



Office of the State Actuary

"Securing tomorrow's pensions today."



January 25, 2012

OSA Study Results LEOFF Merger

Matt Smith, FCA, EA, MAAA
State Actuary

Aaron Gutierrez, MPA, JD
Policy Analyst

Today's Agenda

- Study mandate
- "Studying the Issue"
- Before a merger (base for comparison)
- Defining a hypothetical merger
- Highlights of results under different scenarios
- More information in report



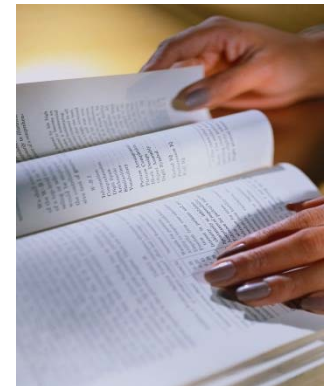
Study Mandate

- Budget proviso requires OSA to
 - “Study the issue of merging (LEOFF Plan 1 and LEOFF Plan 2) into a single retirement plan”
 - Provide specific actuarial analysis
 - Solicit stakeholder input
 - Representative samples included in report



Studying The Issue

- Mergers are complex
- Can involve more than just assets and liabilities
- Examples
 - Governance
 - Funding policy
 - Benefits
- Changes may have tax and legal implications
- Impacts will depend on proposal
 - Not defined in study mandate



Actuarial Analysis Requires Defined Proposal

- Study mandate requires actuarial analysis
 - Analyze the impact on contribution rates and changes to available assets under a range of possible economic and demographic experience and a variety of funding policies.
- Cannot be completed without a defined proposal
- OSA defined a hypothetical merger for analysis purposes only
 - Hypothetical merger was not a recommendation or a prediction



OSA Consulted Tax And Legal Counsel

- To ensure assumptions for hypothetical merger were reasonable
- Federal tax analysis
 - Ice Miller, LLP
- State analysis
 - Washington Attorney General's Office
- All legal analysis reprinted in full in report



Legal Analysis Informed Assumption Setting

- “Merger” defined in federal law as a merger of assets and liabilities
 - Assets “usable” across the merged plan
- Mergers not generally prohibited under federal or state law
 - LEOFF 1 is the product of a merger
 - Certain restrictions may apply based on approach taken
- Most pension benefits are protected under state law
 - There is disagreement on what rights are protected and whether or not there are exceptions to that protection



Approach To Analysis

- Began by analyzing current plan health and risks
 - Assumes the continuation of past practices based on historical data, including assumptions for:
 - Funding (percentage of actuarially required contribution made)
 - Benefit improvements for both plans
- Based on legal analysis and OSA's professional judgment, we defined the hypothetical merger
- Compared results to plans before merger
- Then, we modified the funding policy twice and reviewed the changes in each scenario



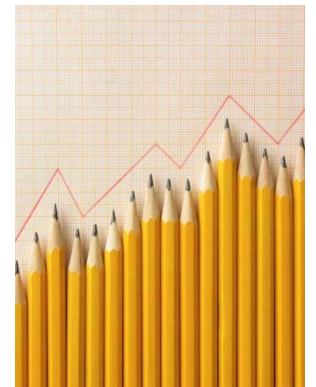
Before Merger: LEOFF 1 Overview

- Generally healthy
 - Funded status over 100 percent
- Closed in 1977; no new members
 - No contributions collected so long as the plan is fully funded (over 100 percent)
- Expected to have a surplus of assets of \$1.2 billion
 - On a present value basis
 - Surplus means if all assumptions are realized, the plan will have more assets than needed to cover all benefits
- Keyword: “expected”
 - If assumptions do not hold true, the surplus could be bigger, smaller, or could become an unfunded liability



