

The background of the entire page is a textured, artistic representation of a chalkboard. It features various mathematical symbols and numbers in different colors and sizes, including plus signs, minus signs, equals signs, and numbers like 2, 3, 4, 5, 6, and 8. The colors range from light green and yellow to dark brown and black, creating a complex, layered visual effect.

**ERS**

EMPLOYEES  RETIREMENT  
SYSTEM OF TEXAS

SUSTAINABILITY OF THE STATE OF TEXAS  
**RETIREMENT PROGRAM**  
REPORT TO THE 82ND TEXAS LEGISLATURE  
SEPTEMBER 4, 2012

## **MISSION**

ERS supports the state workforce by offering competitive benefits at a reasonable cost.

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# Executive Summary

## Purpose and Content

State policymakers directed the Employees Retirement System of Texas (ERS) to report on the actuarial and fiscal impacts from potential changes to the retirement plan. House Bill 1, the appropriations bill for the 82<sup>nd</sup> Texas Legislature, required ERS to perform a study following a recommendation that was part of the Legislative Budget Board's Government Effectiveness and Efficiency Report (GEER) to the 82<sup>nd</sup> Texas Legislature. House Bill 1 requires ERS to submit a report that includes options for changing:

- retirement eligibility,
- final average salary,
- benefit multiplier, and
- creation of a hybrid plan that includes defined benefit and defined contribution features, such as a two-part plan or a cash balance plan.

In response to the Legislative charge, ERS adopted an open, inclusive, and transparent study process that included input from external perspectives through information-gathering forums, meetings, interviews, surveys, and research. See **Appendix A – Retirement Study Glossary** for an explanation of terms used throughout the study and **Appendix B – Retirement Study Background and Methodology** for details about the study process.

The State of Texas has been a leader among states in its administration of its employees' retirement benefit plans. As requested, ERS is presenting numerous options for the Legislature to consider to address the current liability and maintain the state's workforce goals. A careful approach, in line with the State's policy objectives for its workforce and budget obligations, can produce a sound retirement plan.

*The State of Texas retirement plans touch Texas citizens in counties across the state:*

- 137,861 employees working for agencies, including elected state officials, district attorneys, and 36,806 law enforcement and custodial officers,
- 568 judges,
- 84,085 retirees, and
- 85,309 non-contributing members.

*(Per August 31, 2011 ERS Comprehensive Annual Financial Report)*

ERS manages a total of three retirement plan trust funds of which the investments are commingled. The "employee class" plan that includes state employees, elected state officials, and law enforcement and custodial officers is the largest plan ERS operates and is the focus of this report.

The report presents options as a framework for policymakers to use as they determine the future of retirement benefits for state employees. The ultimate decisions affect not only the state workforce, but also Texas taxpayers, the State as an employer, retirees, and beneficiaries. Decisions could also impact the state economy, which currently benefits from the \$1.6 billion in annual annuity income that is spent by state retirees – 96% of whom remain in Texas -- and the impact of trust fund investments in private and public Texas companies.

**Background:** The State of Texas has provided a defined benefit (DB) pension plan to its workforce since 1947. The State designed the plan to reward long-term state employees with a steady retirement income based on their years of service and final average salary. Paying for the retirement benefit has always been a shared responsibility – employees are mandatory members of the system and both employees and the State contribute a percentage of pay throughout each employee's working career. ERS pools the contributions into a trust fund, which it invests to earn revenue that pays most of the cost – about 64% – of retirement benefits. The Legislature determines the eligibility

requirements for retirement and the benefit formula.

The liability of the plan's trust fund is the total of all future retirement benefits that have been accrued by current plan members, meaning both actives and retirees. The calculation of future benefits uses certain economic, demographic, and behavioral assumptions adopted by the ERS Board of Trustees.

When the actuarial value of the trust fund is less than this total benefit liability, the gap is considered an unfunded liability. For multiple reasons discussed later in the summary, the ERS plan has been accruing unfunded liabilities since 2003.

An unfunded liability does not have to be paid immediately or all at once; it is similar to a home mortgage that is financed over a period of years. It is useful as a measure of a plan's current funded status. The unfunded liability, along with the total contribution rate to the plan and the liability for benefit accruals, help determine whether the plan is sustainable or if it needs to be modified to stay on track over the long term. According to Texas statutes, the ERS plans are actuarially sound if the contribution rate will pay off the unfunded liability in 31 years or less.

Sections 3, 4, and 5 of the report examine a wide variety of options for consideration in three distinct categories:

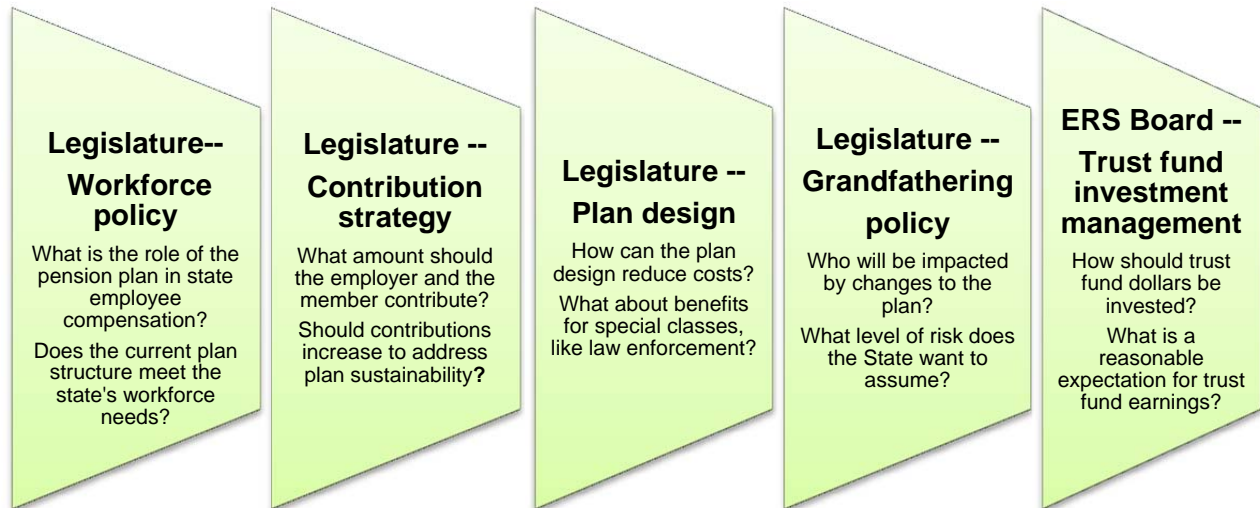
Increase Revenues – Report Section 3	Modify Plan Design – Report Section 4	Consider Alternative Plan Structures – Report Section 5
<ul style="list-style-type: none"> <li>• Option 3.1 – Increase State and/or Employee Contribution Rates</li> <li>• Option 3.2. – Use of Performance Obligation Bonds</li> <li>• Option 3.3. – One-time contribution</li> <li>• Option 3.4. – Ongoing Alternative Funding Sources</li> </ul>	<ul style="list-style-type: none"> <li>• Option 4.1 – Change the Final Average Salary Calculation to 60 Months</li> <li>• Option 4.2 – Eliminate the Use of Unused Leave to Establish Retirement Eligibility or Increase Service Time</li> <li>• Option 4.3 – Reduce the Benefit Multiplier for Future Service (with “buy-up” option)</li> <li>• Option 4.4 – Apply September 1, 2009 Changes to All Members</li> <li>• Option 4.5 – Reduce the Amount of Interest Paid on Retirement Account Balances</li> <li>• Option 4.6 – Establish a 5% per Year Pension Reduction and Eliminate the 25% cap for Members Retiring Prior to Age 60</li> </ul>	<ul style="list-style-type: none"> <li>• Option 5.1 – Choice of DC or Modified DB as Mandatory Plan</li> <li>• Option 5.2 – Cash Balance</li> <li>• Option 5.3 – Two Part Hybrid (DB-DC)</li> <li>• Option 5.4 – Switch to Mandatory DC</li> </ul>

The options fall within five policy areas subject to the jurisdiction of the Legislature and the ERS Board of Trustees. These areas include workforce policy, contribution strategy, plan design, grandfathering policy, and trust fund

management. The Texas Legislature determines the type of retirement plans, state and employee contribution amounts, eligibility for participation and retirement, and how benefits are calculated. The options in this report will require legislative changes to some or all of the existing policies.



**Figure E.1: Legislative and ERS Board Responsibilities**



In addition to the option analysis, the report also provides background information on each of the retirement plans ERS operates for the State of Texas and a detailed discussion of plan funding. The report also looks at what other states are doing as part of a 50 state benchmarking research comparing ERS plans to all other states. Appendices provide more detail on important information on legal and tax risks and other considerations.

**What factors compose a sound and sustainable retirement plan?**

**Definition:** For the purpose of this study, ERS defined a sound and sustainable plan as one that:

- is predictable and reasonable for taxpayers,
- lowers the current unfunded liability and doesn't generate future unfunded liabilities,
- has an equal balance between revenue and expenses and pays for benefits as they accrue,
- shares responsibility between employees and employers,
- fulfills its obligations to current members and retirees, and
- supports the State's workforce with retirement benefits that help attract and retain qualified employees in a wide variety of

positions. Plan design should be linked to the state's workforce policy objectives.

The report examined the retirement plan from many perspectives in order to give legislators a full picture as they make important workforce policy decisions. The answer to the following policy questions can help to evaluate funding, structure, and plan design decisions:

***What role do benefits play in state employee compensation?***

According to interviews and surveys, benefits are an important part of the state employee's compensation package. Benefits are important in public sector recruitment, since employers do not have access to many of the compensation tools available in the private sector, such as stock options, expense accounts, and bonuses, in addition to often-higher salaries.

***How important is it for the State to offer a competitive benefits package?***

- State employee turnover rates are increasing, with certain positions above 40%,
- According to the Texas State Auditor's Office, if skill-shortage trends continue, the State should expect significant competition in recruiting and retaining employees. Competition will be especially difficult in

- certain State jobs, which are already experiencing turnover rates that exceed 20%.
- Employees paid less than \$30,000 annually left state employment at a much higher rate than those earning above this level.<sup>1</sup>

- Employer feedback indicates that the retirement benefit is critical to attracting and retaining a qualified workforce.
- 95% of State of Texas employees said that their retirement benefits are a valuable part of their total compensation in a 2006 employee survey conducted by ERS.<sup>2</sup>

**Figure E.2 - Selected State Jobs with High Turnover for FY2011**

Job Titles	Average Headcount FY2011	Overall Turnover Rate Including Retirement	Percentage of Total State Headcount (excluding higher education)
Mental Retardation Assistant	7,884.00	42.2%	5.1%
Juvenile Correctional Officer	1,887.75	39.6%	1.2%
Licensed Vocational Nurse	1,253.25	33.5%	0.8%
Psychiatric Nursing Assistant	3,075.75	28.9%	2.0%
Child Protective Services Specialist	5,309.75	23.5%	3.4%
Trooper Trainee/Probationary Trooper	240.25	23.3%	0.2%
Correctional Officer	27,296.50	22.3%	17.7%

Source: State Auditor using data from Uniform State wide Payroll/Personnel System, Human Resources Information System, and Standardized Payroll/Personnel Reporting System.

(See **Common Appendix III: The State Workforce** for more information on the state workforce demographics, compensation, and turnover rates).

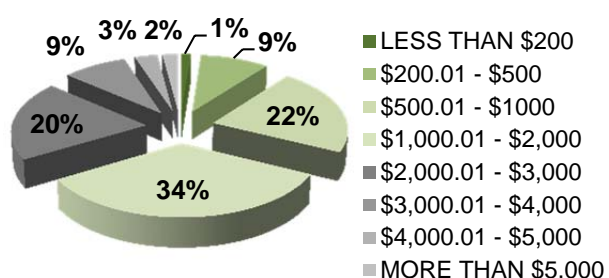
**What type of workforce does the State need?**

Historically the State has had a one size fits all retirement plan that targeted long-term career employees. The State also has a need to recruit for certain positions that benefit from short-term expertise and may want to consider offering retirement plan choices to recruit both types of workers.

**What wage replacement ratio should employees receive when they retire?**

Insufficient wage replacement ratios could affect the ability of state retirees to support themselves in retirement and put a strain on the State's other social services.

**Figure E.3: Gross Pay Comparison for 2012 Annuitants**



Includes all annuitants - Regular state, law enforcement, judges, elected class, and surviving beneficiaries.

The current plans are not overly generous. The July 2012 annuitant payroll for all ERS plans (see Figure E.3) shows that 66.4% of the annuity payments are less than \$2,000 per month before taxes and insurance are deducted.

**Current Status of the ERS Pension Plans**

The following chart indicates the status of the three ERS plan funds as of the last actuarial valuation in FY2011.

**Figure E.4 - FY2011 Actuarial Valuation Summary Results of ERS Plans**

	ERS	LECOS	JRS II
Accrued Liability	\$29 billion	\$993 million	\$300 million
Actuarial Value of Assets	\$24 billion	\$831 million	\$284 million
Unfunded Liability	\$5 billion	\$162 million	\$16 million
Funded Ratio	82.60%	83.70%	94.60%
Normal Cost Rate (Cost of benefits being earned)	12.31%	2.07%	20.38%
Actuarial Sound Contribution (Normal Cost + paying unfunded liability over 31 years)	17.47%	2.72%	21.76%
FY 2012 Total Contribution Rate	12.50%	0.50%*	11.97%

Source: ERS Actuarial Valuation as of August 31, 2011, Buck Consultants.  
\*LECOS contribution is paid by employee only.

Each of the three active ERS pension plans has accrued some level of unfunded liability. It is not unusual to have a long-term funding gap. Funding gaps in mature plans primarily occur for three reasons. Granting benefit enhancements such as retirement incentives or post-retirement adjustments such as a cost of living increase without paying for the increased costs can create a funding gap.

A plan can develop a funding gap because the plan experience is different from the assumptions used by the actuary to evaluate the funding status of the plan. It is important to actively review plan assumptions and make adjustments when needed. ERS evaluates the assumptions annually and conducts a

comprehensive experience study every four to five years and makes any needed adjustments. Nonetheless, the plans are still considered actuarially sound if the expected contributions over the next 31 years amortize the gap.

Finally, a plan can develop a funding gap when the level of contributions do not cover the normal cost of benefits and amortize the unfunded liability over a finite period of time. A financially sustainable plan needs a balance of revenues and expenses. This gap is more difficult to overcome since it is not a one-time occurrence. In this situation, the funding formula is out of balance, which causes liabilities to continue to accrue unless modifications are made to maintain the long-term sustainability of the plan.

A financially sustainable plan relies on a simple formula:

$$\begin{array}{c} \text{REVENUE} \\ \text{(Contributions + Investments)} \\ = \\ \text{EXPENSES} \\ \text{(Costs of Benefits + Administration)} \end{array}$$

## History of Changes to Improve Fiscal Soundness of ERS Plans

In 2009 the Texas Legislature made changes to the retirement program to address concerns from earlier that decade about its viability and funding, and as a result of demographic changes and state fiscal conditions. House Bill 2559 included the following provisions:

- Increased state employees' monthly contributions by 0.5% (to 6.5% of salary).
- The State contribution varied: 6.95% in FY2009, 6% in FY2012, 6.5% in FY2013.
- Law enforcement and custodial officers began to contribute an additional 0.5% to the supplemental retirement fund in addition to their 6.5% contribution to the ERS plan.
- The State modified benefits for employees hired on or after September 1, 2009 to reduce long-term liabilities. Changes included reducing annuities for employees who retire under the age of 60, basing final average salary calculations over a 48-month average rather than 36-month, eliminating the use of sick and annual leave to determine a member's retirement eligibility, and extending retirement eligibility for employees to age 65 with 10 years of service instead of age 60 with five years of service in addition to the Rule of 80.
- Required employees retiring after May 31, 2009 to wait 90 days before returning to state employment.
- Required state agencies to pay a surcharge equal to the state contribution when employing certain Return to Work retirees.

These proactive steps successfully lowered the cost of benefits to the point where the revenue is paying for the retirement benefits being earned (normal cost). In FY2012, the combined state

and employee contribution was 12.5% of payroll and the cost of benefits was 12.31%.

Even though current state and employee contributions are covering slightly more than the normal cost, the additional revenue is not enough to amortize the unfunded liability. In order to contain the liability and keep it from growing, the revenue must cover at least the interest on the liability in addition to normal cost.

## What caused the unfunded liability?

During the 1990s, the ERS plan had more money in the trust fund

*To contain and control the liability, the revenue must cover at least the interest on the liability and the normal cost.*

than was needed to pay all current and future liabilities. During this time there were multiple benefit increases and enhancements that increased plan costs. A retirement incentive also caused people to retire much sooner than assumed, adding more cost. These higher costs combined with investment losses led to the current unfunded liability. The unfunded liability began in 2003.

**Figure E.5 - Events affecting the ERS Plan Status from August 31, 2003 to August 31, 2011.**

Increased Unfunded Liability:	Decreased Unfunded Liability:
Investment earnings were less than assumed in three out of eight years.	Plan changes were implemented for new employees hired after August 31, 2009 that reduced the cost of benefits being earned.
Contributions not enough to pay down the unfunded liability over 31 years.	Employee pay increases were less than assumed, lowering future benefit payments.
More retirements than expected – primarily due to incentives and a generous return-to-work policy.	Mortality experience was greater than assumed.
More service at retirement than expected – primarily due to unused annual/sick leave balances.	
Actuarial assumptions were adjusted to incorporate recent retirement behavior based on experience study results.	

### What can we do about it?

Most states have proportionately far greater long-term unfunded liabilities than Texas. The GEER affirmed that the ERS retirement plans are not facing the same fiscal crisis as many other states. The Pew Center on the States recently recognized the State of Texas as one of 11 solid performing states in managing pension obligations. Even though the plan is strong compared to other states, we still have an unfunded liability that will continue to grow if corrective actions are not taken. This study takes a broad look at potential remedies, including options from other states and private industry as well as options to increase revenues, lower costs, or structure alternative plan options.

### Consider what other states are doing

States across the country have been faced with similar challenges and are addressing them in a variety of ways. Many of the approaches they are using to reduce their unfunded liabilities would not apply to the ERS plan. Some are beginning to have employees contribute to their plans - Texas employees have always contributed to their plan, and increased their contributions in 2009. Others are stopping costly practices that were implemented regardless of funding levels, such as automatic cost of living increases. In 1985, the Texas Legislature wisely enacted §811.006 of the Texas Government Code, which prohibits pension increases and benefit improvements unless the fund is and will

remain actuarially sound. As a result, the ERS plan has not increased pensions for employees since 2002. Rules for calculating ERS benefits also prevent issues like spiking a pension benefit through earning overtime pay.

Because these cost-savings measures are already in place for the State of Texas retirement plan, the available options are limited to increasing revenues or reducing costs through modifying the core plan design or designing lower cost alternative plans.

### Increase Revenue

Currently the trust fund gets revenue from employee and state contributions and trust fund investment earnings.

### Contribution strategy:

When considering changes to contribution strategy it is important to consider the relative impact on the State and on the member:

- Each 1% increase in contribution rates generates \$58 million annually for the fund.
- The current employer contribution accounts for less than one-half of 1% of the state budget (0.046%). If the State were to increase contributions to the actuarially sound level, it would increase to 0.065%.
- An additional \$259 million in contributions each year will make the fund sound.
- The State is currently limited to a 10% contribution.

- Employees' retirement contributions increased in 2009. Higher contributions reduce take home pay for employees who have not had any corresponding across the board salary raise since 2007. At an average salary of \$40,000, a 1% contribution would reduce an average employee's annual take-home pay by about \$400.

If the cost of benefits remains the same and increasing contribution rates were the sole strategy used to make the plan actuarially sound (meaning there is no reduction of retirement benefits), the total contribution rate would have to be increased by \$259 million per year.

The state contribution is an 'all funds' contribution, meaning the total amount is not funded by General Revenue. The following chart shows how the funding would be distributed for the additional \$259 million:

**Figure E.6 - Method of Financing for the State 'All Funds' Contribution**

Method of Finance	% of State Contribution	Amount
GR/GRD	65%	167.3 M
Federal	18%	48.1 M
Fund 6	16%	41.2 M
Other	1%	2.4 M

**Investment Earnings:** The DB plan benefits are pre-funded by the employee and employer over a career. These contributions are then combined (pooled) and centrally invested. Earnings from those investments are used to offset the cost of the benefits. The power of these combined and compounding investment earnings pays about 64% of annuity benefits.

Today, the Trust has more than \$22 billion in assets. ERS invests the funds at the direction of the ERS Board of Trustees with input from an independent Investment Advisory Committee and professional investment advisory firms. ERS designed the diversified, conservatively invested trust to reduce risk and support investment strategies that stretch far into the future.

Prefunded pooled investing maximizes investment returns through a long-term, diversified investment strategy. ERS has worked toward a more diverse allocation of trust assets, adding real estate, hedge funds, and private equity to the target investment mix. Individual investors do not have the same investment horizon or opportunity to diversify.

**Figure E.7 - ERS Retirement Trust Fund Asset Allocation Targets**

Asset Class	August 31, 2011	Long-term Target
Global Equity	55.4%	45%
Fixed Income	36.3%	33%
Private Equity	3.1%	8%
Diversified Real Estate	3.6%	8%
Hedge Funds	0.0%	5%
Cash	1.4%	1%
Internally Managed	78.1%	Externally Advised 21.9%

The fund currently expects to earn 8% on contributions over the employee's working career. The plan uses these earnings to finance most of the annuity benefit. Despite investment market downturns in both 2001-2002 and 2008-2009, the ERS Trust Fund has exceeded its investment return assumptions over the past 30 years with an overall return rate of more than 8.4%.

Determining the investment mix (asset allocation) and expected returns is a complex process with many variables based on assumptions about market performance, inflation, and economic indicators, among others. The ERS Board of Trustees is currently reviewing the fund's investment mix and its potential impact on earning rates going forward. The projected rate of return of the fund is the amount used to "discount" the plan's liabilities. New GASB regulations will affect the accounting and reporting of discount rates. According to GASB, the regulations are not meant to be used to determine a plan's funding requirements. The regulations will first be used on Texas' financial report for 2015, released in February 2016. See

**Appendix C – GASB** for details on the new reporting requirements.

Refer to **Section 3 – Increase Revenue** for the detailed evaluation of four options for increasing revenues.

### **Modify Plan Design**

State of Texas employees who work long enough to meet the retirement eligibility requirements qualify for a lifetime pension paid in monthly installments, referred to as an annuity. The plan design, set in statute, defines retirement eligibility and the formula used to calculate the annuity, which is based on final average salary and years of state service.

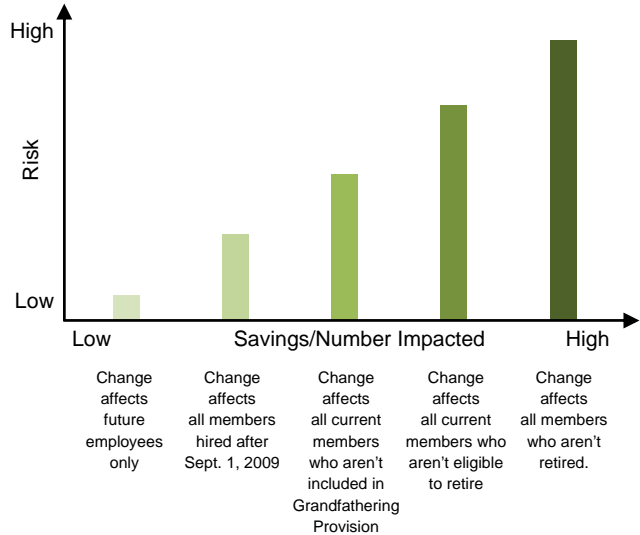
The report offers legislators many viable options to consider for reducing plan costs by modifying the current ERS plan design. It is critical to consider the impact of unintended consequences when considering any plan design modifications. A poorly designed or implemented change could actually increase plan costs over the long term, or have costly implications for the State because of tax qualification issues or litigation.

Important issues to consider:

- A major consideration is whether a plan design change would cause members to “rush to retire.” When employees retire earlier than assumed, it is a cost to the fund and impacts the State’s ability to deliver services. This could increase the liability immediately instead of paying it down. Changing benefits for vested members could cause the plan to lose its tax-qualified status, with major financial implications for the State and employees.
- There are many legal risks when benefits change for vested employees.
- The above risks can be mitigated by “grandfathering” certain employee groups and only applying the design changes to new and/or unvested employees however, the use of grandfathering lowers the immediate savings for the plan.
- Employers say that significant reductions going forward will impact the State’s ability to recruit and retain qualified employees.

Most states exempt or “grandfather” certain employees to mitigate risk when changing plan design. For purposes of comparison, cost estimates were done using both ‘low impact’ and ‘high impact’ grandfathering provisions. The low impact model assumes changes apply to all new and non-vested employees only. The high impact model assumes changes apply to all members except those who are currently eligible or within approximately five years of retirement eligibility. The high impact model is based on the grandfathering assumptions used by the Teacher Retirement System for its benefit changes in 2005.

**Figure E.8 - Cost Savings and Risk Increase as Changes Apply to More Members**



(See **Appendix D: Legal Context and Risks** for more information about considerations related to changing benefits.)

The study provides feasible option combinations and provides a cost savings estimate for the aggregate. Plan design changes in the Group Benefits Program can also affect the retirement plan. For instance, if health insurance contributions increased based on years of service, employees might work longer. This would save money for the retirement plan without any specific retirement benefit change.

On the other hand, if insurance eligibility is changed suddenly, employees may retire earlier than anticipated in order to “lock in” their insurance benefit, which would adversely affect the retirement plan.

Refer to **Section 4 – Modify Plan Design** for the actuarial impact of six options for plan design modification along with their aggregate impact.

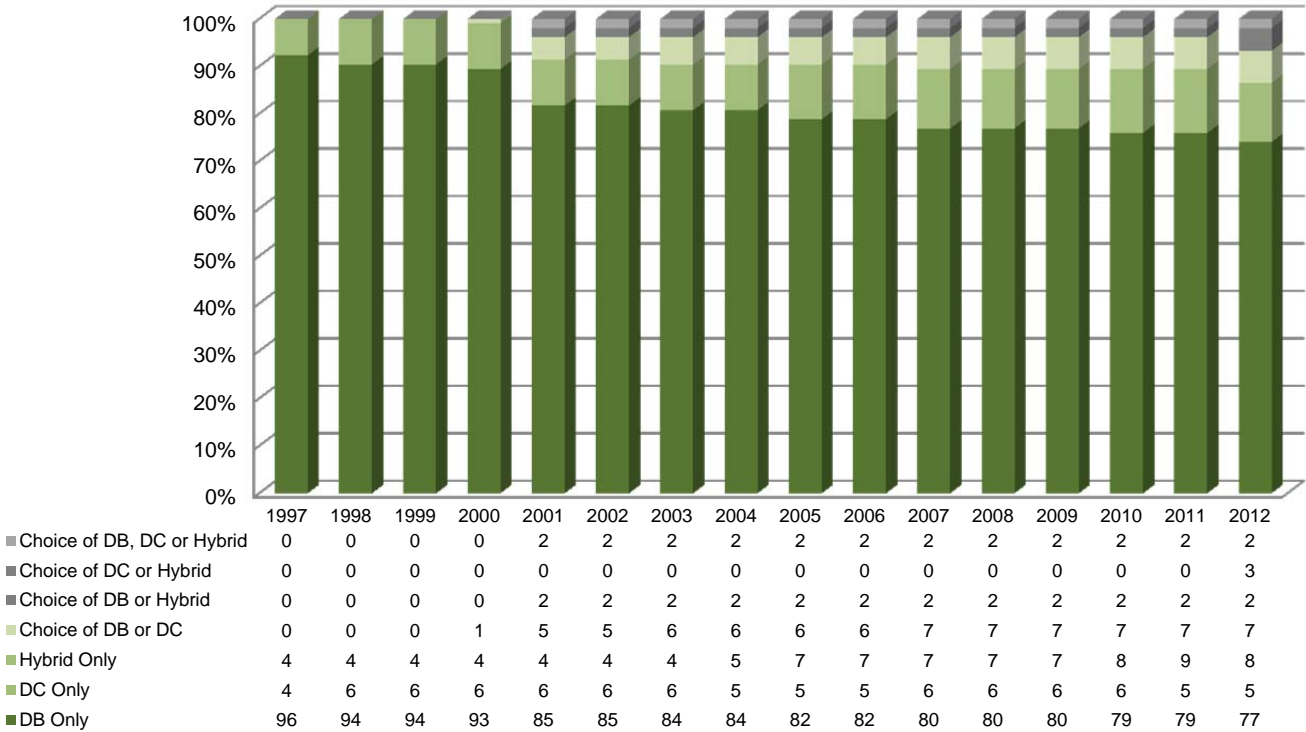
**Consider Alternative Plan Structures:**

Some states have implemented alternative plan structures either as a replacement of their DB plans for new employees or as a choice for current and/or future employees. In the past 14 years, the percentage of states offering only a defined benefit plan has decreased, the percentage of states offering participation in a DC plan has stayed relatively constant, and the percentage of states modifying their DB plans to include a DC component as a hybrid plan or converting to a cash balance DB has increased.



