ROSE INSTITUTE
OF STATE AND LOCAL GOVERNMENT
CLAREMONT MCKENNA COLLEGE

Saving the Golden State:

California's Pension Problems and the Solutions We Need

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A Senior Thesis by a Rose Institute Student

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TABLE OF CONTENTS

1 Introduction

Many people hear the phrase “pension crisis” and immediately think of the largest and most ubiquitous retirement system in the United States: Social Security. Less well-known but equally dire are the challenges that state and local government pension funds face. Due to investment losses and overly optimistic growth assumptions, municipal pension funds are collectively underfunded by more than $1 trillion, even by conservative estimates. California, home to the two largest public pension funds in the nation, is by no means immune to the problem. The state’s Public Employees’ Retirement Fund and State Teachers’ Retirement Fund each have only enough funds to cover about two-thirds of their future liabilities, and together they face a funding gap of close to $170 billion. The impacts of underfunding are real: as liabilities increase, California and its municipalities have had to devote more and more resources to retirement benefits at the expense of other services. Some municipalities have been driven to the breaking point and service delivery insolvency.

This thesis focuses specifically on California's pension problems and the solutions the Golden State needs. A variety of factors have led to California's current pension woes: unaffordable benefits granted during short-term stock market booms, the restrictive California Rule, which has protected these benefits from any reductions, weak accounting rules, over-reliance on investment returns, and the classic time-inconsistency problem. After analyzing these factors, this thesis presents the policy solutions the state needs in order to ensure its future solvency.

2 The Mechanics of Pension Systems

Pension Plan Basics

Retirement pensions can be structured in two general ways: as defined benefit (DB) or defined contribution (DC) plans. Defined benefit plans provide employees with regular, defined payments after retirement, usually a portion of their final salary. The exact percentage varies according to the benefit formula and number of years worked. For example, an employee enrolled in a defined benefit plan might accrue an annual benefit commitment of two percent of her final salary for each year she worked. If she worked 30 years and retired making $100,000, then her annual pension benefit would be $60,000. Benefit formulas vary from municipality to municipality and can be set by statute, collective bargaining agreements, or a combination of the two. Once an employee begins working, his or her retirement benefits are "vested"; they cannot be decreased, and their payment is guaranteed by the municipality and, by extension, the taxpayer. In some states and municipalities, vesting only applies to benefits accrued from work already completed. In others, such as California, vesting applies to all benefits, both earned and not yet earned. In such states, once a public employee is hired, his retirement benefit formula can never be reduced.

In contrast to defined benefit plans, defined contribution plans do not promise payouts after retirement. Instead, the state or municipality makes regular payments into a retirement account during the employee's career. These payments are usually a percentage of the employee's salary, and the employee is often required to contribute a similar percentage. As soon as the employer has made its required contribution to the

account, the employer's financial obligation ends. Investment decisions are the responsibility of employees, though many defined contribution systems offer investment plans that employees may opt into. Defined contribution plans have grown in popularity recently, but, defined benefit plans are far and away the industry standard for public retirement systems.

A third type of pension plan combines features from both defined benefit and defined contribution plans. Hybrid plans have more modest benefit accrual formulas than traditional defined benefit plans, but they make up for this lower benefit by offering a defined contribution component as well. Hybrid pension plans split the risk of lower than anticipated asset growth between the retiree and the taxpayer. If a retiree loses most of his retirement funds in a market crash, he can still fall back on the defined benefit portion of his retirement plan. Alternatively, if markets excel, the retiree directly benefits from the growth of his defined contribution portfolio. In this way, hybrid plans are compromise between the security of a defined-benefit plan and the risk and reward of a defined contribution plan.

Funding Pension Systems

By definition, all defined contribution plans are pre-funded. Theoretically, defined benefit plans should be as well. Employers and employees contribute a percentage of current compensation to the defined benefit pension fund each year. These contributions form the investment base from which the municipality hopes to earn the remaining funds needed to cover its future payments to retirees. If investment returns fall short of expectations, then contributions must increase to keep the system fully funded. In all states and municipalities, employers, not employees, must cover the difference when

investment returns are lower than expected. The total amount of money that the employer must contribute each year is referred to as the Annual Required Contribution (ARC).

Setting contribution rates for employers and employees is a difficult process. The first step is to project the size and duration of future benefit payments to current employees, many of whom will not retire for another 30 years. Actuaries, financial analysts who specialize in assessing future liabilities, must estimate a plethora of different variables that all affect the total size of future benefits. The two most important of these variables are life expectancy and final salary.[1] Life expectancy projections indicate the average number of years each current employee will spend in retirement. Longer than anticipated retirement periods are extraordinarily expensive, so it is critical for actuaries to estimate life expectancy as precisely as possible, though the long time horizon makes this difficult. Similarly, employee salaries are a chief variable in overall cost calculations. Labor market forces can change dramatically during a thirty-year employment window, and actuaries must build a model that predicts the average timeline and size of future raises. Higher salaries increase the absolute amount of money that employees and employers contribute to the system, but they also increase the size of post-employment benefits. If salary increases occur disproportionately at the end of employees' careers, then contributions may not be sufficient to cover the additional retirement pay.

After building a model to project future retirement costs for current employees, actuaries must determine how much money needs to set aside each year to cover those future liabilities. Due to the time value of money, the sum that has to be set aside is

[1] Steven Malanga (*City Journal* Senior Editor) in discussion with the author, April 2014.

significantly lower than the sum of the future payouts. To convert future liabilities to present terms, actuaries use the mathematical process of discounting. Discounting can be thought of as the reverse of compounding interest. The larger the discount rate, the larger the difference between the amount that will ultimately be paid out to retirees and the amount of money that must be set aside in advance. Even a small modification to the discount rate can substantially change the amount that employers and employees must contribute. For example, a $3 billion liability due in 30 years has a present value of $321 million if discounted at 8 percent per year. If discounted at only 6 percent, the present value grows to $553 million. The $230 million difference between these figures demonstrates the importance of an accurate discount rate.

Most public pension funds discount future liabilities at their target investment return rate. Linking the discount rate and target investment return rate is one of the most controversial practices in public pension accounting. In theory, the practice makes sense: if a pension fund expects to earn a certain percentage on its assets, then discounting future liabilities at that percentage allows employers and employees to contribute the minimum amount necessary to fully fund the system. Discounting at a lower percentage than the target return rate would require employers and employees to contribute to the fund at higher rates. Critics of the practice, however, point out that discounting liabilities at the target investment return rate creates a risk mismatch.[2] The surety of future liabilities is close to 100 percent. Barring a catastrophic event, current employees will retire, and when they do, the state or municipality must begin paying benefits. By

[2] Joe Nation, "Pension Math: How California's Retirement Spending is Squeezing the State Budget," *Stanford Institute for Economic Policy Research* (Stanford University, 2011), 11.

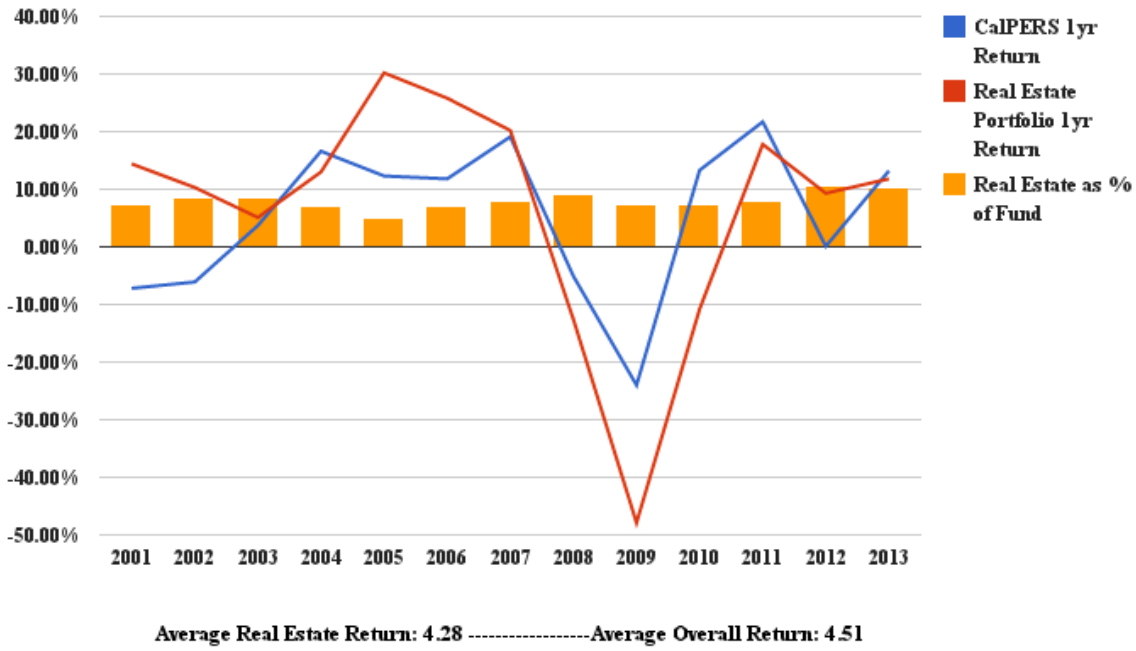
contrast, asset growth is by no means a sure thing. Low target rates of return are achievable to a relatively high degree of certainty if fund managers invest in safe financial products such as high grade bonds, but achieving higher target rates of return requires much riskier investments such as private equity and real estate. Higher portfolio risk exposure reduces the likelihood that the fund will actually achieve its target investment rate, even over the long term. Recognizing the mismatch between the surety of liabilities and the surety of asset growth, Congress passed the Employee Retirement Income Security Act (ERISA), which, among other things, required private sector pension funds to discount future liabilities at the market rate for high-grade corporate bonds, not the fund's target investment return rate. Regardless of how much risk private funds take on with their investment portfolios, they must discount future liabilities at the relatively risk-free rate of a corporate bond. While ERISA governs the private sector, no corresponding regulation exists for the public sector, so state and municipal pension funds discount their liabilities at their target investment return rates.[3]

