

The Jacksonville Pension Reform Task Force Committee Meeting – 10-29-13 Prepared Remarks by Jonathan Trichter, MAEVA Municipal Solutions, LLC

Amended on 11/05/13

Thank you, David, and good morning everyone. As David mentioned, my name is Jonathan Trichter. I work for a restructuring firm called MAEVA Municipal Solutions. We are part of the professional team assembled by The Pew Charitable Trusts and the Laura and John Arnold Foundation partnership to work on pension reform around the country. I initially introduced myself and my background to many of you at a previous gathering of the Task Force on September 16th. I've since met with some of the civic-leaders in the room today as well as members of the media. So I won't dwell on my background, except to say that I have experience in public finance and familiarity with the capital markets, as well as private and public pensions and restructurings. I also should say that while I work in collaboration with Pew, I do not speak for them.

I'd like to thank the Task Force as well, especially its Chairman, Bill Scheu – not just for his assistance, but for his professionalism and dedication to Jacksonville. I'd also like to thank the City and the Brown administration, which has been extraordinarily accommodating and responsive. Likewise, I'd like to thank the Police and Fire Pension Board for their open cooperation.

While we've said this dozens of times since we all met, we will probably say it at least a dozen more. Our goal is to assist pension stakeholders in helping the Police and Fire Pension Fund so that it can keep its promises to current workers and retirees and offer a secure benefit for future ones.

My part of the presentation today will touch on a few topics, starting with pension obligation bonds, or "POBs." I know there has been discussion about POBs in Jacksonville, as there has been elsewhere. Still, for a number of reasons that have little to do with any of us here, there are lingering misconceptions about them. I'd be glad to talk about why that is another time, but at the moment I'd prefer to start with some basic questions, like: "What are they?"

POBs are taxable¹ debt instruments that governments issue to pay or fund an obligation to a pension system. Really, they are issued for two reasons.

The first is "deficit financing," or when a government uses bond proceeds to pay a pension obligation, such as an ARC. While this provides immediate budget relief, it increases the all-in cost due to the associated interest expense. Issued for this purpose, POBs forestall an inevitable bill while increasing its magnitude and are another example of how governments can kick the can down the road when it comes to pension obligations.

¹ Since they are for working capital purposes, and often used for arbitrage, the Tax Reform Act of 1986 did away with their tax exemption; they cannot be issued on a tax-exempt basis.



The second reason to issue POBs is "positive arbitrage," or when a government uses bond proceeds to invest in securities it hopes will earn more than the cost of the bonds. The economics hinge on whether the investments yield more than the cost of the financing. This is an entirely different enterprise from most borrowings, which are for capital improvements.² It's also different from most of the analogies one often hears people use to explain POBs.

For instance, it is sometimes said that POBs are a way to refinance pension debt in the way one refinances a mortgage. Keep in mind, though, that when someone refinances a mortgage, they are usually *replacing* a current debt with one for which they can pay a lower fixed-interest rate. That's not what happens with POBs.

When a government issues pension bonds, it incurs a new debt without extinguishing the old obligation. The new debt is for the bonds, the old obligation is for pension promises owed, and both obligations persist. The only way the issuer can come out ahead is to invest the bond proceeds and earn more than the bonds cost. Then any positive spread between investment income and annual bond payments adds value. This is the arbitrage.

Even when that works, it's really like a "second mortgage," but one where you invest the loan in the stock market and hope you earn enough to pay down your first mortgage a bit *after* covering a fixed rate on your second. And falling short is a double-whammy: pension deficits increase again, while the City remains on the hook for that second mortgage. That's taking on much more risk than one thinks about when they consider a re-fi, which is why I think the traditional mortgage analogy is unhelpful.

It is also sometimes said that issuing POBs shift a "soft liability" to a "hard liability." In theory, that is supposed to address a situation where a government is not making its full pension contributions. By contrast, a government couldn't skimp on its POB payments without immediate and serious consequences. Even in theory, this maneuver shouldn't matter when an employer is already required to pay its full ARC, like in Florida. Nor does the scheme in itself prevent a government that habitually shortchanges its ARC from continuing to do so, while nevertheless paying the annual costs of POBs. So I'm not sure how this accounting shift is relevant to Jacksonville.

For Jacksonville's purposes, we're really talking about transferring bond proceeds to the pension fund, and we should understand the relevant factors that go into its associated costs; these include current interest rates, credit considerations, borrowing costs and – the big unknown variable – the performance of pension investments over the life of the bonds.