The following chart was prepared by the Texas Pension Review Board.

**Figure E.9: Trends in Plan Design of Statewide Plans by Percentage**



Source: *A Review of Defined Benefit, Defined Contribution, and Alternative Retirement Plans, May 2012.*

Alternative plan design options include DC, cash balance, and hybrid plans, which combine features of both plan types. In a DB plan, the ultimate benefit is “defined” by a formula. In a DC plan, the contribution is “defined” and the benefit will vary. A cash balance plan is considered a DB plan and offers features of a DC plan while maintaining the benefits of the DB fund.

Although State of Texas employees have access to a DC plan (the Texa\$aver Plan), the mandatory retirement plan is a DB plan.

It is difficult to evaluate the impact of a different plan structure without considering all the variables in the plan design. The report models particular options based on other state plan

experience to provide some basis for understanding potential impacts.

Important issues to consider:

- The existing unfunded liability remains in the current plan.
- Alternative plans can cost more than defined benefit plans depending on the plan design and benefit levels.
- Similarly situated employees may have vastly different retirement benefits based on date of hire, creating equity issues and potential impact to the State’s ability to recruit and retain qualified employees.

Refer to Section 5 – Consider Alternative Plan Structures for the detailed evaluation of four options.

## REPORT FINDINGS

### **Finding: Without action, the unfunded liability will continue to increase and make today’s situation unmanageable.**

The ERS retirement plans have more than \$22 billion in assets, enough to pay benefits for the next 70 years. The Texas Legislature is correct to be concerned about the long-term solvency of the ERS plans as they are not operating on an actuarially sound basis now. Our research finds that without action to increase revenue or reduce expenses, unfunded liabilities will continue to climb to an unmanageable level, and after 10 years the unfunded liability more than doubles to \$12.8 billion and continues to grow until the fund runs out of money after the 70 years. At that point all future payments would have to be made on a “pay as you go” basis (all contribution dollars) because there would be no trust fund capital to generate investment earnings to offset the cost.

Employer and employee contributions to the ERS plan are paying the current costs of benefits being earned but are not enough to pay down the existing unfunded liability in a measurable period.

In the past, high investment returns have been used to close funding gaps. However, according to Hewitt Ennis Knupp, the fund’s investment consultant, the fund would have to earn an estimated 25% for the next three years in order to achieve actuarial soundness if contributions and benefits do not change. Because investment returns alone cannot realistically solve the retirement plan’s funding issue, it will take increasing revenue, lowering expenses, or a combination of options.

Any significant revenue increase, even if it does not meet the ASC, could put the trust on a path

to pay down the unfunded liability in a measurable period. If the State were to raise its contribution to the legal limit of 10%, combined with the 6.5% employee contribution, the 16.5% rate would pay down the unfunded liability within a measurable period of 55 years.

### **Finding: A good balance can make the current plan sound.**

The report presents four options to increase plan revenue, seven options to lower expenses through plan design modifications, and four options for alternative plan designs. Each option includes an estimate of fiscal impact.

Relying on just one type of solution to reduce the unfunded liability would require significant changes and increase the likelihood of unintended consequences. Selecting options to increase revenue and modify plan design can make the plan sound without extreme impacts on one side or the other.

### **Finding: Establishing an alternative retirement plan could fulfill specific workforce needs, however, it does not erase the unfunded liabilities in the existing DB plan and could cost more.**

The DB plan is not the only way to provide retirement benefits to employees. This report presents many alternative plan types for the Legislature to consider, including a DC plan, cash balance plan, or different combinations referred to as hybrid plans.

The State could offer an optional or mandatory alternative plan as a requirement for all new and/or current employees, or targeted positions. The Optional Retirement Plan, offered to certain Texas higher education employees, is a model that could provide an alternative choice to the DB plan. This option could offer state workers a plan with an individual account and vesting schedule. This could be valuable to members who do not plan a career with the State, or those who would prefer to control their own investments.

Information on the various plan types and the cost impact of implementing each is included in the study report in Section 5.

The extent to which a new plan structure could provide benefits that are comparable with what the current ERS plans provide to retirees depends on the plan design and the effective management of funds – especially in DC plans – where employees manage their own investments. In fact, numerous studies show that individually managed accounts have the highest fees and lower overall performance of any type of retirement plan. The current DB plan can maintain a more diversified portfolio focused on long-term performance than individuals. The DC plan also loses the benefit of the pooled investment returns, which currently make up 64% of annuity payments. The ultimate benefit in an individually controlled DC plan is based only on how well the individually controlled investments have performed. An alternative plan, even one that is required for all employees, does not erase the existing unfunded liability. Paying off the unfunded liability would still require lowering plan costs and/or increasing revenue. Alternative plan structures, such as a DC plan, that do not “pool” funds with the existing DB plan trust fund can accelerate fund depletion. For that reason, many states choose to modify the existing plan design instead of switching all employees to an alternative plan structure. In fact, all 50 state government plans have at least some segment of their workforce participating in a DB plan. Some states have offered optional DC plans, while others enroll new employees in a hybrid or cash balance plan. (See **Section 6 – Benchmarking** for a review of national trends among state government plans.)

**Finding: Prefunded pooled investing increases value to the members and the State.**

Prefunding contributes toward retirement benefits over the course of employee careers, which provides a long-term investment horizon. Prefunding is a significant savings for the State, allowing the ERS trust fund investment returns

to pay 64% of the retirement benefits. Employee contributions, combined with investment earnings, account for 82% of the annual benefits paid to retirees, which significantly reduces the cost to the State for providing the benefits and assisting Texas businesses. The state contribution in Texas is lower, and member contribution higher, than the median public sector pension plan.

The Texas Legislature recognized the benefit of prefunding in 1985 when it closed JRS 1 which was ‘pay as you go’ (benefits were paid through the appropriation process with all state dollars) to create JRS 2 as a prefunded trust to offset the benefit costs with investment earnings.

Pooling contributions allows ERS to put trust fund dollars to work in Texas. Texas companies are included in stock, bond, and real estate investment portfolios. Many local companies get needed capital through the trust’s private equity investments. In addition, about 30% of all trust investments are in Texas companies that employ 200 or more Texas workers, or have established their headquarters in Texas.

Certain alternative plan structures prompt a change in investment strategy, moving the trust investment portfolio focus to short-term, liquid investment classes and lowering the long-term expected return on plan assets.

In addition, a significant portion of the money that is paid to retirees will benefit Texas communities. Most of the retirees (96%) remain in Texas and spend their annuity dollars throughout the state, supporting businesses in every Texas community. See **Appendix E – ERS Economic Impact by County** for details.

**Finding: Retirement benefits are critical in attracting and retaining qualified employees.**

The Legislature provides funding for benefit programs to ensure that state employers can compete in the marketplace for the most qualified and efficient workforce to deliver essential services. State agency employers

depend heavily on benefits to help them attract and retain a skilled workforce.

ERS surveyed and met with state agency officials to understand the role state benefits play in their ability to attract employees. Across the board, state employers who responded as part of this study said that retirement and health insurance benefits were an extremely important factor in attracting the best talent. Employers located in areas with robust private job competition said that the benefits package takes on additional importance as they work to staff prisons and other state facilities. Retirement benefits are just one part of the total compensation package, but a crucial one. While employees don't always differentiate between the type of retirement plan an employer offers, DB plans appear to be increasingly important to job seekers. The 2012 Retirement Attitudes Survey released by Towers Watson shows a rising interest among workers younger than 40. In 2011, 63% of this age group said that a DB plan was their primary reason for accepting their jobs, up from 28% in 2009.<sup>3</sup>

A well-designed plan can also help retain talent and institutional knowledge. Many state government positions require specific training. The State invests about \$30,000 for each Department of Public Safety trooper to complete a seven-month training regimen. A retirement program that encourages employees to work longer helps to ensure that the state's investment doesn't pay for another employer's workforce expertise.

Turnover rates in Texas agencies increased significantly from FY2011 to FY2012, with employees citing new jobs with better pay and benefits as their primary reason for leaving. Certain positions and locations already face turnover rates above 40%.<sup>4</sup> Employers fear that reduced benefits will make it even more difficult to fill these positions. (See **Common Appendix II – Employer Survey** for a summary of the state workforce and employer survey.)

### **Finding: It is difficult to make direct comparisons between private sector and public sector.**

The private sector employs a different workforce, has a wider variety of compensation tools, and faces different pension regulations – making private/public comparisons difficult.

The State Auditor's Office periodically reports on how state government employee's salaries compare to private sector employee salaries. The comparison is complicated by the different types of positions. While the private workforce is heavily weighted in service, retail, and manufacturing jobs, the state workforce includes numerous employees in law enforcement and social services. In general, state employees are older than those in the private sector, and certain public positions require specific expertise derived from extensive formal and/or on-the-job training and advanced education.

Private employer compensation packages often include monetary and other rewards not available to public employees, such as stock options, expense accounts, and annual bonuses. When focusing on salary alone, the value of benefits to state employees becomes especially clear. The SAO found that most general state employees in positions that can be compared to private sector positions, so-called benchmark positions, had wages well below those of comparable jobs in the overall labor market. Almost one-fifth — 17,342 — are paid salaries that are more than 20% behind market rates.<sup>5</sup>

Many private employers have moved to DC retirement plans from DB plans. The trend accelerated following regulations and accounting standards that apply to the private sector. However, large private sector companies continue to offer DB plans to their employees. Research by the Texas Association of Public Employee Retirement Systems on 35 publicly traded companies on the Fortune 100 list in Houston and Dallas showed that 28 still have traditional DB plans for their employees in one way or another as stated in their most recent

10K filings as of June 2012. In effect, 80% of Fortune 500 companies located in Texas' two biggest cities retain DB-style plans. Some of the notables include ConocoPhillips, Texas Instruments, Southwest Airlines, Continental Airlines, and CenterPoint Energy.

The private sector has statutory controls and rules requiring payment of premiums to insure against circumstances such as bankruptcy and until recently, a very conservative discount rate that has made it expensive to operate DB plans. These provisions do not apply to ERS plans because state governments do not pay taxes and exist in perpetuity.

**Finding: Changes to other parts of the employee compensation package can impact the retirement plan.**

Changes to the insurance benefits that encourage employees to work longer have a direct beneficial impact on the retirement plans. For example, the option to tie insurance coverage to years of service will encourage employees to continue working to get a higher premium subsidy. Changing eligibility for insurance, especially for employees planning to retire, could cause a “rush to retirement” which could cost the retirement plan. It is important to consider policy changes as a whole. Lower salaries, lack of pay raises, and increased out-of-pocket insurance costs are just a few of the compensation items that could increase employee retirement rates, affecting not only the financial status of the retirement plan, but also

limiting the State’s ability to deliver critical services.

**Finding: Any plan modification or structural change carries legal risks that increase as more members are included.**

Plan design changes save more money depending on how many members are affected. For instance, “hard-freezing” the current DB plan freezes current retirement benefits for all existing plan members and stops the accrual of any new benefits. While this could produce a one-time reduction to the plan’s current unfunded liability because it removes the need to provide funding for future benefits, it introduces a high level of risk. Certain plan modifications could achieve similar savings. The State must carefully consider changing plan benefits for current system members, particularly vested members. Benefits for vested members have a number of protections and changing them could have significant legal and tax consequences. In best practices, prudent plan sponsors typically seek approval of any significant proposed plan changes from the Internal Revenue Service or make such approval a condition precedent for the change to take effect. See **Appendix D – Legal Context and Risks.**

Members may also “rush to retire,” creating higher benefit costs and leaving the State short of skilled workers.

<sup>1</sup> State Auditor’s Office, *Classified Employee Turnover for Fiscal Year 2011*, December 2010, Report No. 12-701, pp. 1-3. <http://www.sao.state.tx.us/reports/main/12-701.pdf>

<sup>2</sup> A Report on Member Perceptions About Managing Health and Healthcare Costs. A Multi-methodology Study Conducted For Employees Retirement System of Texas, December 2006, Strategic Marketing Research

<sup>3</sup> The 2011 *Towers Watson Retirement Attitudes Survey*, <http://www.towerswatson.com/newsletters/insider/6530>

<sup>4</sup> See #1

<sup>5</sup> State Auditor’s Office, *The State’s Position Classification Plan: A Biennial Report*, August 2010, Report No. 10-708, pp. i – 4. <http://www.sao.state.tx.us/reports/main/10-708.pdf>



# Section 1: Plan Status and Eligibility

## Background

According to the Texas State Pension Review Board, the State has more than 2 million active and retired members in 358 state and local public retirement plans. Public sector employment covers a diverse group, including city, county, and state employees working in education, public safety, and general services.<sup>1</sup>

The Employees Retirement System of Texas (ERS) manages four retirement trust funds for the State of Texas that cover the state workforce, including general state agency employees, state law enforcement and custodial officers, elected state officials, judges, and district attorneys. In addition to regular retirement benefits, each plan provides some level of disability retirement and death benefits.

## Trust Fund Management Practices

ERS has performed its fiduciary responsibilities for managing the funds in the following ways:

- ERS is exceeding its long-term investment goals with a 30-year return rate of 8.4%. The current assumption for long-term investment returns is 8% - a rate that is currently under review.
- ERS reviews capital market assumptions annually and conducts asset/liability studies at least every five years; In light of ongoing economic conditions, ERS moved up its asset/liability study by one year; it began in FY 2012.
- ERS examines its economic actuarial assumptions at least every five years, and the Board adjusts the assumptions as necessary. In order to have an updated best estimate of liabilities going into the asset allocation study, the review of ERS' actuarial assumptions was completed as of August 31, 2011.
- ERS reports to legislators on the direct and indirect impact to the retirement plan of

certain employment policy decisions, such as retirement incentives, furloughs, and layoffs.

To comply with Texas law, actuarial impact analyses are prepared on legislative proposals that affect the trust funds and are reviewed by an independent actuary through the Pension Review Board. ERS directs its consulting actuary for retirement to value the assets and liabilities of each trust fund annually while §815.206, Tex. Gov't Code requires the valuations to be conducted at least every five years. The valuations of the plans' present value of future benefits are based on certain demographic and economic assumptions and actuarial methods adopted by the ERS Board of Trustees. These assumptions include estimates of future plan experience with respect to rates of mortality, disability, turnover, retirement, salary increases, inflation, and an expected long-term return on assets. "Entry Age Normal" is the cost method used in the valuations whereas an annual cost is determined for each active member, referred to as the 'normal cost.' This cost is expressed as a level percentage of compensation and is the contribution required to provide all the projected pension benefits for that person based on current assumptions. Under the Entry Age Normal Cost Method used by ERS, the normal cost contribution is assumed to be payable over the period starting at the member's entry date and ending on his or her projected retirement date.

To be eligible to retire from an ERS plan, participants must meet certain age and years of service requirements. Eligibility, benefit formulas, and other plan provisions vary among employee groups, such as law enforcement and custodial officers. Such differences are based on historical distinctions or varying retirement policies that the Legislature has chosen to incorporate into the plan designs over the years.

State law permits law enforcement and custodial officers, for example, to retire with full benefits at a younger age than most other employees because such positions often require youth and physical exertion. For judges, legislators, and

elected officials, a career may encompass a much shorter period than for other categories of employees, so state law allows them to qualify for benefits at a faster rate.

**Figure 1.1: ERS Retirement Plans Summary Demographic and Payroll Results as of August 31, 2011**

	ERS	LECOSRF*	JRS 2	JRS 1
	State Employees Elected Officials District Attorneys	Certain law & custodial officers at DPS, TABC, TPWD, TJJD, TDCJ & TBPP	Judges, justices and commissioners of certain courts that began service after 9/1/1985	Judges, justices, and commissioners of certain courts that began service before 9/1/1985
<b>Employees</b>				
Active contributing members	137,293	36,806	546	17
Average age	44.1	42.2	55.7	66.1
Average years of service	9.5	8.9	9.2	25.4
Average annual salary	\$41,620	\$39,454	\$127,573	\$129,412
Non-contributing vested (≥ 5 yrs.)	16,252	52	19	60
Non-contributing non-vested (< 5 yrs.)	68,648	5,733	115	4
<b>Annuitants</b>				
Annuitants	83,430**	7,728	208	446
Average annual annuity	\$18,614	\$5,504***	\$60,523	\$60,194
Service Retirements	70,335	7,093	189	302
Average age	67.8	61.3	66.8	80
Average service at retirement	22.4	25.5	14.3	17.6

\*LECOS members are also members of ERS.

\*\*Includes general state employees, law enforcement and custodial officers and elected officials.

\*\*\*The LECOS annuity is a supplement to the general plan – the total average LECOS annuity is \$5,504 + \$18,614 = \$24,118.

Source: ERS Actuarial Valuation as of August 31, 2011, Buck Consultants.

In addition, State of Texas employees participate in Social Security, as do general state employees in all but seven states (Alaska, Colorado, Louisiana, Maine, Massachusetts, Nevada, and Ohio).

ERS members are also eligible to contribute to the TexaSaver 401(k) and 457 deferred compensation plans, which are described in Section 5 of this report. Employees hired after January 1, 2008 automatically contribute 1% of

their pay to the 401(k) component, unless they take action to decline this enrollment.

ERS educates members on a three-legged stool approach to self-sufficiency in retirement: defined benefit annuity, Social Security income, and personal savings (either through the TexaSaver program or on their own). Members are encouraged to save to cover inflation because their retirement plan was not designed to provide cost of living increases.



## ERS Main Plan

The Texas Legislature officially established the ERS Retirement Trust Fund in 1947. In September 1958 the plan converted to a defined benefit (DB) plan. Since that time it has been mandatory that all employees of general state agencies, and law enforcement and custodial officers participate in the main ERS plan. Currently all general state employees contribute 6.5% of their overall gross salary to the plan.

**Figure 1.2: General Employee Eligibility and Annuity Calculation**

Grouping	Retirement Eligibility	Annuity Calculation
Hire date on or after 9-1-2009 (and was not already a member of ERS)	<ul style="list-style-type: none"> <li>Age 65 with 10 years of service</li> <li>Rule-of-80, with at least 10 years of service. (5% annuity reduction for each year retired under age 60, up to 25%)</li> </ul>	<ul style="list-style-type: none"> <li>Final Average Salary x Years of Service X Multiplier of 2.3%</li> <li>Final Average Salary = highest 48 months</li> <li><b>Example:</b> \$38,000 x (20 years x 2.3%) = \$17,480 a year, or \$1,457 a month</li> </ul>
Hire date prior to 9-1-2009	<ul style="list-style-type: none"> <li>Age 60 with 5 years of service</li> <li>Rule-of-80, with at least 5 years of service</li> </ul>	<ul style="list-style-type: none"> <li>Final Average Salary x Years of Service x Multiplier of 2.3%</li> <li>Final Average Salary = highest 36 months</li> <li><b>Example:</b> \$40,000 x (20 years x 2.3%) = \$18,400 a year, or \$1,533 a month</li> </ul>

*Total benefit may not exceed 100% of average salary. Years of Service must be with ERS (including purchased service with ERS, excluding Additional Service Credit) or service transferred from the Teacher Retirement System). Salary examples based on averages for each employee group.*

The July 2012 annuitant payroll for all ERS plans shows that two-thirds of the annuity payments are less than \$2,000 per month before taxes and insurance are deducted. An employee making an annual salary of \$40,000 will receive approximately \$1,500 per month under current law. Considering that the average annuity

income for retired state employees is around \$18,000 a year, a significant annuity reduction could increase the risk of dependency on other state services.

## Elected Class

The ERS general plan also includes members of the Elected Class made up of statewide elected officials, legislators, and district and criminal district attorneys. Unlike general state employees, participation in the ERS retirement plan is not mandatory for these elected officials. Those who choose to join the ERS plan contribute a percentage of their monthly pay. Texas legislators contribute 8% while the other groups contribute 6.5%. The state's contribution for FY2013 is 6.5% for all groups of elected officials.

Retirement eligibility and the formula for calculating benefits is the same for all Elected Class groups regardless of when they began serving; however, eligibility and benefits differ from those of regular state employees. The main difference is the Final Average Salary calculation. Unlike general employees whose annuities are estimated based on an average of actual salary, the final average salary calculation for all elected class members is based on the salary of a district judge, currently set at \$125,000 annually. Instead of using the state salary of a district judge, elected class benefits may be based on their average salary (highest 36 months) as a state employee (certain eligibility factors are required). The monthly standard annuity for a member retiring from the elected class may not exceed 100% of the state salary of a district judge. The percentage value for service credit in the elected class is 2.3% per year.

**Figure 1.3 – Elected Class Eligibility and Annuity Calculation**

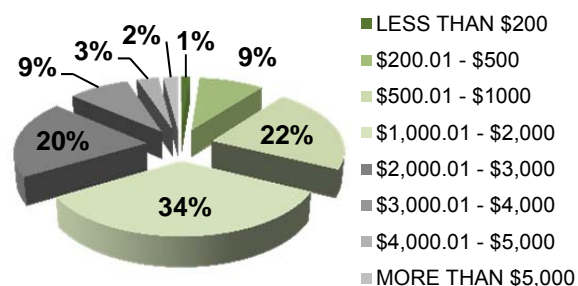
Retirement Eligibility	Annuity Calculation
<ul style="list-style-type: none"> <li>• Age 50 with 12 years of service, or</li> <li>• Age 60 with 8 years of service</li> </ul>	<ul style="list-style-type: none"> <li>• Final Average Salary x Years of Service x 2.3% multiplier,</li> <li>• Final Average Salary = Salary of a State District Judge (currently \$125,000),</li> <li>• <b>Example:</b> \$125,000 x (20 years x 2.3%) = \$57,500 a year, or \$4,792 a month</li> </ul>

Because monthly annuities for most Elected Class retirees are based on a salary that is higher than actual salary, the normal cost for this group is also significantly higher. The normal cost for legislators as of August 31, 2011 was 290% and 18.6% for elected statewide officials and district and criminal district attorneys. However, because the Elected Class are a relatively small group (332 active members) their higher cost is mitigated when combined with the normal cost across all ERS general plan employees – general state employees, law enforcement and custodial officers, and elected statewide officials.

### Retirement Income

When considering net income after all taxes and health care premium deductions, approximately 32,000 of the 83,348 annuitants received pensions of less than \$1,000 per month in July 2012 - 75% received pensions of less than \$2,000.

**Figure 1.4: Annuitant Gross Pay Comparison**



Includes all annuitants: Regular state, law enforcement, judges, elected class, and surviving beneficiaries.

The wage replacement percentages in the following charts reflect prototype ERS plan members who retire with varying years of service – those hired at age 35 are assumed to be long-service employees while those hired at age 50 are assumed to retire as short-service employees.

**Figure 1.5: Wage Replacement Ratios for Current ERS Benefit Plan (state employees who were system members before 9-1-09)**

Age at Hire	Wage Replacement At Age		
	60	62	65
<b>Members hired after September 1, 2009</b>			
Age 35	52%-53%	56%-57%	62%-63%
Age 50	20%-21%	24%-25%	31%-32%
<b>Members hired before September 1, 2009.</b>			
Age 35	53%-54%	58%-59%	64%-65%
Age 50	21%-22%	25%-26%	32%-33%

Source: Buck Consultants. Both use a 2.3% multiplier, but post 9-1-09 members have reduced benefit levels based on how the final average salary is calculated, and longer service requirements before members “vest” for retirement purposes.

State employees, officials, and judges also participate in the federal Social Security program. Earned Social Security benefits add to the wage replacement described above.

### ERS Main Plan: Disability Retirement Benefits

The ERS plan also provides a level of income replacement if active employees become disabled and are unable to perform their normal duties. These include benefits for disabilities that are either job- (occupational disability retirement) or non-job related (non-occupational disability retirement). There is an application and comprehensive review process for these benefits to be granted. The requirements for disability retirement benefits are narrowly defined in statute and the Texas Administrative Code. To qualify for non-occupational disability retirement, one must have at least 10 years of creditable service with the ERS plan. Participants may qualify for occupational disability retirement after one month of

creditable service if a disability is the result of a sudden and unexpected injury resulting from a dangerous job duty not common to the general public.

## Financial Status

As of August 31, 2011, the ratio of the ERS Plan's assets to its liabilities was 82.6%, down from 83.2% in FY2010. While the plan incurred a loss due to accounting for previous investment losses that are smoothed out over a period of years, those losses were completely offset by 'gains' when assumed merit, promotion, and across-the-board salary increases did not occur. A major reason for the decline in the funded ratio to 82.6% was the fact that contribution rates were less than the actuarially sound rate.

**Figure 1.6: Financial Results for the ERS Fund**

Item	As of August 31, 2011
Total Contribution Rates	
• Actuarially Sound Rate	17.47%
• Actual Contribution Rate	12.50%
Total Normal Cost	
• Percent of Payroll	12.31%
• Dollars	\$713 M
Actuarial Funded Status	
• Accrued Liability	\$29.05 B
• Actuarial Value of Assets	\$24.00 B
• Unfunded Accrued Liability	\$5.05 B
• Funded Ratio	82.60%

Source: ERS Actuarial Evaluation for FY2011 and the Plan Year Beginning Sept. 1, 2011, Buck Consultants. Actuarial valuations will be conducted for all plans as of August 31, 2012, and updated as of February 28, 2013. These valuations will provide a better estimate of the retirement plans' funding needs.

Under Texas Government Code §811.006, changes in contribution rates or benefit provisions may not be adopted if the plan is not actuarially sound or the changes would cause the plan to become actuarially unsound.

The ERS plan trust fund has not been actuarially sound since August 31, 2003 when unfunded liabilities began accruing.

The total contribution rate in FY2013 increases to 13%; both the State and the employees contribute 6.5%. Even though the 13% contribution does provide some additional funds beyond the cost of benefits, it is not enough to amortize the unfunded liability over a measurable period.

The unfunded liability as of the last actuarial assessment was \$5.05 billion. To meet the actuarially sound rate of 17.47%, the total contribution rate would have to be increased by 4.47% of payroll, which translates to \$259 million per year, according to the FY2011 valuation based on August 31, 2011 numbers. In comparison, if the state contribution were to increase to the legal maximum of 10% (a total contribution of 16.5%), the unfunded liability would be amortized over a 55 year period.

These calculations will change based on August 31, 2012 numbers.

## Law Enforcement and Custodial Officers Supplemental (LECOSRF)

The Law Enforcement and Custodial Officers Supplemental Retirement Fund was established in September 1979 by the 66<sup>th</sup> Legislature in order to provide enhanced benefits to persons serving as law enforcement and custodial officers.

LECOSRF employees contribute an additional 0.5% of their monthly compensation to this plan and receive 20% of their retirement benefit from the LECOSRF plan and 80% from ERS plan.

**Figure 1.7: LECOSRF Eligibility and Annuity Calculation**

Grouping	Retirement Eligibility	Annuity Calculation
Hire date on or after 9-1-2009 (and was not already a member of ERS)	Full CPO/CO benefits: 20 years - service at or over age 55 Reduced CPO/CO benefits: 20 years - service before age 55 5% annuity reduction for each year retired before age 55, capped at 25%	<ul style="list-style-type: none"> <li>• Final Average Salary x Years of Service x Multiplier of 2.8%</li> <li>• Final Average Salary = highest 48 months</li> </ul>
Hire date prior to 9-1-2009	Full CPO/CO benefits: 20 years CPO/CO service at or over age 50 Reduced CPO/CO benefits: 20 years CPO/CO service before age 50 (annuity is actuarially reduced)	<ul style="list-style-type: none"> <li>• Final Average Salary x Years of Service x Multiplier of 2.8%</li> <li>• Final Average Salary = highest 36 months</li> </ul>

### LECOSRF Disability Retirement Benefits

Qualified LECOSRF members are also eligible for occupational disability retirement benefits under the supplemental retirement plan. There are no age or length-of-service requirements for this benefit; however, the disability must meet strict statutory and rule requirements. The occupational disability retirement annuity may not be less than 50% of the average monthly compensation, regardless of the amount of service credit. Disability retirement benefits for LECOSRF members who are 100% disabled under federal Social Security law based on the injury caused by state employment receive 100% of the average of the 36 highest months of state employment compensation.