The 2008 financial crisis exposed the perils of conflating discount rates with target investment return rates. In the 2000s, California's public employee pension system, CalPERS, assumed an aggressive 7.75 percent annual rate of return, hoping to pay for three of every four dollars of future benefits with investment returns.[4] Like most public pension funds, it discounted its liabilities at its target investment return rate. Early in the decade, CalPERS experienced investment setbacks from the tech crash and the 9/11 shocks to the stock market. To offset these losses and push overall returns closer to the

[3] Nation, "Pension Math," 15.
[4] "Overview of GASB 45 & California Employers' Retiree Benefit Trust Fund" (CalPERS, 2012). <https://www.calpers.ca.gov/index.jsp?bc=/employer/retiree-ben-trust/overview.xml>

target 7.75 percent, CalPERS turned to the real estate market. When real estate yields fell in 2003 due to an influx of capital, CalPERS sold off its safe, core real estate investments and reinvested in higher risk real estate derivatives and speculative, non-income producing assets.[5] To finance these higher risk assets, which cost about twice as much as the cash raised from the sale of its core assets, CalPERS substantially increased its

Figure 1: CalPERS Real Estate Portfolio Performance vs. Overall Fund, 2001-2013



Average Real Estate Return: 4.28 ----------Average Overall Return: 4.51

leverage. In fact, the Loan to Value ratio of CalPERS's real estate portfolio rose by a factor of five between December 2000 and December 2007.[6] When the real estate market started heating up mid-decade, CalPERS profited heavily. Emboldened by double digit returns, CalPERS's investment managers poured money into the real estate portfolio,

[5] "Real Estate Program Review," *CalPERS Investment Office* (CalPERS, 2010). https://web.archive.org/web/20130204041424/http://www.calpers.ca.gov/eip-docs/about/board-cal-agenda/agendas/invest/201004/item04a-01.pdf

[6] *Ibid.*

increasing it from five to eight percent of the total fund between June 2005 and June 2007.[7] Even as the market was melting down, CalPERS increased its real estate holdings to 9.2 percent of the fund by June 2008.[8] The ensuing losses were staggering. As Figure 1 shows, CalPERS's real estate investments fell 12.6 percent in FY 2008, 47.9 percent in FY 2009, and 10.8 percent in 2010. Despite rebounding over the last three years, the fund's real estate portfolio has failed to achieve the high returns dictated by the target return rate. From June 2000 to June 2013, CalPERS's real estate assets returned a geometric average of 4.28 percent per year, 23 basis points less than the fund's overall rate of return of 4.51 percent.[9] In hindsight, the fund's foray into high risk, leveraged real estate investments backfired: these assets pushed the fund away from, rather than towards, the target 7.75 percent return rate. Unfortunately, CalPERS's risk-taking is the rule rather than the exception among public pension funds. A study by Rob Bauer and Aleksandar Andonov of Maastricht University found that "over the last 20 years U.S. public funds uniquely increased their allocation to riskier investment strategies in order to maintain high discount rates and present lower liability valuations" on their books.[10]

If a pension fund chronically underperforms and fails to meet its target rate of return, then the fund's discounted liabilities will exceed its current assets, and the plan will be underfunded. If a fund's managers decide the target investment return rate (and therefore the discount rate) is too high and needs to be revised downward, the

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[7] "CalPERS Comprehensive Annual Financial Report, 2005" (CalPERS, 2005), 16. CalPERS CAFRs, 2006-2007, 16.
[8] CalPERS CAFR, 2008, 20.
[9] CalPERS CAFRs, 2000-2013.
[10] Aleksandar Andonov, and Bauer, Rob, "Pension Fund Asset Allocation and Liability Discount Rates: Camouflage and Reckless Risk Taking by U.S. Public Plans?" (Maastricht University, 2013), 5.

underfunding will be exacerbated. Expressed in dollar amounts, the Unfunded Actuarial Accrued Liability (UAAL) of a fund refers to the difference between the discounted liabilities and the current market value of assets. A more useful metric than the UAAL for measuring the health of a fund is the funded ratio, which is calculated by dividing the current market value of assets by the discounted liabilities. Generally, a healthy fund will have at least an 80 percent funded ratio.[11] When a public pension fund accrues an unfunded liability, the employer supplements its regular funding contribution with an additional payment to amortize the UAAL. A municipality's timeline for amortizing the UAAL is important: the longer the period, the lower the additional costs upfront, but the more that the burden is placed on future taxpayers. In some cases, municipalities will amortize a UAAL over 30 or more years, greatly increasing the cost and pushing the burden of current employees well into the next generation.

Governing Pension Systems

Because states are sovereign entities, federal regulations that apply to the private sector, such as ERISA, do not apply to state or municipal pension plans.[12] States and municipalities have broad leeway to govern and operate their pension funds as they see fit. Every public pension system has a board of governors, but these boards vary significantly in size and composition. According to the most recent data from the Center for Retirement Research at Boston College, the average public pension system board has ten members, with six of the ten board members participating in the plan.[13] More than a

[11] Nation, "Pension Math," 17.
[12] Malanga in discussion with the author, April 2014.
[13] "Public Plans Database," *Center for Retirement Research* (Boston College). Accessed March 15, 2014.

third of pension systems (36 percent) have investment councils separate from their board of governors while 64 percent place all control under the board of governors.[14]

There is some evidence that a pension system's governance structure correlates with its overall health. Applying two-factor correlation analysis to the Center for Retirement Research's Public Pension Database indicates that having a separate investment council correlates moderately (0.192 coefficient) with a higher funded ratio. Indeed, in 2009, the most recent year for which data on independent investment councils is available, the average funded ratio for pension systems with separate investment councils was 82.1 percent compared to 76.2 percent for funds where the board of governors manages investments.[15] Though correlation does not necessarily indicate causation, it is plausible that having a separate investment council leads to better investment decisions and a healthier fund.

Public Pension Accounting: Tricks and Gimmicks

Because there are no federal regulations governing public pension systems, states and municipalities have broad leeway when managing their plans. In many cases, this leeway has allowed political considerations to influence pension accounting and management. As *City Journal*'s Senior Editor Steven Malanga put it:

> Somewhere along the line, elected officials learned that they could fiddle with these systems for their own purposes. So they would promise benefits or face a deficit crisis, and then they would find ways to change the math of the system. If you had a deficit and you wanted to save money, your actuaries might say "we could change the number of years that the average

[14] *Ibid.*
[15] *Ibid.*

> employee will live after retirement." And that's exactly what Washington State did for a few years. Or you can be like the State of New Jersey, where the legislature in 1992 wanted to save $750 million in pension contributions, so they passed a bill increasing the projected investment returns every year for the next 30 years from 7 percent to 8.5 percent.[16]

Accounting tricks such as changing life expectancy assumptions or increasing investment return expectations make pension funds look healthier, but they do nothing to solve underlying funding problems. Chuck Reed, Mayor of San Jose, California and a longtime critic of California's underfunded pension systems, summed up the problem with pension accounting tricks: "I have learned that you cannot reduce [pension] costs with changes in assumptions. In economics, you're in a hole, you assume a ladder and you're out. You can do that with pensions, but you don't get out. You just kick the can down the road a little bit."[17]

In addition to manipulating actuarial assumptions, many state and local governments treat pension liabilities differently than other forms of debt in order to minimize their reported debt profile and to avoid constitutional limitations on borrowing. Many states have constitutional or statutory restrictions that require municipalities to seek voter approval before taking on new debt. In California, Section 18 of article XVI of the state constitution states:

> No county, city, town, township, board of education, or school district, shall incur any indebtedness or liability in any manner or for any purpose exceeding in any year the income and revenue provided for such year, without the assent of two-thirds of the voters of the public entity voting at an election to be held for that purpose . . .; nor unless before or at the time

[16] Malanga in discussion with the author, April 2014.
[17] Chuck Reed (Mayor of San Jose, CA) in discussion with the author, April 2014.