To see how these factors work, we modeled a number of scenarios. And to make things relevant, we modeled \$1 billion worth of POBs with a 22-year term. This is the amount and horizon recommended in the Civic Council proposal. Here, I should stop to thank the Civic Council for

² Burnham, James B, "Risky Business? Evaluating the Use of Pension Obligation Bonds," June 2003, p. 14.



taking the time to meet with us and discuss their plan. They put a serious amount of effort and thinking into it. For a good-government group, their commitment to something as hard as pension reform is remarkable.

As I mentioned, the borrowing costs, or the cost of capital for POBs, is critical, because investment returns on the bond proceeds must be greater than the cost of the bonds to generate positive arbitrage. In its POB modeling and subsequent reports, the Civic Council used 4.5% as the City's cost of capital. This represented their "best guess" at the time of their analysis. Unfortunately, rates have moved significantly in recent months, especially for POBs, which are facing sustained headwinds.

Recently, Detroit offered its pension obligation note holders 17 cents on the dollar in its creditors' proposal before filing for bankruptcy, and the City even hinted it might try to get out of its pension note obligations altogether. Stockton, California defaulted on a series of 2007 POBs, which are now rated as junk by Moody's because of how that City is treating them in bankruptcy. This is in contrast to how Stockton is treating its other bonds, which the City hopes to pay in full, according to its plan of adjustment.³

That trend – where issuers treat pension bonds differently from other debt – is likely to continue. Moody's issued a report not long ago that pointed out how POBs don't finance critical infrastructure nor generate a dedicated revenue stream, yet they "...must compete with other priorities for payment." In other words, these obligations compete with essential assets for limited resources when issuers are under fiscal stress, and essential assets are viewed by ratings agencies as more likely to be paid for than POBs.⁴

These developments come with market consequences. Investors always demand more yield for more risk, so the cost of POBs has increased. To be blunt, there is little chance that Jacksonville could issue POBs at 4.5% today or anytime in the foreseeable future. Our understanding based on in-depth conversations with market participants, underwriters and the sales-desks at prominent muni dealers is that Jacksonville's cost of capital would likely be around 5.6% today.

We settled on that figure after the City of Stratford Connecticut accessed the market on October 17th with \$163 million in POBs. Its overall issuance cost was 5.6%. Stratford is rated 'A1' Moody's, one notch below Jacksonville. But the bonds were issued as general obligations, something Connecticut allows for. In Jacksonville, my understanding is that issuing POBs as a general obligation would require a voter referendum. So the soonest the City could issue on that credit would be November 2014, presuming it passed a referendum. I have no idea what rates will be then, but I would bet they will be higher. Realistically, Jacksonville is likely only able to issue POBs as a special revenue credit, or what I've heard referred to here as the "covenanted"

⁴ "Rating Action: Moody's reviews ratings of 32 California cities; nine pension funds downgraded," Moody's Corporation, 9 October 2013 https://www.moodys.com/research/Moodys-reviews-ratings-of-32-California-cities-nine-pension-bonds--PR_257248

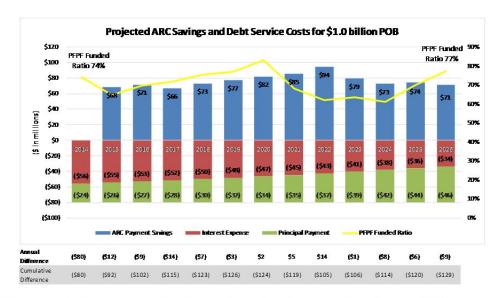
³ "Moody's lowers Stockton, Calif., pension bonds deeper into junk," Rueters, 14 October 2013 http://www.reuters.com/article/2013/10/15/stockton-downgrade-idUSL1N0I500W20131015



credit." That credit is one notch below Jacksonville's GO, putting it more or less in-line with Stratford for our purposes. Furthermore, Stratford issued its pension bonds over a 25-year horizon, which is close to the 22 years the Civic Council recommended. All of this is to say that the Stratford deal is a good proxy for the spot market.

So we used 5.6% as our cost of capital and modeled \$1 billion in POBs over 22 years under different market scenarios, using the provisions of the mediation settlement agreement.⁵

Our first set of scenarios took the Jacksonville Police & Fire Pension Fund's (PFPF) recent yields for the previous 13 years. In other words, we modeled what would happen if future fund growth for the next 13 years mirrored those in the past 13 years. Here is what we found:



- Scenario is based on actual investment returns during the past 13 years (approx.
 5.6% CAGR)
- Net present value of projected savings is negative \$121 million
- \$1.0 billion in total debt service costs (interest and principal payments)

Note: Projections are based on 5.6% overall cost of capital and assume \$1 billion in bond proceeds less transaction fees are deposited in the fiscal year ending October 1, 2014.