Disability retirement benefits due to a non-job related injury or illness are provided as part of the ERS plan.

### LECOSRF Financial Status

In 1979, the Legislature added 75 cents to the fee for individual motor vehicle inspections and designated the fee as funding for LECOSRF. Later, that fee was doubled to \$1.50 per auto inspection. This dedicated funding source kept the fund above the actuarially sound level and the plan accumulated a significant overfunded balance. However, LECOSRF lost that funding source in 1995, when motor vehicle inspection revenue was swept into general revenue. At that time, the Legislature stipulated in Texas Government Code §815.403 (a) (3) that the State's LECOSRF annual contribution shall be 2.13% of payroll. The State did not appropriate contributions under this statutory provision because the plan was overfunded. The LECOSRF plan eventually used up the overfunded balance and began accumulating an unfunded liability in 2007.

**The following state employees participate in LECOSRF**

- Texas Department of Criminal Justice (TDCJ) employees certified to have contact with inmates in correctional institutions
- University of Texas Medical Branch and Texas Tech University Health Services Center employees that transferred from TDCJ with the same certification as above
- Commissioned law officers employed by:
  - Texas Department of Public Safety,
  - Texas Alcoholic Beverage Commission,
  - Texas Parks and Wildlife Department, or
  - Office of Inspector General at the Texas Juvenile Justice Department
- Commissioned officers who were employed by the Texas Board of Pharmacy prior to September 1, 2005
- Parole officers and caseworkers employed by the Board of Pardons and Paroles and the Texas Department of Criminal Justice

Between 2007 and 2011, a 1.59% state contribution rate was in place; the FY2012 rate was 0%, and the FY2013 rate is 0.5%. LECOS members began contributing 0.5% of their salary

to their supplemental fund beginning September 1, 2009. The actuarially sound contribution rate for LECOSRF as of August 31, 2011 was 2.72% of payroll.

Currently LECOSRF has a \$162.3 million unfunded liability, with a funded ratio of 83.7%. A provision enacted by the 82<sup>nd</sup> Texas Legislature goes into effect in FY2014 providing an estimated \$21.3 million per year from court costs. Depending on the additional state contribution appropriated, this amount may help reduce the unfunded liability.

**Figure 1.8: Financial Results for the Law Enforcement and Custodial Officer Supplemental Retirement Plan**

Item	As of August 31, 2011
Total Contribution Rates	
• Actuarially Sound Rate	2.72%
• Actual Contribution Rate	0.50%
Total Normal Cost	
• Percent of Payroll	2.07%
• Dollars	\$30 M
Actuarial Funded Status	
• Accrued Liability	\$992 M
• Actuarial Value of Assets	\$830 M
• Unfunded Accrued Liability	\$162 M
• Funded Ratio	83.7%

Source: ERS Actuarial Evaluation for FY2011 and the Plan Year Beginning Sept. 1, 2011, Buck Consultants. Actuarial valuations will be conducted for all plans as of August 31, 2012, and updated as of February 28, 2013. These valuations will provide a better estimate of the retirement plans' funding needs.

## Judicial Retirement System of Texas Plan 2 (JRS 2)

In 1985, upon closing the Judicial Retirement System of Texas Plan 1 to new judges, the 69<sup>th</sup> Texas Legislature enacted laws creating JRS 2 for judges that began serving after August 31, 1985. JRS 2 is a qualified plan pursuant to the Internal Revenue Code and its trust generates investment income that defrays the cost of funding the benefits. This trust fund is separate from the ERS and LECOSRF trust funds.

As originally created, the JRS 2 retirement benefit structure was similar to the one for regular state employees, where the standard annuity is calculated using a highest average salary, a specific multiplier, and the number of years of service. In 1993, legislation changed the benefit design of JRS 2 to mirror JRS 1, except that retired JRS 2 members do not automatically get annuity increases when a judges' pay is increased.

JRS 2 membership includes a judge, justice, or commissioner of the Supreme Court, Court of Criminal Appeals, Court of Appeals, District Court, or specified commissions to a court after August 31, 1985.

JRS 2 members become eligible to receive a service retirement annuity in the following ways:

- at age 65 with 10 years creditable service and currently holding a judicial office,
- at age 65 with 12 years creditable service, whether or not currently holding a judicial office,
- at any age with 20 years of service, whether or not currently holding a judicial office, or
- served at least 12 years on an appellate court and the sum of age and amount of service credit in the retirement system equals or exceeds the number 70, whether or not currently holding office.

The base Service Retirement Annuity (SRA) is 50% of the state salary paid to a judge of a court of the same classification as the last court to which the member was elected or appointed. This is increased by 10% for judges who have not been out of office for more than one year at retirement or have accepted an assignment as a visiting judge within a year of their effective dates of retirement. Monthly retirement annuities are adjusted through legislation. The annuity of a member who elects to make contributions after 20 years of service or after reaching the Rule of 70 with 12 years on an appellate court would be based on 50% of the state salary plus 2.3% for each subsequent year not to exceed 90%.

**Figure 1.9 – JRS Retirement Eligibility and Annuity Calculation**

JRS Retirement Eligibility	Annuity Calculation
<ul style="list-style-type: none"> <li>• Age 65 with 10 years creditable service and currently holding a judicial office,</li> <li>• Age 65 with 12 years creditable service, whether or not currently holding a judicial office,</li> <li>• Any age with 20 years of service, whether or not currently holding a judicial office, or</li> <li>• Rule of 70 - 12 years on an appellate court and the sum of age and amount of service credit in the retirement system equals or exceeds the number 70, whether or not currently holding office.</li> </ul>	<p>Monthly Judicial state salary (dependent on court classification) X 50% = Monthly Annuity.</p> <p><b>Example:</b></p> <ul style="list-style-type: none"> <li>• \$10,416.67(District Judge Salary) X 50% = \$5,208.34</li> </ul> <p><b>Example with additional 10%:</b></p> <ul style="list-style-type: none"> <li>• \$10,416.67(District Judge Salary) X 60% = \$6,250.00</li> </ul> <p><b>Example with additional 10% and electing to contribute after obtaining 20 years of JRS service or meeting Rule of 70:</b></p> <ul style="list-style-type: none"> <li>• \$10,416.67(District Judge Salary) X 90% = \$9,375.00</li> </ul> <p>(Assumes working and contributing an additional 13 years beyond eligibility. 13 years X 2.3%= 30% + 60% (original annuity percentage) = 90%).</p>

A member who is impeached or removed from office for official misconduct may not receive retirement benefit payments.

### **JRS 2 Disability Retirement Benefits**

Regardless of age, qualifying JRS 2 members are eligible to receive a disability retirement annuity when they have seven years of service credit in JRS 2. The disability must be certified as mentally or physically incapacitating by the Chief Justice of the Supreme Court and is subject to review and approval by the ERS medical board. A disability annuity cannot be reduced because of age, and it is payable for the duration of the disability.

### **JRS 2 Financial Status**

Similar to the General Fund and LECOSRF, the statute specifies funding requirements for the JRS 2 plan. However, rather than listing a specific state contribution, §840.103, Tex. Govt. Code, requires that the state’s portion be based on the percentage of annual payroll required to fully finance the plan as determined by an actuarial valuation of the plan’s assets and liability.

Over the history of JRS 2, benefits have been pre-funded according to statute and the fund was actuarially sound until September 1, 2011 (FY2012), when the state’s contribution was reduced to 6% of payroll. Because of the significant decrease in funding, the JRS 2 plan is now considered actuarially unsound under the standard established in §840.106, Tex. Govt. Code.

### **Judicial Retirement System of Texas Plan 1 (JRS 1)**

JRS 1 was established in 1949 to provide retirement benefits to state judges. Initially, the Chief Justice of the Texas Supreme Court administered it. In 1955, the administration of JRS 1 was transferred to the Employees Retirement System Board of Trustees.

In response to the projected expenses of continuing JRS 1, it was closed to new members effective September 1, 1985 in order to create a pre-funded plan for judges (JRS 2).

Retirement eligibility, benefits and disability retirement benefits under the JRS 1 plan are generally the same as JRS 2, except that JRS 1 is the only pension plan that automatically increases annuities. When the salary of a sitting judge is increased, ERS recalculates and increases the annuity of a JRS 1 retired judge based on the higher salary. A judge who is impeached or removed from office for official misconduct may not receive retirement benefit payments.

## **JRS 1 Financial Status**

Since its inception, JRS 1 has been a pay-as-you-go plan. This means that retirement benefits are not funded in advance and there is no reserve trust or investment income to help pay

for the retirement benefits. As a pay-as-you-go plan, the Texas Legislature must appropriate sufficient funds each legislative session to pay annuities owed to JRS 1 retired judges during the biennium.

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<sup>1</sup> Texas State Pension Review Board, *A Review of Defined Benefit, Defined Contribution, and Alternative Retirement Plans*, Research Paper No. 12-001, May 2012: <http://www.prb.state.tx.us/files/reports/areviewofdbdand.pdf>



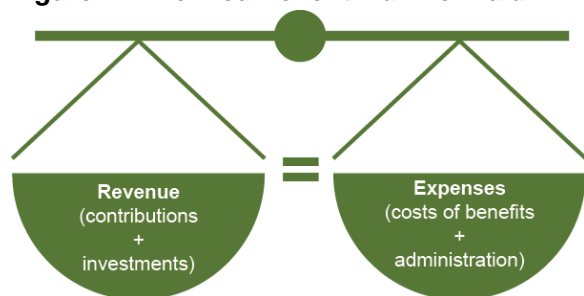


## Section 2: Plan Funding

### Overview

Defined benefit plans use employer and employee contributions during the employee's working years to pre-fund the employee's pension benefits. Plan administrators invest the contributions in a trust fund. Investment earnings pay most of the cost of the eventual benefit.

**Figure 2.1: Defined Benefit Plan Formula**



A DB plan should have an equal balance between assets and liabilities, with sufficient investment earnings and contributions to equal the benefits being earned and expected to be paid over the long-term (contributions + investment earnings = benefits + expenses).

Actuarial valuations report on a plan's membership, funding and financial status based on a best estimate of future benefit obligations. In order to conduct actuarial valuations, ERS actuaries calculate the liabilities of a defined benefit plan based on an entry age actuarial cost method and in accordance with applicable federal and state statutes, and accounting standards. They rely on a number of assumptions including the plan's expected investment returns (often referred to as the discount rate), inflation predictions, projected retirement rates, worker and retiree mortality rates, and other demographic data. In the case of the ERS pension plans, the ERS Board of Trustees adjusts the plan assumptions as necessary following a formal evaluation process that occurs at least every five years.

The Board of Trustees, Investment Advisory Committee, and ERS staff review the assumptions used for the plan regularly to

ensure they reflect actual and expected experience in order to provide a best estimate of the plans' liability and funding needs. For example, an employee longevity assumption that is closely predicting how long employees are working before retiring can prevent dramatic actuarial gains and/or losses from year-to-year.

**Figure 2.2: Summary Results of Actuarial Valuations of ERS Plans as of August 31, 2011**

	ERS	LECOS	JRS II
Accrued Liability	\$29 B	\$993 M	\$300 M
Actuarial Value of Assets	\$24 B	\$831 M	\$284 M
Unfunded Liability	\$5 B	\$162 M	\$16 M
Funded Ratio	82.60%	83.70%	94.60%
Normal Cost Rate (Cost of benefits being earned)	12.31%	2.07%	20.38%
Actuarial Sound Contribution (Normal Cost + paying unfunded liability over 31 years)	17.47%	2.72%	21.76%
<b>FY 2011 Total Contribution Rate</b>	<b>12.50%</b>	<b>0.50%*</b>	<b>11.97%</b>

Source: ERS Actuarial Valuation as of August 31, 2011, Buck Consultants.

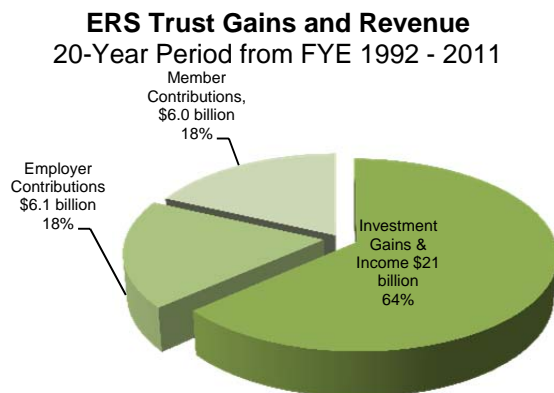
\*LECOS contribution is paid by employee only.

Actuaries also figure the "actuarial value of assets" that fund a plan based on the plan's expected and actual market value of assets. The excess of actuarial accrued liabilities over the actuarial value of assets is referred to as the "unfunded actuarial accrued liability" or unfunded liability. For Texas statewide plans, if assets are not sufficient to pay the unfunded liabilities over 31 years, the fund is considered actuarially unsound. In most plans an unfunded liability is the responsibility of the fund administrator. In Texas, however, because the State and the employees contribute to the plan, both share part of the risk.

In addition to employee and employer contributions, ERS trust fund assets also include investment returns for the \$22 billion trust fund. The Board of Trustees is responsible for setting policies and investment strategies with the advice and expertise of an independent Investment Advisory Committee (IAC). ERS' professional investment team makes day-to-day investment decisions.

The Board of Trustees also determines how to invest assets based on economic and market expectations that are reviewed regularly by the Board, IAC, and ERS staff. Between 1992 and 2011, investment gains and income made up 64% of the revenue source for the trust fund, with 18% from State contributions, and 18% from employee contributions.

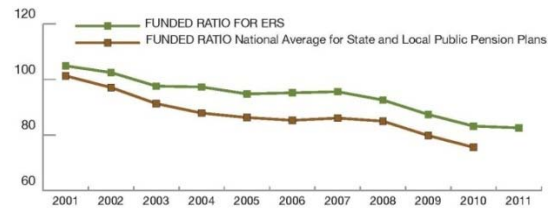
**Figure 2.3: ERS Trust Gains and Revenue**



### Unfunded Liabilities

The PEW Center on the States ranked Texas as 1 of 11 states with pension plans that are solid performers.<sup>1</sup> Unlike other states, Texas state law (Texas Government Code §811.006) further prevents benefit enhancements or cost-of-living increases to retirees unless the overall system is actuarially sound. Unlike other employers, the Texas plans do not allow spiking to increase pensions (such as counting overtime in pension calculations).

**Figure 2.4: Funding Ratios of Large State and Local Pension Plans Compared to Texas - 2001-2010**



Source: GAO analysis of data on large plans from the National Association of State Retirement Administrators' Public Fund Survey and the Center for Retirement Research.

Based on the August 31, 2011 actuarial valuation, returning the ERS retirement plan to actuarial soundness in one payment would require a lump sum of \$5.05 billion. The plan is also considered actuarially sound if the contributions pay the cost of benefits and amortize the liability over a 31 year period. The actuarially sound contribution for the ERS plan is 17.47% which is an increase of 4.47% or an additional \$259 million for FY2012. This contribution increases the state cost from 0.04 % of the current state budget to 0.065%.

Employer and employee contributions to the ERS plan are paying the current costs of benefits being earned but are not enough to pay down the existing unfunded liability in a measurable period. In the past the State has looked to investment returns to reduce liabilities. According to Hewitt Ennis Knupp, the fund's investment consultant, the fund would have to make returns at the level of 25% per year for three years to pay down the current liability. Since investment returns alone cannot realistically solve the retirement plan's funding issue, it will take increasing revenue, lowering expenses, or a combination of options from both.

### New GASB Rules Change Liability Reporting

On June 25, 2012, the Governmental Accounting Standards Board (GASB) approved a new standard that systems must use to report on their funding needs and liabilities. The new

standard requires systems to report liabilities based on a combined discount rate (where funded liability is discounted using the assumed investment return, and unfunded liability is discounted using the AA municipal bond rate) which will increase the amount of pension liability ERS will report in its FY 2014 comprehensive annual financial report. The State of Texas will report the numbers in its financial statements for FY 2015, available in February 2016. The standard affects reporting only, and is not intended to change how plan administrators determine plan funding.

Although many people think that the GASB based the new public sector standards on similar private sector rules, Congress recently amended those rules. On June 29, 2012, the U.S. Congress passed a bill that changed the smoothing period for the discount rate used in calculating private sector pension liabilities from two to 25 years, effectively raising the discount rate and lowering the reported liability. When applied, the new rules will show private employer pension plans as better funded and will reduce required pension contributions.

## **Long-Term Liabilities Become Unmanageable Unless State Takes Action**

The actuary evaluated the long-term impact on the \$5.05 billion unfunded liabilities if the State took no action to increase funding levels or modify current benefits. The State could pay benefits for the next 70 years until the fund runs out of money, however after 10 years the unfunded liability more than doubles to \$12.8 billion and continues to rise. .At the point of depletion, all future payments would have to be made on a “pay as you go” basis (all contribution dollars) since there would be no trust fund capital to generate investment earnings to offset the cost.

In the past, high investment returns have been used to close funding gaps. However, according to Hewitt Ennis Knupp, the fund’s investment consultant, the fund would have to earn an estimated 25% for the next three years in order to achieve actuarial soundness, if contributions and benefits do not change. Since investment returns alone cannot realistically solve the retirement plan’s funding issue, it will take increasing revenue, lowering expenses, or a combination of options for both.

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<sup>1</sup> Pew Center on the States, *The Widening Gap Update*, June 2012:  
[http://www.pewstates.org/uploadedFiles/PCS\\_Assets/2012/Pew\\_Pensions\\_Update.pdf](http://www.pewstates.org/uploadedFiles/PCS_Assets/2012/Pew_Pensions_Update.pdf)



## Section 3: Increase Revenue

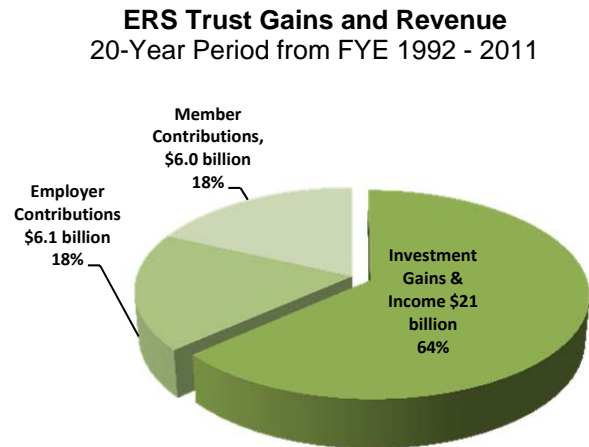
### Background

The main sources of revenue to the pension plan are contributions and investment earnings. The State and employees share responsibility for contributions – employees have always contributed a portion of their salary to the plan. The State, as employer, also contributes. The State's contribution is an “all funds” contribution with about 65% of the total coming from General Revenue (GR) funds, another 18% from federal funds, and another 16% from Fund 6, often referred to as “local funds.” Contributions from the State and from employees are granted tax-exempt status by the Internal Revenue Code (IRC, §401(a) (1) and §501(a)).

In Texas, state law defines an actuarially sound contribution (ASC). An ASC is the level of contributions necessary to fund the cost of future benefit accruals (the normal cost) and amortize any unfunded liability over a finite period, which according to Texas statute is 31 years. The cost of benefits (normal cost) is calculated using the current benefit structure and a number of assumptions, including employee termination, retirement and mortality rates. Because the ERS plans have an unfunded liability, this amount must be factored into the ASC equation so that the level of contribution covers the cost of the current and future benefits and the unfunded liability amortized over 31 years.

Defined benefit plans use investment returns and gains from the trust fund to help pay the cost of benefits. Historically, ERS investment returns have accounted for about 64% of the total revenue in the fund.

Figure 3.1: ERS Trust Gains and Revenue



ERS is currently examining the retirement program's history, and determining the trust's optimal asset allocation for the future. In the past, high investment returns have been used to close funding gaps. However, according to Hewitt Ennis Knupp, the fund's investment consultant, the fund would have to earn an estimated 25% for the next three years in order to achieve actuarial soundness, if contributions and benefits do not change.

Because investment returns alone cannot realistically solve the retirement plan's funding issue, it will take increasing revenue, lowering expenses, or a combination of both options. This section explores the revenue component of the formula and offers several revenue strategies for consideration. Options include increasing contribution rates, as well as options for one-time or continuing infusions from alternative or dedicated revenue sources.

Option	Description
<b>Option 3.1</b> Increase State and/or Employee Contribution Rates	Increase the total contribution rate to the trust fund by increasing the state contribution, the employee contribution, or both. Rate increases could be fixed or variable to ensure coverage of all costs.
<b>Option 3.2</b> Consider the use of Obligation Bonds	Either general obligation bonds or a state bond with repayment funded by a consistent, regular funding source owned by the state.
<b>Option 3.3</b> Consider using a one-time revenue source	Make a one-time payment for the full amount or some other amount to pay off or significantly reduce the unfunded liability.
<b>Option 3.4</b> Consider using alternate, ongoing funding sources	Direct lapsed GR dollars into fund or use a dedicated revenue source similar to the criminal court fee revenue provided to LECORSF starting on 9/1/13.

### Option 3.1 Increase State and/or Employee Contribution Rates

Any change to state or employee contributions requires legislation or appropriations authority. If the total contribution is set to the ASC, the plan is considered sound.

Contribution rates have not always equaled the ASC or even the normal cost of benefits. Had contributions been at least equivalent to normal costs from 1995 through 2011, there would be an additional \$516.1 million in the trust fund (\$283.4 million from contributions and \$232.7 million from investment earnings).

The contributions also have been lower than the amount in Texas Government Code §815.403: "During each fiscal year, the State shall contribute to the retirement system an amount equal to 7.4% of the total compensation of all employees in the retirement system for that year." Had the appropriated funding level remained at the 7.4% level, \$1.12 billion in additional funds would have been contributed between 1991 and 2011.

Each 1% increase in the total contribution rate generates \$58 million annually for the fund. The total contribution rate in FY2013 is 13%; both state and employees contribute 6.5%. If increasing contribution rates were the sole strategy for achieving actuarial soundness (meaning current benefit levels would not be reduced), the total contribution rate would have to be increased by 4.47% of payroll to 17.47%. This translates to \$259 million per year, according to the FY2011 valuation based on August 31, 2011 numbers. These calculations will change in the FY2012 valuation based on August 31, 2012 numbers.

Assuming the increased contribution comes only from employer contributions, not all of it comes from GR. The state contribution is an 'all funds' contribution. Following is the method of finance showing what the distribution of funding sources would be for \$259 million:

**Figure 3.2: Method of Financing of the State 'All Funds' Contribution**

Method of Finance	% of State Contribution	Amount (in millions)
GR/GRD	65%	\$167.3 M
Federal	18%	\$48.1 M
Fund 6	16%	\$41.2 M
Other	1%	\$2.4 M

When considering changes to contribution strategy it is important to consider the relative impact on the employer and on the employee. If the State raised only the employee contribution, it would represent a significant out-of-pocket increase for employees, and be viewed as a pay cut.

If only the state contribution absorbed the increase, and there was no legal cap, it would raise the current employer contribution level to 10.97%. At this contribution rate, the employer cost would move from 0.046 % of the current state budget to 0.065%.

Increasing employee contributions is not as effective as raising employer contributions due to account withdrawals by terminating

employees. Terminating employees can withdraw their contributions in full, plus interest, reducing the available amount for the trust fund to invest. On the other hand, all employer contributions remain in the trust fund investment pool. This often requires that employees contribute a higher percentage of payroll to cover this extra cost.

**Figure 3.3: Pros and Cons of Increased State and/or Employee Contribution Rates**

Pros	Cons
Reduces or eliminates the unfunded liabilities and, potentially, achieves actuarial soundness	Requires an increase in contribution rates
Reduce or eliminates the need to lower benefit levels to achieve sustainability over time	Increases the strain on the budget (if state contributions increased)
Increase in employee pretax contributions would reduce the state FICA match and create state savings	Increased employee contributions lower salaries and could disproportionately hurt lower salaried employees
Can prevent accrual of future unfunded liabilities based on funding level	
The State would report less unfunded liability on its financial statements under the new GASB standard	

**Option 3.2 Use of Obligation Bonds**

The study examined the possibility of issuing bonds as one way to get revenue. Other entities have used bonds with varying success. The State could issue obligation bonds in any amount and contribute the funds to the retirement system to pay off all or a part of its unfunded liability. There are two types of funding sources for pension obligation bonds in Texas.

- General obligation bonds: General state revenues in the budget repay this bond. General obligation bonds have a constitutional cap (maximum) monitored by the Texas Bond Review Board.

- State bonds: Repayment is funded by a consistent and regular funding source owned by the State. These funding sources would have to be identified and agreed to by the Legislature, and could include dedicated state fees, surcharges, lottery proceeds, gas or oil royalties, or other regular state income.

The ERS Board does not have authority over the decision to issue the bonds, nor does it administer the bond proceeds until they are deposited into the trust.

**Figure 3.4: Pros and Cons of Using Obligation Bonds**

Pros	Cons
Would reduce or eliminate current unfunded liabilities	Bonds increase state debt, and create hard-dollar repayment schedules for the state to meet
Would improve the plan's actuarial position and give it a more sustainable financial position for the long term	Funding sources for the bonds, whether a specific stream of income or a share of the general revenue of the state budget, are usually aggressively sought by many other state interests
Historically low lending rate	If the State issues too many bonds, it is penalized by the rating agencies and its borrowing costs for other projects would go up
The State would report less unfunded liability on its financial statements under the new GASB standard	The timing of the funding can be unfortunate. For example, if the amount given to the plan is invested immediately before a major market drop. The bonds must be repaid by the state in full even though the plan may only have 70% or 80% of the amount contributed

Pros	Cons
	Federal agencies could question being asked to reimburse a share of taxable bond debt service
	There is a state cap on general obligation bonds. It is unlikely that the Texas Legislature would give funds from pension obligation bonds to fund the ERS plan fully without also providing similar funds for the TRS plan. Thus, the combined pension obligation bond amount could be significant
	Does not prevent accrual of future unfunded liabilities based on plan experience and funding level

Considering other plans' experiences, the following practices should be followed when issuing bonds:

- Continue to make regular employee and employer contributions, and target bond proceeds towards the plan's unfunded liability.
- Allow bond proceeds to be invested in accordance with the Trust's asset allocation strategy as directed by the Board in exercise of its fiduciary responsibility.
- Establish governance measures to ensure that the bonds are repaid before considering any benefit enhancements. These measures should be done proactively because the Plan may appear to be better funded than the reality when combining the pension plan and bond assets.
- Comply with the bond market's structural and size requirements. Bonds are subject to an extensive and detailed process for the

issuance of any state bond, including review by the Texas Bond Review Board and the state Attorney General's office.

### Option 3.3 Consider the Use of a One-time Revenue Source

The State could choose to provide a one-time full or partial payment towards the current unfunded liability. Some have suggested using the State's economic stabilization fund for this purpose, though other potential sources could be tapped. If the State used this strategy to pay down unfunded liabilities through a one-time lump sum appropriation directly to the retirement trust fund, it could come in the following forms:

- a one-time payment to pay off the unfunded liability,
- a payment equal to the GR/GRD portion of increased state contributions for covering the unfunded liabilities, or
- a set amount equal to the interest earnings of the fund or a percentage of the fund.

**Figure 3.5: Pros and Cons of One Time Revenue Source**

Pros	Cons
Payment toward unfunded liabilities is a one-time cost that does not commit the fund to any continuing obligations	Would reduce the amount of reserves available for other state services
Would decrease or eliminate the plan's unfunded liabilities	The Legislature has displayed a clear aversion to using the stabilization fund
Would bring the State closer to funding its employees' retirement benefits on an actuarially sound basis	Does not prevent accrual of future unfunded liabilities based on plan experience and funding level



Pros	Cons
<p>Would lessen the need for, and extent of, retirement plan design changes. Employees could potentially retain current retirement benefits without increases to contribution rates</p>	
<p>The State would report less unfunded liability on its financial statements under the new GASB standard</p>	

**Option 3.4 Consider the Use of an Ongoing Alternate Revenue Source**

Alternative funding sources could be directly applied to the fund, or could be the source for enabling the State to issue performance obligation bonds funded by a consistent and regular funding source owned by the State.

**Dedicate a Revenue Source to Pay Down the Unfunded Liability**

In 1979, the Legislature provided for the funding of enhanced law enforcement benefits through a 75-cent additional fee for individual motor vehicle inspections. Later that fee was doubled to \$1.50 per auto inspection. This dedicated funding source kept the fund above the actuarially sound level and the plan became overfunded. However, LECOSRF lost that funding source in 1995, when motor vehicle inspection revenue was swept into GR. The LECOSRF plan overfunded balance eventually eroded and the plan began accumulating an unfunded liability in 2007.