> of incurring such indebtedness provision shall be made for the collection of an annual tax sufficient to pay the interest on such indebtedness as it falls due, and to provide for a sinking fund for the payment of the principal thereof, on or before maturity, which shall not exceed forty years from the time of contracting the indebtedness.[18]

Restrictions such as California's are meant to enhance fiscal responsibility and limit municipalities' deficit spending. Local voters must approve all new debt issuances by a two-thirds vote, and these new debts must be amortized over at most a 40-year period. One of the main ways to get around this rule, however, is with unfunded pension liabilities. Because pension liabilities are created by vested benefit formulas rather than by discretionary bond issuances, governments do not consider them to be subject to constitutional limitations on debt.[19] As a result, pension systems have been states' and municipalities' preferred mechanism for deficit spending since the early 1990s.[20]

Some states and municipalities outright skipped or only partially paid their annual required contributions (normal contribution plus UAAL amortization supplement). Indeed, the New Jersey Teachers' Pension and Annuity Fund (TPAF) paid none of its ARC between 2003 and 2005.[21] New Jersey was not alone in its delinquency: between 2001 and 2010, only 30 percent of public pension funds paid their ARCs in full every year.[22] Despite strong annual investment returns during the middle part of the decade, the

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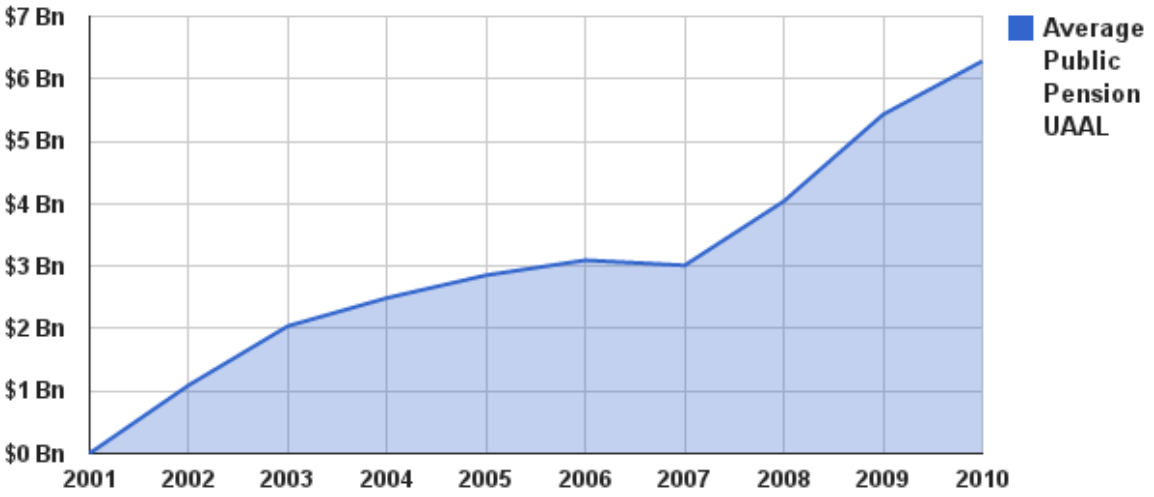
[18] "Constitution of the State of California," *Legislative Counsel of the State of California.* Accessed April 10, 2014.
[19] Robin Harris, "California Constitutional Debt Limits and Municipal Lease Financing," (California League of Cities, 2002), 3. <http://www.cacities.org/getattachment/08d8e6e0-6fb6-48b0-9b36-9f3dfaf6e3b4/10-2002-Annual;-Harris-Debt-Limit.aspx>.
[20] Malanga in discussion with the author, April 2014.
[21] "Public Plans Database," *Center for Retirement Research* (Boston College).
[22] "Public Plans Database," *Center for Retirement Research* (Boston College).

average public pension fund's unfunded liability grew from nearly zero in 2001 to more than $6.2 billion in 2010, as shown in Figure 2.[23]

Figure 2: Average Unfunded Accrued Liability, 2001-2010



To minimize the effect of investment losses on their books, many public pensions also engage in asset smoothing, another accounting trick. The unfunded liability amortization portion of an employer's annual required contribution (ARC) fluctuates year to year depending on the size of the UAAL. To mitigate spikes in the ARC, pension funds will smooth changes in asset values over several years. CalPERS, for example, realized only 1/15th of its losses from FY 2009 when calculating its ARC for that year.[24] The stated justification for asset smoothing is to prevent major fluctuations in the employer contribution rates so that employers are not caught off guard by a sudden change in the stock market. Assuming there are enough "good years" (years where returns exceed the target rate of return) to bring the geometric average rate of return back up to the target rate, asset smoothing only causes underfunding in the short term, not the

[23] *Ibid.*
[24] Nation, "Pension Math," 15.

long term. It does introduce extra risk, however, precisely because of the chance that assets may not rebound from previous years' losses. If assets do not rebound sufficiently, then the fund will eventually have to increase its ARC by much more than it would have had it done so immediately when the losses occurred.[25]

Some critics of asset smoothing argue that its only purpose in public pension accounting is to camouflage investment losses and unfunded liabilities. There is no doubt that after large market losses, smoothing does make pension funds look healthier than they are. In its latest annual report on the one hundred largest public pension plans, the actuarial firm Milliman found that plans reported smoothed asset values of $2.73 trillion while really only holding $2.58 trillion.[26] In total, asset smoothing allowed funds to report unfunded liabilities in 2013 that were $150 billion or 12.6 percent lower than reality.[27] There is some evidence that this camouflaging effect may be a large part of pension funds' motivation for asset smoothing. In a 2013 study, Aleksandar Andonov and Rob Bauer of Maastricht University found that the riskier a fund's investment portfolio, and therefore the more volatile its returns, the more likely it is to smooth its asset values.[28] Furthermore, critics of asset smoothing point out that, because sovereign state and local governments do not legally have to contribute their ARCs each year (and in many cases, they do not), stabilizing employer contribution rates is not necessary like it is in the private sector. These critics note that it is much easier politically for a fund to

[25] Mark Randall and Newton, Joe, "Texas Municipal Retirement System Board Meeting: Asset Smoothing," (Gabriel Roeder Smith & Co, 2009), 33. <http://www.tmrs.org/down/GRS_asset_smoothing.pdf>.
[26] Rebecaa A. Sielman, "2013 Public Pension Funding System," (Milliman, 2013), 1. <http://www.milliman.com/uploadedFiles/Solutions/Products/public-pension-funding-study-2013.pdf>.
[27] *Ibid.*
[28] Andonov and Bauer, "Risk Taking by U.S. Public Plans," 4-5.

report a lower UAAL and ARC than to report a higher, more accurate ARC and only pay part of it.

The Role of the GASB and Rating Agencies

Pension accounting gimmicks in the public sector are largely the product of a loose regulatory environment. The Governmental Accounting Standards Board (GASB) is a non-governmental body that sets the generally accepted accounting principles (GAAP) for state and local governments, including their pension funds. As a private organization, GASB does not have the authority to enforce its rules, but many states have laws requiring GASB compliance. GASB estimates that more than two thirds of the 31,221 largest state and local government entities follow the Board's accounting principles, whether by law or voluntarily.[29] California law requires the State Controller to set uniform accounting procedures for counties, and the Controller borrows heavily from GASB statements when setting its procedures.[30] Most California cities also comply with GASB guidelines.

Three GASB rules, or the lack thereof, drive the lax regulatory environment for public pensions. First, despite tightening regulations in 2012, GASB still allows governments to discount most of their liabilities at whatever long run investment return

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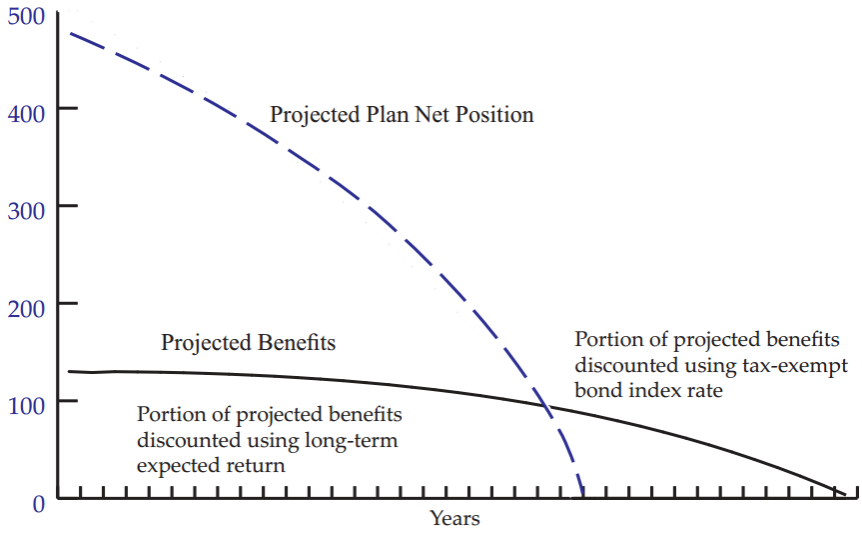
[29] "Research Brief: State and Local Government Use of Generally Accepted Accounting Principles for General Purpose External Financial Reporting," (Governmental Accounting Standards Board, 2008), 7. <http://gasb.org/cs/ContentServer?c=Document_C&pagename=GASB/Document_C/GASBDocumentPage&cid=1176156726669>.