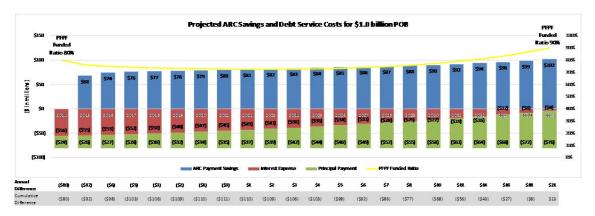
Using pension obligation bond proceeds to infuse the PFPF with \$1 billion in cash would increase its funded ratio to 74% in 2014 and reduce the City's ARC payments going forward. At the same time, the City would be on the hook for debt service payments on the bonds. Over just these 13 years, that debt service would be \$1 billion. This is the "second mortgage" in my analogy. And under this scenario, the City would have paid \$129 million more in debt service than it would have achieved in ARC savings over these thirteen years. This amounts to \$121

⁵ As analyzed by the City's contracted actuary



million in net present value (NPV) losses. Over that time, the funded ratio of the PFPF increases a bit and winds up at 77% in 2026.

In this case, there are still many years left on the life of these bonds. So what we did next was to take the last 13-year compounded annual growth rate (CAGR)⁶ of the PFPF and project it over the entire 22-year horizon.



- Scenario is based on historical returns CAGR of approx. 5.6%
- Net present value of projected savings is negative \$27 million
- \$1.8 billion in total debt service costs (interest and principal payments)

Note: Projections are based on 5.6% overall cost of capital and assume \$1 billion in bond proceeds less transaction fees are deposited during the midpoint of the fiscal year ending October 1, 2014.

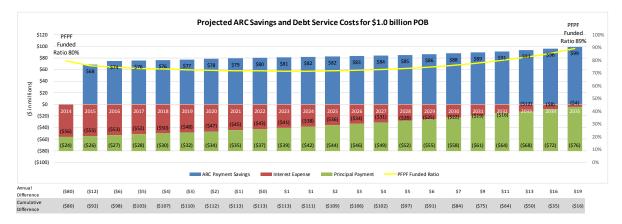
Under this scenario, the City would pay all-in debt service on the bonds of \$1.8 billion, which is \$13 million less than the City would save on its ARC payments. That appears to be a positive arbitrage. However, on a net present value basis, it actually amounts to a loss of \$27 million, meaning it would have been \$27 million cheaper in today's dollars had the City never issued the POBs. This is true because more of the ARC savings come in later years when, on a present value basis, they are worth less in terms of today's dollars. Also, in this scenario, the PFPF would wind up 90% funded in 2035.

Note, these data are a little different than the previous data over the first 13 years. This is because we used a smooth growth rate in this example, whereas our first case included volatility in the annual growth. This is a good illustration of how volatility can be a key risk factor when issuing POBs, and it's something that never shows up in actuarial illustrations that assume flat growth. We will come back to this point.

⁶ Fiscal years 2001 to 2013



Next, we modeled future market projections based on the conservative expectations of some notable investors for the new, lower growth outlook for the 21st Century U.S. economy. Specifically, we assumed returns of 6% for equities and 3.5% for fixed income. Using the rough weighted average of the PFPF's recommended asset allocation, we came up with a conservative rate of return estimate for the full 22-year life of the POB issuance.⁷



- Scenario is based on conservative expectations of notable investors for U.S. economy growth outlook (5.4% CAGR assuming 6.0% return for equities and 3.5% for fixed income per annum)
- Net present value of projected savings is <u>negative</u> \$47 million
- \$1.8 billion in total debt service costs (interest and principal payments)

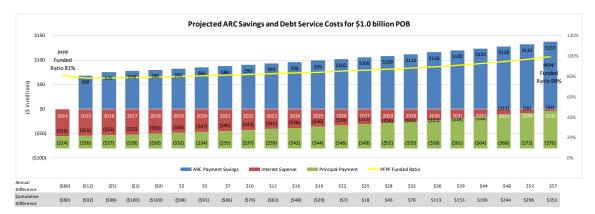
Note: Projections are based on 5.6% overall cost of capital and assume \$1 billion in bond proceeds (less transaction fees) are deposited in the fiscal year ending October 1, 2014.