Between 2007 and 2011, a 1.59% State contribution rate was in place; the FY2012 rate was 0%, and the FY2013 rate is 0.5%. LECOS members began contributing 0.5% of their salary to their supplemental fund beginning September 1, 2009.

Effective September 1, 2013, the Comptroller will begin to deposit approximately 11% of certain local criminal court fees that the Comptroller collects into the LECOS fund, as part of a provision enacted by the 82<sup>nd</sup> Legislature. This dedicated source is expected to contribute \$21.3 million per year. Depending on the additional State contribution that is appropriated, this amount may help to reduce the current unfunded liability of \$162.3 million.

**Direct Future Lapsed General Revenue Dollars into the Retirement Fund When Available.**

The State could deposit lapsed GR dollars up to the amount of the unfunded liability into the ERS trust. The constitution requires that half of any unencumbered positive balance of general revenues be deposited in the State’s economic stabilization fund, but the other half remains in GR.

The State has lapsed significant amounts of GR in the past. The 50% of lapsed GR transferred to the economic stabilization fund was \$1.8 billion in FY2008 and \$20.2 million in FY1992. Leftover GR balances do not occur frequently; however, when they do it can provide a significant amount of money. If a portion of this money were transferred to the ERS trust, it could reduce the unfunded liability without any additional contribution requirements.

An ERS bill along with a contingent rider in Article IX could stipulate that a portion of any remaining general revenues after the economic stabilization fund transfer be deposited in the fund. In addition, because the transfer takes place at the end of a biennium, the state could transfer the funds immediately without the complications and planning that may be involved with some of the other potential uses of the unspent general revenue. This approach does not require any additional budget or appropriation (except for the contingency rider), and there is no additional liability to the State.

This approach has similar pros and cons to those presented in figure 3.5.



## Section 4: Modify Plan Design

### Overview

This section will present potential plan design modifications and their impact on the unfunded liability, the funded ratio, and the actuarial sound contribution rate. The design modification options include those requested by the legislative charge, some that were considered in previous legislative sessions, and others that may slow future retirement rates but don't immediately lower costs.

When considering modifications that reduce benefits, ERS notes the impact and risk of unintended consequences. Some of the key policy questions to evaluate are:

- How will these changes affect the State workforce?
- Will these changes impair or assist the State's ability to deliver critical state services effectively?
- Do these changes maintain retirement benefits as an appropriate portion of the State's total compensation package?
- How will these changes affect individual employees?
- Will these changes risk legal or Internal Revenue Service repercussions?

According to SAO, state employee salaries are below norms for similar jobs in the private sector. State employers say the state benefit package is necessary to offset these lower wages. Without adequate benefits, they will not be able to recruit and retain the workforce needed to deliver state services.

### Crucial policy decisions - When to implement? Who is affected?

The State could face legal issues if it reduces pension benefits, especially if the reductions apply to currently vested members of the plan. Therefore, any proposed pension modifications must be carefully evaluated to ensure compliance with state law, federal anti-discrimination laws, and Internal Revenue Code

requirements that address tax-deferral qualifications. See **Appendix D – Legal Context and Risk** for further details.

Losing the plan's qualified status would have the following consequences to both the State and members:

- Member contributions to the pension trust would have to be paid with after-tax dollars (which would increase Federal Insurance Contributions Act (FICA) costs to the State and the members).
- Members would have to report the present value of their account balances immediately as taxable income and continue to report as taxable income the accrued value of their benefits, even though they are not yet receiving any payments from the plan, and both the State and members would have to pay FICA taxes on those values.
- Distributions from the pension trust would not be eligible to rollover to qualified accounts, such as 401(k) accounts.
- The income of the pension trust itself could be subject to tax, which would substantially increase the cost of funding benefits.

The report assumes that any plan modifications enacted by the 83<sup>rd</sup> Texas Legislature would be reviewed and evaluated by the IRS and that process is completed before the projected start date of January 1, 2014. The delayed start is also needed to communicate plan changes to employees.

A major concern with any benefit modification is whether the change would cause a "rush to retirement." This would almost certainly happen if a proposed change were to reduce the benefits of current employees unless they retired before the date the change became effective. The most costly retirees (from an actuarial perspective) are those that retire as soon as they are eligible. Employees who work beyond their retirement date support the long-term solvency of the plan because they contribute longer. Conversely, a rush to retirement would

further damage the pension trust's solvency. Further, if employees leave state service before they otherwise would in order to lock in benefits before a change, it also could harm the State's productivity and ability to retain employees with critical institutional knowledge before adequate succession planning. One way to reduce the risk of a rush to retirement is to grandfather anyone currently eligible to retire, or within about five years of retirement eligibility, so that any changes would not affect this group.

### Evaluating Cost vs. Risk

The report includes the fiscal impact for each option, either by analysis by ERS' consulting actuary, Buck Consultants, or by internal costing methodology. Unless noted otherwise, estimates on fiscal impact are made at both a low and high point to provide "bookends" for cost ranges of modifications based on grandfathering:

**LOW END** - The "low impact/low risk" model assumes that benefit reductions apply to employees who began their employment with the State on or after September 1, 2009, which includes some non-vested employees and all future employees.

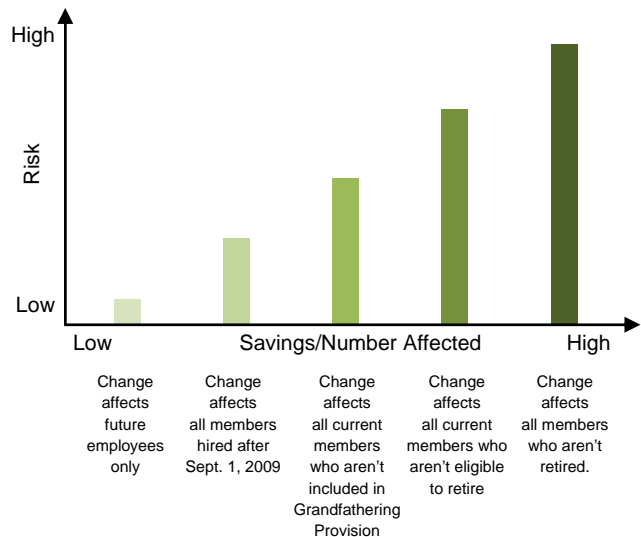
Changes applied only to this group have the impact of lowering the actuarial sound contribution rate – this is a result of the current cost method, which determines normal cost based on benefits in effect for members hired after August 31, 2009.

**HIGH END** - the "high impact/high risk" model is based on the assumptions used by the Teacher Retirement System for its benefit changes in 2005. The model assumes that the benefit reductions apply to all employees except any group that is exempt from changes by virtue of their age, service, or retirement eligibility as of January 1, 2014. This model would grandfather employees who meet one or more of the following requirements on or before December 31, 2013:

1. the person has attained age 50,

2. the sum of the person's age and amount of service credit in the retirement system equals 70 or greater, or
3. the person has at least 25 years of service credit in the retirement system (includes ERS service credited on or before December 31, 2013, along with contributory service, purchased service, including military service purchases, and certified Texas Governmental Entity service).

**Figure 4.1: Cost Savings and Risk Increase as Changes Apply to More Members**



As the chart indicates, cost reductions increase as the impact to employees increases. None of the discussed options affects current retirees.

Possible outcomes to evaluate when considering plan changes that reduce benefits:

- Benefit reductions improve the sustainability of the retirement system and reduce the actuarially sound contribution as well as the present value of future benefits promised by the plan.
- Employees would continue to receive a benefit and be eligible for a lifetime annuity.
- Benefit changes can create a rush to retirement unless there is appropriate grandfathering.
- Grandfathering tends to reward longer-term employees and in some cases may keep a

more experienced workforce in place if employees choose to work longer to increase pension amounts.

- Grandfathering reduces benefits only for some employees, creating inequity among different groups of employees and retirees.
- Based on past experience, even with grandfathering, some employees rush to retire just because of a change.
- Previously provided annual retirement benefit statements used for financial planning would no longer be valid for non-grandfathered active employees.
- Benefit changes may discourage future hires and/or increase agency turnover due to reduced benefits.

### Option Analysis

Research on six plan modification options is presented in this section. ERS presented Options 4.1, 4.2 and 4.3 in previous legislative sessions. Options 4.1, 4.3 and 4.6 address the

charge included in the General Appropriations Act.

The analysis uses ERS' current cost method, which determines the normal cost for all employees based on benefits in effect for employees hired after August 31, 2009. Thus, the impact of some changes applied only to the "low-end" grandfathering raises unfunded liabilities but lowers the actuarially sound contribution rates. Alternative cost methods can be used to determine normal cost based on benefits in effect for each benefit group. The actuarial impact of these changes using other cost methods lowers the unfunded liability but would also increase the normal cost rate as a percentage of payroll, and subsequently increase the actuarially sound contribution rate.

A summary of the actuarial impact of all modifications along with their aggregate impact follows the individual options.

Option		Description
4.1	Change the Final Average Salary Calculation to 60 Months	Bases the final average salary calculation used to determine benefit amounts on the highest average salary over 60 months for affected employees.
4.2	Eliminate the Use of Unused Leave to Establish Retirement Eligibility or Increase Service Time	Eliminates ability to use sick and annual leave balances to increase service time or increase annuity benefits.
4.3	Reduce the Benefit Multiplier for Future Service and allow Employees to "Buy Up" to Increase their Multiplier	Reduces the multiplier for future service from 2.3% to 2% for non-grandfathered employees. Allows affected employees to pay an increased contribution rate to "buy up" their multiplier to the 2.3% level at the actuarial cost.
4.4	Apply September 1, 2009 Changes to All Employees	Applies the benefit modifications enacted by the 82 <sup>nd</sup> Texas Legislature to additional non-grandfathered employees hired before September 1, 2009.
4.5	Reduce the Amount of Interest Paid on Retirement Account Balances	Reduces the amount of interest paid on employee accounts from 5% per year to a level authorized by the ERS Board of Trustees.
4.6	Establish a 5% per Year Pension Reduction and Eliminate the 25% Cap for Employees Who Retire Prior to Age 60	Establishes a 5% annual pension reduction starting at age 60 for non-grandfathered employees and eliminates the early reduction cap of 25% for those hired after 9/1/09.

### Option 4.1: Change the Final Average Salary Calculation to 60 Months

Option Number	Option	Grandfather Level	Reduction to Unfunded Liability (currently \$5.05 B)	Funded Ratio (currently 82.6%)	Actuarially Sound Contribution Rates (currently 17.47%)
4.1	Change FAS calculation period to 60 months	High End	\$216.0 M	83.2%	17.01%
		Low End	(\$70.0 M)	82.4%	17.30%

This option would modify the current rules for calculating average salary at retirement for ERS and LECOSRF members. The formula would use the highest 60 months of salary. Currently, the formula uses either the highest 36 months, for pre 9/1/09 employees, and 48 months for employees hired on or after that date.

Changing the final average salary calculation is more significant for employees using the 36-month final average salary. The benefit reductions reduce annuities approximately 5% for the affected employees. For employees who are currently subject to the 48-month average, benefit reductions would be approximately 2.5%.

Virginia recently raised the highest average salary calculation from 36 months to 60 months. Rhode Island also made a similar change to its state employee plan beginning in September

2009, which changed the final average salary to the highest five years rather than the highest three years.

Pros	Cons
<ul style="list-style-type: none"> <li>• Lowers the actuarial sound contribution rate</li> <li>• Consistent with changes being made by other states</li> <li>• Does not change current retirement eligibility rules</li> <li>• Similar to TRS annuity calculation rules</li> </ul>	<ul style="list-style-type: none"> <li>• Could create a rush to retirement without appropriate grandfathering</li> <li>• Could have legal implications without appropriate grandfathering</li> <li>• Previously provided annual retirement statements and estimates would no longer be valid for non-grandfathered active members</li> </ul>

## Option 4.2: Eliminate the Use of Unused Leave to Establish Retirement Eligibility or Increase Service Time

Option Number	Option	Grandfather Level	Reduction to Unfunded Liability (currently \$5.05 B)	Funded Ratio (currently 82.6%)	Actuarially Sound Contribution Rates (currently 17.47%)
4.2	Eliminate Use of Unused Leave for Accrual and Eligibility	High End	\$183.0 M	83.1%	16.89%
		Low End	No Change	No Change	No Change

This option would eliminate the use of annual leave and sick leave balances to become eligible to retire and to increase retirement annuities. While leave balances vary by individual, employees receive an average of six months of service credit from their leave balances at retirement. This option would affect contributing employees only. Employees who have left state employment, known as non-contributing employees, forfeit their leave balances when they terminate state employment.

Eliminating the use of sick and annual leave would have an effect on other leave policies and potentially raise other employment issues. Human Resource officials at state agencies tell ERS that the ability to use the leave for

retirement eligibility is a key factor aiding productivity. Employees now “bank” the leave rather than “burn” it, but officials believe that will not be the case if the policy were to change.

Pros	Cons
<ul style="list-style-type: none"> <li>• Although immediate reduction of unfunded liability is small, gains could be realized over a long term basis</li> <li>• Lowers the actuarially sound contribution rate</li> </ul>	<ul style="list-style-type: none"> <li>• Opposition by employers, employee associations, and employees</li> <li>• Could create a rush to retirement without appropriate grandfathering</li> <li>• Previously provided annual retirement statements and estimates would no longer be valid for non-grandfathered active employees</li> </ul>

### Option 4.3: Reduce the Benefit Multiplier for Future Service

Option Number	Option	Grandfather Level	Reduction to Unfunded Liability (currently \$5.05 B)	Funded Ratio (currently 82.6%)	Actuarially Sound Contribution Rates (currently 17.47%)
4.3	Reduce the Benefit Multiplier to 2% for Future Service	All active employees	\$375 M	83.7%	16.38%
		High End	\$252.5 M	83.3%	16.63%

#### History of the ERS Main plan multiplier

Between 1976 and 1986, the ERS plan multiplier was 1.5% for the first 10 years of service, and 2.0% for 10+ years. In 1988, the multiplier for the first 10 years of service was increased from 1.5% to 1.8%. In 1990, the state removed the tiers and set the multiplier at 2.0% for all years of service. In 1998, the multiplier became 2.25%, and in 2001, 2.3%. Retirement incentives temporarily increased multipliers in 1986-87 and 1993-95.

#### Proposed Change

The Legislative Budget Board recommended in its Staff Report to the 82<sup>nd</sup> Legislature<sup>1</sup> to reduce the current retirement benefit multiplier from 2.3% to a lower amount, such as 2.0%.

During the 81<sup>st</sup> Legislature, Regular Session, 2009, ERS provided estimates on the fiscal impact of potential changes to the system. One such change involved lowering the multiplier to 2.0%, which at that time would have lowered the normal cost rate by 1.14%.

Reducing the benefit multiplier from 2.3% to 2.0% for future service equals a benefit reduction of 0.3% of final average salary for each future year of service. It affects participants further away from retirement eligibility more significantly than participants who are near retirement eligibility.

If this option were applied to all employees, then the multiplier reduction for future service would affect all employees (except current retirees). If employees within five years of retirement

eligibility were grandfathered, then employees within five years of retirement and those eligible to retire would continue to have a 2.3% multiplier for future service. The State could also apply the new multiplier only to new employees, or apply it to only those employees who were hired on or after September 1, 2009.

#### Other States:

According to Public Fund Survey data presented in Section 6 of this report, 16 states use tiered multipliers based on years of service. Of the 44 plans with a single multiplier structure, 15 have the median of 2.0%. Multipliers across state plans varied from a low of 1.5% for the defined benefit component of Michigan's hybrid plan to 3.0% for New Mexico state employees.

#### Member Impact

**Figure 4.2 – Examples of Multiplier reduction**

Employee Description	Current 2.3% Multiplier	Change to 2.0% Multiplier
A 36-year-old employee with two years of service as of change on 1/14/2014 retiring at 60 (assuming continuous service)	would receive 59.8% of final average salary (2.3% x 26 years of service) at age 60  FAS of \$40,000 = \$1,993 gross monthly annuity	would receive 52.6% of final average salary (2.3% x two years of service=4.6%, plus 2.0% x 24 years of service=48%) at age 60  FAS of \$40,000 = \$1,753 gross monthly annuity



Employee Description	Current 2.3% Multiplier	Change to 2.0% Multiplier
A 50-year-old employee with 16 years of service as of change on 1/14/2014 retiring at 60 (assuming continuous service)	Would receive 59.8% of final average salary (2.3% x 26 years of service) at age 60  FAS of \$40,000 = \$1,993 gross monthly annuity	Would receive 56.8% of final average salary (2.3% x 16 years of service=36.8%, plus 2.0% x 10 years of service=20%) at age 60  FAS of \$40,000 = \$1,893 gross monthly annuity

Pros	Cons
<ul style="list-style-type: none"> <li>• Lowers the actuarially sound contribution rate</li> <li>• Encourages longer employment</li> <li>• Is consistent with the median multiplier provided by other state plans</li> </ul>	<ul style="list-style-type: none"> <li>• Could create a rush to retirement without appropriate grandfathering</li> <li>• Could have legal implications without appropriate grandfathering</li> <li>• Previously provided annual retirement statements and estimates would no longer be valid for non-grandfathered active employees</li> </ul>

### Allow Employees to “Buy Up” to Increase Their Multiplier

If the State chooses to reduce the multiplier for future service, it could also offer those affected the opportunity to “buy up” from the reduced multiplier of 2.0% to 2.3% for future service by increasing their contribution amount to the actuarially determined level. This would be a neutral cost to the system.

## Option 4.4: Apply September 1, 2009 Benefit Changes to Additional Employees

Option Number	Option	Grandfather Level	Reduction to Unfunded Liability (currently \$5.05 B)	Funded Ratio (currently 82.6%)	Actuarially Sound Contribution Rates (currently 17.47%)
4.4	Apply September 1, 2009 Benefit Changes to Additional Employees	High End	\$1.06 B	85.7%	16.39%
		Non-vested employees hired after 9/1/09	\$70.3 M	82.8%	17.40%

The 2009 Texas Legislature established the following benefit calculation rules for employees who were hired after September 1, 2009. This option expands these rules to non-grandfathered employees hired before this date:

- change final average salary calculation from a 36-month average to a 48-month average,
- change retirement eligibility from age 60 with five years to age 65 with 10 years,
- change rule of 80 with a minimum vesting of five years to rule of 80 with a minimum vesting of 10 years,
- change in early retirement factors:
  - implement a 5% reduction for employees who retire before age 60, capping at 25%,
  - implement a 5% reduction for LECOSRF class employees who retire before age 55, capping at 25%,
- eliminate the use of sick/annual leave to meet retirement eligibility (can still count leave as service credit in calculation of annuity).

Pros	Cons
<ul style="list-style-type: none"> <li>• Lowers the actuarially sound contribution rate</li> <li>• Encourages longer employment</li> <li>• Makes benefits consistent across a larger population of employees</li> </ul>	<ul style="list-style-type: none"> <li>• Could create a rush to retirement without appropriate grandfathering</li> <li>• Could have legal implications without appropriate grandfathering</li> <li>• Previously provided annual retirement statements would no longer be valid for non-grandfathered active employees</li> </ul>

This option would change retirement eligibility criteria and lower annuities for ERS and LECOSRF employees (and not ESO, JRS1, or JRS2 employees).

Option Number	Option	Grandfather Level	Reduction to Unfunded Liability (currently \$5.05 B)	Funded Ratio (currently 82.6%)	Actuarially Sound Contribution Rates (currently 17.47%)
4.5	Stop paying guaranteed 5% interest	Reduce interest paid on all accounts to 2%	\$7.9 M	No change	17.42%

**Option 4.5: Reduce the Amount of Interest Paid on Retirement Account Balances**

Currently, contributing and non-contributing members earn 5% interest on their retirement account balances. The retirement account includes only the employee’s retirement contributions. Employees who leave state employment and withdraw their account balance receive this interest. This guaranteed interest is the only benefit that short-term employees receive for their years of service as they forfeit future retirement benefits once they withdraw their account balances. Employees only get access to the employer contribution if they retire.

This option would reduce the interest paid on employees account balances but would not reduce an employee’s retirement annuity amount. Employees who leave their money in their ERS account when terminating state employment are called non-contributing employees. Both non-contributing and contributing members (active employees) would receive less interest on their accounts under this option, but if they eventually retired, it would not lower their annuity payments.

**As of August 31, 2011**  
*ERS has 84,900 Non-Contributing Members.*

The ERS Board of Trustees could be given the authority to set the interest rate,

whether it is dropped to a fixed percentage (for example, 2%), dropped to 0%, or set at a variable rate based on investment performance.

Pros	Cons
<ul style="list-style-type: none"> <li>supported by the Texas Public Employees Association</li> <li>lowers the actuarially sound contribution rate</li> <li>brings interest payments, now set at 5%, in line with current market rates</li> <li>does not impact employee’s annuity amount or benefit calculation</li> </ul>	<ul style="list-style-type: none"> <li>reduces one of the plan’s portability features that provide a benefit to shorter-term employees</li> <li>lowers accumulated employee retirement account balances</li> <li>impact of change on the rate of account withdrawals is unknown</li> </ul>

Although the actuarial impact is relatively low for this option, there is a perception that the 5% interest rate is out of line with market realities. Therefore, enabling the Board to make interest rate adjustments could be important.

The relatively high interest rate in place now supports the argument that even those employees who do not work long enough to qualify for retirement get a benefit that is portable as they move to other employers.

**Option 4.6: Establish a 5% per Year Pension Reduction and Eliminate the 25% Cap for ERS Employees Who Retire Prior to Age 60 (LECOSRF at Age 55)**

Option Number	Option	Grandfather Level	Reduction to Unfunded Liability (currently \$5.05 B)	Funded Ratio (currently 82.6%)	Actuarially Sound Contribution Rates (currently 17.47%)
4.6	Establish a 5% per Year Pension Reduction and Eliminate the 25% Cap for Retirements Prior to Age 60	High End	\$1.07 billion	85.8%	16.29%
		Low End	(\$173.0 M)	82.1%	17.08%

The charge for this report requested that the study look at the impact of changing retirement eligibility. Option 4.6 is an alternative approach to changing eligibility requirements. Under this option, employees are still able to retire under the Rule of 80, but they earn a lower annuity if they retire before age 60 (55 for LECOSRF members). Employees hired on or after September 1, 2009 have their standard service retirement annuity reduced by 5% for each year an employee retires before age 60, with a maximum possible reduction of 25%. This option would remove the 25% cap for those who retire before age 60 or age 55 for LECOSRF. Senate Bill 1691 (2005) established a 5% reduction for each year for Teacher Retirement System employees who retire before the age of 60 with no cap on the amount of the reduction.

Employees eligible to retire before age 60, or age 55 for LECOSRF, could elect to take the reduced pension or wait until their unreduced retirement age. The estimated savings for all of these annuity reduction factors based on age do not assume or account for any behavior changes on the part of employees. Therefore, the savings are likely overstated. Many employees might choose to work beyond their initial retirement eligibility date to avoid having their annuity reduced if they meet the Rule of 80 before age 60.

Assuming continuous state service, approximately 70% of state employees hired

before September 1, 2009 are expected to be eligible to retire before reaching the age of 60. For state employees hired after September 1, 2009, that figure is 38%.

Pros	Cons
<ul style="list-style-type: none"> <li>lowers the actuarial sound contribution rate</li> <li>does not change retirement eligibility</li> <li>encourages longer employment</li> <li>employees who choose to work longer would avoid the 5% reduction and would receive a higher annuity due to having more years of service at retirement</li> <li>minimal impact to LECOSRF employees as most LECOSRF retirees are age 55 or older at retirement</li> </ul>	<ul style="list-style-type: none"> <li>reduces pensions of future retirees who retire before age 60 or age 55 for LECOSRF</li> <li>could create a rush to retirement without appropriate grandfathering</li> <li>could have legal implications without appropriate grandfathering</li> <li>previously provided annual retirement statements and estimates would no longer be valid for non-grandfathered employees</li> </ul>

**LECOSRF component**

LECOSRF employees hired on or after September 1, 2009 can receive a full annuity if they meet retirement eligibility at age 55. If they retire before age 55, their annuity is reduced by 5% per year for a max of five years. This gives them 75% of their annuity if they retire at age 50 and all years below age 50. Under this option, reductions apply at all retirement ages below

age 55 with no cap on the reduction amount for those employees who are not grandfathered.

Assuming continuous state service, approximately 90% of LECOSRF employees hired before September 1, 2009 are expected to be eligible to retire before reaching the age of 60. For LECOSRF employees hired after September 1, 2009, that figure is 87%.

**Figure 4.3 - Employees Class and LECOSRF Examples**

<b>Employees Class Examples</b>	<b>25% Cap</b>	<b>No Cap</b>
The average State employee is age 44 with nine years of service and will meet the rule of 80 with continuous service at age 58	This employee's monthly annuity would be reduced 10%	This employee's monthly annuity would be reduced 10%
An employee who starts working at age 18 will meet the rule of 80 with continuous service at age 49	This employee's monthly annuity would be reduced 25%	This employee's monthly annuity would be reduced 55%
<b>LECOSRF Examples</b>	<b>25% Cap</b>	<b>No Cap</b>
A LECOSRF employee that starts working at age 25 will meet eligibility with 20 years of LECOSRF service at age 45	This officer's monthly annuity would be reduced 25%	This officer's monthly annuity would be reduced 50%

**Other Options Considered**

In addition to the options evaluated above, ERS researched a number of other options for legislative consideration. These options have not undergone actuarial evaluations, because initial analysis indicated they would have a low or neutral cost impact. However, should the Legislature choose to consider any of the following options, ERS could request specific actuarial evaluations.

**Change LECOSRF Eligibility to Age 50 with 25 Years of Service**

Changing LECOSRF retirement eligibility to age 50 with 25 years of service to retire (currently 50 with 20 years) would increase contributions to the system for a minimum vesting period of 25 years and would delay employees from receiving annuities by an additional five years for a LECOSRF supplement.

Pros	Cons
<ul style="list-style-type: none"> <li>would still allow LECOSRF employees to receive the higher multiplier and would increase benefits due to more years of service</li> <li>may encourage longer employment, but impact to employees is lessened by the fact that the average LECOSRF employee has 25.72 years of service at retirement</li> </ul>	<ul style="list-style-type: none"> <li>may impair recruitment efforts for state law enforcement officers when candidates compare retirement benefits provided by competing employers (counties and cities)</li> <li>cost impact on trust is lessened by the fact that the average LECOSRF employee has 25.72 years of service at retirement</li> </ul>

**Make All Service Purchases Actuarially Neutral**

This option would make buy-back of military, service not previously established, and refunded service actuarially neutral.

Currently, when an employee purchases cancelled or withdrawn service credit, a 10% penalty is applied to the principle.

Military service purchases under §813.302 are also based on a 10% penalty. An employee may

buy a maximum of 60 months of military service under §813.301. In addition, the State must make a matching contribution when the military service is initially established.

Currently, the purchase cost for additional service credit (§813.513), or “airtime,” and the 90-day waiting period (§813.514) are calculated on an actuarially neutral basis.

Pros	Cons
<ul style="list-style-type: none"> <li>eliminates service cost subsidies and may represent a change in State policy</li> <li>may encourage longer employment</li> </ul>	<ul style="list-style-type: none"> <li>would not measurably lower the unfunded liability</li> <li>low cost to purchase previous military service is a long-standing popular feature and may represent a change to State policy</li> <li>might discourage skilled employees from returning to state employment</li> </ul>

**Base Retiree Health Insurance Premiums on Years of Service**

This option is included in the Interim Benefits Study report on the Group Benefits Program (GBP). However, it could have a positive impact on the retirement trust as well.

Currently, retirees get the same health insurance subsidies as regular employees – 100% for the employee, and 50% for dependents, provided they had at least 10 years of ERS service credit and meet other eligibility criteria. This option would reduce the State’s premium contribution subsidy for employees who retire with less than 20 years of service. ERS previously presented this option to the 2009 and 2011 Texas Legislatures.

Under this option, State premium subsidies would decrease to:

- 50% for retirees with 10-15 years of service,
- 75% for retirees with 15-20 years of service, or
- 100% for retirees with 20+ years of service.

Three levels of grandfathering are presented in the GBP Study report:

- no grandfathering,
- grandfathering current retirees, and
- grandfathering 10 years of service.