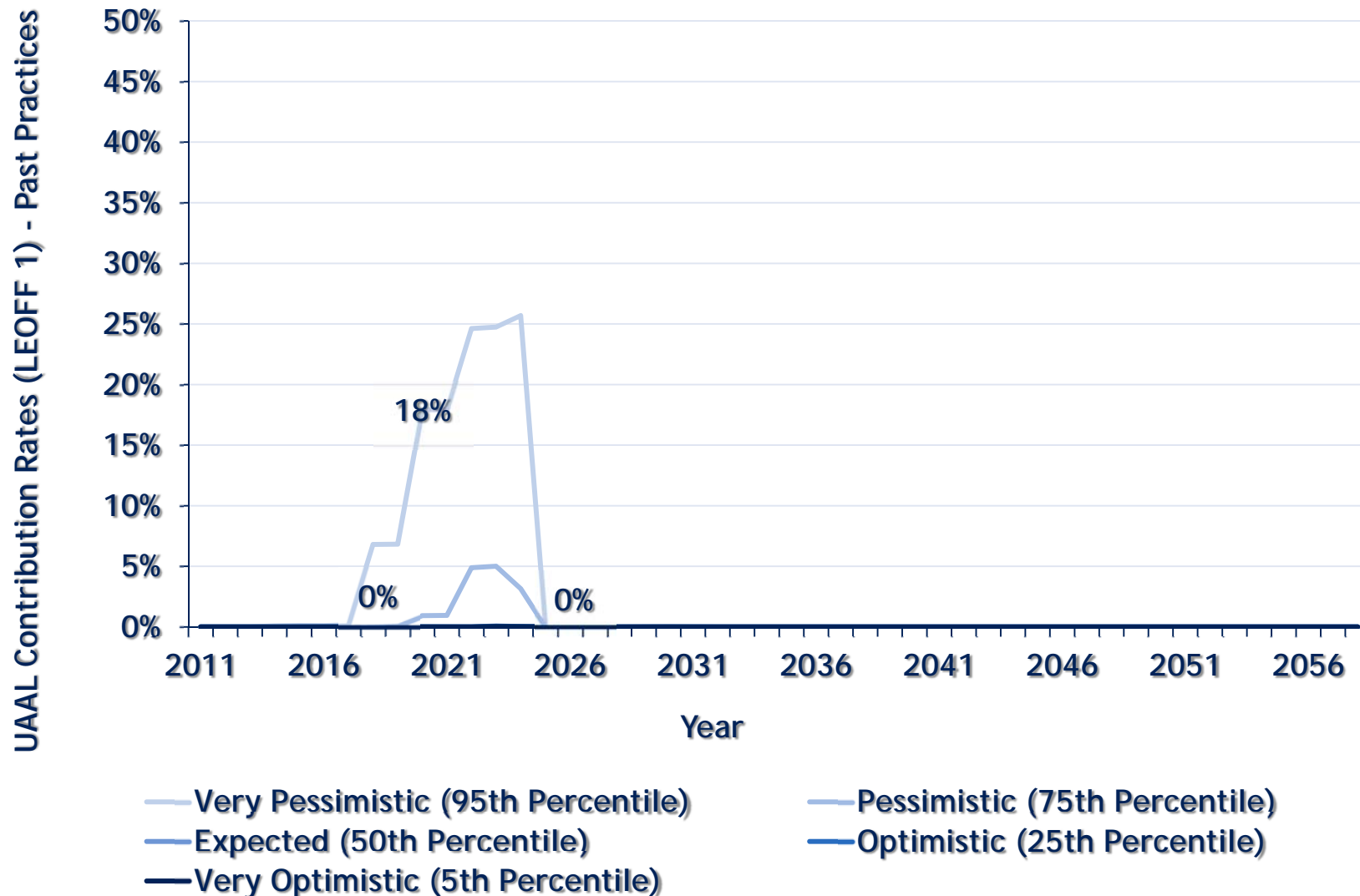
Before Merger: LEOFF 1 Rates Could Spike

- Under pessimistic scenarios, unfunded liability appears
- Unfunded liability could result in contribution rate spike prior to 2024
 - All costs amortized by June 30, 2024
 - On very pessimistic basis, contribution rates could go from 0 percent to 25 percent in just over a decade
 - Contributions would be made by the state under the assumed funding policy



Before Merger: LEOFF 1 Projected Contribution Rates

Figure 1b - Contribution Rates, LEOFF 1 Before Merger



Before Merger: LEOFF 1 Has Pay-Go Risk

- No funding policy after 2024
- If unfunded costs arise after 2024, they would be on a “pay-go” basis
 - On a very pessimistic basis, yearly costs of as much as \$440 million



Before Merger: LEOFF 1 Chance Of Pay-go

Figure 1c - Pay-Go, LEOFF 1 Before Merger



*Pay-Go costs on top of normal pension costs.