Again under this scenario, the funded ratio of the PFPF jumps in 2014 to about 80%. The reason there's some inconsistency among our scenarios in the initial funded ratio is because we are including year-1 returns there. More importantly, the City spends \$16 million more in debt service on the POBs than it receives in ARC savings. Interestingly, that amounts to a NPV loss of \$47 million over the life of the bonds. Again, the reason that NPV loss is so different than the \$16 million figure is because the debt service costs substantially exceed the projected ARC savings in the first few years of the horizon, whereas the positive savings that materialize in the future are worth less on a present value basis than the early year losses.

The next scenario we modeled assumed the same flat, annual rate of return the PFPF would assume under the mediation settlement agreement.

⁷ The return rate derived by this method is 5.4%.





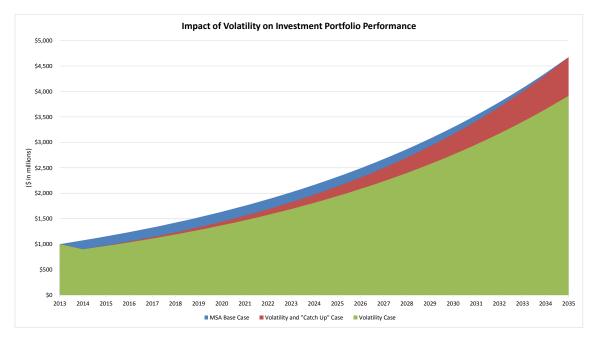
- Scenario is based on Mediation Settlement Agreement investment return assumptions of 7.5% in fiscal 2014 and 7.25% thereafter
- Net present value of projected savings is \$202 million
- \$1.8 billion in total debt service costs (interest and principal payments)

Note: Projections are based on 5.6% overall cost of capital and assume \$1 billion in bond proceeds (less transaction fees) are deposited in the fiscal year ending October 1, 2014.

This is more or less what the Civic Council modeled, although they used a lower discount rate and a 4.5% cost of capital. Using 5.6% as the financing cost, the City would realize \$353 million more in ARC savings than it paid in debt service on the POBs, for a projected net present value savings of \$202 million. The PFPF's funded ratio would reach 99% in 2035.

Returning to the matter of volatility, real returns are more random than flat assumptions. Say the markets drop 10% in year 1 after Jacksonville issues \$1 billion in POBs. If that happened, the PFPF would have to earn higher than its expected returns for years 2 through 22 to reach its assumed 7% over the life of the bonds. In fact, it would have to earn 7.89% over years 2 through 22, if in year one the fund dropped 10%.





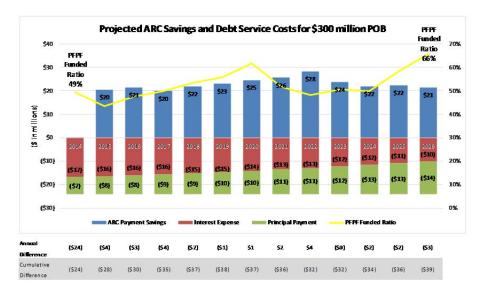
 Scenario assumes 10% drop in Year 1; annual returns would need to reach around 8% thereafter to "catch up"

Note: Market values of investment portfolio under the cases shown above are indicative.

POBs are vulnerable to lower returns than the assumed actuarial rate. They are also vulnerable to volatility, especially in their immediate aftermath due largely to the effect of geometric growth on principal. Once the initial principal suffers losses, it is hard to climb back. So the success of POBs hinges on market timing. Whether a municipality should be in the business of market timing is a question for the Task Force to consider.

The truth is that the market for POBs is such that there is little chance Jacksonville could sell \$1 billion of them. The market couldn't absorb it, and the cost of capital for Jacksonville would be much higher than 5.6%. Honestly, I'm not sure what amount the City could market. But there's at least a possibility the City could issue a \$300 million tranche. So we modeled up some \$300 million cases.



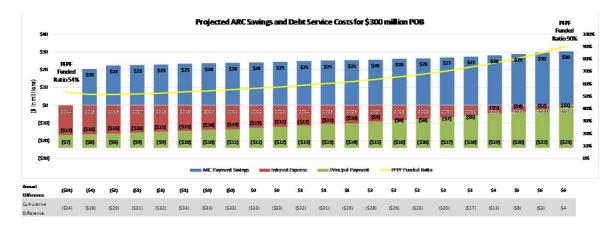


- Scenario is based on actual investment returns during the past 13 years (approx.
 5.6% CAGR)
- Net present value of projected savings is <u>negative</u> \$36 million
- \$313 million in total debt service costs (interest and principal payments)

Note: Projections are based on 5.6% overall cost of capital and assume \$300 million in bond proceeds less transaction fees are deposited during the midpoint of the fiscal year ending October 1, 2014.