This option would not reduce the level of retirement benefits provided by the retirement system. However, it is likely that employees would work longer on average to reach the next level of state service time they need to earn the higher level of premium subsidy when they retire. When employees work and contribute for

longer periods of time to the retirement trust, it has a positive financial effect. Actuaries cannot determine in advance how much longer employees would work on average, but could determine savings through an experience study after the option is implemented.

The Texas Public Employees Association and The Center for Public Policy Priorities have expressed support for this option.

## Actuarial Analysis comparing all Plan Modification Options

**Figure 4.4 - Summary of Actuarial Impacts Based on “High Impact/High Risk”<sup>\*\*</sup> and “Low Impact/Low Risk”<sup>\*\*\*</sup> Grandfathering<sup>\*\*</sup>**

Option Number	Option	Grandfather Level	Reduction to Unfunded Liability (currently \$5.05 B)	Funded Ratio (currently 82.6%)	Actuarially Sound Contribution Rates (currently 17.47%)
4.1	Change FAS calculation to 60 months	High End	\$216.00 M	83.2%	17.01%
		Low End	(\$70.00 M)	82.4%	17.30%
4.2	Eliminate Use of Unused Leave for Accrual and Eligibility	High End	\$183.00 M	83.1%	16.89%
		Low End	No Change	No Change	No Change
4.3	Reduce the Benefit Multiplier to Future Service	All active employees	\$375.00 M	83.7%	16.38%
		High End	\$252.50 M	83.3%	16.63%
4.4	Apply September 1, 2009 Benefit Changes to Additional Employees	High End	\$1.06 B	85.7%	16.39%
		Non-vested employees hired after 9/1/09	\$70.30 M	82.8%	17.40%
4.5	Reduce the Amount of Interest Paid on Retirement Account Balances	Reduce interest paid on all accounts to 2%	\$7.90 M	No change	17.42%
4.6	Establish a 5% per Year Pension Reduction and Eliminate the 25% Cap for Retirements Prior to Age 60	High End	\$1.07 B	85.8%	16.29%
		Low End	(\$173.00 M)	82.1%	17.08%
Aggregate Impact of Options	High End	\$1.38 B	86.7%	14.55%	Aggregate Impact of Options
	Low End	(\$426 M)	81.4%	16.39%	Low End
<p>“High Impact/High Risk” Grandfathering would exempt employees who, on December 31, 2013, are at least 50 years old; the sum of the person’s age and amount of service credit in the retirement system equals 70 or greater; or the person has at least 25 years of service credit in the retirement system (includes ERS service credited on or before December 31, 2013, along with contributory service, purchased service, including military service purchases, and certified Texas Governmental Entity service).</p> <p>***“Low Impact/Low Risk” Grandfathering includes all employees hired after September 1, 2009 and all new hires. Changes applied only to this group have the impact of lowering the actuarially sound contribution rate – this is a result of the current cost method that determines normal cost based on benefits in effect for members hired after August 31, 2009.</p>					

<sup>1</sup> Legislative Budget Board Staff, *Effectiveness and Efficiency Reports*, “Maintain the Pension Solvency of the Employees Retirement System and the Teacher Retirement System,” January 2011, p. 97-116.



## Section 5: Consider Alternative Plan Structures

### Overview

This section explores options for alternative retirement plan structures. State governments have historically provided some form of defined benefit retirement plan for their employees. Through the beginning of 2012, 49 states still provide a traditional defined benefit retirement plan as part of their retirement package. The majority (33) only provide a traditional DB plan, while the remaining states provide one of the alternative plan structures outlined in this section. One state, Alaska, instituted a mandatory defined contribution plan for employees hired after 2005 with no defined benefit option. There can be potential benefits in adding or changing plan structures such as reducing the risk of accumulating additional unfunded liabilities going forward and providing choices to assist employers in attracting skilled employees. This section explores alternate plan options, potential benefits and impacts.

### Key Findings:

- Implementing an alternative plan structure does not automatically lower costs. In fact, all the sample alternatives modeled in this Section show increased costs in order to achieve a sound new benefit structure.
- Changing to an alternate plan structure does not eliminate the current unfunded liability. Freezing the current plan to move to an alternative structure will require contributions in an amount necessary to ensure that the new benefit structure is sustainable as well as pay down the existing unfunded liability in an actuarial sound manner. If the existing plan is closed to new members, it will be depleted by 2039 based on the current contribution levels and the full cost of annuities will need to be met from other State resources such as General Revenue without any benefit of investment earnings to reduce the cost – the 2039 ‘pay as you go’ annual cost is estimated over 3 billion. It should be noted that this amount slowly decreases each

year and it will take over 40 years until this ‘pay as you go’ cost will drop to the level the state is currently contributing. This amount does not include the contribution to the alternative plan, only the benefits earned by current DB plan members.

- The level of benefits provided by an alternative plan structure depends on the contributions made available to fund the new benefits. An alternative structure can be designed to reduce risks and costs in the future, however modeling indicates a lower level of benefit to achieve savings. Savings can also be achieved by lowering benefits in the current plan.
- Prefunded and pooled investing are important plan design features that provide value to both the member and the state. Prefunding and pooled investing allows the ERS trust fund investment returns to pay 64% of the retirement benefits which significantly reduces the cost of providing benefits. In addition, Texas businesses are supported by the investment portfolios and with 96% of retirees staying in Texas, their annuities are spent in communities across the state.

### Alternative Plan Types

A traditional defined benefit plan (DB plan) defines a specified monthly benefit at retirement. This benefit generally continues for the lifetime of the member and is based on the member's salary and service at retirement. Alternatively, a defined contribution plan (DC plan) does not define a specific amount of benefits at retirement.

A DC plan defines the employee and employer contributions to the employee's individual account and the employees' ultimate benefit will be based on these contributions plus investment gains or losses. The traditional DC plan is a self-directed DC plan, where the individual has discretion over how much they may contribute to the plan (within IRS limits) and what the asset allocation of the plan will be.

A hybrid plan combines features of traditional defined benefit and defined contribution plan designs. There are many alternative plan structures that can be called “hybrid plans”; however, in this section we will review the following structures:

- **Employee Choice Plan:** Provides members with choice between a traditional DB plan and a traditional DC plan. The two funds are invested separately – expected to have little impact on the DB trust fund.
- **Cash balance plan:** Considered a Defined Benefit plan however differs from the traditional model by defining the retirement benefit in terms of a stated account balance. The investment risks and rewards may fluctuate with the market as a DC plan and/or have some minimum guarantee which is borne by the employer as in a traditional DB plan. Can be implemented using the same trust as used by the current plan allowing maximum pooled investment benefit.
- **Two-part (Defined Benefit, Defined Contribution) hybrid plan:** Includes a modest mandatory DB plan and a modest mandatory DC plan where the combined benefit is intended to provide a reasonable overall benefit to the member while mitigating some of the risks to the employer. The two funds are invested separately.

**Section 6 – Benchmarking** provides more information about the alternative plans adopted by other states.

### **Plan Design Choices are Critical**

There are so many plan design options to consider in a new plan structure, ERS took the approach of reviewing the experiences in other states to evaluate the impact in Texas.

Following are considerations in transitioning from the current plan structure to an alternative:

- **Plan design elements:** The current defined benefit plan requires mandatory participation and provides a lifetime annuity with wage replacement based on a final average salary and years of service. There is some level of

portability however the state match is not received until a person retires. When considering alternative plan structures, all plan design features must be defined – portability and vesting requirements, contribution strategies, retirement eligibility, and what is required for the employee to achieve retirement readiness and self-sufficiency given the provided benefit.

- **Intergenerational inequity:** If benefits are reduced for new employees when all are making the same contribution, they are paying the same for less benefits than tenured employees. The challenge is to determine how to address these inequities fairly.
- **Lower risk versus decreased benefits and increased costs:** Research indicates alternative plans are more expensive to operate than a traditional DB and are less efficient in the level of benefit provided.
- **Death and Disability Benefits:** These benefits are currently provided as part of the DB plan; however, they are not typically in the alternative plan structures. This would be a plan design decision or possibly an optional choice at an additional cost. Both of these benefits are especially important for the state’s law enforcement and custodial officers.
- **Benefits for special classes – law enforcement, custodial officers, elected class:** The current plan accommodates benefits for different types of employees with different needs. The costs for these benefits are generally higher than regular state employee benefits and are currently included as part of the main ERS plan costs. A plan structure change will require consideration of all the different groups, general employees, elected class and law enforcement and custodial officers.
- **Investment Returns:** Certain alternative plan structures prompt a change in investment strategy which impacts the long-term expected return on plan assets.

**Figure 5.1: Background on retirement plan designs**

	ERS Defined Benefit	Hybrid Plans		Defined Contribution
		Cash Balance	Combination Defined Benefit/Defined Contribution	
Investment Strategy	Invest to achieve superior long-term return that will help fund plan benefits	Invest to achieve superior long-term return that will help fund plan benefits while considering the impact of the interest crediting rate.	Invest to achieve superior long-term return that will help fund plan benefits while a portion of plan assets will be diverted to individual accounts	Based on the employees' individual account allocation
Investment management	Pooled and managed professionally	Pooled and managed professionally	Percentage of total assets that will be pooled and managed professionally will slowly decrease which could impact optimal asset classes.	Usually by the individual employee or professionally for a fee paid by the employee, but can be centrally managed (pooled funds) for greater returns and lower costs.
Benefits	Lifetime annuity based on a formula that pays 2.3% per year of service based on the employee's final average salary	Notional account balance at retirement can be converted to annuity or distributed to as a single sum	Portion of benefit paid as a lifetime annuity while the member also accumulates a DC account balance	Based on the value of the employee's account at retirement
Risk sharing	Shared responsibility between employees and employer. Participants may need to increase contributions or receive lower benefits if plan costs increase.	Shared responsibility between employees and employer. Tied to guarantees specified in the plan design.	Reduced DB benefit with enhanced DC component shifts more risk to member.	Zero risk of unfunded liability to employer if it does not guarantee ultimate benefit level. However, if the DC plans perform poorly, there can be indirect risks of poor retirement planning, an older, possibly less productive workforce and potential for increased utilization of government provided social programs.

Source: various, including National Association of State Retirement Administrators and the Pension Review Board.

**Alternative Plan Design Options:**

The following chart outlines the 4 options analyzed in the report. The options include those requested by the Legislature, two part hybrid and cash balance, as well as employee choice and mandatory DC options. Due to the complexity of setting up a new plan structure, the option analyses use assumptions based on other state's experience to model cost and determine impacts of the different structures.

Option	Description
<b>Option 5.1 Employee Choice Plan</b>	At the time of employment, this option would provide the member a choice between a DC-only plan and a DB-only plan. The DB option could be the ERS main plan as it is or with plan design modifications
<b>Option 5.2 Mandatory Cash Balance Plan</b>	Accruals will mimic a DC plan; except the investments are pooled with professional management during active employment and annuitization is required at retirement. The plan will define the benefit in terms of a stated account balance where the investment risks and rewards on plan assets are based on the formula for crediting interest on the notational accounts. Cash balance plans implemented by Nebraska and Louisiana are analyzed.
<b>Option 5.3 Mandatory Two-part Hybrid Plan</b>	Members participate in a reduced mandatory DB plan and a mandatory DC plan where the combined benefit is intended to provide a benefit while shifting more of the risk to the employee. Employees within certain grandfathered groups remain in the current ERS main DB only plan.
<b>Option 5.4 Close the DB plan and establish a mandatory DC Plan for new employees</b>	New employees are not allowed to participate in the DB plan.
<b>Other Combinations</b>	The legislature could design a unique plan for the State of Texas combining features from any of these plan structures. For instance, a hybrid plan could include DB and cash balance features, instead of DB/DC.

### Option 5.1: Employee Choice Plan

Under this option, members would be given a one-time irrevocable election to either participate in a traditional DB plan or participate in a traditional DC plan. This election could be made available to all current employees or only to new employees after a certain date.

In calculating the fiscal impact of this type of plan design, we had to estimate how many employees would choose the optional plan. Based on experience in other States, DC plans generally have proven to be less popular with state workers than DB plans: In Florida where employees can choose between DB and DC, an average of more than 95% of existing employees opted to stay in the DB plan. Likewise, an overwhelming majority of new employees – 78% on average – have chosen DB plans. This experience is similar to private sector worker’s preferences. Recent studies show that workers prefer DB plans to other types, and seek out the plans when considering their employment options.<sup>1</sup>

Assumptions	Fiscal Impact
<ul style="list-style-type: none"> <li>• New and existing employees can make a one-time choice for the DC plan</li> <li>• Choice is irrevocable</li> <li>• Adoption rate of the DC plan less than 25% (as experienced in other states)</li> <li>• Reduced DB benefit costs through adoption of one or more of the plan design options in Section 4</li> <li>• DC vesting schedule of 0% after one year and 25% after each of the subsequent four years, for full vesting at five years.</li> </ul>	<ul style="list-style-type: none"> <li>• No unfunded liability for those choosing DC plan</li> <li>• An additional contribution of 4.47% of payroll (or \$259 million in FY2013) would still be needed to make the ERS main plan actuarially sound.</li> </ul>

Pros	Cons
<ul style="list-style-type: none"> <li>• Maintains existing DB trust for continued long term investing for maximum returns.</li> <li>• Choice – lets employees choose their retirement plan.</li> <li>• Provides a more portable option to employees who are not planning state government careers.</li> <li>• Allows employees that want investment control to manage their own investments.</li> <li>• DC option may increase the ability of the State to recruit new types of employees.</li> <li>• Retains some level of lifetime monthly annuity benefit for employees who elect the DB plan.</li> <li>• Eliminates unfunded liabilities for the participants that elect the DC plan.</li> </ul>	<ul style="list-style-type: none"> <li>• With the same contribution rates, a traditional DC plan will generally provide less income replacement at retirement than a traditional DB plan.</li> <li>• Member-directed DC plans have the highest administrative costs and fees, and lowest overall returns.</li> <li>• Ultimate DC benefit may be too low for a self-sufficient retirement.</li> <li>• DC plans do not offer death or disability benefits.</li> <li>• The ultimate retirement benefit provided by a DC plan can be negatively impacted by members withdrawing funds prior to retirement through loans and hardship withdrawals.</li> <li>• DC Plan implementation and administrative costs are higher and cannot be borne by existing trust fund.</li> <li>• Risk of unfunded liability growth in DB plan if a sound contribution strategy is not adopted during the implementation of the new program.</li> </ul>

## Option 5.2: Establish a Cash Balance Plan

Similar to DC plans; a cash balance plan bases retirement benefits on the employee's account balance. In a cash balance plan, however, investment risks and rewards are professionally managed and the interest credit will be based on a formula, which may or may not be tied to actual investment performance. At retirement, the account balance is annuitized into the trust to provide longevity protection for the member. As a DB plan, it can be incorporated into the current ERS plan design. Therefore, even if a new cash balance plan were mandatory for future hires, the current DB plan would not need to be frozen. This is important because both contributions can pool into the existing trust fund which maximizes the investment potential.

Both Nebraska and Louisiana have recently implemented cash balance plans for state employees. **Section 6 – Benchmarking** provides descriptions of the alternative plans adopted by these states.

Texas could devise a cash balance plan that would be actuarially sound based on some level of contributions, although contributions may be higher and benefits lower since contributions would have to continue to support the existing DB plan and pay down the unfunded liability.

ERS used two state government plans (Nebraska and Louisiana) to model the state's cost of a cash balance structure under a wide range of economic conditions. Each state has a financial situation that differs from the ERS plan, and cost estimates were based on the minimum Texas contribution levels and plan status.

The estimates compare the potential cash balance costs to those of the current DB plan under the same economic scenarios and based on the assumptions listed as “sample plan designs” in the following table.

Sample Plan Designs	Fiscal Impact
<ul style="list-style-type: none"> <li>• Current members remain in the current ERS DB plan (2.3% multiplier).</li> <li>• New members hired after January 1, 2014 are enrolled in a cash balance plan.</li> <li>• Employees cash balance accounts receive 12% pay credits (6% employer/6% employee).</li> <li>• State is assumed to contribute the actuarially sound rate for the total program (pay down the current DB plan's unfunded liability and also make a 6% contributions to new employees' cash balance accounts).</li> <li>• In addition to state contribution, cash balance participants receive interest credits:</li> </ul> <p>Louisiana Plan: Annual interest credit is equal to system's actuarial rate of return, less 1%, but not less than 0%.</p> <p>Nebraska Plan: Annual interest credit is equal to Federal Midterm Rate plus 1.5% with a minimum of 5%.</p>	<p><b>Louisiana model:</b> Under a wide range of economic conditions, the state's cost on an actuarially sound basis and over a 30-year basis ranges from a low of \$7.9 billion (high market returns) to a high of \$52.2 billion (low market returns).</p> <p><b>Nebraska model:</b> Under the same range of economic conditions, the state's cost on an actuarially sound basis and over a 30-year basis ranges from a low of \$7.6 billion to a high of \$50.2 billion.</p> <p>Under both cash balance models, lower overall interest crediting rate during a member's career will result in lower benefits. Alternatively, the members can also benefit from strong asset performance and potentially earn a greater benefit under the Louisiana model.</p> <p><b>Current DB model (only):</b> For comparison purposes, the potential cost needed to maintain the current DB plan as is (for current and new employees) and under the same range of economic conditions and contribution rates (6%/6%), the state's cost on an actuarially sound basis and over a 30-year period ranges from \$8.1 billion to \$53.8 billion.</p>

Pros	Cons
<ul style="list-style-type: none"> <li>• Maintains existing trust fund for maximum investment opportunities.</li> <li>• May provide guaranteed account growth for the career of the employee and lifetime annuity payments during retirement.</li> <li>• In the Louisiana structure, the member is provided a less volatile investment experience as the interest credit is based on the 5-year average return on investment. Also, investments are pooled and professionally managed which have historically provided much higher overall returns than self-directed defined contribution plans.</li> <li>• State risk may be limited since interest credits can be correlated with actual return on investments.</li> <li>• Easier for members to understand how the value of their benefit accumulates each year with pay and interest credits.</li> </ul>	<ul style="list-style-type: none"> <li>• Death and disability benefits are not always included. The state would need to decide if and how to provide these benefits.</li> <li>• Does not eliminate the risk of an unfunded liability if plan experience does not meet expectations.</li> <li>• Limits the ability to have orderly and predictable retirement patterns, or encourage retirements.</li> </ul>

### Option 5.3: Establish a Two-part Hybrid Plan

Two-part hybrid plans shift more of the risks from the employer to the employee by providing a reduced DB plan benefit and implementing a mandatory DC benefit. The level of the benefit provided by the DB and DC components will depend on the plan design and the level of contributions provided to fund the new structure while continuing to amortize the existing unfunded liability of the current ERS DB plan.

The following sample plan design illustrates a possible two-part hybrid plan design and the fiscal impact of the associated cost.

Sample Plan Design	Fiscal Impact
<ul style="list-style-type: none"> <li>Existing employees remain in the current ERS DB plan (2.3% multiplier).</li> <li>New members hired after January 1, 2014 are enrolled in a two-part hybrid plan.</li> <li>The hybrid DB benefit is based on a 1.00% multiplier.</li> <li>Employees remaining in the DB plan will continue to contribute 6.5%</li> <li>New employees contribute 3.25% of pay to each of the DB and DC components.</li> <li>The state contributes 6.5% to the DB plan for the DB participants and 3.25% to the DB and 3.25% to the DC for the alternative plan participants</li> </ul>	<ul style="list-style-type: none"> <li>The combined plan will require an ASC that is higher than continuing with the current ERS main DB plan for several decades.</li> <li>If the State and employee contribution remains at 13.00% of pay (the anticipated contribution rates for FY2013), funding is not sufficient to pay down the unfunded liability and the ERS trust fund will be depleted by the year 2037 becoming a pay as you go plan.</li> </ul> <p><i>Refer to <b>Appendix F - Actuarial Analysis of Option 5.3.Two-Part Hybrid Plan</b></i></p>

Pros	Cons
<ul style="list-style-type: none"> <li>Maintains an ongoing DB trust fund for maximum long-term investment opportunities</li> <li>Distributes investment risk more evenly between the employer and employee</li> <li>Retains some level of lifetime monthly annuity</li> <li>No employer liabilities for DC component benefit</li> <li>Provides a more portable benefit</li> </ul>	<ul style="list-style-type: none"> <li>Contributions diverted to the new DC plan will have a different investment strategy and may not be available for long-term investment opportunities.</li> <li>More portable benefit rewards shorter-term employees over longer term employees.</li> <li>To achieve the same benefit level in a DC plan costs more than a comparable DB plan.</li> </ul>

#### **Alternative hybrid designs:**

An alternative design utilizing a similar concept is a capped hybrid plan. In this plan the contributions are made into the retirement program, then contributions necessary for the DB plan are allocated first, with the remaining balance available for DC contributions. This allows for the employer contribution levels to be “capped”. Utah has recently implemented this structure with a 10% contribution from the State going into the program for members of the hybrid plan. However, a transition plan has to be implemented to move from the current plan to the new hybrid plan as it would be difficult to implement this type of arrangement on a mid-career employee. In Utah, the hybrid plan is for new hires only and the contribution requirement into the hybrid DB plan is only based on the funding level and requirements of the new plan. The plan for existing members is still being funded.

#### **Option 5.4: Close the DB plan and establish a Mandatory DC Plan**

Employer contributions to a DC plan are often based on a specific contribution such as a percentage of participant salary or a specified amount. At retirement, the benefit may be paid in a lump sum (most common), an annuity, or a combination. The value of future retirement benefits from DC plans increases each year by the value of employee and employer contributions to the plan plus any investment returns earned on the account balance. While costs are readily calculated for the employer, the benefit to the retiree depends upon the account balance at the time an employee retires.

Most stakeholder groups across the county realize that providing retirement benefits solely through a self-directed DC plan is not the most efficient delivery mechanism nor does it provide much self-sufficiency. This is evidenced by the fact that Alaska is the only state that has a mandatory DC plan. However, also evidenced by recent pension reform actions across the country, having a DC plan as part of an overall benefit package can be a way of spreading risks across groups and generations of stakeholders without eliminating the concept of self-sufficiency in retirement.

If all future members are placed into a DC plan, then the structure and provisions of that DC plan need to be strategically crafted. Many DC plans are incorporating traditional DB plan features, such as mandatory member contributions, default investment options, and lifetime annuity options. Loan and withdrawal provisions would need to be carefully considered as they can have a devastating effect on the retirement readiness of employees.

In addition, if a DC plan became mandatory for future hires only, the current DB plan would close this is referred to as a “soft freeze.” Due to the unfunded liability, the trust fund will deplete within 27 years and convert to an estimated \$3 billion annual pay as you go obligation.

If all current and future members were moved into a DC plan instead of only future hires, the

current DB plan would close as a “hard freeze”. A hard freeze eliminates new benefit accruals, but does not eliminate the unfunded liabilities. Although the hard freeze initially lowers the unfunded liability to an estimated \$2.9 billion, without contributions, the trust fund depletes almost twice as fast depending on rates of retirement.

This type of change disproportionately affects mid-career employees. Forcing a mid-career employee to change plan structures in the middle of their career makes them accrue benefits during the least advantageous accrual period of both structures, DB for early career and DC for later career. The generation before and after will realize larger benefits. The mid-career employee does not have enough time to save enough from now to retirement age to make up the loss in anticipated retirement income.

It should be noted that other options to pay down the existing unfunded liability following a plan closure do exist. As a result, any decision to freeze a retirement plan must be accompanied by a dedicated and actuarially sound funding policy to pay down the existing unfunded liability as well as cover the remaining benefit accruals (normal cost), if applicable.

Earlier we looked at statistics for the JRS I plan, which closed 27 years ago to new entrants. Taking a similar view of a soft frozen ERS plan, shows that an estimated 1,516 actively contributing employees would remain in the plan in 2039. The State’s pay-as-you-go cost would be \$3 billion for that year’s annuity payments if combined contributions are sustained throughout at 13.0%. The pay-as-you-go figure would gradually decline over an estimated 72 years, when the last beneficiary in the frozen system dies.



**Figure 5.2: Impact of Soft-freeze on State Costs When Trust is Depleted (2039)\***

Source of Funds	Dollar Amount
Member Contributions (6.5% of payroll for remaining DB plan actives)	\$31.9 M
State Contributions (\$6.5% of payroll for remaining DB plan actives)	\$31.9 M
General Fund Contributions (the balance of estimated benefit payments not funded by participant or State contributions)	\$3.3 B

Based on remaining DB members receiving benefits at current levels and a sustained contribution rate of 13.0% (6.5% State and 6.5% for remaining members).

In 2039, the DC plan would have 135,777 active members. The State would not incur any risk of unfunded liabilities for these members, and would not have any retirement plan obligation to them once they retire. However, if retirees are not able to be self-sufficient in retirement, it could affect other state social services. Based on the contribution assumption of 6.5% of payroll, however, the State would contribute \$925 million in 2039 for these DC participants. When added to the \$3.3 billion the State would be obligated for covering the benefits of remaining DB retirees and participants, results in the total State costs in 2039 alone being \$4.3 B.

Assumptions	Fiscal Impact
<ul style="list-style-type: none"> <li>Mandatory participation in DC (for purposes of these fiscal estimates it was assumed DC plan began Sept. 1, 2011)</li> <li>Assumes a 13% contribution rate split between employers and employees</li> <li>DB plan closed to any new members (soft-freeze)</li> </ul>	<ul style="list-style-type: none"> <li>If current contribution policy continues, depletes the DB Trust in 2039.</li> <li>Changes to a “pay as you go” state obligation. For comparison purposes, FY12 annuity payments are about \$1.6 billion, compared to the \$636 million per year required to meet the ASC.</li> <li>With payments to the new DC plan, the total state contribution would be \$2.0 billion starting in 2037.</li> <li>No State retirement plan obligation for DC plan member benefits beyond initial contributions</li> </ul> <p><i>Refer to Appendix G - Actuarial Analysis of Option 5.4.Mandatory DC Plan</i></p>

Pros	Cons
<ul style="list-style-type: none"> <li>Allows the state to predict DC plan costs</li> <li>Does not create any employer liability for DC plan Provides a more portable option to employees who are not planning state government careers</li> <li>Allows employees that want investment control to manage their own investments</li> </ul>	<ul style="list-style-type: none"> <li>In general, provides a much lower benefit for retirement-eligible employees and no benefit guarantee</li> <li>Self-controlled DC plans have the highest administrative costs and fees, and lowest overall returns</li> <li>DC plans do not offer death or disability benefits</li> <li>Ultimate benefit can be too low for a self-sufficient retirement</li> <li>No guarantee of lifetime benefit</li> <li>Would require DB plan to close and accelerate trust fund depletion</li> </ul>

## Findings from other state reports on alternative plans

A **2011 Minnesota Study**<sup>2</sup> on switching to a DC plan reported the following key findings:

### 2011 Minnesota Study

key findings:

- High transition costs
- Higher Long term Costs
- Higher Liabilities
- Smaller Retirement Accounts
- Higher Fees
- Lower Efficiency

1. **High Transition Costs** – Mercer’s actuarial analysis indicated there would be a \$2.76 billion transition cost to Minnesota over the next decade if Minnesota moved from a DB to DC plan for new hires. These transition

costs are similar to those found in studies done by other states such as Nevada, Kansas, Rhode Island, New Mexico, and Missouri.

2. **Long-term Costs Higher** – Mercer found that with a funding structure of 5% employer and 5% employee contributions, the ongoing cost of the existing Minnesota DB plans would be less than the cost of a future replacement DC plan.
3. **Higher Liabilities** – Employees exiting the DB plan would decrease the funding available over the short term, possibly requiring higher employer contributions to dampen the impact of a rapidly increasing negative cash flow.
4. **Smaller Retirement Accounts** – DC plans run the risk of providing inadequately-funded retirement incomes that may lead to higher public assistance costs.
5. **Higher Fees** – DC’s grant many individual employees more control over investments, but individuals usually incur higher investment fees and make poor decisions and thus realize lower returns.
6. **Lower Efficiency** – DB plans can provide the same level of income at roughly half the cost of a DC plan because of DB’s superior

investment returns and ability to pool longevity risk.