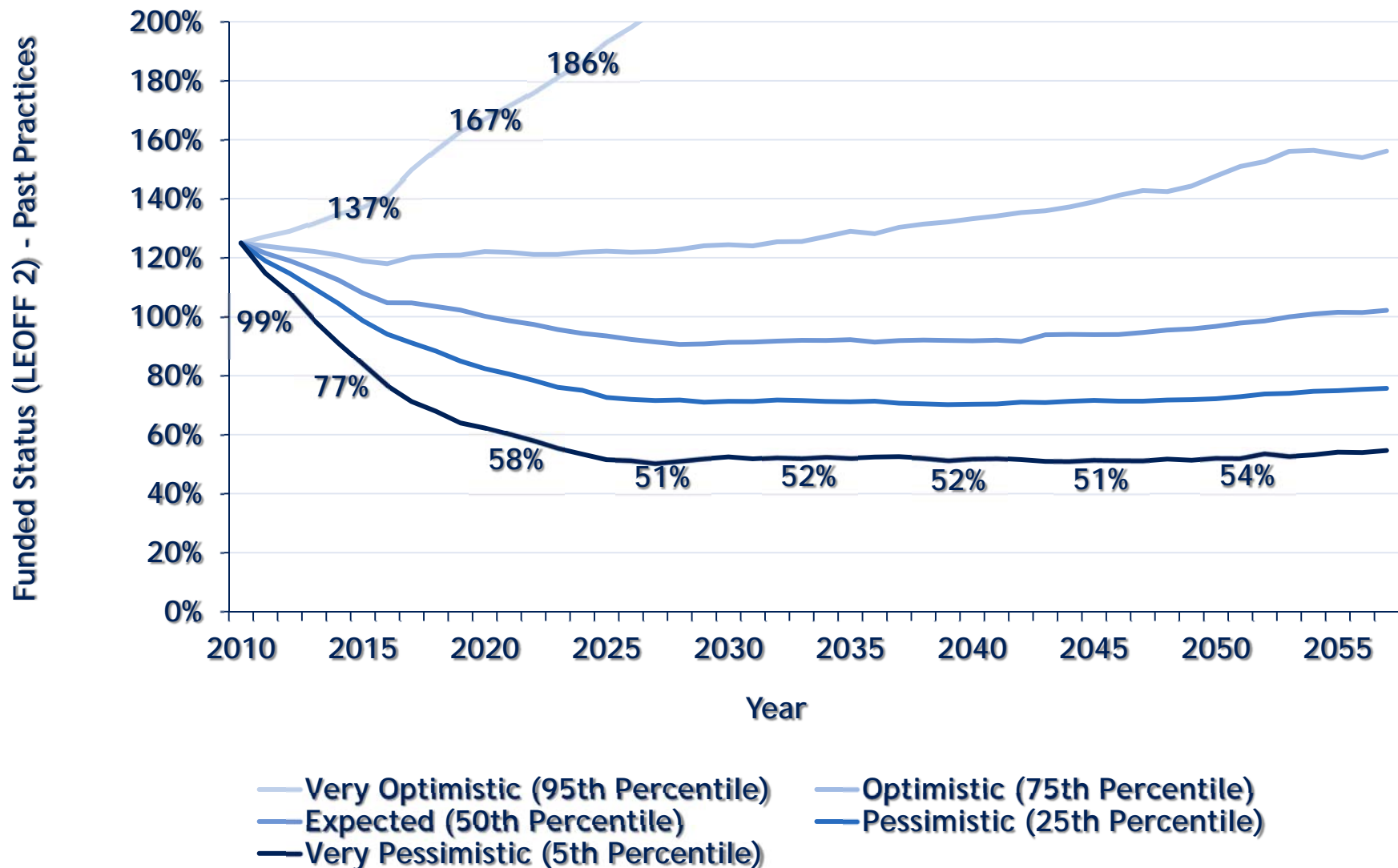
Before Merger: LEOFF 2 Overview

- Generally healthy
 - Funded status over 100 percent
- No surplus
 - It is an open and ongoing plan with unfunded future benefits
 - As of today, all earned benefits are funded
- Expected to fall out of full funding
 - Still considered healthy
- Rates expected to more than double by 2050 if past practices continue
- Virtually zero chance of pay-go



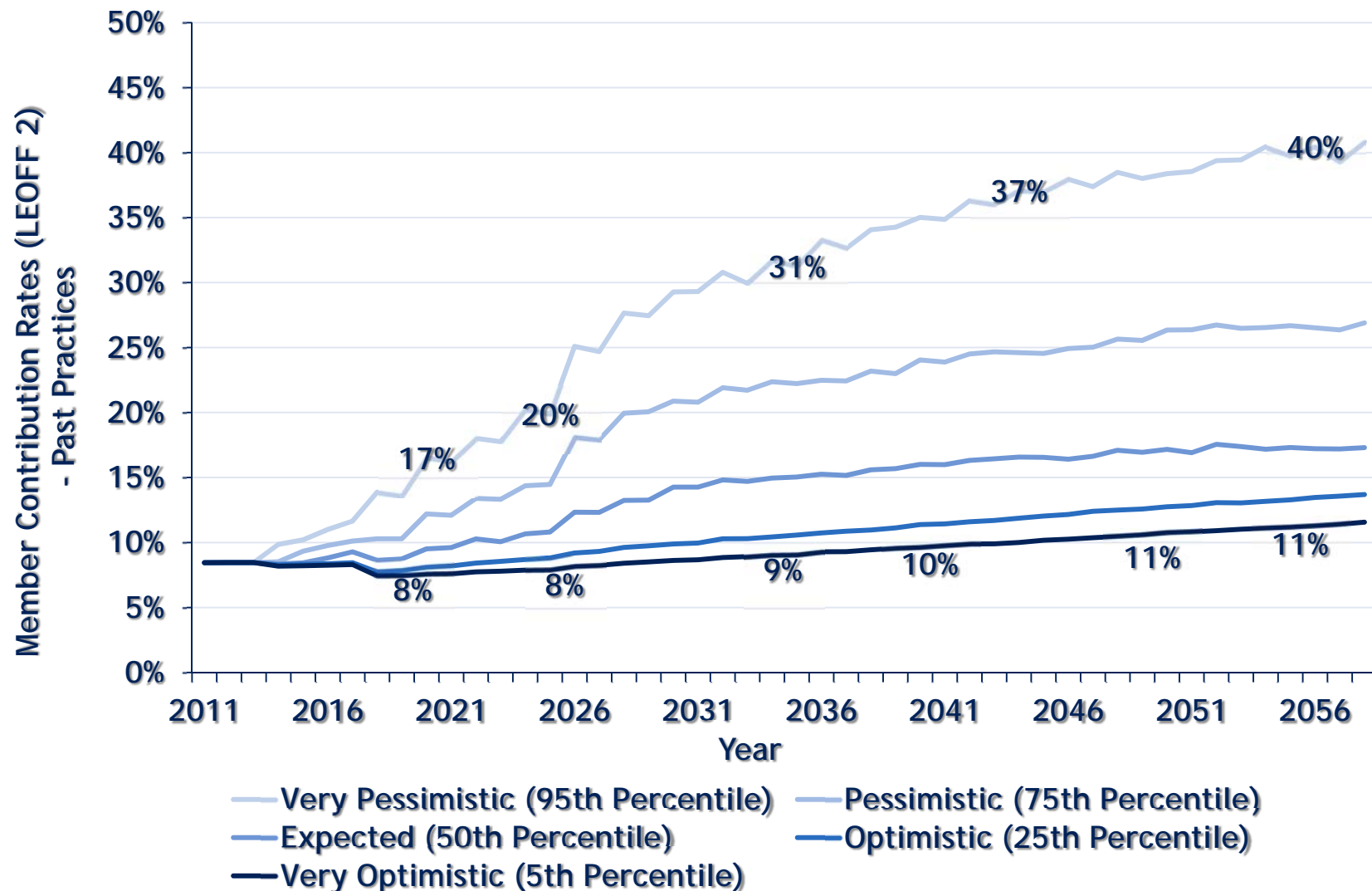
Before Merger: LEOFF 2 Funded Status Expected To Drop Below 100 Percent