[30] John Chiang, "Accounting Standards and Procedures for Counties," (California State Controller's Office, 2013), i. <http://www.sco.ca.gov/files-ard-local/locrep/manual_cntyman.pdf>.

rate they choose, typically 7.5 to 8 percent.[31] That said, GASB's new rules, which are set to take effect in June 2014, require that some liabilities for underfunded plans be discounted at the market rate for a high-grade municipal bond rather than the fund's target investment return rate. Specifically, if a municipality foresees a crossover point whereupon projected future payments will exceed the projected future assets held by the fund, all liabilities after the crossover point must be discounted at a the rate of return for a high-grade municipal bond.[32] The basis for this distinction is that benefits payments after

Figure 3: Crossover Point



Source: Gabriel Roeder Smith & Co

the crossover point will have to be paid from general revenues since fund assets will have been depleted.[33] Plans with lower funded ratios have a closer crossover point and thus

[31] "Public Plans Database," *Center for Retirement Research* (Boston College).
[32] Paul Zorn and Rizzo, James, "The GASB's Exposure Drafts on Pension Accounting and Financial Reporting," (Gabriel Roeder Smith & Co, 2011), 4. <http://leg.mt.gov/content/Publications/fiscal/Pensions/GASB.pdf>.
[33] John Sugden, "Standard & Poor's Approach to Pension Liabilities in Light of GASB 67 and 68," (S&P Ratings Services, 2013), 2. <http://www.standardandpoors.com/spf/upload/Events_US/US_PF_Event_Webcast72913Article2.pdf>.

will have to discount a higher proportion of their liabilities at the relatively risk-free rate. Though these new regulations are a step in the right direction, it is not clear yet how much they will impact pension funds. Underfunded pension systems can avoid projecting a crossover by simply setting up a UAAL amortization plan, which they may or may not follow. Moreover, the new regulations do not solve the problem of underfunding caused by overly optimistic return assumptions.

Second, GASB rules still allow governments to use smoothed asset valuations to calculate annual employer contributions. The 2012 rule changes require funds to report the market value of assets in their financial statements; however, funds can still use up to five years of smoothing when calculating employer ARCs.[34] Finally and most significantly, there are no federal or GASB regulations requiring municipal governments actually to contribute to their pension systems at all. Private sector pension plans, by contrast, must meet each year's ARC or face serious financial or criminal sanctions.[35]

After the GASB, credit rating agencies exert the most influence over public pension accounting. Of the major rating agencies, Moody's Corporation has taken the most aggressive approach to improving pension financial reporting. In April 2013, Moody's announced a new set of criteria by which it would evaluate all pension systems' assets and liabilities. First, and most significantly, Moody's announced it would discount all pension liabilities using a high-grade long-term taxable bond index.[36] In April 2013,

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[34] Michael Moran, "A 'Sea Change' in Public Pension Reporting on the Horizon," (Goldman Sachs Asset Management, 2012), 3. <http://www.nasra.org/Files/Topical%20Reports/GASB/GS1212.pdf>.
[35] Nation, "Pension Math," 15.
[36] Marcia Van Wagner and Blake, Timothy, "Adjustments to US State and Local Government Reported Pension Data, (Moody's Investors Service, 2013), 8. <http://gfoa.org/downloads/MoodysAdjustmentsApril2013.pdf>.

that index rate was 5.47 percent, significantly lower than the 7.5 or 8 percent rate that most funds use to discount their assets.[37] Second, Moody's eliminated all smoothing measures, instead opting to only consider the market value of assets.[38] Third, Moody's assumed that all UAALs would be amortized over a twenty year period.[39] Together, these changes increased Moody's calculated unfunded liability for state and local governments to $1.88 trillion.[40] In making these changes, Moody's stated purpose was not to impose new funding standards on municipalities but rather to provide uniform information with which investors could easily understand and compare the health of various pension funds.[41] Though the new criteria would greatly reduce the calculated funded ratios of many pension plans, Moody's made it clear that "less than 2% of the total population of local general obligation (GO) and equivalent and related ratings will be placed under review for possible downgrade as a result of adopting the adjustments."[42] Like the GASB, rating agencies have no formal authority to force states and municipalities to fund their plans according to the rating agencies' actuarial analysis, but they do have some influence through bond ratings. A rating downgrade, such as the one Moody's announced in March 2014 for Chicago, almost always results in higher borrowing costs for municipalities.[43]

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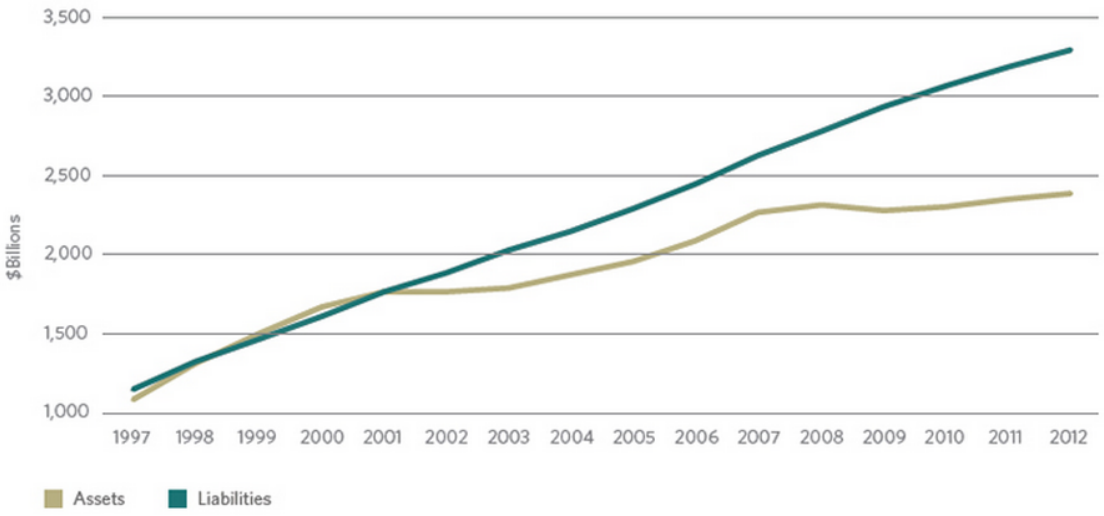
[37] Hazel Bradford, "Public pension funds face scrutiny from accounting updates," (Pensions & Investments Online, 2013). <http://www.pionline.com/article/20130401/PRINT/304019998/public-pension-funds-face-scrutiny-from-accounting-updates>.
[38] Wagner and Blake, "Adjustments to Reported Pension Data," 1.
[39] *Ibid.*
[40] *Ibid,* 10-11.
[41] *Ibid,* 2.
[42] *Ibid,* 6.
[43] Matthew Butler, "Moody's downgrades Chicago, IL to Baa1 from A3, affecting $8.3 billion of GO and sales tax debt," (Moody's Investors Service, 2014).

Though pension systems have been susceptible to weak accounting and political manipulations, there is some evidence that things are changing. The 2008 financial crisis brought to light the dire state of many public pension funds, and since then, some have taken steps to improve their fiscal health. The National Association of State Retirement

Figure 4: State and Local Pension Funding Gap



Source: The Pew Charitable Trusts

Administrators's (NASRA) Public Fund Survey found that more than half of the 126 pension plans surveyed had reduced their investment return assumptions since 2008, bringing the average assumption down to 7.72 percent (though the median was still 8 percent).[44] These changes will drive up employer contribution rates, but they will also

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<https://www.moodys.com/research/Moodys-downgrades-Chicago-IL-to-Baa1-from-A3-affecting-83--PR_294237>.

[44] "Public Pension Plan Investment Return Assumptions," (National Asasociation of State Retirement Administrators, 2014), 3. <http://www.nasra.org/files/Issue%20Briefs/NASRAInvReturnAssumptBrief.pdf>.

help pension plans ensure that they meet their liabilities and close the enormous funding gap that has developed over the last decade (depicted in Figure 4).[45]

[45] Mark Wolff, "The Fiscal Health of State Pension Plans: Funding Gap Continues to Grow," (Pew Charitable Trusts, 2014). <http://www.pewstates.org/research/fact-sheets/the-fiscal-health-of-state-pension-plans-funding-gap-continues-to-grow-85899542910>.