Assuming the historical fund growth of the past 13 years repeat, \$300 million in POBs would bump up the PFPF's funded ratio to 49% in 2014 and then cost the City \$39 million more in debt service payments than it would realize in ARC savings by 2026. That's a NPV loss of \$36 million. And if you stretch those 13-year growth figures out to the full 22-year life of the bonds...





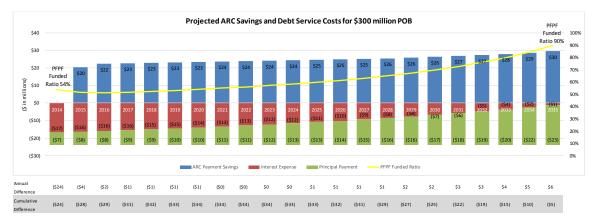
- Scenario is based on historical returns CAGR of approx. 5.6%
- Net present value of projected savings is negative \$8 million
- \$529 million in total debt service costs (interest and principal payments)

Note: Projections are based on 5.6% overall cost of capital and assume \$300 million in bond proceeds less transaction fees are deposited during the midpoint of the fiscal year ending October 1, 2014.

...then the City would experience an NPV loss of \$8 million over the term of the issuance.

Recall our next scenario modeled market projections based on conservative expectations of some notable investors for the new, lower growth outlook for the 21st Century U.S. economy.





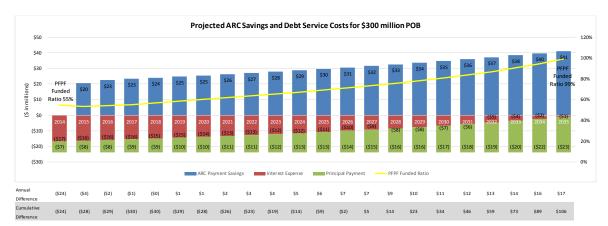
- Scenario is based on conservative expectations of notable investors for U.S. economy growth outlook (5.4% CAGR assuming 6.0% return for equities and 3.5% for fixed income per annum)
- Net present value of projected savings is negative \$14 million
- \$529 million in total debt service costs (interest and principal payments)

Note: Projections are based on 5.6% overall cost of capital and assume \$1 billion in bond proceeds (less transaction fees) are deposited in the fiscal year ending October 1, 2014.

For \$300 million notional under these market conditions, the City would pay \$5 million more in debt service than it would realize in ARC savings, or what amounts to \$14 million in NPV losses.

Our last scenario is based on the assumptions of the Mediation Settlement Agreement.





- Scenario is based on Mediation Settlement Agreement investment return assumptions of 7.5% in fiscal 2014 and 7.25% thereafter
- Net present value of projected savings is \$61 million
- \$529 million in total debt service costs (interest and principal payments)

Note: Projections are based on 5.6% overall cost of capital and assume \$1 billion in bond proceeds (less transaction fees) are deposited in the fiscal year ending October 1, 2014.

Here again the fund would start out with an additional \$300 million and a 2014 funded ratio of 55%. The City would realize \$106 million more in ARC savings than it would pay in debt service on its POBs in this case. That amounts to a NPV savings of \$61 million. So long as returns are precisely what the system assumes, the PFPF would be 99% funded in 22 years. I also can mention that under this scenario, but assuming 7% annual returns, savings would drop to only \$11 million on a net present value basis. Anything less than 7% and you would start to experience losses again pretty quickly.

I'm going to stop there, since we already demonstrated the effect of volatility on initial principal infusions. Suffice to say that for downside volatility the magnitude of the losses is reduced when the notional amount is reduced, but the risk remains.

Indeed, the theme here is that the City would take on increased investment risk after issuing POBs, and the economic benefits would be contingent upon whether pension investments earn enough to avoid new deficits.

Unfortunately, we are exiting a low-interest rate environment for POBs. At the same time, we are exiting a period of American growth that benefited from the industrial revolution and its transition from an agrarian economy to a manufacturing economy – plus a number of investment bubbles – and emerging as a mature, service-based economy. Broadly speaking, this is why expert investors believe future market returns are unlikely to resemble the past. Take a look at this slide.



"Let me summarize what I've been saying about the stock market: I think it's very hard to come up with a persuasive case that equities will over the next 17 years perform anything like—anything like—they've performed in the past 17. If I had to pick the most probable return, from appreciation and dividends combined, that investors in aggregate—repeat, aggregate—would earn in a world of constant interest rates, 2% inflation, and those ever hurtful frictional costs, it would be 6%."

-Warren Buffett

"You're not going to get a 7.6% return when the U.S. is seeing a subpar [economic] growth rate of 2% to 3%...You'll be lucky to get 6% ... maybe 5%."