Figure 1e - Funded Status , LEOFF 2 Before Merger



Before Merger: LEOFF 2 Contribution Rates Expected To More Than Double

Figure 1f – Contribution Rates, LEOFF 2 Before Merger



Recap: Approach To Study And Plans Before Merger

- Study mandate requires actuarial analysis and stakeholder input
- To meet the mandate, we had to define a hypothetical merger
- Both plans are currently healthy
- Under pessimistic outlooks, LEOFF 1 has potential risks
 - Contribution rate spikes
 - Pay-go
- LEOFF 2 is expected to fall out of full funding, but still remain healthy
- LEOFF 2 rates expected to more than double, if past practices continue



How Did We Define The Hypothetical Merger?

- Merger of assets and liabilities
- Member benefits not reduced by the merger
- Plan costs/rates calculated using funding policies in place for most of state's open pension plans
 - Aggregate actuarial cost method
 - Eighty percent EANC contribution rate floor
- Plan costs will be shared as follows
 - Fifty percent member
 - Thirty percent employer
 - Twenty percent state
- All active members of the merged plan will contribute to plan costs
 - Currently, no contributions are required for LEOFF 1
- Not a recommendation or prediction



Why Did We Choose These Assumptions?

- Study mandate did not specify funding policy or governance
- Chose generic assumptions
 - Most are consistent with state's other open plans
 - Applied LEOFF 2 cost sharing because there would be very few active LEOFF 1 members in combined plan



Hypothetical Merger Is Not The Same As Merger Bills

- Two merger bills differ from each other and from hypothetical merger
 - HB 2097 (2011)
 - HB 2350 (2012)
- Analysis and pricing will not be identical
- Fiscal note for newest bill in process



Overview Of Results Of Hypothetical Merger

- Could have a cost or savings, depending on economic outlook
- LEOFF 1 surplus is incorporated into merged plan
 - Impact depends on future economic conditions
- Eliminates contribution rate spike for LEOFF 1
- Virtually zero chance of pay-go for combined plan
 - LEOFF 2 already virtually zero chance before merger



Hypothetical Merger Could Have Cost Or Savings

Changes to Total Pension Contributions		
(Dollars in Millions)	Optimistic/ Expected	Pessimistic
2013-2015		
General Fund	(\$18.6)	(\$18.6)
Non-General Fund	0.0	0.0
Total State	(\$18.6)	(\$18.6)
Local Government	(27.3)	(27.3)
Total Employer	(\$45.9)	(\$45.9)
Total Employee	(\$45.9)	(\$45.9)
2013-2038		
General Fund	(\$369.8)	(\$8.9)
Non-General Fund	0.0	0.0
Total State	(\$369.8)	(\$8.9)
Local Government	(556.6)	461.2
Total Employer	(\$926.5)	\$452.2
Total Employee	(\$926.5)	\$770.2

Assumes plan(s) will be funded at the actuarially required level and that no benefit improvements will occur in the future.