3 Digging a Hole: Where California Went Wrong

The Development of California's Public Pension Systems

California's first state employee retirement fund dates back to 1913 and the governorship of Hiram Johnson. Assembly Bill 1236 established the Public School Teachers' Retirement Salary Fund (now called CalSTRS) for the purpose of providing "teachers with a secure financial future during their retirement years and as an incentive to retain a professional staff in the field of education."[46] From the very beginning, CalSTRS had an unfunded liability. When enacted, the CalSTRS plan granted retroactive defined retirement benefits to teachers for work performed before 1913, so by 1919, the plan was already underfunded by $26 million.[47] By 1964, that unfunded liability had grown to $2.1 billion, and the state was strongly considering relaxing its restrictions on the fund's investment portfolio to try and make up the difference in the stock market.[48] Separately, in 1932, the California Public Employees' Retirement System (CalPERS) was established to provide a pension system for state workers other than teachers. Soon after, in 1937, CalPERS was expanded to allow local municipalities and agencies to set up retirement plans under the CalPERS umbrella.[49]

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[46] "The History of CalSTRS Investment Portfolio," (California Teachers Association, 2011), <http://www.cta.org/~/media/Documents/PDFs/Issues%20and%20Action%20PDFs/Retirement/History%20of%20CalSTRS%20Inv%20%20Portfolio.pdf?dmc=1&ts=20140426T1741174932>.

[47] *Ibid.*

[48] *Ibid.*

[49] "Public Pensions for Retirement Security," (California Little Hoover Commission, 2011), 4, <http://www.lhc.ca.gov/studies/204/Report204.pdf>.

The original, Progressive Era rationale for establishing a state employee retirement fund was not to reward career public servants but rather to encourage older workers to retire. In a 1928 report, the state commission that preceded the establishment of CalPERS found that many retirement age workers were unproductive and inefficient. They earned large salaries, but many would just "go through the motions" at work to stay on payroll.[50] The commission noted that because older workers remained on payroll for so long, "[t]o a very considerable extent, the state pays for a retirement system even though none is established."[51] The commission made it clear that "[a] sound retirement system is not charity, doled out to the aged employee. It is an orderly method of providing for his retirement at the end of his normal service-life, using a capital fund which has been built up during his active service with this very eventuality in prospect."[52] Given the goal of pushing unproductive workers towards retirement, the commission emphasized that no pension fund should "encourage or permit the granting of any retirement allowance to an able-bodied person in middle life who through long experience may have just reached the peak of his value to the state."[53] To ensure that only unproductive workers would be incentivized to retire, the commission recommended that only workers over the age of 60 be allowed to retire with a pension, with all workers over 70 required to retire.[54]

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[50] "Report of the Commission on Pensions of State Employees," (California State Legislature, 1932), 9, <http://www.pebc.ca.gov/images/files/12-31-28%20Report%20of%20the%20Commission%20on%20Pensions%20of%20State%20Employees.pdf>.
[51] "1932 Report of the Commission on Pensions," 9.
[52] *Ibid.*
[53] *Ibid,* 11.
[54] *Ibid.*

As the 20th century progressed, CalPERS and CalSTRS's purpose changed considerably. Instead of being a means for encouraging unproductive employees to retire, public pensions became a reward owed to public employees for their careers in government. Due to changes in life expectancy, more and more retirees were able-bodied when they retired, and retirements stretched for decades rather than a few years. As a result, CalPERS and CalSTRS, which were originally intended to push unproductive workers off government payrolls, are now incentivizing experienced employees to end their careers while they are still at prime productivity and while they still have decades to live.[55] On top of this, benefits have become much more generous. In a 2011 report entitled "Public Pensions for Retirement Security," the Little Hoover Commission noted that the average state worker retiring at 65 around the time of CalPERS's creation could expect to receive about half of her final salary each year after retiring.[56] Now, however, "a 30-year state worker retiring at age 63 can expect to receive 75 percent of the single highest paid year – every year for the rest of his or her life."[57] In short, both the duration and size of California's public pension benefits have dramatically increased over the last eighty years.

As pension benefits became more expensive, both CalPERS and CalSTRS started relying more heavily on investment returns to cover their liabilities. The original 1932 law that created CalPERS limited it to investing in Treasuries and municipal bonds, which paid consistent but low rates of return.[58] In 1953, the state Legislature passed

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[55] "Public Pensions for Retirement Security," (California Little Hoover Commission, 2011), 7.
[56] *Ibid,* 8.
[57] *Ibid,* 9.
[58] *Ibid,* 63.

legislation allowing CalPERS to invest in real estate, and in 1966, Proposition 1 allowed the fund to invest up to 25 percent of its total portfolio in common stocks.[59] Similarly, CalSTRS could only invest in bonds until the passage of Proposition 6 in 1970, which allowed the fund to allocate a portion of its portfolio to equity and real estate.[60] Finally, in 1984, voters passed Proposition 21, which amended Article XVI, Section 17 of the California Constitution to remove all remaining investment restrictions on CalPERS and CalSTRS.[61] Malanga explained that Proposition 21 was pitched as a "win-win for employees and the taxpayer": as long as the stock market did well, benefits could go up while employer contributions simultaneously went down.[62]

During the stagflation of the 1970s and early 1980s, actual investment returns were not on track to cover CalPERS's projected benefit costs. To ease the fiscal pressure, CalPERS opened a separate "Tier II" pension plan formula in 1984. The existing, Tier I benefit accrual formula for most state workers was 2 percent per year of the employee's final salary with a minimum retirement age of 60.[63] The optional new Tier II plan provided new employees a much lower benefit—1.25 percent per year of final salary with a minimum retirement age of 65—but it also required no contributions from them.[64]

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[59] Raquel Pichardo, "CalPERS a model of innovation at 75," (Pensions & Investments Online, 2007), <http://www.pionline.com/article/20070514/PRINT/70511017>.
"Public Retirement Funds, California Proposition 1 (1996)," (UC Hastings Scholarship Repository, 2014), <http://repository.uchastings.edu/ca_ballot_props/677/>.
[60] "Teachers' Retirement Fund: Investments, California Proposition 6 (1970)," (UC Hastings Scholarship Repository, 2014), <http://repository.uchastings.edu/ca_ballot_props/721/>.
[61] "Public Pension Fund Investments, California Proposition 21 (1984)," (UC Hastings Scholarship Repository, 2014), <http://repository.uchastings.edu/ca_ballot_props/939/>.
[62] Malanga in discussion with the author, April 2014.
[63] "Public Pensions for Retirement Security," (California Little Hoover Commission, 2011), 12.
[64] *Ibid.*

Despite being optional, 47 percent of new employees opted for the pared-down Tier II plan in the first four years after its introduction, and, by 1990, CalPERS had already realized savings of $66.5 million in annual employer contribution costs.[65] In 1991, the state Legislature and Governor George Deukmejian approved AB 702, which, among other things, closed the Tier I plan to new employees, thereby funneling all new employees into the less expensive Tier II system.[66] As the decade progressed and membership in the Tier II system increased, CalPERS's future liabilities fell relative to where they would have been. This, combined with the booming stock market of the second half of the 1990s, soon brought CalPERS's funded ratio up above 100 percent and pushed the state's annual required contributions down.[67] After the state saved $766 million from lower ARCs in fiscal year 1998, state workers' unions heavily lobbied the CalPERS Board to pass these short-term savings on to public employees through a pension benefit increase.[68] In a classic case of the Time-Inconsistency Problem, the CalPERS Board, almost half of whose members are chosen by plan members, told the state Legislature that returning to the Tier I plan both for new employees and retroactively for employees who had been under the Tier II plan could be paid for entirely with investment earnings.[69] Indeed, the President of the CalPERS Board stated about the proposed Senate Bill 400: "This is a special opportunity to restore equity among

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[65] "Public Pensions for Retirement Security," (California Little Hoover Commission, 2011), 12.
[66] Elizabeth Hill, "State Spending Plan for 1991-92," (Legislative Analyst's Office, 1991), 31, <http://www.lao.ca.gov/1991/0991_spending_plan_91.pdf>.
[67] "Public Pensions for Retirement Security," (California Little Hoover Commission, 2011), 12.
[68] "Addressing Benefit Equity: The CalPERS Proposal (SB 400)," (CalPERS, 1999), 6, <http://www.pebc.ca.gov/images/files/benefitEquitySB400.pdf>.
[69] *Ibid,* 7.

CalPERS members without it costing a dime of additional taxpayer money."[70] The bill went beyond rolling back Tier II plans and also increased pension formulas for non-safety workers to 2.7 percent with retirement at 65 and for safety workers to 2.35 percent with retirement at 56.[71] For state peace officers and CHP officers, SB 400 increased pension formulas to 3 percent with retirement at 55 and 50, respectively.[72]

Unfortunately, because of the dot-com bubble, 9/11, and the 2008 recession, Senate Bill 400 and its retroactive pension benefit increases did require additional taxpayer dollars, and a lot of them. Mayor Reed noted ironically that "technically they [CalPERS] were correct. It did not cost a dime. It cost billions of dimes, and it is going to get worse."[73] Though SB 400 only directly increased pension benefits for state employees, it indirectly drove up pension benefits for most local governments and CalPERS member agencies, too. By improving benefits beyond rolling back the Tier II plan, the Legislature started "a bidding war among government agencies . . . to retain and attract talent by boosting retirement benefits."[74] These bidding wars were premised on the assumption that higher benefits would not cost employers anything as long as investment returns continued as expected. When that assumption proved false and stock market returns fell below expectations, it was taxpayers who had to pick up the tab.[75] Much of

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[70] Daniel Weintraub, "Pension fund ills can be traced to big giveaway," (Sacramento Bee, 2003), < http://www.calstate.edu/pa/clips2003/may/29may/pensions.shtml>.
[71] "The CalPERS Proposal (SB 400)," 3.
[72] *Ibid.*
[73] Reed in discussion with the author, April 2014.
[74] "Public Pensions for Retirement Security," (California Little Hoover Commission, 2011), 13.
[75] Steven Malanga, "The Pension Fund that Ate California," (City Journal, 2013), <http://www.city-journal.org/2013/23_1_calpers.html>.