In March 2011, **California Public Employees’ Retirement System** (CALPERS) published a report examining the effect of closing the DB plan and opening a replacement DC plan. The report suggested that closing a DB plan and replacing it with a DC plan would cost employers more and offer employees lower benefits.<sup>3</sup>

• **New York City’s 2011** report, “A Better Bang for New York City’s Buck”,<sup>4</sup> found that DB pension plans can deliver the

**New York City 2011 Report** “found that DB pension plans can deliver the same retirement income at nearly 40% lower costs than a DC plan.

same retirement income at nearly 40% lower cost than a DC plan. The report identified three sources from which the DB plan provides savings:

1. **Superior investment returns** – the pooled assets in a DB plan result in higher investment returns as a result of the lower fees that stem from economies of scale, but also because the assets are professionally managed. The City’s investment returns save from 21 percent to 22 percent.
2. **Better management of longevity risk** – pension’s pool longevity risks of a large number of individuals and can determine and plan for mortality on an actuarial basis. New York City’s DB plans save between 10 percent and 13 percent compared to a typical DC plan.
3. **Portfolio diversification** – Unlike DC plans, DB pension assets can be invested for optimal returns whereas DC investments in 401(k)s, by comparison, are advised to rebalance by downshifting into less risky and lower-returning assets as they age. The report finds that this ability to maintain portfolio diversity in the City’s DB plans saves from 4 percent to 5 percent.

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<sup>1</sup> The 2011 *Towers Watson Retirement Attitudes Survey*, <http://www.towerswatson.com/newsletters/insider/6530>

<sup>2</sup> Minnesota Statewide Retirement Systems. (June, 2011). *Retirement Plan Design Study*.

<sup>3</sup> CALPERS. (March, 2012). *Actuarial Cost Analysis of SCA 13*

<sup>4</sup> Fornia, W. B. (October, 2011). A Better Bang for NYC's Buck. *Retirement Security NYC*.



## Section 6: Benchmarking Research

To provide a more complete contextual understanding of the Employees Retirement System of Texas (ERS), this report provides an overview of the status, funding strategies, and plan types in other state retirement systems.

As described elsewhere in this report, Texas is in better shape than many other states, with a funding ratio of 82.6% as of August 31, 2011. The PEW Center on the States rated Texas pension systems as “solid performers” – a designation granted to only 11 states. Despite this designation, the ERS plan is not considered actuarially sound.

**Figure 6.1: PEW Evaluation of State Pension Systems**

Solid Performer	Needs Improvement	Serious Concern
Delaware, Florida, Georgia, Nebraska, New York, North Carolina, South Dakota, Tennessee, Texas, Wisconsin, and Wyoming	Idaho, Iowa, Minnesota, Oregon, Utah, Vermont, and Washington	Alabama, Alaska, Arizona, Arkansas, California, Colorado, Connecticut, Hawaii, Illinois, Indiana, Kansas, Kentucky, Louisiana, Maine, Maryland, Massachusetts, Michigan, Mississippi, Missouri, Montana, Nevada, New Hampshire, New Jersey, New Mexico, North Dakota, Ohio, Oklahoma, Pennsylvania, Rhode Island, South Carolina, Virginia, and West Virginia.

Source: PEW Center on the States.

## States are Responding to Economic Pressures With Changes to Retirement Plans.

There are more than 3,400 state and local retirement systems in the United States, with about 24 million members and beneficiaries covered by state plans, and 3 million by locally administered plans.

Due largely to the economic downturn of 2008-2009, state governments have been left with lower tax revenues to fund government expenditures, including pension costs. Since 2008, the combination of fiscal pressures and increasing contribution requirements has spurred many states and localities to take action to strengthen the financial condition of their plans for the long term, often packaging multiple changes together.

**Figure 6.2: State Pension Reforms 2001-2010<sup>1</sup>**

Reduced Benefits	Increased Employee Contributions	Reduced Benefits And Increased Employee Contributions	No Reforms
California, Nevada, Utah, North Dakota, South Dakota, Illinois, Michigan, Georgia, New York, Delaware, Connecticut, Rhode Island, Massachusetts, and Alaska	Washington, Oklahoma, South Carolina, Pennsylvania, Maryland, and Hawaii	<b>Texas</b> , Oregon, Arizona, New Mexico, Louisiana, Mississippi, Arkansas, Missouri, Kansas, Colorado, Wyoming, Nebraska, Iowa, Minnesota, Kentucky, Virginia, New Jersey, Vermont, and New Hampshire	Idaho, Montana, Wisconsin, Indiana, Ohio, West Virginia, Tennessee, North Carolina, Alabama, and Florida.

Source: U.S. Government Accounting Office.

The majority of states continue to provide traditional defined benefit (DB) retirement benefits for their employees and, as indicated in the above table, most are addressing their growing unfunded liabilities through benefit and contribution changes to their existing plans.

For example, New Jersey made major changes through the 2011 Pension and Health Benefits Reform to scale back pension benefits, suspending cost-of-living adjustments (COLAs) for existing workers and retirees and requiring increased employee contributions. As a result of these changes, the state's unfunded liability was reduced by 30%, from \$37.1 billion to \$25.6 billion, increasing the system's funded ratio from 56.4% to 65.2%.<sup>2</sup> Changes can also result in widening disparity in benefits. In recent years, several states have raised the contribution rate, age, and/or length of service required for new employees, along with other changes to eligibility requirements that make grandfathered employees qualify for a much more robust benefit than new employees even though they may be making the same level of contribution. In some cases, the people with the lowest benefits are paying the most.

Texas is another state that increased employee contributions and reduced benefits levels. In 2009, the 81<sup>st</sup> Texas Legislature reduced benefit levels for new employees and also increased state and employee contributions beginning in Fiscal Year 2010. The intent of these changes was to improve the sustainability of the ERS retirement plans. Prior to these changes, the cost of current benefits was being met; however, the revenue was not enough to reduce the unfunded liability that had accrued since 2003. These changes did provide additional revenue for some amortization of the liability, but not over a measurable timeframe and definitely not over the 31-year period that would make the plan sound.

In 2011, the 82<sup>nd</sup> Texas Legislature then reduced State contributions to pre-2009 levels (6%) beginning in Fiscal Year 2012. This amount was less than the employee contribution of 6.5% and is 4.97% lower than the actuarially sound contribution (ASC) rate. The same Legislature designated that the state contribution would increase for Fiscal Year 2013 to match the employee rate of 6.5%, making the total contribution 13%. Again, this is still less than the ASC of 17.47%.

## **Key Observations – State Employee Defined Benefit Plans:**

The National Association of State Retirement Administrators and the National Council on Teacher Retirement maintain a database of the key characteristics of 126 public retirement plans referred to as the Public Fund Survey. The following information is based on data from the 60 state employee defined benefit plans included in the Public Fund Survey:

### **Funded ratios**

- The aggregate funded ratio is 79.8%
- The median funded ratio is 75.3%

**Benefits** – Retirement eligibility, calculation of benefits, and post-retirement annuity adjustments differ from plan to plan. Generally, plans with automatic COLAs have lower multipliers and higher contribution rates. Of the 60 state employee plans reviewed, 40 have some type of automatic COLA while most (33) of those plans have benefit multipliers of 2% or less. The median funded ratio of plans with automatic COLAs is 73.45% and the median total contribution rate (employee and employer) is 21.52% of payroll.

Sixteen plans use tiered multipliers based on years of service and seem to be designed to manage workforce. For instance, Arizona's multiplier encourages long-term employment with ranges from 2.1% for the first 20 years, up to 2.3% for 30 or more years of service. New York and New Hampshire's multiplier structures appear to discourage employment beyond a certain point, with New York's multiplier dropping from 2% to 1.5% for years of service beyond 30, and New Hampshire's multiplier dropping from 1.67% to 1.5% upon reaching age 65.

Of the 44 plans with a single multiplier structure, 15 have the median of 2%, slightly less than the 2.3% multiplier for regular Texas state employees. Multipliers across plans varied from a low of 1.5% for defined benefit component Michigan's plan to 3% for New Mexico state employees. Of the eight plans with multipliers of 2.5% or higher, only three – New Mexico,

Pennsylvania, and Texas' law enforcement supplemental plan at 2.8% – also participate in Social Security.

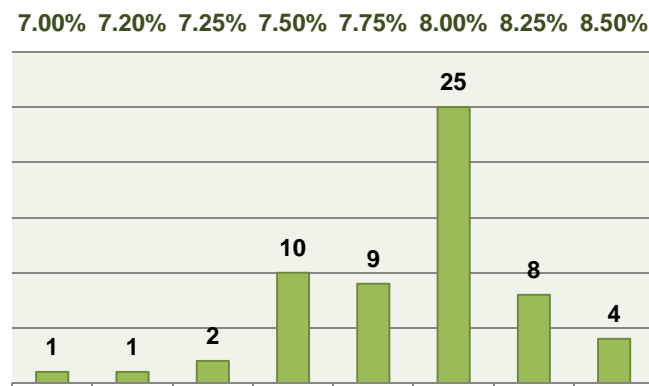
### Contribution rates

- The median **employer** contribution rate is 11.14%
  - 48 plans receive higher employer contribution rates than the ERS 6.5% employer rate. Employer contributions for these plans ranged from 6.51% for Pennsylvania to 31.4% for Missouri's plan for transportation and highway patrol employees.
  - More than half (34) of the plans reviewed have employer contribution rates greater than 10%. Of those 34 plans:
    - 29 have COLAs,
    - five have multipliers of 2.5% or more,
    - 13 have employee contributions rates under 4%, and
    - seven receive no contributions from employees.
- The median **employee** contribution rate is 5.5%.
  - 17 plans have higher employee contribution rates than the ERS 6.5% employee rate. Employee contribution rates for these plans ranged from 6.75% for the closed Alaska plan to 10.5% for Colorado.
  - In nine out of the 60 plans reviewed either no employees or a majority of employees do not contribute to their defined benefits.
  - Only newer employees are required to make contributions in four plans – Arkansas, Florida, and two Missouri plans.
  - two plans had tiered employee contribution rates – Kansas employees may elect to contribute either 4% or 6% of their salaries; Massachusetts employees' contribution rate increases from 9% to 11% on the portion of annual salary above \$30,000.
- The median **total** contribution rate is 15.87%
  - 40 plans have higher total employer and employee contribution rates than the ERS 13% rate. Total contribution rates ranged from 7.13% for Virginia to 35.4% for Missouri's transportation and highway patrol plan.

**Social Security** – the majority of the plans reviewed (87%) participate in Social Security. The eight plans not participating in Social Security each provides automatic COLAs to retirees and has benefit multipliers at or above 2.5%.

**Discount Rates** – The rate at which state employee defined benefit plans discount the liabilities, also referred to as the “assumed rate of return,” vary from Virginia's 7% to the high of 8.5% used by Missouri, Minnesota, New Hampshire, and Arizona's plan for public safety personnel. Almost half of the plans (25) use the same 8% discount rate as the ERS plans.

**Figure 6.3 Discount Rates of State Employee DB Plans**



Most states do not fully fund their DB plans:

- The state government and local governments outside New York City are required to pay the ARC. However, over many decades the state periodically has used “amortization” to delay a portion of annual payments to state-run systems – in effect, borrowing from the pension fund itself while being credited for paying the ARC. The state's first use of the practice came during the Great Depression.
- In California, CalPERS has a guaranteed draw on state funds for state agency employees; in other words, it simply submits a bill that the state must pay.

- CalSTRS, on the other hand, does not have an automatic draw; and contributions set by statute have been well below the ARC for the last decade.
- Illinois, Virginia, New Jersey, and Texas set contributions by statute and have consistently underpaid their ARCs.

**Illinois** has underpaid its contributions for at least 15 years; between 1996 and 2011, Illinois underpaid contributions by \$28 billion.

In **Virginia**, the legislature in recent years has overridden recommendations from the actuary of the Virginia Retirement System, substituting its own assumptions to calculate a statutory contribution rate. As noted in a bond disclosure document in Fiscal Year 2012, "The General Assembly is again funding less than the rate determined by the actuary by extending the funding period for these groups from 20 years to 30 years, increasing the investment return assumption from 7.5% to 8.0% and increasing the inflation assumption from 2.5% to 3.0%." Further, in some cases reductions in contributions that would have benefited funds outside the general fund have instead been diverted to the general fund. During the recent fiscal crisis, such moves provided Virginia with cash savings of more than \$1 billion – savings that will come at the expense of future budgets.

**New Jersey**, too, has habitually underpaid its pension contributions. Over the last six years, contribution shortfalls have totaled about \$14.5 billion. New Jersey's 2011 Pension and Health Benefit Reform included a provision that could make it more difficult to underpay pension contributions in the future, although no assurance can be given that the State Legislature will make such appropriations in accordance with this law. A provision states that members of the Pension Plans now have a contractual right to the annual

required contribution being made by the state and local participating employers and failure by the state and local employers to make annual required contributions is deemed an impairment of the contractual right of each member. This contractual right could limit the state's ability to reduce or limit pension contributions in response to future budgetary constraints. Whether this provision will achieve the intended effect remains to be seen.

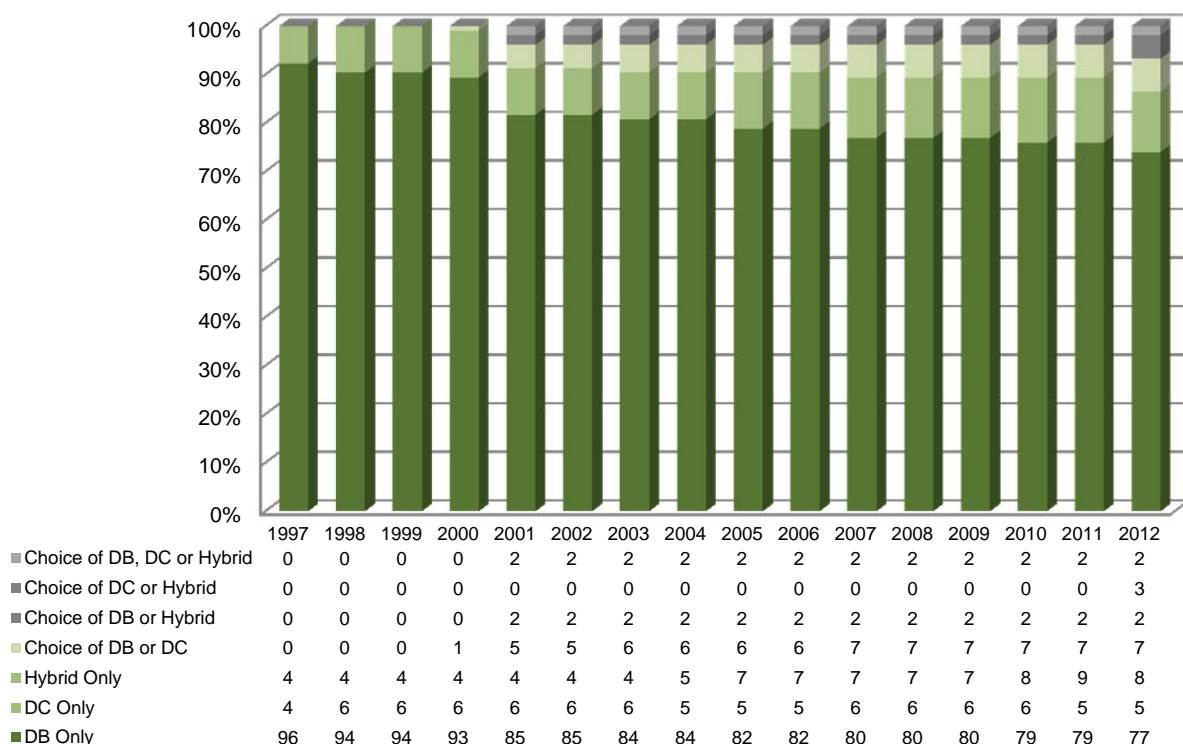
**Texas** has underpaid its ASC for 14 out of the last 15 years. The ERS trust has been accruing an unfunded liability since 2003.

### **States are Increasingly Considering Different Types of Plans.**

Some states have implemented alternative plan structures either as a replacement of their DB offering for new employees or as a choice option for current and/or future employees. In the past 14 years, the percentage of states offering only a defined benefit plan has decreased, the percentage of states offering participation in a DC plan has stayed relatively constant, and the percentage of states modifying their DB plans to include a DC component as a hybrid plan or converting to a cash balance DB has increased. The following chart was prepared by the Texas Pension Review Board:



**Figure 6.4: Trends in Plan Design of Statewide Plans by Percentage**



Source: A Review of Defined Benefit, Defined Contribution, and Alternative Retirement Plans, May 2012.

The Pension Review Board’s May 2012 review of other state plans provides details on state plans with combined defined benefit and defined contribution features. For this study, ERS focused on three states that offer either a cash balance or hybrid plan (see Section 5 for more information on these plan types):

**UTAH:** The Utah Retirement System is comprised of eight plans with the majority of active members (88%) participating in the non-contributory public employees’ plan established in 1985, in which the employer pays 100% of the actuarial required contribution.

Utah established a second tier of benefits consisting of a reduced DB plan and DC plan in 2010. The Utah legislature took this action after the Utah plans’ aggregate funded ratio dropped from 95.1% to 86.6% as of January 1, 2009. The funded ratio decrease was primarily due to a negative 23.4% return on assets in 2008.

Utah’s employer contribution rates are determined on actuarial sound basis and are effective 18 months after the valuation date.

They currently contribute 16.86% for the existing Tier 1 plan in addition to funding the new plan. For the new plan, Utah is contributing 12.74%.

**Figure 6.5: Utah Plan Provisions:**

2011 Actuarial Valuation

Plan	Tier 1	Tier 2*	
	Public Employees Non-contributory Plan	Public Employees Contributory Plan	Defined Contribution Savings Plan
Plan Type	Defined Benefit	Defined Benefit	Defined Contribution
Membership	Automatic at employment	Irrevocable election within first year of employment	Irrevocable election within first year of employment
Vesting	4 years	4 years	4 years cliff
Retirement Eligibility	30 years at any age; various reductions at 25, 20, 10, and 4 years of service based on age	35 years at any age; 20, 10, and 4 years of service based on age with 7% reduction for each year between age 60-63 and 9% for each year between age 64-65	N/A - access to full value if vested, or employee balance if not vested, upon leaving employment. IRS rules apply
Multiplier	2.0%	1.5%	N/A
Final Average Salary	Highest 3 years	Highest 5 years	N/A
COLA	Up to 4% annually, based on original annuity; eligible after one year	CPI up to 2.5% annually, based on original annuity; eligible after one year	N/A
Death Benefits	Reduced monthly annuity paid to beneficiary based on option selected at retirement/must meet age/service qualifications	Same as Tier 1	Account balance, plus any vested funds paid to beneficiary
Disability Benefits	Long-term disability and continue to accrue benefits until eligible to retire; based on employer contract	Same as Tier 1	Same as Tier 1
Contribution Rates  <i>(ARC required for both DB &amp; Tier 2 Hybrid)</i>	16.86% - State 0% - Employee	**10%, +2.74% toward amortization of Tier 1 = 12.74% - State 2.41% - Employee	DC only: 10% State Hybrid: State = % remaining when Tier 2 DB contribution is less than 10%; Employee = applicable IRS limits
Social Security	Yes	Yes	

\*Effective July 1, 2011 for all new public employees.

\*\*State contribution set at 10% w/employee making up difference for ARC; Employers are required to contribute amortization rate toward old DB based on payroll of all Tier 1 & 2 employees.

**NEBRASKA:** The Nebraska Public Employees Retirement System administers retirement benefits for more than 16,000 state employees and 7,500 county employees. In 2002, in response to concerns that employees were not accumulating enough for retirement in their DC plan, the Nebraska Legislature closed its DC plan to new employees. In its place, Nebraska established a cash balance DB plan that provides professional pooled investments and the option of receiving a lifetime annuity. Employees in the closed DC plan were given

opportunities to move into the cash balance plan and most elected to do so. As of January 2012, 11,263 active employees participated in Nebraska's state employee cash balance plan.

The state protects employees from downside investment risks with a guaranteed annual interest credit of 5%. Employees contribute 4.8% of pay to the cash balance plan with the State of Nebraska matching at 156% of the employee contribution. The January 2012 actuarial valuation of the Nebraska cash balance plan

found that this contribution rate was sufficient for the plan to operate on an actuarially sound basis with a 92.9% funded ratio.

Other Nebraska **cash balance plan** features include:

- Eligible for retirement at age 55 regardless of service,
- Vesting (qualify to receive employer contributions) after three years of employment,
- Normal form of payment at retirement is a single life annuity with a five-year certain, and
- Option to convert account to a monthly annuity that provides a 2.5% annual COLA.

**LOUISIANA:** The Louisiana legislature recently adopted a new mandatory cash balance DB plan for future non-hazardous duty state employees effective July 1, 2013. The 55,000 employees currently employed by the state will remain in the existing DB plan.

The new law requires Louisiana to continue paying the existing DB plan's full normal cost each year, plus contribute toward full payment of the initial unfunded actuarial liability by 2029. With a 57.6% funded ratio, the state's required actuarially sound contribution rate for the DB plan had reached 22% of payroll as of June 2011, while employees contributed 8%. Other features of Louisiana's state employee DB plan include:

- 2.5% multiplier,
- automatic COLA equal to the lesser of 2% or the Consumer Price Index, plus up to an additional 1% based on investments,
- no Social Security participation, and
- Deferred Retirement Option (DROP) which allows individuals to elect to receive a portion of annuity payments in a lump sum. Under a DROP plan, annuities are not actuarially reduced, the retired employee continues working, and annuity payments are deposited into an account and are not accessible until the employee permanently leaves employment.

The Government Finance Officers Association expressed concern on the use of DROP plans in

a 2005 advisory<sup>3</sup> noting their actual costs were significantly higher than anticipated.

The new cash balance plan sets the employee contribution at 8% and employer contribution at 4%. In addition, the employee receives an investment credit equal to the system's rate of return on the actuarial value of its assets less 1%, which is to be used to build a reserve fund to hedge against investment losses. The state continues to protect its employees from investment losses in down years under the cash balance plan through a guaranteed investment credit of at least 0%.

Additional features of Louisiana's new cash balance plan include:

- The cash balance benefit vests at five years. After five years, employees may take a lump sum of the full account balance or leave it with the system without interest. Non-vested employees who leave state employment are entitled to a return of employee contributions only without interest.
- Retirement eligibility is at age 60, with a lifetime monthly annuity actuarially equivalent to the lump sum in the account on the date of retirement.
- Disability and death benefits are paid for by the state. In both cases, the disabled worker or beneficiary may choose between the lump sum balance of the member's account, or a monthly annuity benefit equal to what they would have received under the DB plan.

The Governor of Louisiana, who supported the legislation, is seeking determination from the Internal Revenue Service on the tax-qualified status of the cash balance plan and a ruling on whether the benefits it will provide in retirement are sufficient to meet Social Security's equivalent benefit standard. There is a concern that some employees may require enrollment in Social Security adding to the state's and taxpayers' cost.

Also, since passage of the legislation, Louisiana's state retired employees association

filed a lawsuit in the 19th Judicial District Court in Baton Rouge challenging its constitutionality.

Again, there are more options today in state retirement plans than ever, with a range of features, blends of investment risk, and sources of funding. The following highlights are provided as examples:

- **Rhode Island** closed the state's DB pension plan in November 2011 and established a DB/DC hybrid plan for all employees. Lawsuits have since been filed questioning the legality of the change due to its applicability to all employees, not just new ones.
- **Alaska** closed its DB plan for public employees hired after June 2006. All new employees now participate solely in a DC plan. Alaska is the only state retirement plan to offer only a mandatory DC plan to its employees.
- **Montana** established a DC option for new employees in 2003. Existing employees were

given a choice between the traditional DB plan and the DC alternative during a 1-year open enrollment process. Approximately 3% of those eligible elected to participate in the DC plan.

- **Oregon** established a DB/DC hybrid plan for new Oregon PERS participants in lieu of the traditional DB plan in 2003. The hybrid combines a DB component multiplier of 1.5% (1.8% for public safety personnel) funded by the employer, with mandatory participation in a DC plan, funded by the employee (unless the employer elects to make its employees' contributions).
- **Florida** established an optional retirement plan for all current and future employees in 2000. Existing employees were given the option to remain with the DB plan or switch to the DC plan. Since opening, approximately 95% of existing employees elected to stay with the DB plan and approximately 83% of new hires have elected to participate in the DB plan.

**Figure 6.6: State by State Comparison of Retirement Plan Offerings**

Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>Alaska PERS</b>								
62.4	60/5, any/30; also applies to public safety workers	2% for first 10 years, 2.25% for years 11-20; 2.5% for years thereafter. Public safety EE's receive 2% for the first 10 years and 2.5% thereafter	Yes	6.75% for general employees; 7.5% for police and fire	12.87%	automatic based on CPI; annuitant must reside in-state to receive the COLA, compounded	8.00%	6/30/2010
<b>Alabama ERS</b>								
68.2	any/25, 60/10	2.01%	Yes	5%; state police contribute 10%	11.94% for state employees; 30.57% for state police officers; rates for local employers vary	ad hoc as approved by the legislature	8.00%	9/30/2010
<b>Arkansas PERS</b>								
70.7	65/5, any/28, 55/35	1.72% for non-contributory members, who are those hired before 7/1/05; 2% for contributory members, who were hired after 6/30/05	Yes	non-contributory for those hired before 7/1/05; 5% for those hired since (who are automatically enrolled in the contributory plan) and for those who elected to switch to the contributory plan	12.46% for most participants	automatic 3% compounded	8.00%	6/30/2010
<b>Arizona SRS</b>								
76.4	65/any, 62/10, Rule of 80; Rule of 85 for new hires after 6/30/11	2.1% for first 20 years, 2.15% for 20 to 25 years, 2.2% for 25 to 30 years, and 2.3% for 30 or more years	Yes	9.85%, including the long-term disability benefit	9.85%, plus 0.59% for the retiree health care benefit	based on excess earnings above 8%, up to 4% annually	8.00%	6/30/2010
<b>Arizona Public Safety Personnel</b>								
67.7	62/15, any/20	for 20 to 25 years of service, 50% of FAS plus 2% for each year above 20; for more than 25 years, 2.5% for each year above 20	Yes	7.65%	weighted average of 21.72%; varies by employer depending on valuation, with a minimum of 8%	based on a sliding scale of 2% to 4%, contingent on investment earnings above 10.5%,	8.50%	6/30/2010

Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>California PERF</b>								
83.4	60/5; 50/5 or 55/5 for public safety personnel, depending on employer election	2% at 60/5, rising to 2.418% at 63/5; employers may select from a range of benefit structures, including 3% at 50 and 55 for law enforcement personnel	Yes	Most state employees contribute 5%; school employees contribute 7%; firefighters and police officers contribute 10%; most others contribute between 5% and 9%	15.7% as an average	automatic based on CPI up to 2%, compounded	7.75%	6/30/2010
<b>Colorado State</b>								
57.7	65/5; hired before 7/1/05: 50/30, Rule of 80 w/min age 55; hired 7/1/05-12/31/06: any/35, Rule of 80	2.5%	No	10.5%; state troopers contribute 12.5%	11.23%; 13.93% for state troopers	varies by date of retirement; automatic, generally, CPI up to 2%, compounded; see also <a href="http://www.copera.org/pdf/Legislation/SB1Actives.pdf">http://www.copera.org/pdf/Legislation/SB1Actives.pdf</a>	8.00%	12/31/2011
<b>Colorado Fire &amp; Police Statewide</b>								
102.9	55/25 w/2.0% factor; otherwise, 55/5 with 1.5% factor	2% at 55/25; otherwise, 1.5% at 55 with 5 years of service	Yes	8%	8%	ad hoc as approved by board	8.00%	1/1/2011
<b>Connecticut SERS</b>								
44.4	62/5, 60/25; any/20 for public safety personnel	1.33% plus 0.5% for salary above Social Security breakpoint; 2.5% for public safety personnel	Yes	2% for those hired since July 1997; 5% for public safety personnel	21.9%	automatic based on 60% of CPI, with a minimum of 2.5% and a max of 6.0%, compounded	8.25%	6/30/2010
<b>Delaware State Employees</b>								
96	62/5, 60/15, any/30	1.85%	Yes	3% of earnings above \$6,000	5.8% for state employees and teachers	ad hoc as approved by the general assembly	8.00%	6/30/2010
<b>Florida RS</b>								
86.9	62/6, any/30; 55/6, any/25 for public safety personnel; for new hires as of 7/1/11, 65/8, any/33	1.60% for most general employees and teachers; 3% for most public safety personnel	Yes	non-contributory through 6/30/11; as of 7/1/11, participants are required to contribute 3% of pay	9.66%; 22.14% for public safety personnel	automatic 3% compounded; as of 7/1/11, no additional COLA credit will be earned, a restriction that currently is under legal challenge	7.75%	7/1/2011

Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>Georgia ERS</b>								
76	65/10, any/30	2%; those hired after 2008 participate in a hybrid plan with a multiplier of 1.25%	Yes	1.25%	10.41%; members hired since 1/1/09 participate in the hybrid plan to which the employer contributes 6.54%	ad hoc as approved by the ERS board	7.50%	6/30/2011
<b>Hawaii ERS</b>								
64.6	62/5, 55/30 for hybrid plan; 55/5, any/25 for public safety personnel	2%; 2.5% for public safety personnel	Yes	6% for hybrid plan participants; 7.8% for those in the contributory plan; public safety personnel contribute 9.75%	15%; 19.7% for police and fire	automatic 2.5% simple	8.00%	6/30/2009
<b>Iowa PERS</b>								
79.9	65/any, 62/20, Rule of 88; 55/any for public safety	2%	Yes	4.5%; 8.94% for most public safety personnel	6.95%; 8.94% for most public safety personnel	Non-guaranteed post-retirement payment from a reserve account established from excess investment earnings	7.50%	6/30/2011
<b>Idaho PERS</b>								
89.9	65/5; 60/5 for public safety personnel	2%; 2.3% for public safety personnel	Yes	6.23%; 7.69% for public safety personnel	10.39%; 10.73% for public safety personnel	automatic 1% compounded (as long as CPI rises at least 1%), plus investment-based increase	7.75%	7/1/2011
<b>Illinois SERS</b>								
37.4	60/8, Rule of 85	1.67%; 2.2% for those not covered by Social Security	Yes	4% for those covered by Social Security, 8.0% for those not covered; public safety members contribute 10.5%	12.8%	automatic 3% compounded; for those first hired after 12/31/10, lesser of 3% or half of CPI, simple	7.75%	6/30/2010

Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>Kansas PERS</b>								
62.2	65/any, 62/10, Rule of 85; 65/5, 60/30 for those hired after 6/30/09	1.75%	Yes	4% or 6%, depending on employee election	8.17% for state and school; 6.74% for local governments; 8.5% for correctional employees	ad hoc as approved by the legislature	8.00%	12/31/2010
<b>Kentucky ERS</b>								
40.3	Non-hazardous: 65/any, any/27; Hazardous: 55/any, any/20; those hired after 8/31/08, non-hazardous	Non-hazardous: 1.97% to 2.2%; Hazardous: 2.49%; for those hired after 8/31/08, graduated factor beginning at 1.1% for first 10 years, rising to 2% for 30 or more years of service	Yes	5%; 8% for hazardous duty workers; for those hired after 8/31/08, rates are 6% and 9%, respectively, with all but one percent going to individual participant accounts	11.61% for most employers; 39.45% for hazardous duty workers	automatic, tied to CPI, not to exceed 1.5% after 12 months of retirement, compounded	7.75%	6/30/2010
<b>Louisiana SERS</b>								
57.6	any/30, 60/10, 55/25; for regular members hired after 12/31/10, 60/5	2.5%	No	7.5% for regular employees; correctional officers contribute 9%	22%	lesser of 2% or CPI, plus up to 1% additional based on investment returns	8.25%	6/30/2011
<b>Massachusetts SERS</b>								
81	65/10, any/20; 60/10 for public safety personnel	2.5%; benefit may not exceed 80% of FAS	No	9% plus 2% of pay above \$30,000; state police contribute 12% plus 2% above \$30,000	9.23%	automatic, based on CPI up to 3% on first \$13,000 of benefit, compounded; increased to first \$13,000 effective in 2011. COLA is subject to legislative approval and enactment	8.25%	1/1/2011
<b>Maryland PERS</b>								
62.8	any/30, 62/5, 63/4, 64/3, 65/2; for those hired after 6/30/10, Rule of 90, 65/10	larger of: 1) 1.2% of FAS for service prior to 6/30/98; 2) 0.8% FAS up to SSIL* plus 1.5% FAS above that level for service prior to 6/30/98; 3) 1.8% FAS after 6/30/98	Yes	4% for most general employee participants; increased to 6% effective 7/1/11	14.33%	automatic based on CPI, up to 3%, compounded; svc earned after 6/30/11 reduces the cap to 2.5% and requires attainment of the assumed investment return; if that target is not reached, the COLA is 1%	7.75%	6/30/2011



Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>Maine State and Teacher</b>								
77.4	60/5, 62/5, 62/10; any/25 for state police; unvested workers as of 7/1/11 (not including state police)	2%	No	7.65%; 8.65% for state police	16.92% for most state employees; 17.28% for teachers; in addition, state law requires that a portion of any unallocated general fund surplus be used to reduce the state and teacher pension liability	effective 7/1/11, COLA is suspended for 3 years; when it returns, it will be based on the CPI up to 3% applicable to the first \$20k of benefit	7.25%	6/30/2011
<b>Michigan SERS</b>								
78	60/10, 55/30	1.5%	Yes	non-contributory	21.3%	automatic 3% simple up to \$300 annually	8.00%	9/30/2009
<b>Minnesota State Employees</b>								
86.3	Same age as eligibility for full Social Security benefits, not to exceed age 66	1.7%	Yes	5%; 8.6% for correctional officers	5%; 12.1% for correctional officers	automatic 2% compounded, until the plan's funding level reaches 90%, when it will increase to 2.5%	8.50%	7/1/2011
<b>Missouri State Employees</b>								
79.2	62/5, Rule of 80 for MSEP 2000; MSEP: 65/4 if active, 65/5, 60/15, Rule of 80; for those hired on or after 1/1/11: 67/10, Rule of 90 at age 55	1.7% for MSEP 2000; 1.6% for MSEP	Yes	non-contributory for those hired before 1/1/11; 4% for those hired thereafter	14.04%	80% of CPI up to 5% compounded; members hired before 8/28/97 receive a minimum of 4% and a maximum of 5% compounded, up to 65% of original benefit, and then 80% of CPI up to 5% thereafter	8.50%	6/30/2011
<b>Missouri DOT and Highway Patrol</b>								
42.2	62/5, Rule of 80 for those hired before 1/1/10; 67/10, Rule of 90 for those hired after	1.7%	Yes	non-contributory for those hired on or before 12/31/10; 4% for those hired after	31.4% for non-uniformed; 39.95% for uniformed personnel	80% of increase in CPI, up to 5%, compounded	8.25%	6/30/2010

Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>Mississippi PERS</b>								
62.2	60/4, any/25; 60/8 for those hired after 6/30/07	2% for the first 25 years and 2.5% for each year thereafter	Yes	9%; Highway Patrol Officers contribute 6.5%	12%; 35.21% for Highway Patrol Officers	Automatic 3%, simple, until age 55, then compounded thereafter. For new hires after June 2011, onset of compounding is delayed until age 60	8.00%	6/30/2011
<b>Montana PERS</b>								
74.2	any/30, 65/any, 60/5	1.785%; 2% for members with 25 years of service	Yes	6.9%	7.17% for state and university workers; 7.07% for local government workers; 6.8% for school district employees; the state contributes an additional 0.1% for local government employees and 0.37% for school district workers	automatic 3% compounded	7.75%	6/30/2010
<b>North Carolina Teachers and State Employees</b>								
99.3	65/5, 60/25, any/30; 55/5 for public safety personnel	1.82%	Yes	6%	3.36%	ad hoc	7.25%	12/31/2008
<b>North Dakota PERS</b>								
73.4	65/3, Rule of 85; 55/3 for public safety personnel	2%	Yes	4%; law enforcement officers pay 8.31%; the state picks up its employees' contributions	4.12%; 16.7% for public safety personnel	ad hoc as approved by the legislature	8.00%	6/30/2010
<b>New Hampshire Retirement System</b>								
58.5	60/any for general employees and teachers; 45/20, 60/any for police and fire	1.67% for general employees and teachers prior to age 65, 1.5% after attaining age 65; 2.5% for police and fire	Yes	5% for general employees and teachers; 9.3% for police officers and firefighters	8.74% for general employees; 8.93% teachers; 18.21% for police officers; 24.49% for firefighters	ad hoc as approved by the legislature's fiscal committee	8.50%	6/30/2010

Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>New Jersey Police &amp; Fire</b>								
77.1	55/10	2%	Yes	8.5%; increased to 10% October 2011	24.2%	Legislation approved in 2011 suspended COLAs until the plan funding level reaches 80%, when a panel will assess the prudence of paying a COLA	8.25%	6/30/2010
<b>New Jersey PERS</b>								
69.5	60/10; 62/10 for those hired after 2007	1/55 for each year of service (1.818%)	Yes	5.5%; increased to 6.5% October 2011	7.05% as a weighted average	Legislation approved in 2011 suspended COLAs until the plan funding level reaches 80%, when a panel will assess the prudence of paying a COLA	8.25%	6/30/2010
<b>New Mexico PERF</b>								
70.5	65/5, 64/8, 63/11, 62/14, 61/17, 60/20, any/25; for those hired after 6/30/10, any/30, Rule of 80	3% for service after 12/96	Yes	7.42%	16.59%	automatic 3% compounded	7.75%	6/30/2011
<b>Nevada Regular Employees</b>								
70.6	65/5, 60/10, any/30; for new hires on or after 1/1/10: 65/5, 62/10, any/30	2.5%, and 2.67% for svc earned after 7/1/01; for those hired on or after 1/1/10, 2.5%	No	12.26%, paid by employers for most members as a pre-tax cost-sharing plan, in lieu of salary increases or by salary reduction as certified by employers	12.26%, paid by employers for most members as a pre-tax cost-sharing plan, in lieu of salary increases or by salary reduction as certified by employers	After 3 years of receiving benefits, auto 2% annually, rising gradually to 5% annually, compounded, after 14 years of receiving benefits; the compounded COLA is capped by the lifetime CPI for the period of retirement - - it may not exceed inflation	8.00%	6/30/2011

Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>Nevada Police Officer and Firefighter</b>								
68.4	55/10, 50/20, any/25; 60/10 for those hired on or after 1/1/10: 65/5, 60/10, 50/20, any/30	2.5%, and 2.67% for svc earned after 7/1/01; for those hired on or after 1/1/10, 2.5%	No	20.27%; paid by employers for most members as a pre-tax cost-sharing plan, in lieu of salary increases or by salary reduction as certified by employers	20.27%; paid by employers for most members as a pre-tax cost-sharing plan, in lieu of salary increases or by salary reduction as certified by employers	After 3 years of receiving benefits, auto 2% annually, rising gradually to 5% annually, compounded, after 14 years of receiving benefits; the compounded COLA is capped by the lifetime CPI for the period of retirement - it may not exceed inflation	8.00%	6/30/2011
<b>New York State &amp; Local ERS</b>								
93.9	62/5, 55/30	1.67% if service is less than 20 years, 2.0% if service is 20 or more years, and 1.5% for each year above 30	Yes	3% for most participants	11.9% as a plan average	Automatic based on half the CPI applied to first \$18,000, compounded. Must be 62 and retired for 5 years, or 55 and retired 10 years, to receive COLA	7.50%	4/1/2010
<b>New York State &amp; Local Police &amp; Fire</b>								
96.7	62/5, 55/30	1.67% if service is less than 20 years, 2% if service is 20 or more years, and 1.5% for each year above 30	Yes	0%	The average employer contribution rate for PFRS for fiscal year ended 3/31/11 was approximately 18.2%	Automatic, equal to one-half the CPI, compounded. Must be 62 and retired for 5 years, or 55 and retired 10 years, to receive COLA	7.50%	4/1/2010
<b>Ohio PERS</b>								
79.1	60/5, 55/25, any/30; for law enforcement officers, 48/25	2.2% up to 30 years and 2.5% thereafter; for law enforcement officers, 2.5% up to 25 years and 2.1% thereafter	No	10%; law enforcement personnel contribute 11.1%	14% for employers of state and local workers; 18.1% for law enforcement. Rates include 4% for retiree health care	automatic 3%, simple	8.00%	12/31/2010

Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>Ohio Police &amp; Fire</b>								
72.8	48/25, 62/15	2.5% for first 20 years, 2% for next 5, 1.5% for each year thereafter	No	10%	19.5% for police; 24.0% for firefighters, which includes 6.75% for retiree health care benefits	automatic 3%, simple	8.25%	1/1/2010
<b>Oklahoma PERS</b>								
80.7	62/8, Rule of 90; members who joined before 7/1/92 qualify for the Rule of 80; those hired after 10/31/11 must reach age 65 to retire	2%	Yes	3.5% for state employees; the combined EE and ER rate for county and local agencies is 19%, composed of a minimum EE rate of 3.5% to a max of 8.5%, and a minimum ER rate of 9.5% to a max of 15.5%	15.5% for state ER's; the combined EE and ER rate for county and local agencies is 19%, composed of a minimum EE rate of 3.5% to a max of 8.5%, and a minimum ER rate of 9.5% to a max of 15.5%	ad hoc as approved by the legislature; the legislature approved a provision in 2011 that future COLAs must be funded, effectively ruling out COLAs	7.50%	7/1/2011
<b>Oregon PERS</b>								
86.9	60/5; those hired after August '04 participate in the hybrid plan, w/65/any or 58/30; 60/any or 53/25	1.67%; 2% for public safety personnel; those hired after August '04 participate in the hybrid plan, w/a factor of 1.5%; 1.8% for public safety	Yes	non-contributory for the DB plan; 6% for the individual accounts	11.15% for the state and political subdivisions; 14.01% for schools	based on CPI, compounded, up to 2%	8.00%	12/31/2010
<b>Pennsylvania State ERS</b>								
65.3	60/3, any/35; 50/any, any/20 for state police	2.5%	Yes	6.25% for most	6.51% as a blended rate	ad hoc as approved by the general assembly	7.50%	12/31/2011

Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>Rhode Island ERS</b>								
48.4	Varies based on date of hire and retirement eligibility as of 9/30/09 invested (10 years) participant; a new hybrid plan takes effect 7/1/12 for new hires and most active workers	Varies based on dates of hire and retirement eligibility. For vested (10 years) participants as of 7/1/05: 1.6% for first 10 yrs., 1.8% for yrs. 11-20, 2.25% for yrs. 21-26, 2.5% for yrs. 26-30. New hybrid, effective 7/1/12, includes DB multiplier or 1%	Yes	8.75% for state employees, 9.5% for teachers	22.5%	Effective 7/1/12, risk-adjusted COLA targeting 2% annually, compounded. 5-year smoothed investment return less 5.5% with a 0% floor and 4% cap, applied to first \$25,000 of benefit, indexed. COLA delayed until later of SS NRA or 3 years after retirement	7.50%	6/30/2010
<b>South Carolina RS</b>								
65.5	65/5, any/28	1.82%	Yes	6.5%	9.24%, plus 0.15% for the death benefit	automatic, based on CPI up to 2% annually, compounded	8.00%	7/1/2010
<b>South Carolina Police</b>								
74.5	55/5, any/25	2.14%	Yes	6.5%	11.13%, plus 0.4% for death benefits	automatic, based on CPI up to 2% annually, compounded	8.00%	7/1/2010
<b>South Dakota PERS</b>								
96.4	65/3, Rule of 85; 55/3; Rule of 75 for public safety personnel	1.7% for svc before 7/1/08 and 1.55% for service thereafter; or Alternate Benefit--see SDRS website for details	Yes	6%; public safety personnel contribute 8%	6%; 8% for public safety personnel	Indexed to CPI and funded status, with a minimum of 2.1% and a maximum of 3.1%	7.75%	6/30/2011
<b>Tennessee State and Teachers</b>								
92.1	60/5, any/30	1.5% plus 0.25% of FAS over SSIL	Yes	non-contributory for most state and higher ed employees; 5% for teachers	15.14% for state and higher ed employees; 8.88% for teachers	automatic based on CPI, up to 3% compounded	7.50%	7/1/2011

Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>Texas ERS</b>								
84.5	60/5, Rule of 80; 65/10 for those hired after 2009	2.3%	Yes	6.5%	6.95%	ad hoc as approved by the legislature; per state constitution, plan's amortization period must be less than 31 years for legislature to approve a COLA	8.00%	8/31/2011
<b>Texas LECOS</b>								
86.4	50/any, Rule of 80, any/20	2.8%	Yes	0.5%; LECOS is a supplementary plan	1.59%; LECOS is a supplementary plan	ad hoc as approved by the legislature; per state constitution, plan's amortization period must be less than 31 years for legislature to approve a COLA	8.00%	8/31/2010
<b>Utah Noncontributory</b>								
78.4	any/30, 65/4	2%	Yes	non-contributory	13.77% to 16.86%; 15.97% as a weighted average	For those hired before 7/1/11, automatic based on CPI up to 4%, simple. For those hired after 6/30/11, based on CPI to 2.5%, simple	7.50%	12/31/2011
<b>Virginia Retirement System</b>								
72.4	65/5, 50/30	1.7%	Yes	5% for participants other than law enforcement and corrections personnel, and judges. Employers make most contributions for employees	2.13% for state employees; 3.93% for teachers; rates vary for political subdivisions from 0% to 25%	automatic based on CPI up to 5%; 3% for non-vested members as of 1/1/3	7.00%	6/30/2010
<b>Vermont State Employees</b>								
81.2	62/any, any/30	1.67%	Yes	5.1%	7.99%	automatic based on CPI, up to 5%, compounded	8.25%	6/30/2010

Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>Washington PERS 1</b>								
74.1	60/5, 55/25, any/30	2%	Yes	6%	5.31%	automatic, service-based, dollar amount of COLA increases by 3% annually, compounded	8.00%	6/30/2010
<b>Washington LEOFF Plan 1</b>								
126.6	50/5	2% for 20 or more years of service; 1.5% for 10 to 19 years; 1% for 5 to 9 years	Yes	0%	0.16%	automatic, full CPI, compounded	8.00%	6/30/2010
<b>Washington PERS 2/3</b>								
97.2	65/5	2%	Yes	3.9%; Plan 3 members contribute only to their defined contribution plan at between 5% and 15%	5.31%	automatic, based on CPI, up to 3%, compounded	8.00%	6/30/2010
<b>Washington LEOFF Plan 2</b>								
117	50/20, 53/5	2%	Yes	8.46%	5.24% for local government units; ports and universities pay 8.62%; the state pays 3.38%	automatic based on CPI, up to 3% compounded	8.00%	6/30/2010
<b>Wisconsin Retirement System</b>								
99.8	65/any; 55/any for public safety personnel	1.6%; 1.765% for service before 2000. Public safety personnel receive 2.165% for service before 2000 and 2% for service after	Yes	5%; 5.5% for public safety personnel	4.8%; 8.6% for public safety personnel	based on investment returns, and can increase and decrease, but not below base benefit	7.20%	12/31/2010
<b>West Virginia PERS</b>								
74.6	60/5, Rule of 80 at age 55 or higher	2%	Yes	4.5%	12.5%		7.50%	7/1/2010



Actuarial Funding Ratio	Normal Retirement (age/svc)	Benefit Factor	Social Security	Employee Contribution Rate	Employer Contribution Rate	Post-Retirement Increase Provisions	Investment Return Assumption	Actuarial Valuation Date
<b>Wyoming Public Employees</b>								
84.6	60/4, Rule of 85; for law enforcement personnel, any/25 at age 50	2.125% for first 15 years, 2.25% for each year of service thereafter	Yes	7%; law enforcement personnel contribute 8.6%; employer pay most employees' contributions	7.12%; law enforcement personnel contribute 8.6%	Removed effective 7/1/12 until the actuarial funded ratio reaches 100 percent "plus the additional percentage the retirement board determines is reasonably necessary to withstand market fluctuations"	8.00%	1/1/2011
Source: Public Fund Survey, National Association of State Retirement Systems and National Council on Teacher Retirement.								

<sup>1</sup> GAO Studies, <http://www.auditforum.org/speaker%20presentations/pacific/pniaf%2004%2011/Blackmer.pdf>

<sup>2</sup> State Budget Crisis Task Force, Report, Co-Chairs Richard Ravitch and Paul Volcker, July 2012. <http://www.statebudgetcrisis.org/wpcms/wp-content/images/Report-of-the-State-Budget-Crisis-Task-Force-Full.pdf>

<sup>3</sup> [http://www.gfoa.org/index.php?option=com\\_content&task=view&id=1662](http://www.gfoa.org/index.php?option=com_content&task=view&id=1662)



# Appendix A: Retirement Report Glossary

Information in this glossary includes definitions from Wikipedia, Investopedia, and other sources cited in the report document.

Term	Definition
<b>Actuarial Assumptions</b>	Estimates of future plan experience with respect to rates of mortality, disability, turnover, retirement, rate or rates of investment income, and salary increases. Assumptions that decrease the cost of future benefits such as mortality, disability, turnover, and retirement are generally based on past experience and often modified for projected changes in conditions. Economic assumptions (salary increases and investment income) consist of an expected underlying real rate-of-return plus an expected long-term average rate of inflation.
<b>Actuarial Value of Assets</b>	The value of current plan assets recognized for valuation purposes. Based on a smoothed market value that recognizes investment gains and losses over a period of time.
<b>Actuarially Sound (Texas Government Code)</b>	A retirement system that contains sufficient assets to cover future obligations. Under §811.006 of the Texas Government Code, the ERS retirement programs are considered actuarially sound if the current total contribution rate covers the plan's administrative expenses and the cost of benefits earned during the year by current active members – the normal cost – as well as the cost of amortizing any unfunded accrued liability over a maximum of 31 years.
<b>Amortization</b>	Paying an amount, such as an unfunded liability balance, over a defined period of time.
<b>Annuity</b>	An annuity is a contractual or legal obligation for an entity to make future monetary payments, either in a lump sum or in a series of regular payments, based on the life of person to whom the annuity is owed. For purposes of the ERS defined benefit plans, an annuity is paid from the ERS trust fund, and is defined by §811.001(3), Government Code, as “an amount of money payable in monthly installments for a guaranteed period or for life, as determined by this subtitle.”
<b>Benefits (Intangible)</b>	Includes items that are important to employees and the State but that are less tangible than employee pay and benefits. This may include scheduling flexibility and programs to help employees be successful at home and work, as well as challenging and rewarding work environments.
<b>Benefits (Tangible)</b>	Includes federally mandated programs, such as Social Security and unemployment, as well as core benefits that satisfy an employee's basic expectations for health insurance, retirement, and paid time off.
<b>Board of Trustees</b>	A group of six people (three elected by members and three appointed) who are responsible for administering the Employees Retirement System and managing its assets in trust.
<b>Cash Balance Pension Plan</b>	A pension plan under which an employer credits a participant's account with a set percentage of compensation plus a guaranteed interest rate. A cash balance pension plan is a defined benefit plan, but unlike the regular defined benefit plan, the cash balance plan is maintained on an individual account basis, much like a defined contribution plan. The cash balance plan also is similar to a defined contribution plan in that changes in the value of the participant's portfolio do not affect the yearly contribution. Because a cash balance plan has characteristics of both defined benefit and defined contribution plans, it is sometimes referred to as a ‘hybrid’ plan.”
<b>Compensation</b>	Wages and salaries provided to employees. Under §811.001(7), Texas Government Code, this includes things like longevity pay and hazardous duty pay, salary deductions for participating in the TexaSaver 401(k) program, and other amounts. It excludes overtime pay.

<b>Defined Benefit Plan</b>	A defined benefit pension plan is a type of pension plan in which an employer promises a specified monthly benefit on retirement that is predetermined by a formula based on the employee's earnings history, tenure of service, and age, rather than depending on investment returns. It is 'defined' in the sense that the formula for computing the employer's contribution is known in advance. In the United States, 26 U.S.C. §414(j) specifies a defined benefit plan to be any pension plan that is not a defined contribution plan where a defined contribution plan is any plan with individual accounts.
<b>Defined Contribution Plan</b>	A defined contribution plan, such as a 401(k), is a type of retirement plan in which the amount of the employer's annual contribution is specified. Individual accounts are set up for participants and benefits are based on the amounts credited to these accounts (through employee contributions and, if applicable, employer contributions) plus any investment earnings on the money in the account. Only contributions to the account are guaranteed, not future benefits. In defined contribution plans, future benefits fluctuate on the basis of investment earnings. The most common type of defined contribution plan is a savings and thrift plan. Under this type of plan, the employee contributes a predetermined portion of his or her earnings (usually pretax) to an individual account, all or part of which is matched by the employer.
<b>401(k) Plan</b>	A qualified deferred compensation plan established by employers to which eligible employees may make salary deferral (salary reduction) contributions on a post-tax or pretax basis. Employers offering a 401(k) plan may make matching or non-elective contributions to the plan on behalf of eligible employees and may also add a profit-sharing feature to the plan. Earnings accrue on a tax-deferred basis.  Caps placed by the plan or IRS regulations usually limit the percentage of salary deferral contributions. There are also restrictions on how and when employees can withdraw these assets, and penalties may apply if the amount is withdrawn while an employee is under the retirement age as defined by the plan. Plans that allow participants to direct their own investments provide a core group of investment products from which participants may choose. Otherwise, professionals hired by the employer direct and manage the employees' investments.
<b>457 Plan</b>	A non-qualified, deferred compensation plan established by state and local governments and tax-exempt governments and tax-exempt employers. Eligible employees are allowed to make salary deferral contributions to the 457 plan. Earnings grow on a tax-deferred basis and contributions are not taxed until the assets are distributed from the plan.  Employees are allowed to defer up to 100% of compensation not exceeding the applicable dollar limit for the year. Caps placed by the plan or IRS regulations usually limit the percentage of salary deferral contributions. If the plan does not meet statutory requirements, the assets may be subject to different rules.
<b>Governmental Accounting Standards Board (GASB)</b>	The Governmental Accounting Standards Board (GASB) is currently the source of generally accepted accounting principles used by state and local governments. GASB establishes standards of governmental accounting and financial reporting to ensure uniformity in financial reports.
<b>Normal Cost</b>	The cost of benefits being earned during the year by current active members – 12.31% of payroll for all ERS retirement programs in FY2011.
<b>Other Post-Employment Benefits (OPEB)</b>	Benefits, other than pension benefits, that an employee will begin to receive at the start of retirement. These include life insurance premiums, healthcare premiums and deferred compensation arrangements.
<b>Pension Benefit Guaranty Corporation</b>	A non-profit corporation that functions under the jurisdiction of the Department of Labor to regulate and guarantee the payment of certain private pension benefit plans.

<b>Pension Protection Act of 2006</b>	<p>An act of legislation that makes a large number of reforms to U.S. pension plan laws and regulations. This law made several pension provisions from the Economic Growth and Tax Relief Reconciliation Act of 2001 permanent, including increasing limits on IRA contributions and increasing limits on salary deferral contributions to 401(k)s.</p> <p>In addition to making past provisions permanent, the act attempts to strengthen the pension system and reduce reliance on both the federal pension system and the Pension Benefit Guaranty Corporation. This is done through the requirement that companies with under-funded pensions pay additional premiums and through the elimination of loopholes that allowed under-funded pensions to miss pension payments. The act also requires that pension plans provide more accurate assessments of their pension obligations.</p>
<b>Qualified Plan</b>	A retirement plan, either defined benefit or defined contribution, that meets certain IRS rules and thus qualifies for favorable tax treatment and tax savings.
<b>Revenue</b>	The amount of money coming into a retirement fund. This includes contributions from employers and employees, and investment income. Can also include one-time contributions or an ongoing funding source other than contributions.
<b>Trust</b>	A relationship under which property is held by one party for the benefit of another. Under §815.103(a). Texas Government Code, that party is the ERS Board of Trustees, who “hold all retirement system assets in trust for the exclusive benefit of the members and annuitants..”
<b>Unfunded Liability</b>	An unfunded liability occurs when a defined benefit plan does not have enough money set aside to meet the pension obligations to employees who will be retired in the future.

# Appendix B: Study Background and Methodology

## Background:

The Legislative Budget Board's biennial report to the 82<sup>nd</sup> Texas Legislature (2011) provided three general recommendations for maintaining the solvency of ERS plans and those operated by the Teacher Retirement System (TRS):<sup>1</sup>

- fully fund both systems, which would have cost the State \$1.1 billion in All Funds for the 2012-13 biennium,
- refine current system benefits to make current funding levels sufficient to fully fund the systems, such as modifying the minimum retirement age, retirement eligibility, the final average salary computation, the benefit multiplier, or other plan features, or
- develop a new structure for the pension plans that features elements of both defined benefit and defined contribution plans – with the caveat that a hybrid structure for the pension plans would require a careful plan design and funding strategy to be successful.

The Legislature determined that instead of enacting the above changes for the 2012-2013 biennium, a study would be conducted based on

a rider in §18.03 of the 2012-2013 General Appropriations Act. This rider requires ERS and TRS to conduct a Pension Plan Changes Study and to submit a report to the LBB and the Governor no later than September 1, 2012.

ERS and TRS must individually report on the actuarial and fiscal impacts from potential changes to the state, university, and school district pension plans as of August 31, 2011, including but not limited to:

- retirement eligibility,
- final average salary,
- benefit multiplier, and
- the creation of a hybrid plan that includes defined benefit and defined contribution features such as a two-part plan or a cash balance plan.