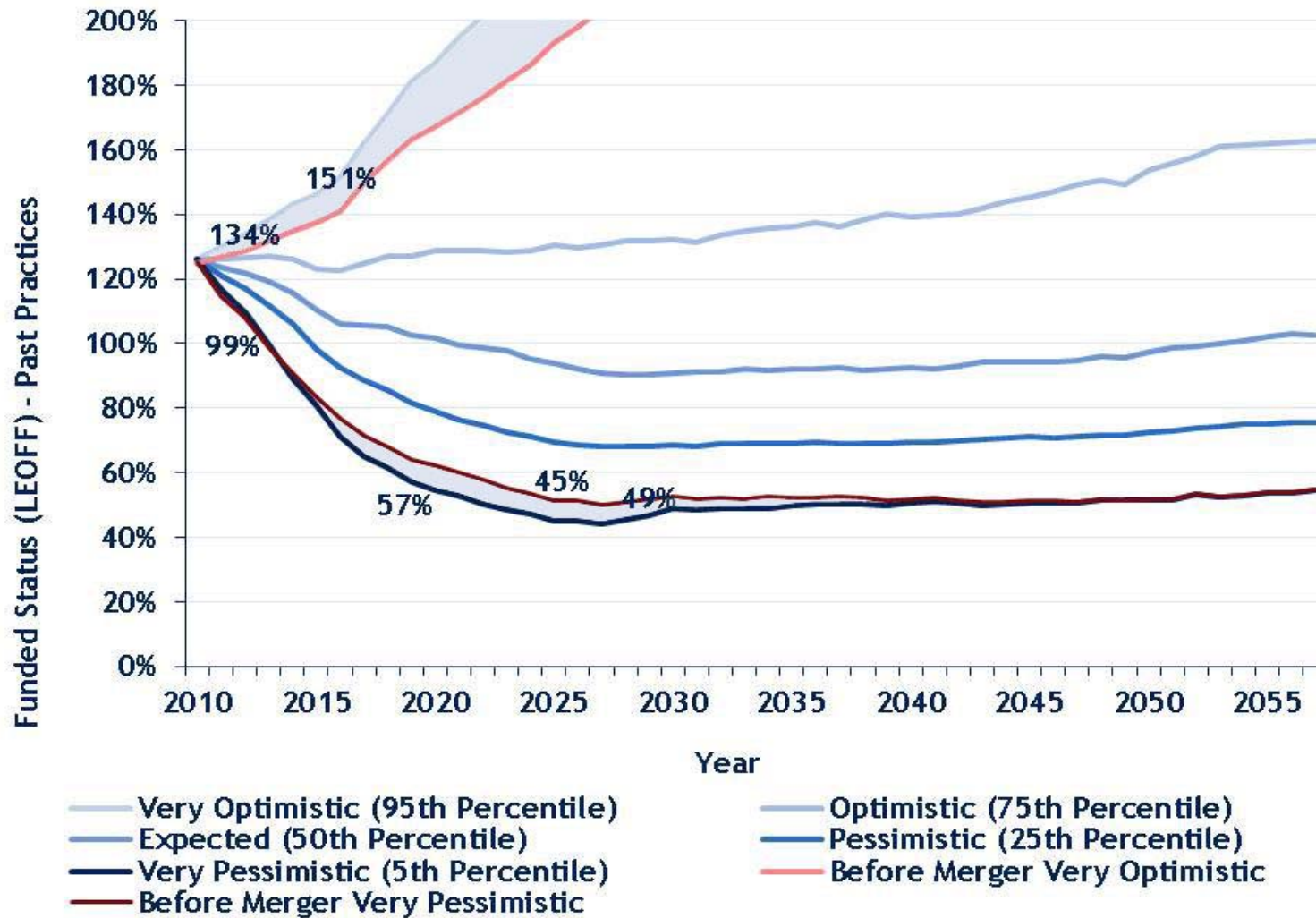
Role Of LEOFF 1 Expected Surplus

- LEOFF 1 surplus is incorporated into merged plan
- Surplus exists on an expected basis only
 - If surplus realized, merger would drive down plan costs and rates
 - Under unfavorable conditions, surplus may be smaller or not exist
 - If surplus not realized, merger would drive up plan costs and rates
- Combined plan has bigger stake in game than either plan alone
 - Better outcomes in favorable conditions
 - Worse outcomes in unfavorable conditions



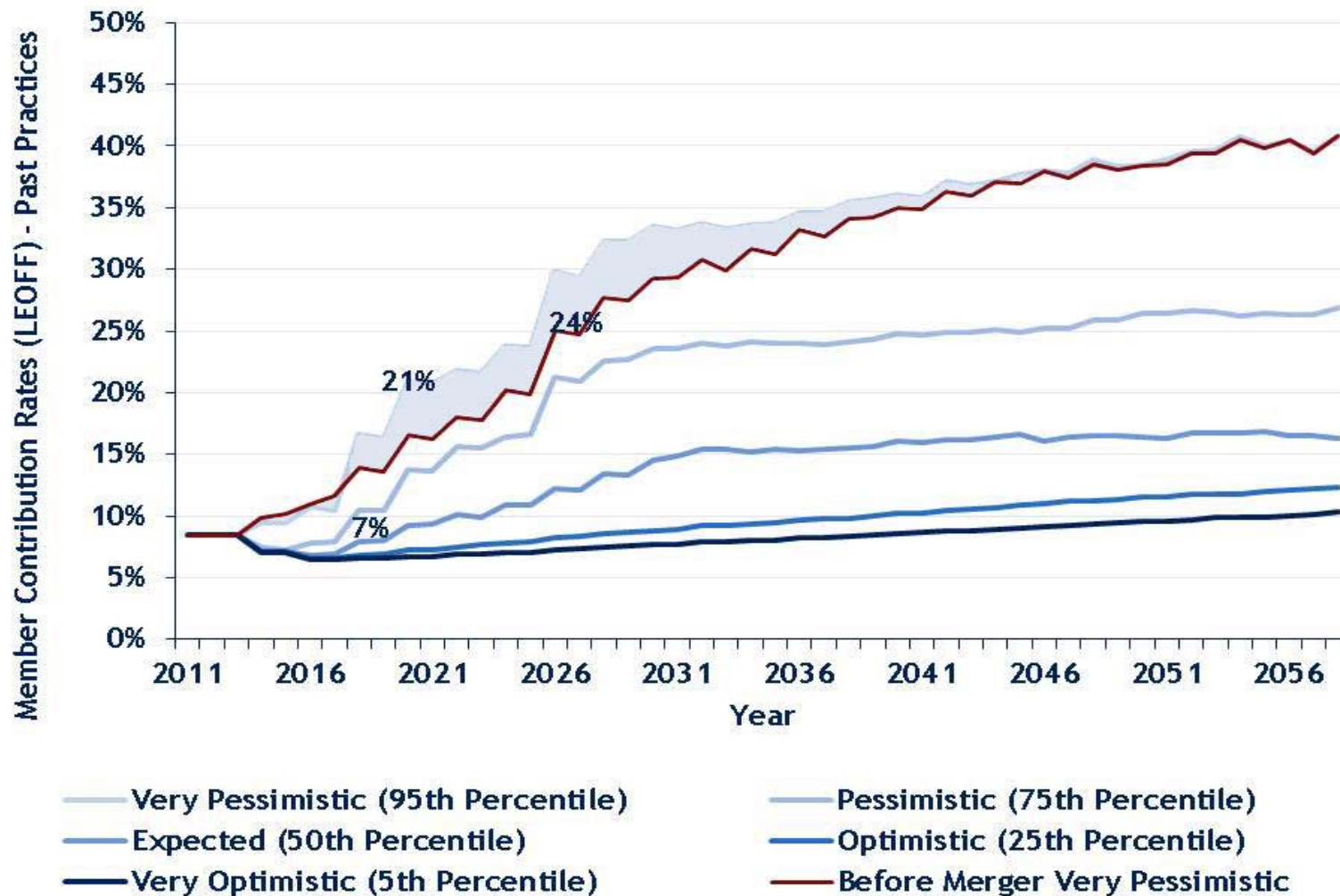
Hypothetical Merger: Projected Funded Status

