is used. However, the choice of the asset valuation method and length of smoothing period can have a major impact on how pensions are presented from year to year. A plan would appear stronger during a time of market growth using the market value method compared with the smoothing method, and weaker during a time of investment losses. Analysts should note which method is used as well as the length of the smoothing period, if applicable. For plans using the smoothing method, it should be noted if any large increases or decreases are expected to be incorporated over the next few years.

Actuarial Cost Method*

Analysts can use this allocation to identify how much of the total projected liability is already accrued and what portion is attributable to future work. There are currently six acceptable methods: entry age normal, frozen entry age, attained age, frozen attained age, unit credit, and aggregate. The total liability of a plan is not changed by the chosen actuarial cost method. However, similar to the actuarial valuation method, the chosen actuarial cost method can have an impact on how well-funded a plan can

4 Alicia Munnell et al., "Why Don't Some States and Localities Pay Their Required Pension Contributions?" Center for Retirement Research at Boston College, Mav 2008



appear. The entry age normal method* is the most common method and, with the implementation of the new GASB regulations discussed in the report below, will soon be the only allowable method.

How Does This Relate to Credit Quality?

Pension obligations are included under the debt and long-term liabilities analysis of a credit, which accounts for one of Morningstar's four pillars that drive the assessment for all sectors under U.S. public finance. Morningstar evaluates the magnitude of the liability and assesses the entity's ability to meet these obligations over the long term along with the accompanying projected impact on future financial flexibility. A large unfunded pension liability and/or general budgetary pressure stemming from pension payments can be credit negatives that can put downward pressure on credit quality. Morningstar, however, notes that credit quality is determined by the overall picture of the entity, with pension analysis forming one portion of the overarching evaluation.

What Will Change with the New GASB Legislation?

The Governmental Accounting Standards Board, or GASB, which establishes government accounting standards, approved new accounting and reporting standards for state and local government pension plans in June 2012 under GASB Statements Number 67 and 68 with the goal of improving the accounting and financial reporting for affected plans. GASB standards are nonbinding but compliance is required for governments to receive a clean audit. The new pension standards become effective for state and local pension plans in fiscal years beginning after June 15, 2013 and for employers in fiscal years beginning after June 15, 2014. While it will be a few years until all applicable governments fully incorporate these standards, some areas will likely move toward early adoption and compliance.

Overall, the new standards aim to focus pension disclosure on liabilities, as opposed to the ARC. For defined benefit plans, disclosure of the ARC will no longer be required. Instead, annual change in the net pension liability*, or NPL, will serve as the primary pension expense reported. Analysts will need to judge movement of the NPL to determine if an entity is making adequate contributions to the plan.

DB plans will be required to report an NPL on their balance sheets. This will, in many cases, cause a drastic change in the balance sheet presentation, particularly in terms of total liabilities. This number is expected to be relatively volatile as asset smoothing will not be allowed for accounting purposes. The NPL will be measured at market value with annual changes immediately recognized. Despite its expected volatility, the implementation of the NPL will allow for investors and constituents to gain a clearer picture of actual projected liabilities as this data is currently only disclosed in the financial notes section of a government's audit. Cost-sharing, multiemployer plans will record a liability and expense equal to their proportionate share of the total plan liability and expenses, allowing analysts to accurately incorporate pension liabilities into analysis of credits that participate in a CSME plan.



Additionally, some changes are being made to allowable accounting methods. As mentioned above, smoothing will no longer be allowable for accounting measurements but it will still be allowed for funding purposes. Actuarial cost methods will be limited solely to the entry age normal method. Additionally, liabilities will be required to be allocated as a level percentage of payroll and will no longer be able to be allocated as a level dollar amount. The discount rate of liabilities will change for accounting purposes, but will remain unchanged for funding calculations. For accounting purposes, the allowable assumed discount rate will depend on whether the plan's net position is projected to be sufficient to pay benefits of current employees and retirees. If that condition is met, the regular discount rate is able to be used. An index rate on tax-exempt 20-year AA or higher rated municipal bonds will be used to the extent projected assets are not anticipated to meet projected liabilities. Overall, these accounting changes will cause a disconnect between pension funding and accounting while leading to greater levels of volatility for pension accounting measures.