California's pension problem can be traced directly to SB 400 and its massive, retroactive increase to retirement benefits formulas.

CalSTRS's fiscal health followed a similar trajectory. Like CalPERS, CalSTRS briefly reached full funding in 1998 after strong investment returns in the late 1990s,[76] Emboldened by these returns, the state increased benefits and reduced its contributions.[77] When the early 2000s and 2008-2009 brought unexpected investment losses, CalSTRS quickly became underfunded again. Since the legislature is in charge of setting CalSTRS's contribution rates, the Teachers' Retirement Board could not react to these losses by increasing employer contribution rates.[78] Current statutes require employees to contribute 8 percent of payroll ($2.1 billion in 2012-2013), employers to contribute 8.25 percent ($2.2 billion in 2012-2013), and the state to contribute about 5 percent ($1.4 billion in 2012-2013).[79] Even with aggressive investment return assumptions, these rates are far too low, and each year CalSTRS's funded ratio gets worse. Unless the legislature hikes contribution rates, CalSTRS will run out of money by 2044 (Figure 5), even if all investment return targets are met.[80] The Legislative Analyst's Office has calculated that bringing CalSTRS back to full funding would require the state to contribute $4.5 billion

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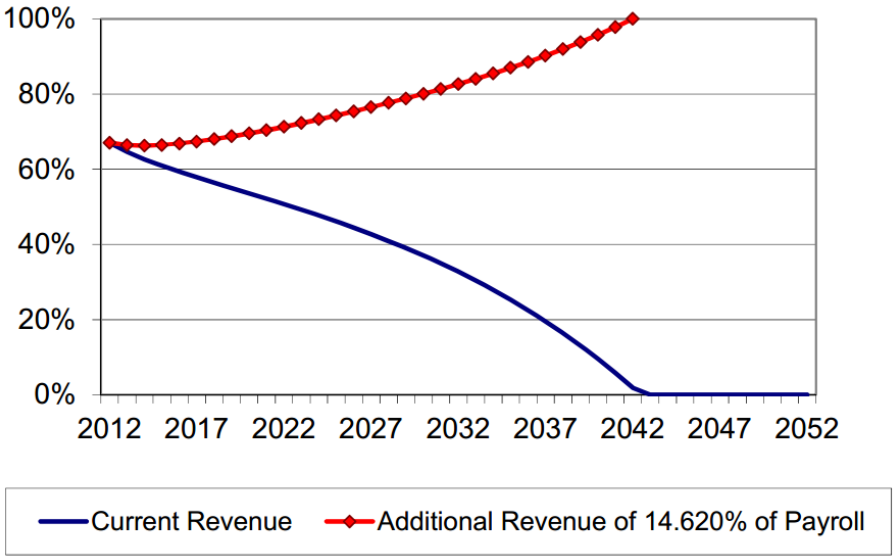
[76] "Addressing CalSTRS' Long-Term Funding Needs," (Legislative Analyst's Office, 2013), 4, <http://www.lao.ca.gov/handouts/state_admin/2013/CalSTRS-Funding-032013.pdf>.
[77] *Ibid.*
[78] "Sustaining Retirement Security for Future Generations: Funding the California State Teachers' Retirement System," (CalSTRS, 2013), 6, <http://www.calstrs.com/sites/main/files/file-attachments/scr_105_final_reportltr_v2.pdf>.
[79] "Addressing CalSTRS' Funding Needs," (LAO, 2013), 6.
[80] "Funding the California State Teachers' Retirement System," (CalSTRS, 2013), 31. "Defined Benefit Program Actuarial Valuation as of June 30, 2012," (Milliman Actuaries, 2013), 5, < http://www.calstrs.com/sites/main/files/file-attachments/2012_db_valuation.pdf>.

per year for the next 30 years on top of its current payment of $1.4 billion.[81] Put in context, the amount of money needed to fully fund CalSTRS is greater than the amount

Figure 5: CalSTRS's Path to Insolvency



Source: CalSTRS Actuarial Valuation Report, FY 2012

the state currently spends on the University of California and California State University systems combined.[82] In other words, even if California closed every UC and CSU in the state, it still would not free up enough money in the state budget to make the annual payments necessary to amortize CalSTRS's unfunded liability over the next thirty years.

The longer the state Legislature waits to increase contributions to CalSTRS, the worse the underfunding problem becomes. Three forces are pushing the Legislature to act sooner rather than later. First, current contributions do not cover even the Normal Cost portion of the pension system, so with each year that passes, the CalSTRS unfunded liability grows. Second, because none of the existing unfunded liability is being amortized with a supplemental payment, the fund's UAAL is becoming harder to pay off

[81] "Funding the California State Teachers' Retirement System," (CalSTRS, 2013), 18.
[82] "Addressing CalSTRS' Funding Needs," (LAO, 2013), 6.

due to the time value of money, which CalSTRS assumes to be 7.5 percent per year. Indeed, CalSTRS found that delaying contribution increases from 2014 to 2016 would require the total rate increase necessary to get the fund back to full funding over 30 years (15.1 percent of payroll per year if implemented in 2014) to increase by one percentage point to 16.1 percent of payroll.[83] The Legislative Analyst's Office has gone so far as to argue that the state should prioritize increasing CalSTRS's funded ratio over paying down the state's outstanding bonded debts since bonded debts grow significantly more slowly than the CalSTRS unfunded liability.[84] Third and finally, the new GASB rule requiring pensions to discount liabilities due after the crossover or asset depletion point at a low-risk municipal bond index rate (currently about 3.5 percent) will take effect beginning in fiscal year 2015. Because CalSTRS projects that its assets will be depleted by 2044, and because it has no plan in place for avoiding this depletion, the fund will be required to calculate the present value of all liabilities due after 2044 using this low rate instead of its current 7.5 percent assumed rate of return.[85] Though GASB rules do not dictate actual contribution rates, this decrease in the discount rate will greatly increase the size of the unfunded liability that CalSTRS's reports in its financial statements, which could cause public backlash against the fund. In its February 2013 proposal to the state Legislature, CalSTRS was concerned enough about these political ramifications to list the new GASB rule as a reason for the state to develop an amortization plan as soon as possible.[86]

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[83] "Funding the California State Teachers' Retirement System," (CalSTRS, 2013), 28.
[84] "Addressing CalSTRS' Funding Needs," (LAO, 2013), 8.
[85] "Funding the California State Teachers' Retirement System," (CalSTRS, 2013), 18.
[86] *Ibid.*

Today, CalPERS and CalSTRS are the two largest public pension systems in the United States, together managing $423.72 billion worth of assets at the end of fiscal year 2013 and serving more than 2.5 million members.[87] Unfortunately, both funds are a far cry from their super-funded status in 1998. Using the market value of assets and actuarial liabilities from the most recent year reported, CalPERS has funds for only 66 percent of its future liabilities, and that is assuming CalPERS achieves its 7.5 percent rate of return every year in the future.[88] CalSTRS's fiscal health is not much better. The teachers' retirement system has funds to cover 67.6 percent of its future liabilities, again assuming it meets its investment expectations.[89] Overcoming these shortages is difficult because, as Mayor Reed put it, "there are two equally important, competing objectives: one is to make sure that employees get paid what they've earned, and the other is to make sure that our residents and taxpayers get the services that they deserve."[90] Though many pension boards blame the stock market for their underfunding woes, Reed minced no words in identifying the real cause: "It is the cost that is the problem. The government cannot afford the costs of the benefits. The employees cannot afford the cost of the benefits. The only solution is to reduce the cost."[91]

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[87] "CalSTRS Fast Facts," (CalSTRS, 2013), <http://www.calstrs.com/sites/main/files/file-attachments/fastfacts_2013.pdf>.
"CalPERS Facts at a Glance," (CalPERS, 2013), <https://www.calpers.ca.gov/eip-docs/about/facts/facts-at-a-glance.pdf>.
[88] "Comprehensive Annual Financial Report, 2013," (CalPERS, 2013), <https://www.calpers.ca.gov/eip-docs/about/pubs/cafr-2013.pdf.>
[89] "CalSTRS Comprehensive Annual Financial Report, 2013," <http://www.calstrs.com/sites/main/files/file-attachments/cafr2013.pdf>.
[90] Reed in discussion with the author, April 2014.
[91] *Ibid.*