Figure 2a - Funded Status, LEOFF Merged Plans (With Shading)



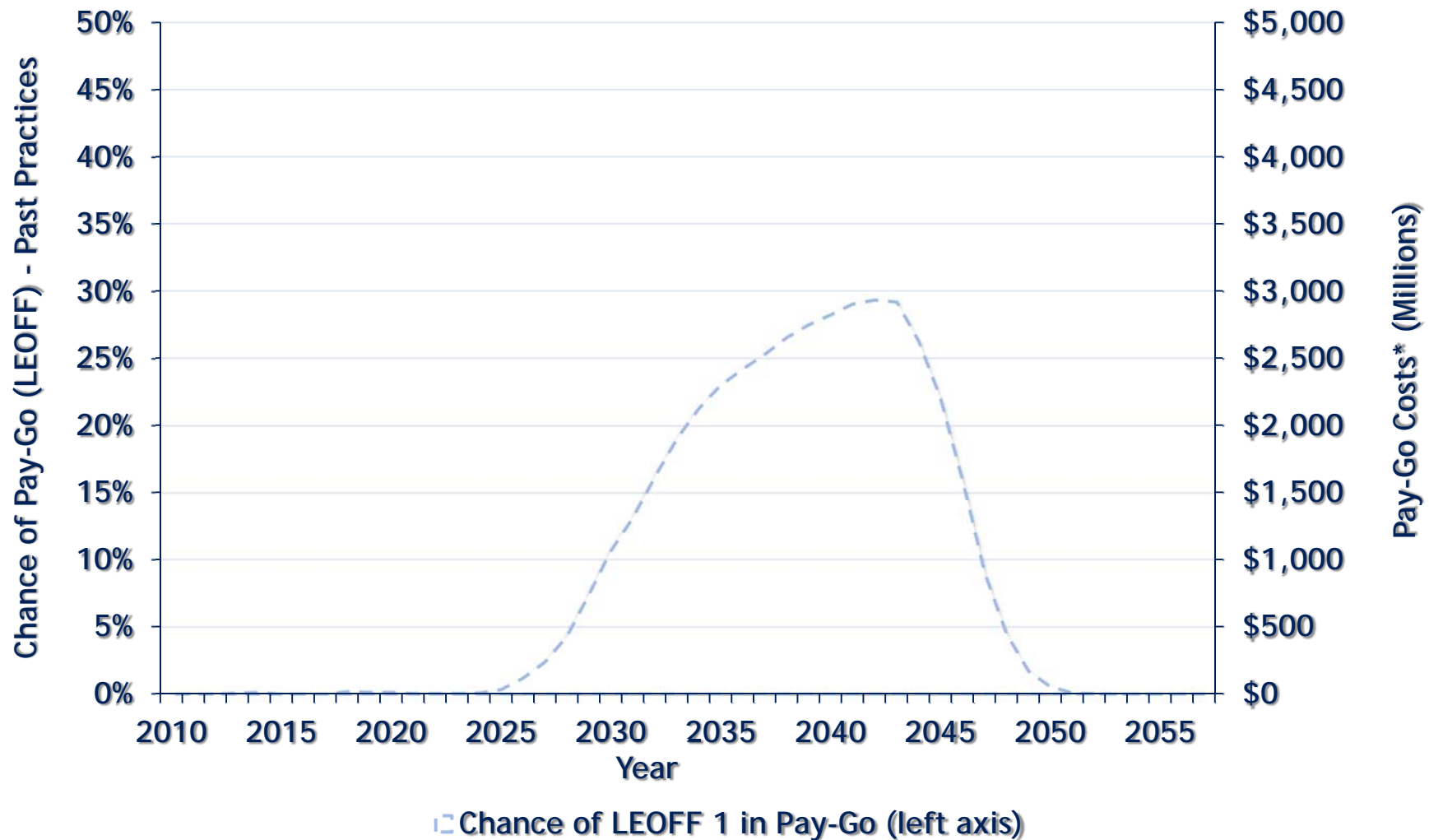
Hypothetical Merger: Projected Rates Compared to LEOFF 2