--Laurence Fink, chairman and CEO of BlackRock Inc.

"Risk taking in financial markets has always presented opportunities; otherwise no one would participate. But pensioner assets should not be used by public bodies for gambling on equities even if the expectation is that this will reduce their cost."

-- Jarmon Welch

Sources:

 Buffett, Warren and Loomis, Carol. "Warren Buffett on the Stock Market," Fortune Magazine, 22 Nov. 1999. 25 Aug. 2010. http://money.cnn.com/magazines/fortune/fortune_archive/1999/11/22/269071/index.htm

"Fink gives CalPERS a reality check." Pensions & Investments. 10 Aug. 2009. 11 Aug. 2010. http://www.pionline.com/article/20090810/PRINTSUB/308109987

"Why Public Pension Funds Failed," by Jarmon Welch (submitted for publication as of 10-19-13)

We all know the person in the first quote. I expect many of us know who said the second quote. Now let's see who has been doing their homework and paying attention. Who knows who the third person is on this slide – Jarmon Welch? For those of you who don't know, he's the PFPF's actuary.

Issuing POBs would expose the City to magnified investment risk and should be evaluated in that context. To my knowledge, the most comprehensive study of POB performance was conducted by the Center for Retirement Research at Boston College. The study examined outcomes for nearly 2,931 POB issuances from 236 state and local governments between 1986 and 2009. Most were out of the money.⁸

Still, we wouldn't reflexively condemn them. But we would only recommend that a municipality consider them as part of a comprehensive solution that includes new reforms to prevent future pension underfunding. It's really up to the Task Force to seek those reforms, especially in the event that the City takes on more risk.

⁸ Munnell, Alicia, Ashby Monk, Jean-Pierre Aubry and Thad Calabrese, "Pension Obligation Bonds: Financial Crisis Exposes Risks," Center for Retirement Research at Boston College, 9 January 2010 < http://crr.bc.edu/briefs/pension-obligation-bonds-financial-crisis-exposes-risks/>



Next, I want to talk about public asset sales, private public partnerships and asset monetizations – with the benefits or proceeds going to the Jacksonville Police and Fire Pension Fund. First, we should consider the overall wisdom of selling public assets.

It is generally the case that whenever a state or municipality sells, leases or monetizes a public asset, it does so at a discount, meaning there is some value to the populace that is lost in the transaction. This is true for a number of reasons, including the fact that private entities seek to purchase or operate enterprises at a profit, whereas governments can operate at breakeven or, in some cases, at a loss.

Also, the private sector values enterprises based in large part on existing revenues and will rarely include any projected upside in a purchase price. Meanwhile, many government assets are monopolies, like parking facilities near a commuter rail station. So even if those assets are underdeveloped, they have limited competition and significant potential.

There are exceptions to this – mostly when there is excess capital in the marketplace and limited deal-flow. In frothy markets, it's possible to sell assets at a premium. At the moment, though, there are plenty of public assets available, and a return to the 2006 market is unlikely.

It can also make sense for a government to explore selling an *underutilized* asset – one for which it has no ability to exploit for any common good. It is our understanding that there is municipal real estate that is vacant – assets for which Jacksonville has no affirmative plans to develop into anything with a community purpose. So long as this is the case, it can make sense to sell or transfer these assets to experienced developers in exchange for revenue and the promise of future enterprise. This kind of deal can help cities avoid urban blight and expand their tax-base.

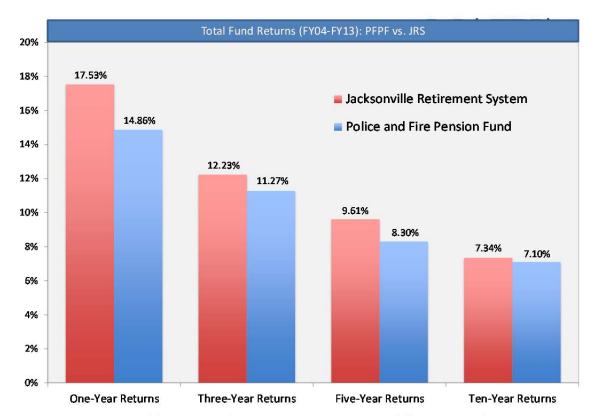
Nevertheless, it is incumbent upon a government to act on behalf of its citizenry in order to maximize compensation when relinquishing a spoke in the common wheel. This is best done after preparing the asset for sale – in the same way someone washes their used car before putting it on eBay – and conducting a multi-party auction to attract the most bidders. Again, eBay is a fine example, whereas non-competitive bids, private deals and direct transfers are problematic. It is hard to determine a fair value when only one party is allowed to bid.