Protecting Pension Benefits: The California Rule

Pension benefit costs are problematic for two reasons: first, they have risen to the point that they are unaffordable for many municipalities, and second, they are extraordinarily difficult to reduce. California's laws protecting pension benefits have been described as a one-way ratchet: pension benefit formulas can be increased, but they cannot be decreased. The infamous "California Rule" protects not just benefits already earned but also all future benefits that an employee has not yet earned. If a government wants to reduce pension benefit formulas, it is free to do so, but the reduced formula will only apply to new employees who are hired after the date of the change. Because of the California rule, reducing pension benefit costs is an extremely slow and incremental process that can only take place as employees under the old, higher benefit plan retire and are replaced by employees whose first day of work was after the transition to the lower benefit formula. Steve Malanga explained the delayed savings: "[After changing the benefit formula,] you have to continue letting workers accrue benefits in that system at that rate for fifteen years before you have washed it out of the system, and then you have to pay those workers in retirement. [Pension debt] is a very difficult kind of debt to pay back because you can't stop accruing it, you just keep digging yourself a deeper hole."[92]

The California Supreme Court established the California rule in a 1955 when it struck down several modifications to the City of Long Beach's pension benefit formulas. Enacted by the city in 1951, these modifications 1) raised employee contribution rates from 2 percent to 10 percent of salary, 2) converted pension benefits to a fixed formula instead of one that fluctuated depending on inflation, and 3) required returning military

[92] Malanga in discussion with the author, April 2014.

servicemen, whose time spent in the military counted as years worked for the city for retirement purposes, to pay the contributions that would have been deducted from their city salaries had they been on the city's payroll during their military leaves of absence. Previously, city employees who took a leave of absence to serve in the military did not have to contribute to the city pension plans but still accrued pension benefits while they were away.[93] Crucially, the city wanted to apply these changes to all current employees for any benefits they would earn going forward.

In its landmark ruling *Allen v. City of Long Beach* (1955), the California Supreme Court struck all three of these changes down as unduly burdensome on the contract rights of employees hired under more generous pension benefit formulas. The court noted that pension rights may be modified before retirement "for the purpose of keeping a pension system flexible . . . to changing conditions."[94] The court's test for a reasonable change, however, was high: "To be sustained as reasonable, alterations of employees' pension rights must bear some material relation to the theory of a pension system and its successful operation, and changes in a pension plan which result in disadvantage to employees should be accompanied by comparable new advantages."[95] The City of Long Beach's modifications clearly failed this latter portion of the test, for all three changes either reduced pension benefits or increased employee buy-in costs. The city was free to apply these changes to new employees hired after the changes were made, but all employees who were accruing benefits under a more generous formula could not have

[93] 45 Cal. 2d 128; 287 P.2d 765; 1955 Cal. LEXIS 302. Date Accessed: 2014/04/28. www.lexisnexis.com/hottopics/lnacademic.
[94] *Ibid.*
[95] *Ibid.*

that formula reduced. The court grounded its decision in the contracts clause of the California Constitution, so the California Rule became a constitutional right.

Since *Allen v. City of Long Beach,* California courts have continued to apply the "comparable benefits" test to other instances of municipalities changing pension benefit formulas for future work by current employees. In *Legislature v. Eu* (1991), for example, the state Supreme Court partially struck down the section of Proposition 140 (1990) that eliminated future pension benefits for state legislators. The court took no issue with Proposition 140 as it applied to future legislators, but it allowed any state senator or assemblyman currently in office to continue to accrue pension benefits until leaving office. Eliminating an entire pension benefit constituted a modification that, in order to pass constitutional muster, would have needed to provide a new benefit comparable to the one eliminated.[96] Proposition 140 completely eliminated pension benefits for legislators, so it certainly did not provide a comparable replacement benefit. Thus, the court invalidated that section of Proposition 140 as it applied to current legislators and, in doing so, re-affirmed the California rule.

Another important follow-up case to *Allen* was *Pasadena Police Officers Association v. City of Pasadena* (1983). In 1969, the City of Pasadena added cost of living allowances (COLA) to its standard pension benefit formulas. The city placed no cap on the size of the COLA adjustment, instead tying it to whatever the consumer price index dictated. After a period of high inflation in the 1970s, the city modified the pension

[96] *Legislature v. Eu* (1991), 54 Cal. 3d 492; 816 P.2d 1309; 286 Cal. Rptr. 283; 1991 Cal. LEXIS 4529.

benefit formula to cap COLA adjustments to 2 percent per year.[97] Not wanting to go against the *Allen* ruling, the City of Pasadena did not apply the COLA cap to employees who retired between 1969 and 1981. They did, however, apply the cap to employees who retired before the COLA adjustments were added in 1969. For employees who started working before 1981 and continued working after, the exemption was partial. All benefits earned between 1969 and 1981 would be COLA adjusted at whatever the CPI dictated, while those earned after 1981 would be capped at 2 percent.[98] In its opinion, the California appeals court unequivocally struck down the COLA cap as it applied to employees who worked between 1969 and 1981. The city's pro-rated exemption was not good enough because the employees had developed a vested right to earn unlimited COLA adjustments when they worked between 1969 and 1981, and the city could not constitutionally cap those COLA adjustments for future, unearned benefits. Only employees hired after 1981 could have their COLA adjustments capped. Moreover, the court also struck down the cap as it applied to pre-1969 retirees. The city had justified this change by arguing that the pre-1969 retirees had never worked when the COLA adjustments existed, so, while they received uncapped COLA adjustments after 1969, they could not have developed a vested right to those COLA adjustments.[99] The court rejected this argument, instead asserting that, by requiring pre-1969 retirees to elect to receive COLA adjustments instead of just automatically giving COLA adjustments to

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[97] *Pasadena Police Officers Association v. City of Pasadena* (1983), 147 Cal. App. 3d 695; 195 Cal. Rptr. 339; 1983 Cal. App. LEXIS 2232.
[98] *Ibid.*
[99] *Ibid.*

them, the state created irrevocable, constitutionally-protected contracts with the retirees.[100]

The Impact of Rising Pension Costs: Service Delivery Insolvency

At nearly 60, the California Rule is as vigorous and far-reaching as ever. Mayor Reed was right that the cost of benefits is driving California's pension problems, but the California Rule has made reducing them extraordinarily difficult. While some reforms efforts have been made, for the most part employers—and by extension taxpayers—have been forced to pick up the tab (or the tab has been left largely unpaid, as has been the case with CalSTRS recently). Higher employer contributions have caused a squeezing effect on state and municipal budgets, and the pressure will only increase in the years to come. In fact, CalPERS has announced that it will raise employer contribution rates by about 50 percent over the next five years.[101]

The impact of rising pension contribution costs has been significant. Some California cities, notably Stockton and San Bernardino, have already declared bankruptcy partly because of rising pension costs, and others could follow. Pat Morris, the Mayor of San Bernardino, commented that "it is increasingly impossible with the prospect of these new inflated CalPERS contribution rates to balance the critical equation of giving our city adequate services and paying these overly generous retirement benefits to these

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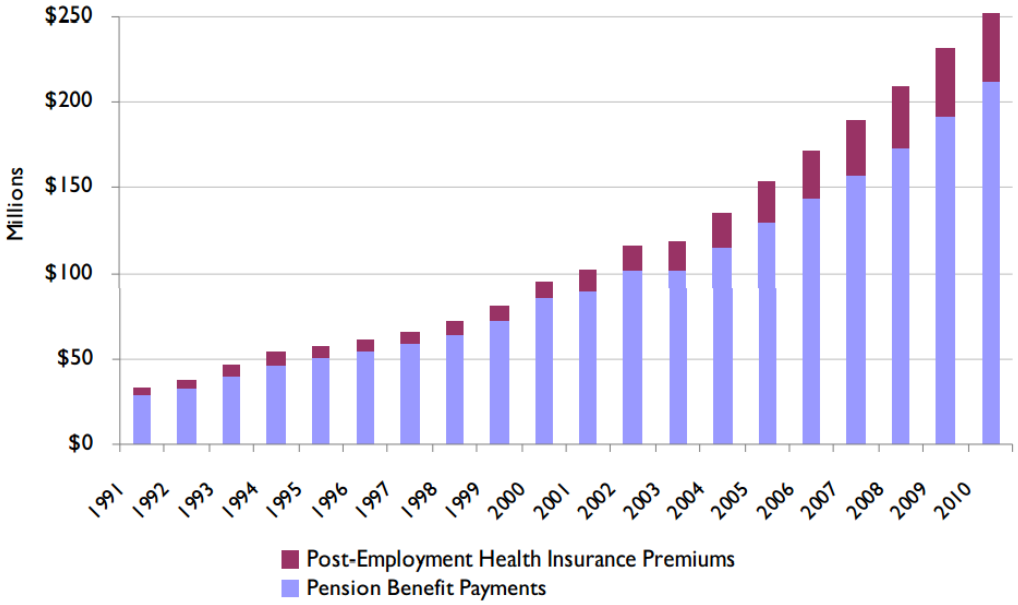
[100] *Ibid.*