Figure 2b - Member Contribution Rates, LEOFF Merged Plans (With Shading)



Hypothetical Merger: Pay-Go Risk

Pay-Go After Hypothetical Merger



**Pay-Go costs on top of normal pension costs.*



Changed Funding Policy And Reviewed Results

- Two alternative scenarios
 - Zero percent rate for LEOFF 1 members
 - Maximum rate for LEOFF 2 members
- Other assumptions unchanged



Sample Alternative 1: Zero Percent Rate For LEOFF 1 Members

- Little difference due to few active LEOFF 1 members
 - No change in liabilities (only changes cost sharing)
 - Small change in contributions
- Any risk forgone by LEOFF 1 members is transferred to LEOFF 2 members and employer/state



Sample Alternative 1: Budget Impacts

Figure 3b

Change in Total Pension Contributions* - Merged Plans, No LEOFF 1 Member Contributions (Dollars in Millions)			
	Optimistic	Expected	Pessimistic
2013-2015			
General Fund	\$0.0	\$0.0	\$0.0
Non-General Fund	0.0	0.0	0.0
Total State	\$0.0	\$0.0	\$0.0
Local Government	0.0	0.0	0.0
Total Employer	\$0.0	\$0.0	\$0.0
Total Employee	(\$1.5)	(\$1.5)	(\$1.5)
2013-2038			
General Fund	\$0.0	\$0.0	\$1.8
Non-General Fund	0.0	0.0	0.0
Total State	\$0.0	\$0.0	\$1.8
Local Government	0.0	0.0	5.6
Total Employer	\$0.0	\$0.0	\$7.5
Total Employee	(\$2.8)	(\$2.8)	\$4.5

* Compared to Merged Plans scenario.

Assumes plan(s) will be funded at the actuarially required level and that no benefit improvements will occur in the future.



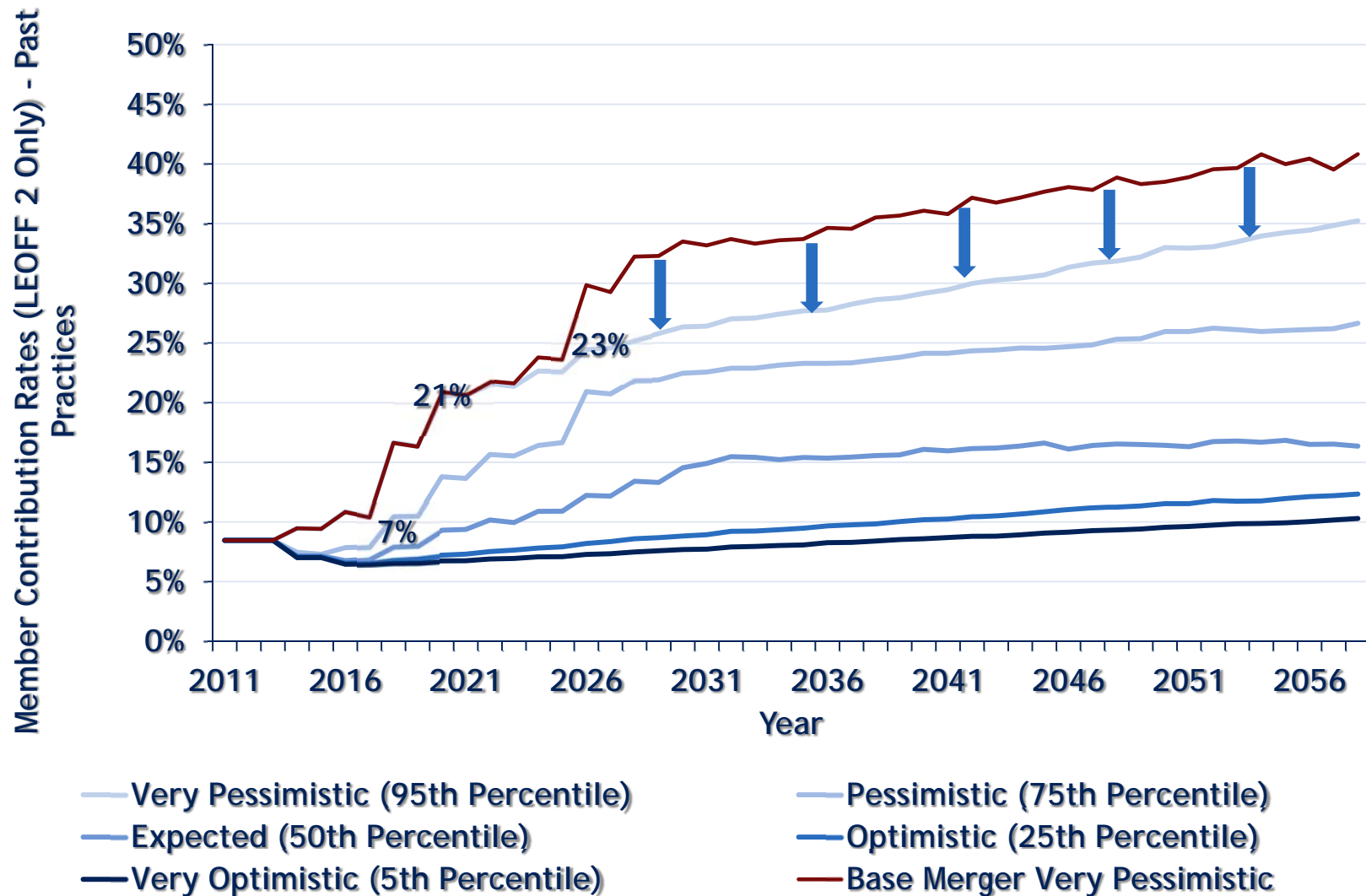
Sample Alternative 2: Maximum Rate For LEOFF 2 Members