Finally, there is nothing wrong with pension funds investing in real estate. But part of the fund's fiduciary responsibility to its members is to diversity its portfolio strategically. By contrast, the value of local real estate rises and falls in lock-step with the economic fortunes of the City itself – in the same way the City's ability to afford its annual pension expense does. These things are both dependent upon economically related forces. So investing in local real estate is antithetical to the theory of diversification. It is using the pension fund to double-down on the City's economic future.



In sum, Jacksonville should prepare its "lazy assets" for sale via competitive bids and use the proceeds for a public good. There is every reason to consider funding the PFPF a public good. But if the pension fund is serving its purpose well – functioning efficiently according to its charter – then its diversified portfolio should ensure a maximum return. Pensioners would be better served if the City were to transfer the proceeds of a sale to the PFPF to invest according to a strategic deployment of its assets.

Lastly, I want to address the Fund's investments. In recent periods for which public data are available, the PFPF's returns have lagged those of the Jacksonville Retirement System (JRS) – the City pension system that jointly manages the assets of the General Employees' Pension Plan and the Corrections Officers Pension Plan. This is true over the last ten years, over the last five years, over the last three years and also last year.



Sources: Summit Strategies Group PFPF 2013 Flash Report, 30 September 2013; Summit Strategies Group JRS 2013 Flash Report, 30 September 2013

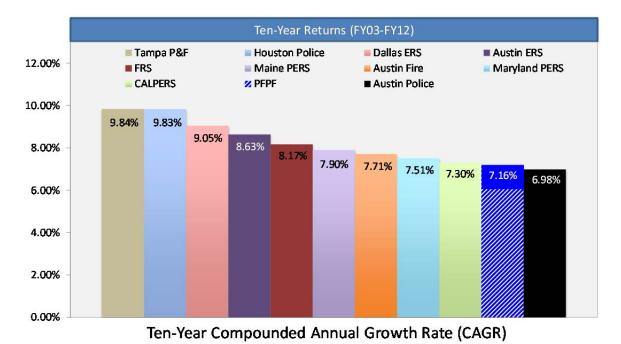
Note: The Jacksonville Retirement System jointly manages the assets of the General Employees Pension Plan and the Corrections Officers Pension Plan.

We were limited a little in comparing the PFPF's performance to other public funds in addition to JRS, because PFPF is on a September 30th fiscal year; most pension funds are on a June 30th



fiscal year, and these comparisons are only relevant over similar time periods. Nevertheless, we were able to find a number of funds of similar size that are on September 30th fiscal years, or simply report their results quarterly. That allowed us to back into annual periods that ended on September 30th.

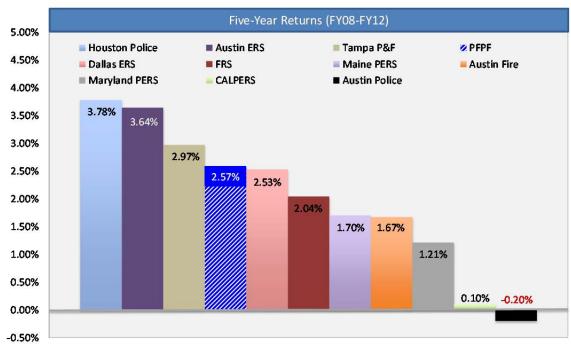
Over the last ten years for which data are available – 2003 to 2012 – PFPF underperformed most of the pension funds we looked at.



Note: These public plans all have assets > \$500mm and 9/30 reporting periods; returns are taken from public disclosures as of 9/30/2012.

Over the last five years for which data are available – 2008 to 2012 – PFPF performed better relative to these funds' performance.



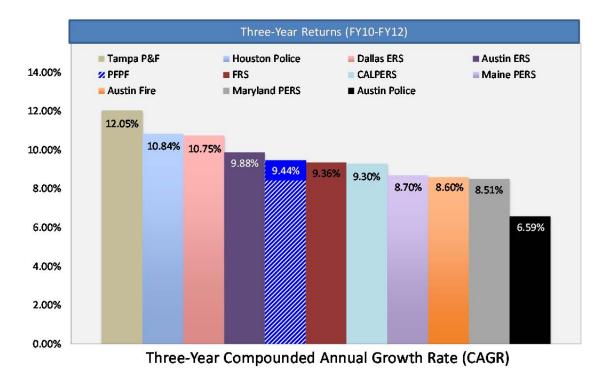


Five-Year Compounded Annual Growth Rate (CAGR)

Note: These public plans all have assets > \$500mm and 9/30 reporting periods; returns are taken from public disclosures as of 9/30/2012.