[101] Jim Christie, "CalPERS endorses employer rate hikes of up to 50 pct," (Reuters, 2013), <http://www.reuters.com/article/2013/04/18/calpers-contributionrates-idUSL2N0D41UO20130418>.

retirees. Without reform . . . more cities will find themselves insolvent – cash insolvent and service insolvent."[102]

San Jose, California is an example of a city whose rising pension costs nearly caused service delivery insolvency. Over the last twenty years, the City Council has given public employees several substantial pension benefit increases. Most notably, the maximum pension benefit for police and firefighters was increased to 90 percent of final

Figure 6: San Jose's Annual Retirement Payments



compensation, and the cost-of-living adjustment (COLA) for all city workers was set at a 3 percent annual increase.[103] The cost of these generous benefits has caught up with the City, and retirement expenses now make up more than 20 percent of the general fund.[104] Between 1991 and 2010, retirement expenses increased nearly eight-fold, as shown in

[102] Ryan Hagen, "California's pension increases were expected, not welcomed," (San Bernardino Sun, 2014), < http://www.sbsun.com/government-and-politics/20140219/californias-pension-increases-were-expected-not-welcomed>.
[103] "San Jose's Pension Problems," (Office of Mayor Chuck Reed, 2012), <https://www.sanjoseca.gov/index.aspx?NID=2200#3>.
[104] "Retirement Reform," (Office of Mayor Chuck Reed, 2013) https://www.sanjoseca.gov/index.aspx?NID=624

Figure 6.[105] Retirement costs are projected to increase even more in the next few years, from $251.2 million in fiscal year 2013 to $325.0 million in fiscal year 2017.[106]

To pay for these rising pension costs, San Jose has had to reduce its core services substantially. Between fiscal years 2002 and 2012, the number of city employees fell steadily from 7453 to 5400 as the City pared back its workforce by 27 percent to save money.[107] The San Jose Police Department was particularly hard hit, as its full-time staff was cut from 1887 to 1511 during this same period.[108] In addition to laying off employees, the City has reduced services such as library hours, street paving, sidewalk repairs, crime and gang prevention programs, and public park maintenance.[109] In order to avoid even more layoffs, all City employees took a 10 percent pay cut in fiscal year 2012.[110]

After ten years of service cuts, San Jose could cut not cut any more programs without nearing service delivery insolvency. Mayor Reid explained, "If we continued to cut, we would be in serious trouble. We decided that we would not go into service delivery insolvency and that we had to act [to reduce retirement costs]. And we did. We put a ballot measure in front of the voters and got a 70 percent approval rate."[111] Measure B increased contributions for current employees, as well as decreased pension benefits

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[105] "Pension Sustainability: Rising Pension Costs Threaten the City's Ability to Maintain Service Levels – Alternative for a Sustainable Future," (San Jose City Auditor, 2010), 13, < https://www.sanjoseca.gov/DocumentCenter/View/3208#page=13>
[106] "Mayor Reed's 2012 Community Budget Meeting Presentatoin," (San Jose Office of Chuck Reed, 2012), <https://www.sanjoseca.gov/DocumentCenter/View/3806#page=5>
[107] *Ibid.*
[108] *Ibid.*
[109] "The Budget Deficit's Impact on Our Community," (San Jose Office of the Mayor, 2013), < https://www.sanjoseca.gov/index.aspx?NID=626#1>.
[110] *Ibid.*
[111] Reed in discussion with the author, April 2014.

for future employees.[112] As was expected, a lower court struck down the first part of Measure B as unconstitutional, but Reed plans to use Measure B to test the limits of the California Rule in front of the state Supreme Court. He noted that it has already cost the City $3 million to pass and litigate Measure B this far, but as a large city, San Jose can afford to fight this battle on behalf of all the other municipalities that are being crushed by the expensive combination of overly generous pension benefits and the restrictive California Rule.[113]

[112] Mike Rosenberg, "Pension reform: Settlement talks brewing in landmark San Jose case," (Mercury News, 2014), <http://www.mercurynews.com/pensions/ci_25251379/pension-reform-settlement-talks-brewing-landmark-san-jose>.
[113] Reed in discussion with author, April 2014.

4 Climbing Out: The Solutions California Needs

Pension reform is difficult because it involves two competing interests: paying retirees the benefits they have been promised while ensuring that residents and taxpayers receive the government services that are essential to maintaining a safe, healthy, and productive community. Successfully reforming California's pension systems will require two steps: first, getting pension funds back on stable financial footing, and second, ensuring that these funds stay well funded in the future.

Short Term: Loosen the California Rule

Changing the California Rule is a pre-requisite to any serious public pension reform in the state. Benefit costs are the problem, so reducing them has to be part of the solution. Revising pension benefit formulas downward for future employees is a first step, but it takes years to realize savings if benefits only change for future employees. Benefits that have already been earned should be protected, but future benefits should be changeable, as they are in the private sector and in most states. Mayor Reed summed up this point nicely: "If you're going to make significant reductions in costs, you have to do something that affects current employees. That's where the huge liabilities are. [Cutting costs] for future employees is important and significant, but it is by no means anywhere sufficient to solve the problem because the benefits from dealing with future employees are well out into the future."[114]

[114] Reed in discussion with the author, April 2014.

California could go about changing the California Rule in a variety of ways. First, it could be changed through case law, as Mayor Reed is trying to do with his Measure B litigation. The California Supreme Court read the California Rule into the Contracts Clause of the state Constitution in 1955, so the Supreme Court could overturn or revise its ruling without having to change the text of the Constitution. Of course, a textual amendment to the state Constitution would work to overturn the California Rule as well. Mayor Reed, along with several other California Mayors, is also attempting this method via an initiative that will likely be on the state ballot in November 2016.

While state courts and constitutional amendments are the only two ways to overturn the California Rule outright, there are other ways the state could mitigate or avoid the rule. One method, proposed by legal scholar Alexander Volokh, would be to contract out more government services to the private sector.[115] Public employees are not protected from being laid off, so an unusual but effective workaround would be to replace certain discrete sectors of public employees—waste management services, for example—with privately contracted companies. These companies could set up either defined benefit or defined contribution pension systems for their employees, but, in any case, the state or municipalities' liabilities would only extend as far as their contract for the services.[116]

Another more unusual alternative for avoiding the California Rule would be for the state to get out of defined benefit plans altogether and convert to defined contributions plans. To avoid triggering the "comparable benefits" test of the California Rule, these defined contribution plans would likely have to be more lucrative than the

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[115] Alexander Volokh, "The Constitutional Protection of Public-Employee Pensions," *Reason Foundation*, February 19, 2014. <http://reason.org/news/show/pensions-california-rule>.

[116] *Ibid.*

defined benefit plans they replaced, for the simple reason that a large part of the benefit to employees of a defined benefit plan is the safety and security of the retirement income. The fact that defined contribution plans export the investment risk to the employee is an advantage from the employer's perspective but a disadvantage from the employee's. Under the "comparable benefits" test, employees would have to be compensated for this additional risk through larger contributions from the employer.[117] Though most unions oppose the idea of switching public pensions from defined benefit to defined contribution, recent polling in January 2014 by the Public Policy Institute of California indicates that 71 percent of Californians would favor "changing the pension systems for new public employees from defined benefits to a defined contribution system similar to a 401(k) plan."[118] Even if the state Legislature would not propose such a policy, this overwhelming support among voters indicates that a statewide ballot initiative could be successful at introducing defined benefit plans.

Long Term: Improve Fund Oversight, Accounting Standards, and Management

Over the long term, assuming California does not convert to defined contribution plans, the state's public pensions should focus on tightening accounting standards and improving board management systems to avoid political manipulations. The association between higher investment target return rates and portfolio risk exposure is concerning, and indicates that overly aggressive return assumptions, which make pension funds look healthier on paper, are in reality weakening funds. California pension boards that have not done so already should explore setting up separate investment councils that are

[117] Volokh, "The Constitutional Protection of Public-Employee Pensions."
[118] Public Policy Institute of California, "PPIC Statewide Survey: Californians and Their Government," January 21, 2014.

distinct from the managing board of directors, as this separation is correlated with healthier fund ratios. Finally, and most importantly, states should enact legislation to require public employers to pay their annual contributions in full each year or face stiff fines. Ending the procedure of using pension funds as means of deficit spending is easily the most important step California can take to make sure its public pensions stay healthy.

5 Conclusion

California's public pensions have a long way to go before they are fully funded again, and there is a good chance they will never be as long as the California Rule remains unchanged. However, there is hope for the Golden State's public pension funds. The growing consensus among Californians is that public pension plans need to be reformed, even if it takes something as comprehensive as converting to defined contribution plans. And it will not be long before voters get a chance to express their voices. The California Rule could be amended as early as 2016, which would pave the way for the comprehensive pension reform plans the state so desperately needs.

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