- Member maximum: 20 percent, plus 50 percent of the cost of any improvements
 - Twenty percent represents highest simulated rate (90th percentile) before merger
- Assumed any excess would be paid by employers
 - Employers absorb risk forgone by Plan 2 members
- No change in plan liabilities compared to hypothetical merger
- Under most outlooks, rates never hit maximum
- Cost shift only triggered in very pessimistic outlooks



Sample Alternative 2: Projected Contribution Rates

Figure 4a



Sample Alternative 2: Budget Impacts

Figure 4d

Change in Total Pension Contributions* - Merged Plans, No LEOFF 1 Member Contributions, Maximum LEOFF 2 Member Rates			
(Dollars in Millions)	Optimistic	Expected	Pessimistic
2013-2015			
General Fund	\$0.0	\$0.0	\$0.0
Non-General Fund	0.0	0.0	0.0
Total State	\$0.0	\$0.0	\$0.0
Local Government	0.0	0.0	0.0
Total Employer	\$0.0	\$0.0	\$0.0
Total Employee	\$0.0	\$0.0	\$0.0
2013-2038			
General Fund	\$0.0	\$0.0	\$0.0
Non-General Fund	0.0	0.0	0.0
Total State	\$0.0	\$0.0	\$0.0
Local Government	0.0	0.0	0.0
Total Employer	\$0.0	\$0.0	\$0.0
Total Employee	\$0.0	\$0.0	\$0.0

* Compared to Merged Plans, No LEOFF 1 Member Contributions scenario.
Assumes plan(s) will be funded at the actuarially required level and that no
benefit improvements will occur in the future.



Hypothetical Merger Is Not The Only Option

- Different methods can accomplish different goals or manage different risks
- For illustration purposes only, report looked at an alternative way to manage LEOFF 1 pay-go
- In brief, we found that making LEOFF 1 funding policy the same as PERS 1 and TRS 1, it virtually eliminated pay-go risk
 - Rolling ten-year amortization
 - No contributions collected unless unfunded liability exists
- More information and data in Appendix 5 of the report



Recap

- Analysis requires a defined proposal
- In order to respond to study mandate, we created a hypothetical merger
 - Not a recommendation or prediction
- Hypothetical merger is likely to result in short-term savings
- Could result in long-term cost or savings (over \$1 billion either direction), depending on the economic outlook
- No material impact from alternate funding policies reviewed
- Different methods can accomplish different goals
 - For example, if rate stability and reducing pay-go risk are the only goals, there are ways to address them without a merger



Questions?

- Please refer to the full report for
 - All tax and legal analysis
 - Charts and tables
 - Assumptions and methods used
 - http://osa.leg.wa.gov/Actuarial_Services/Publications/PDF_Docs/Pension_Studies/11LEOFFMergStudy.pdf
- More information on OSA's Risk Model is available in the Risk Assessment
 - http://osa.leg.wa.gov/Actuarial_Services/RiskAssessment/documents/2010RA.pdf



Appendix

Total Pension Contributions				
(Dollars in Millions)	Optimistic/Expected		Pessimistic	
	Before	After	Before	After
2013-2015				
General Fund	\$131.5	\$112.9	\$131.5	\$112.9
Non-General Fund	0.0	0.0	0.0	0.0
Total State	\$131.5	\$112.9	\$131.5	\$112.9
Local Government	197.2	169.9	197.2	169.9
Total Employer	\$328.7	\$282.8	\$328.7	\$282.8
Total Employee	\$328.7	\$282.8	\$328.7	\$282.8
2013-2038				
General Fund	\$3,158.2	\$2,788.4	\$5,326.4	\$5,317.5
Non-General Fund	0.0	0.0	0.0	0.0
Total State	\$3,158.2	\$2,788.4	\$5,326.4	\$5,317.5
Local Government	4,737.3	4,180.7	7,512.9	7,974.0
Total Employer	\$7,895.5	\$6,969.1	\$12,839.3	\$13,291.5
Total Employee	\$7,895.5	\$6,969.1	\$12,521.3	\$13,291.5

Assumes plan(s) will be funded at the actuarially required level and that no benefit improvements will occur in the future.