And over the last three years for which data are available -2010 to 2012 - PFPF performed close to the middle of the pack.





Note: These public plans all have assets > \$500mm and 9/30 reporting periods; returns are taken from public disclosures as of 9/30/2012.

One overlooked but key contributing factor to PFPF's performance over time is the outsized amount of administrative and investment fees it pays.

A Comparison of Total Plan Fees: PFPF vs. FRS						
	PFPF (FY13)	PFPF (FY12)	FRS (CY11)			
Professional Services Fees	\$5,937,000	\$5,745,347	N/A			
Administrative Expenses	\$3,265,154	\$2,547,264	N/A			
Total Fees	\$9,202,154	\$8,292,611	\$376,721,095			
Assets (Beginning of Year)	\$1,173,771,828	\$1,116,370,870	\$126,579,719,608			
Fees as Percentage of Assets	78 bps	74 bps	30 bps			

Sources: PFPF 2012 Annual Report (p. 4) and document supplied by PFPF: Attachment Detail for Page 6, Item 4; Florida Retirement System 2011-2012 Annual Report (pp. 24 and 27)

All-in costs for the FRS Defined Benefit Plan include:

- 1. Investment management costs, including those related to externally managed assets and internally managed assets
- Overlay costs (forex, asset allocation programs, etc.)
- Oversight, custodial and other costs (staff salaries, direct expenses, overhead, etc.), trustee and custodial services, consulting and performance measurement
 costs, audit costs, legal expenses and other asset-related costs (benefits administration costs, actuarial valuations fees, etc.)



According to PFPF's disclosures, it paid 74 basis points in all-in fees in fiscal year 2012 and 78 basis points in 2013. By comparison, the State Florida Retirement System paid 30 basis points in fiscal year 2011, the last year for which public data are available.

When you are a large fund like PFPF, at some level you are the market. As a result, high fees serve as friction that practically guarantees a large fund will underperform. Meanwhile, indexfunds mirror the market and offer fees for around 20 basis points or less. A more heavily indexed portfolio could significantly reduce the PFPF's drag. Whereas 78 basis points effectively means the fund has to earn an extra .78% each year just to reach its actuarially assumed rate net-of-fees.

There are a number of reasons PFPF is paying too much in expenses and fees, including that the fund is over-emphasizing active management of its portfolio.

A Comparison of Active & Passive Asset Management: PFPF vs. FRS								
	PFPF (Targets)*		FRS**		PFPF (Weighted)		FRS (Weighted)	
Asset Class	Active	Passive	Active	Passive	Active	Passive	Active	Passive
Equity	83.0%	17.0%	51.1%	48.9%	45.8%	9.2%	30.2%	28.9%
Fixed Income	66.7%	33.3%	51.0%	49.0%	15.0%	7.5%	11.2%	10.8%
Real Estate	100.0%	0.0%	100.0%	0.0%	15.0%	0.0%	7.6%	0.0%
Private Equity	-	-	100.0%	0.0%	-	-	5.2%	0.0%
Strategic	100.0%	0.0%	100.0%	0.0%	7.5%	0.0%	5.1%	0.0%
Cash	-	-	100.0%	0.0%	-		0.9%	0.0%
Total	-	-	-	-	83.3%	16.7%	60.3%	39.7%

^{*}Source: Summit Strategies Group Memo Dec 20, 2012, Recommended Targets

Take a look at PFPF targets for active vs. passive investments compared to FRS. PFPF's recommended target portfolio for fiscal year 2012 contains only about 17% passively managed investments. And the recommended target for equities was 83% active. I didn't show this here, but PFPF's target for large cap equities was two-thirds active and one-third passive in fiscal year 2012. That is the most efficient market there is.

What I did do is isolate in this next slide PFPF's equity allocation for active and passive strategies next to CalPERS. You can see they are almost inverted.

^{**}Source: FRS Staff, Florida SBA Quarterly Report June 2013



A Comparison of Active % Passive Equity Management								
	Jacksonville PFPF (Recommended Targets)		Florida Retin	ement System	CalPERS			
	Active	Passive	Active	Passive	Active	Passive		
Equities	83.0%	17.0%	51.1%	48.9%	31.0%	69.0%		

Sources: Summit Strategies Group Memo Dec 20, 2012, FRS Staff, CalPERS Facts at a Glance January 2013 (p. 4)

I'm going to stop now and allow David to return for the remainder of his remarks.

END