In aggregate, the funded level of pension plans is expected to decrease because of the accounting changes. A recent report by the Center for Retirement Research at Boston College indicated the aggregate-funded level for 126 large pension plans it sampled would decline from 76% based on fiscal 2010 levels to a low 57%⁵. This decline in funding, coupled with the emphasis on the NPL, will likely increase the level of debate regarding pension benefits and their impact on governments.

5 Munnell, Alicia, et al., "How Would GASB Proposals Affect State and Local Pension Reporting?" Center for Retirement Research at Boston College, November 2011

What are Some Red Flags I Should Look for to Determine a Stressed Pension Plan?

Despite the recent increase in news coverage of state and local pension plans, the majority of pension plans currently remain adequately managed. However, several pension systems are experiencing considerable pressure. These pressures typically build over time and can often be identified years before substantial stress is placed on the applicable government. Red flags that indicate the solvency of a pension plan is deteriorating include a substantial unfunded pension liability, a low and/or declining funded ratio, annual contributions less than the ARC, rapid increases in annual contributions, and pension costs accounting for a significant portion of general government spending.





Glossary

Actuarial Accrued Liability (AAL)

The present value of future benefits earned by employees to date.

Actuarial Cost Method

The actuarial cost method is the process used by the actuary to allocate the projected liabilities of the plan to prior years (the actuarial accrued liability), the current year (the normal cost), and future years.

Actuarial Value of Assets (AVA)

The actuarial value of the plan's assets. This amount incorporates investment gains and losses dependent upon the asset valuation method.

Agent Multiple-Employer Plan

In agent multiemployer plans, assets are pooled but legally restricted to pay pension obligations of their specific employer.

Annual Required Contribution (ARC)

The ARC is determined by the actuary during the valuation of the plan and equals the amount that would need to be paid during the current fiscal year to fund benefits earned in that year (the normal cost) plus a portion of any unfunded liability from past years.

Asset Valuation Method

The actuarial value of the plan recognizes gains and losses in the market value of plan assets dependent on the asset valuation method.

Cost Sharing Multiple Employer Plan (CSME)

In CSME plans, the participating employers pool their obligations and assets. Assets of the plan can be used to pay pension obligations of any participating employer.

Defined Benefit Plan (DB)

For defined benefit plans, pension payments operate as an annuity with each employee entitled to a specific annual payment based on a benefit formula. These formulas generally incorporate years of service, salary, and a multiplier variable. Specific benefit formulas vary between plans and often within plans dependent on an employee's start date and/or employee classification (public safety, general, management, and so on). Defined benefit payments can be constant for the life of the payment, adjusted annually for cost of living, or adjusted occasionally for cost of living increases as seen fit by the overseeing party. The government is responsible for funding this liability no matter what return it achieves on its investments.

Defined Contribution Plan (DC)

Defined contribution plans are similar to 401(k)s found in the private sector. The government is obligated to contribute a certain amount annually until retirement while the actual benefit is subject to market returns. The government has no liability to make up for investment losses.

Entry Age Normal Actuarial Cost Method

Entry age normal allocates the cost of benefits from the time an employee is hired (the entry age) to the date of expected retirement either as a level dollar amount or as a percentage of payroll.

Funded Ratio

The percentage of the AAL that is currently funded through the AVA. This is calculated by dividing AVA by the UAAL.

Market Value Method of Asset Valuation

Under the market value method, plans recognize the full amount of actual gains or losses at the end of each fiscal year.

Net Pension Liability (NPL)

The NPL is the total pension liability (actuarially determined present value of future benefits that are due to work already completed by plan participants) less the plan net position (plan assets set aside in a trust or restricted for benefit payments).

Smoothing Method of Asset Valuation

Smoothing incorporates any deviation between expected returns and actual results over a period of years. Assuming a five-year smoothing period, which is common, 20% of any variation between expected and actual results for a given year would be incorporated into the AVA for each of the next five years.

Unfunded Actuarial Accrued Liability

The difference between the AVA and the AAL.