## Methodology:

**Overall report process and timeframe.** ERS began the Interim Benefits Study in the summer of 2011 with a strategic planning process that defined the policy framework for the analysis. ERS staged a series of educational forums to get input from legislative representatives, national authorities in the employer benefits field, and academic and policy experts.

From November 2011 to February 2012, ERS solicited feedback from vendors, associations, think tanks, employees, and retirees – all were given the same opportunity to present their ideas and suggestions.

**Figure B.1: Interim Benefits Study Research Process**



ERS also held a series of employer meetings with major state agencies to gather input on the health benefits program and the impact of potential changes on their ability to recruit and retain employees. See Common Appendix A for a list of those who presented ideas to ERS during the course of the study.

In addition, ERS conducted benchmarking research to compare retirement plan structure and status across all the states.

In March 2012, the process of consolidating and analyzing options began. A working set of assumptions were defined to guide the option research and evaluation.

An internal team composed of experts in the areas of finance, contracts, legal, government relations, customer benefits, information systems, and communications vetted and consolidated dozens of options, resulting in a categorized list for consideration.

Because the Legislature requested actuarial impact, ERS defined a set of assumptions for costing the options. There are so many variables to consider in the various grandfathering approaches, ERS decided that grandfathering bookends would be used to present a high and

low point for cost comparison. The low end impacting only non-vested employees (those hired after September 1, 2009) and the high end impacting all employees not within approximately five years of retirement. The Teacher Retirement System did a similar grandfathering in 2005 which was accepted by the Legislature. Therefore, we used the same proven assumptions. See Section 4 – Plan Design Modifications for details on the grandfathering assumptions and cost estimates.

**Definition of a Sound Plan:**

- has an equal balance between revenue and expenses,
- pays for benefits as they accrue,
- fulfills its obligations to current members and retirees,
- supports the state’s employers in attracting and retaining a qualified workforce,
- shares responsibility between employees and employer,
- addresses the unfunded liability and stops accruing future liabilities, and
- is predictable and reasonable for the state budget.

<sup>1</sup> Legislative Budget Board Staff, *Effectiveness and Efficiency Reports*, “Maintain the Pension Solvency of the Employees Retirement System and the Teacher Retirement System,” January 2011, p. 97-116.

# Appendix C: GASB

## Background

On June 25, 2012, the Governmental Accounting Standards Board (GASB) approved two new standards relating to accounting and reporting for pensions that will have an impact on the calculations and presentation of pension related information. Most plans and governmental employers have determined that the new standards will increase the reported unfunded pension liability. Rather than reporting the unfunded liability in the notes to the financial statements, the liability will be reported on the financial statements of the employers.

The calculation of the liability will be very complex and will require a combined discount rate. The assumed investment rate of return will only be applied to the portion of the liability that is projected to be paid with current assets. The remainder must be discounted using the AA municipal bond rate which is about half of the investment rate. Amortization periods for actuarial changes are generally shortened under the new standards. The net impact of the new standards will almost certainly be a higher amount for the reported unfunded liability.

The analysis below is based on preliminary information available from GASB. The new pension related standards, GASB Statements No. 67 and 68 will be available for download from the GASB website in early August 2012. Once the new statements are available, ERS will perform a more detailed analysis of the required changes.

## Detailed Changes and Timelines

The new GASB standards require a separation of the accounting and funding reporting for pensions. There will no longer be an Annual Required Contribution based on GASB requirements. The funding requirements will be based on the design and policies of each plan. This will result in separate calculations and

reporting for 1) funding purposes, and 2) accounting purposes, which may lead to confusion according to most pension plans. The new standards are effective for FY2014 for plan administrators such as ERS and will be reported in the ERS Comprehensive Annual Financial Report issued in November 2014. For employers such as the State of Texas, the standards are effective for FY2015 financial reports, which will be issued in February 2016 by the Comptroller. ERS will be working closely with its pension actuaries to implement the changes. The funding requirements for the plans will be presented as supplementary information to the financial statements.

The funding requirements may be calculated using current methodologies and assumptions, so there should not be a significant difference in the funding or contribution requirements. The big change will be in the notes and the reporting of GASB required calculation of the net pension liability, which will need to be reported on the financial statements of the employer (the State of Texas as reported by the State Comptroller). The State of Texas currently reports the difference between the actuarially required contribution and the actual contribution as a liability (basically the annual shortfall). Under the new standards it appears that the full amount of the net pension liability would be reported on the financial statements as a liability.

These changes will cause reported funded ratios to decline sharply, by up to 20%. However, accounting changes do not alter the underlying fundamentals; what is owed to a plan member under current standards will not change under the new standards. So policymakers should not let new numbers throw them off the path of sensible reform.<sup>1</sup>

Even if new GASB requirements increase the magnitude of unfunded liabilities that must be reported, Texas is in relatively good shape compared to other states in terms of combined pension and long-term debt liabilities. Texas has a low level of debt relative to reserves, which



reduces concerns that unfunded liabilities could damage its bond rating long term.

Texas, like other states, is addressing its near-term budget deficits. However, any issues related to bond indebtedness and pension obligations are best viewed over a multi-decade window – hence it is not generally considered appropriate to add these longer-term costs to projected operating deficits.<sup>2</sup>

## **New GASB Rules Change Liability Reporting Requirement**

On June 25, 2012, GASB approved two new standards relating to accounting and reporting for pensions that will affect the calculations and presentation of pension related information. Most plans and governmental employers have determined that the new standards will increase the reported unfunded pension liability. Rather than reporting the unfunded liability in the notes to the financial statements, the liability will be reported on the financial statements of the employers.

The complex calculation formula requires a combined discount rate. It applies the assumed investment rate of return to the portion of the liability that is projected to be paid with current assets. The remainder must be discounted using the AA municipal bond rate, which is about half of the investment rate. The new standards shorten the amortization periods for actuarial changes. The net impact of the new standards will almost certainly be a higher amount for the reported unfunded liability.

The new GASB standards separate calculations and reporting for plan accounting and funding. There will no longer be an Annual Required Contribution based on GASB requirements. Instead, it bases funding requirements on the design and policies of each plan. Most pension plans believe that the new reporting requirements will add to confusion and create additional concern about the plan's financial status.

## **GASB Implications for ERS and the State of Texas**

The new standards are effective for Fiscal Year 2014 for plan administrators such as ERS and will be reported in the ERS Comprehensive Annual Financial Report issued in November 2014. For employers such as the State of Texas, the standards are effective for Fiscal Year 2015 financial reports. The Texas Comptroller of Public Accounts will issue these reports in February 2016.

The funding requirements for the plans will be presented as supplementary information to the financial statements. Because the funding requirements may be calculated using current methodologies and assumptions, ERS does not expect there to be a significant difference in the funding or contribution requirements. The big change will be in the notes and the reporting of the GASB required calculation of Net Pension Liability, which the financial statements of the employer (the State of Texas as reported by the Texas Comptroller of Public Accounts) will report. The State of Texas currently reports the difference between the actuarially required contribution and the actual contribution as a liability (the annual shortfall). Under the new standards, it appears that the financial statements will report the full amount of the Net Pension Liability as a liability.

Although many people think that GASB based the new public sector standards on similar private sector rules, Congress recently amended those rules. On June 29, 2012, the U.S. Congress passed a bill that changed the smoothing period for the discount rate used in calculating private sector pension liabilities from two to 25 years, effectively raising the discount rate to about 7% and lowering the reported liability. When applied, the change will have the opposite impact on private sector reporting. It will result in private employers appearing to be better funded and will reduce their annual required contribution.

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<sup>1</sup> Center for Retirement Research at Boston College, How Would GASB Proposals Affect State and Local Pension Reporting?, by Alicia H. Munnell, Jean-Pierre Aubry, Josh Jurwitz, and Laura Quinby, November 23, 2011, Updated June 2012: [http://crr.bc.edu/wp-content/uploads/2012/06/wp\\_2012-17.pdf](http://crr.bc.edu/wp-content/uploads/2012/06/wp_2012-17.pdf)

<sup>2</sup> Center on Budget and Policy Priorities, *Misunderstandings Regarding State Debt, Pensions, and Retiree Health Costs Create Unnecessary Alarm*, by Iris J. Lav and Elizabeth McNichol, January 20, 2011. <http://www.cbpp.org/cms/index.cfm?fa=view&id=3372>

# Appendix D: Legal Context and Risks

## Key Findings

All of the potential changes described in this report may carry some degree of legal risk, with the possible exception of plan changes that apply only to newly hired employees. These legal risks may be to the State of Texas, its officers, to the Employees Retirement System of Texas, to the ERS Board and other fiduciaries, and to the members of the ERS system.

Generally, there is a sliding scale of legal risk to the State and ERS if changes are made to the ERS pension trust fund. There is virtually no risk for lawful plan changes that apply only to persons who have not yet been hired by the State. The risk of IRS plan disqualification and the State's and ERS' liability under other noted legal theories is lowest and gradually increases when changes apply to persons in the following order:

- new employees within their 90 day waiting period for trust fund membership,
- non-vested members,
- vested members who are not yet eligible to retire,
- vested members who are eligible to retire, and
- retirees.

## Governance

### State

The pension trust fund for State of Texas employees is governed by the Texas Constitution (Tex. Const. Art. XVI, §67), state statutes (Texas Government Code, Chapters 811-815), and by the Rules of the ERS Board of Trustees (Texas Administrative Code, Title 34, Part IV). These legal provisions are considered to be the written plan, or "plan document," for the ERS pension trust fund.<sup>1</sup>

On April 22, 1975, Texas voters adopted a constitutional amendment that revised and consolidated constitutional provisions relating to state and local retirement systems. The amendment permitted a maximum state contribution of 10% and a minimum state contribution of 6% of the aggregate compensation paid to persons participating in the ERS pension trust fund. Article XVI, §67 of the Texas Constitution also places limits on the State's legal ability to reduce state employee pension rights and expectations in the following respects:

- no diversion of trust assets,
- discretion to invest ERS trust funds must remain with the ERS Board of Trustees,
- the State must make minimum ERS contributions measured as 6% of state employees' compensation,
- ERS members must contribute at least 6% of their compensation to the retirement system, and
- financing of ERS retirement benefits must be based on sound actuarial principles.

The Texas Constitution expresses that the State is obligated to pay pension benefits based on at least minimum contributions and the return on pension fund investments. The funds shall be invested prudently, balancing the amount of income with the safety of capital. Further, the reference in the Constitution that the financing of benefits must be based on "sound actuarial principles" reflects constitutional intent that the State will make stable and reliable contributions to the trust fund in order that the resulting benefits paid to retirees are actuarially sound.

In a defined contribution plan, "sound actuarial principles" have no real meaning. A retiree in such a plan is simply paid his own contributions and some percentage of contributions made by the employer. A retiree in a defined contribution plan will also receive investment returns accrued over time, depending on the volatility of the stock market. However, in a defined benefit

plan, benefits are based on a formula including years of service, average salary, and a multiplier established by statute. Such defined benefits are generally paid for the retiree's and/or a survivor's lifetime. Accordingly, careful actuarial review and analysis is required to gauge the sound financial requirements necessary to pay the benefits over a long period of time.

Texas Government Code §811.006 provides that changes in contribution rates or benefit provisions may not be adopted if such changes would reduce the actuarial soundness of the retirement system. Actuarial soundness occurs when current contributions by the State and employees, along with investment returns earned by the pension trust fund, cover all administrative expenses, the cost of benefits being earned during the year by current active members (normal cost) and costs to pay back any unfunded liabilities over a maximum of 31 years. In other words, no cost of living increases, benefit enhancements, or reductions in the total (employee and state) contribution rate can occur if these changes would cause the pay-back period for unfunded liabilities to extend further.

## **Federal**

The ERS pension trust fund is "qualified" under federal law. The Internal Revenue Code (IRC, §401(a)(1) and §501(a)) provides the ERS pension trust fund with its tax-exempt status. As a qualified plan, the State of Texas and members of the pension trust receive a number of tax advantages as a result of their retirement contributions to the pension trust.

## **Consideration of Risks**

### **IRS Qualification**

Any significant proposed plan changes must be carefully considered to avoid losing that qualified status. Failure to be considered a qualified plan under federal tax law could adversely impact the state of Texas by imposing additional Federal Insurance Contributions Act (FICA) and employment taxes, penalties, fines, and also adversely impact the members with additional

and accelerated taxes and penalties. To this end, a loss of tax-exempt status would mean that:

- member contributions to the pension trust would have to be paid with after-tax dollars (which would increase FICA costs to the state and the members),
- members would have to report immediately as taxable income the present value of their account balances and continue to report as taxable income the accrued value of their benefits even though they are not receiving any payments from the plan, and both the State and member also must pay FICA taxes on those values,
- distributions from the pension trust would not be eligible to rollover to qualified accounts such as 401(k) accounts, and
- the income of the pension trust itself could be subject to tax, which would substantially increase the cost of funding benefits.

Prudent plan sponsors typically seek approval of any significant proposed plan changes from the Internal Revenue Service or make such approval a condition precedent for the change to take effect. Actual disqualification of the pension trust would potentially cost the state hundreds of millions of dollars in additional taxes and costs. The Internal Revenue Code has a fairly intricate set of qualification requirements that qualified plans must adhere to in order to continue to receive the preferential tax benefits.

Several of these requirements provide some protection to vested participants in an employee benefit plan. The IRS requires that a plan, such as the ERS pension trust fund, must be written and adhered to in practice (in the plan document). One of the federal tax law requirements in place to protect plan participants specifies that benefits must be definitely determinable under the plan document, called the "Definitely Determinable Benefit Doctrine." For example, vested members of a defined

benefit plan have an understanding of their retirement eligibility date and the retirement benefits they will receive, if they continue working for the state, based on the terms of the plan document. Any changes to these “definitely determinable benefits” will be subject to scrutiny by the IRS.

Under IRS requirements, if those employees who already qualify for retirement under current law are not grandfathered, it almost certainly would risk disqualification of the plan. Without appropriate grandfathering, a similar risk of disqualification exists with the elimination of any other accrued benefit, including a decrease in the multiplier applied to prior service, changes to average salary used in the formula, a longer vesting schedule, or any other increase in the normal retirement age.

## **Other Legal Risks**

In addition to the risk of plan disqualification and penalties under federal tax law, the legal risks

may arise from possible violations of: (1) contractual rights; (2) fiduciary duties; (3) constitutional rights under state and federal constitutions; (4) common law rights; and (5) federal statutes, in particular with regard to federal age discrimination, and requirements of the Internal Revenue Code, Internal Revenue Service procedures, and U.S. Treasury Regulations.

There are a number of federal statutes that could conflict with any potential changes to the ERS pension trust fund. In particular, the federal Age Discrimination in Employment Act and the Older Workers Benefit Protection Act protect the benefits of older workers and retirees. Many federal rights may be enforced by means such as class action lawsuits, and by actions brought by federal agencies such as the U.S. Department of Labor and the Equal Employment Opportunity Commission.

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<sup>1</sup> The plan document for the Judicial Retirement System of Texas Plan I also includes Tex. Gov't Code Chapters 831-835, and JRSII includes Tex. Gov't Code Chapters 836-840 as part of their respective plan governance.

## Appendix E: ERS Economic Impact by County

The following chart shows the number of contributing ERS members, the number of retired ERS members, and the annuity payments made by county.

COUNTY	ERS MEMBERS <sup>1</sup>	NUMBER OF ANNUITANTS <sup>2</sup>	FY2011 ANNUITY PAYMENTS <sup>3</sup>
ANDERSON	1,896	1,054	\$14,170,648
ANDREWS	28	24	\$305,350
ANGELINA	1,502	701	\$9,479,235
ARANSAS	140	122	\$1,882,340
ARCHER	174	124	\$2,048,588
ARMSTRONG	16	13	\$183,403
ATASCOSA	230	129	\$2,394,611
AUSTIN	382	181	\$2,945,567
BAILEY	21	19	\$313,491
BANDERA	85	75	\$1,143,362
BASTROP	1,195	1,000	\$17,212,913
BAYLOR	44	42	\$570,973
BEE	1,327	255	\$3,258,820
BELL	1,676	884	\$12,697,096
BEXAR	6,013	3,561	\$55,414,489
BLANCO	63	79	\$1,382,569
BORDEN	10	3	\$55,226
BOSQUE	82	108	\$1,394,544
BOWIE	684	259	\$4,561,253
BRAZORIA	1,356	824	\$11,932,432
BRAZOS	800	540	\$9,704,648
BREWSTER	92	56	\$1,124,316
BRISCOE	39	19	\$377,953
BROOKS	34	33	\$493,884
BROWN	631	377	\$5,817,672
BURLESON	146	125	\$1,849,752
BURNET	225	389	\$7,339,099
CALDWELL	261	246	\$4,257,527
CALHOUN	50	41	\$682,559
CALLAHAN	180	180	\$2,617,606
CAMERON	1,605	836	\$12,743,283
CAMP	35	28	\$441,020
CARSON	33	26	\$270,644
CASS	273	216	\$3,791,494

COUNTY	ERS MEMBERS <sup>1</sup>	NUMBER OF ANNUITANTS <sup>2</sup>	FY2011 ANNUITY PAYMENTS <sup>3</sup>
CASTRO	45	19	\$224,450
CHAMBERS	96	62	\$854,512
CHEROKEE	1,360	991	\$12,856,335
CHILDRESS	329	171	\$2,716,524
CLAY	114	84	\$1,136,970
COCHRAN	18	9	\$154,022
COKE	16	21	\$262,054
COLEMAN	61	64	\$989,968
COLLIN	596	382	\$6,416,314
COLLINGSWORTH	37	37	\$513,691
COLORADO	70	85	\$1,511,214
COMAL	356	333	\$5,760,642
COMANCHE	59	83	\$1,146,653
CONCHO	13	17	\$348,534
COOKE	344	226	\$2,999,309
CORYELL	1,437	936	\$11,547,905
COTTLE	26	16	\$267,779
CRANE	20	8	\$164,380
CROCKETT	30	20	\$360,301
CROSBY	33	26	\$407,912
CULBERSON	25	17	\$252,927
DALLAM	131	49	\$536,554
DALLAS	4,030	1,682	\$29,978,895
DAWSON	336	53	\$877,559
DEAF SMITH	42	26	\$533,153
DELTA	25	35	\$594,926
DENTON	2,093	799	\$11,156,241
DEWITT	239	128	\$1,895,331
DICKENS	12	15	\$174,532
DIMMIT	71	36	\$492,417
DONLEY	33	32	\$437,583
DUVAL	68	54	\$795,180
EASTLAND	127	95	\$1,402,747
ECTOR	401	207	\$3,730,089
EDWARDS	9	13	\$194,025
ELLIS	303	189	\$3,176,687
EL PASO	3,150	1,039	\$16,822,375
ERATH	106	116	\$2,004,792

COUNTY	ERS MEMBERS <sup>1</sup>	NUMBER OF ANNUITANTS <sup>2</sup>	FY2011 ANNUITY PAYMENTS <sup>3</sup>
FALLS	404	124	\$1,828,445
FANNIN	353	140	\$1,929,088
FAYETTE	116	155	\$2,504,954
FISHER	60	34	\$359,272
FLOYD	66	25	\$433,991
FOARD	41	22	\$312,216
FORT BEND	3,018	1,223	\$18,169,227
FRANKLIN	52	38	\$826,212
FREESTONE	498	270	\$3,103,536
FRIO	211	86	\$1,235,804
GAINES	33	7	\$93,117
GALVESTON	1,011	548	\$9,063,334
GARZA	25	38	\$563,138
GILLESPIE	93	196	\$3,013,985
GLASSCOCK	2	2	\$17,332
GOLIAD	94	60	\$1,122,019
GONZALES	72	96	\$1,618,366
GRAY	278	113	\$1,444,378
GRAYSON	360	316	\$4,675,114
GREGG	317	282	\$4,738,157
GRIMES	395	146	\$1,747,104
GUADALUPE	298	256	\$4,094,339
HALE	426	104	\$1,803,283
HALL	66	25	\$335,118
HAMILTON	122	77	\$1,106,625
HANSFORD	7	5	\$83,742
HARDEMAN	124	66	\$840,282
HARDIN	269	179	\$3,194,291
HARRIS	8,934	3,072	\$53,177,308
HARRISON	196	143	\$2,140,551
HARTLEY	49	8	\$117,468
HASKELL	49	43	\$716,046
HAYS	1,657	1,155	\$23,027,060
HEMPHILL	12	7	\$100,120
HENDERSON	547	348	\$4,756,648
HIDALGO	2,807	1,047	\$18,602,252
HILL	141	140	\$1,855,305
HOCKLEY	100	48	\$865,009



COUNTY	ERS MEMBERS <sup>1</sup>	NUMBER OF ANNUITANTS <sup>2</sup>	FY2011 ANNUITY PAYMENTS <sup>3</sup>
HOOD	98	122	\$2,046,053
HOPKINS	170	137	\$2,414,401
HOUSTON	844	417	\$6,283,744
HOWARD	590	348	\$4,369,939
HUDSPETH	20	20	\$271,478
HUNT	257	320	\$4,326,235
HUTCHINSON	91	40	\$646,505
IRION	5	7	\$230,482
JACK	40	48	\$810,521
JACKSON	41	48	\$861,806
JASPER	379	164	\$2,461,418
JEFF DAVIS	64	43	\$670,385
JEFFERSON	1,942	813	\$13,401,148
JIM HOGG	34	37	\$588,429
JIM WELLS	206	122	\$1,741,737
JOHNSON	300	280	\$4,584,186
JONES	249	130	\$1,742,125
KARNES	280	84	\$1,238,913
KAUFMAN	706	358	\$5,202,879
KENDALL	71	78	\$1,253,626
KENEDY	3	3	\$50,050
KENT	6	12	\$190,109
KERR	572	557	\$7,717,291
KIMBLE	44	52	\$1,002,853
KING	4	2	\$39,977
KINNEY	22	18	\$422,849
KLEBERG	122	71	\$1,167,771
KNOX	24	32	\$532,952
LAMAR	276	299	\$5,288,853
LAMB	64	28	\$534,750
LAMPASAS	231	142	\$2,225,108
LASALLE	102	49	\$933,772
LAVACA	182	203	\$3,940,356
LEE	369	225	\$3,487,194
LEON	219	190	\$2,430,167
LIBERTY	577	201	\$2,947,931
LIMESTONE	1,091	630	\$7,316,002
LIPSCOMB	7	5	\$52,382

COUNTY	ERS MEMBERS <sup>1</sup>	NUMBER OF ANNUITANTS <sup>2</sup>	FY2011 ANNUITY PAYMENTS <sup>3</sup>
LIVE OAK	84	59	\$893,972
LLANO	53	158	\$2,761,806
LOVING	0	0	\$0
LUBBOCK	2,491	1,064	\$16,885,225
LYNN	51	20	\$375,216
MADISON	386	217	\$2,627,626
MARION	30	24	\$425,450
MARTIN	16	12	\$194,414
MASON	20	37	\$650,061
MATAGORDA	126	102	\$1,610,335
MAVERICK	144	81	\$1,205,272
MCCULLOCH	43	64	\$1,091,687
MCLENNAN	1,534	938	\$17,025,525
MCMULLEN	21	13	\$276,449
MEDINA	402	216	\$3,375,505
MENARD	10	11	\$181,219
MIDLAND	526	236	\$4,526,675
MILAM	149	120	\$1,908,717
MILLS	47	35	\$573,342
MITCHELL	258	85	\$998,249
MONTAGUE	75	88	\$1,900,934
MONTGOMERY	1,278	680	\$10,016,655
MOORE	55	23	\$320,176
MORRIS	64	58	\$839,889
MOTLEY	13	11	\$188,333
NACOGDOCHES	312	272	\$4,231,234
NAVARRO	380	243	\$3,517,945
NEWTON	52	48	\$759,255
NOLAN	152	64	\$1,024,776
NUECES	2,123	1,018	\$15,272,624
OCHILTREE	16	10	\$210,300
OLDHAM	9	9	\$93,037
ORANGE	309	162	\$2,683,124
PALO PINTO	103	101	\$1,644,054
PANOLA	56	66	\$1,075,801
PARKER	222	199	\$3,581,537
PARMER	21	9	\$192,582
PECOS	346	98	\$1,338,601

COUNTY	ERS MEMBERS <sup>1</sup>	NUMBER OF ANNUITANTS <sup>2</sup>	FY2011 ANNUITY PAYMENTS <sup>3</sup>
POLK	726	317	\$4,397,878
POTTER	1,057	373	\$5,347,270
PRESIDIO	77	35	\$501,218
RAINS	37	40	\$594,170
RANDALL	1,173	617	\$10,761,605
REAGAN	7	4	\$61,848
REAL	26	24	\$379,996
RED RIVER	102	90	\$1,543,737
REEVES	74	53	\$864,375
REFUGIO	56	27	\$491,097
ROBERTS	2	7	\$94,687
ROBERTSON	162	121	\$2,253,671
ROCKWALL	139	73	\$1,528,797
RUNNELS	47	52	\$811,286
RUSK	179	162	\$2,515,615
SABINE	48	54	\$834,695
SAN AUGUSTINE	44	42	\$649,235
SAN JACINTO	349	152	\$2,176,485
SAN PATRICIO	392	204	\$3,489,231
SAN SABA	114	58	\$884,251
SCHLEICHER	8	8	\$160,904
SCURRY	268	132	\$1,612,133
SHACKELFORD	44	17	\$233,919
SHELBY	56	77	\$1,246,856
SHERMAN	8	9	\$57,783
SMITH	1,202	771	\$13,066,838
SOMERVELL	18	30	\$470,026
STARR	240	76	\$1,145,020
STEPHENS	121	81	\$1,210,317
STERLING	10	6	\$87,087
STONEWALL	20	16	\$253,327
SUTTON	19	24	\$389,158
SWISHER	113	43	\$611,177
TARRANT	3,588	1,716	\$28,147,698
TAYLOR	2,710	1,223	\$16,419,861
TERRELL	23	12	\$188,461
TERRY	126	40	\$694,283
THROCKMORTON	17	12	\$160,255

COUNTY	ERS MEMBERS <sup>1</sup>	NUMBER OF ANNUITANTS <sup>2</sup>	FY2011 ANNUITY PAYMENTS <sup>3</sup>
TITUS	117	98	\$1,903,743
TOM GREEN	1,222	750	\$11,562,686
TRAVIS	27,334	12,303	\$246,306,551
TRINITY	533	296	\$3,978,374
TYLER	325	161	\$1,946,312
UPSHUR	101	104	\$1,836,774
UPTON	9	15	\$212,764
UVALDE	176	136	\$2,300,657
VAL VERDE	156	144	\$2,578,046
VAN ZANDT	293	232	\$2,940,165
VICTORIA	369	239	\$3,977,985
WALKER	3,538	1,760	\$28,041,099
WALLER	116	50	\$690,834
WARD	48	78	\$1,534,891
WASHINGTON	939	433	\$5,896,847
WEBB	773	310	\$5,289,080
WHARTON	196	169	\$2,418,309
WHEELER	32	22	\$293,739
WICHITA	1,906	865	\$11,688,828
WILBARGER	937	444	\$5,339,061
WILLACY	113	74	\$1,204,080
WILLIAMSON	4,665	2,753	\$53,040,358
WILSON	214	178	\$2,583,627
WINKLER	19	24	\$291,363
WISE	128	113	\$1,704,735
WOOD	189	181	\$2,449,034
YOAKUM	12	12	\$268,306
YOUNG	95	70	\$103,255
ZAPATA	31	17	\$292,019
ZAVALA	78	33	\$465,414
<b>GRAND TOTAL</b>	<b>141,237</b>	<b>73,236</b>	<b>1,207,547,248</b>

<sup>1</sup> ACTIVE MEMBER counts are effective as of 8/31/2011.

<sup>2</sup> AUG 11 ANNUITANTS represents number of paychecks on the August 2011 monthly payroll. Members with multiple accounts get 1 paycheck.

<sup>3</sup> AUG 11 GROSS PAY represents the summed gross pay from the August 2011 monthly payroll.

**Appendix F – Actuarial Analysis of Option 5.3 – Two Part Hybrid Plan**  
**New employees go to new hybrid (1% multiplier DB/DC) effective January 2012**  
**State contributes 6.5% to DB and 3.25% to DB/DC hybrid**

**Employees Retirement System of Texas**  
**Plan Design Alternatives**

**Current Plan**

Traditional Defined Benefit Plan

Benefit formula (Grandfathered):	2.3% of final average salary per year of service
Benefit formula (Not Grandfathered):	Not applicable
Grandfather Criteria:	Not applicable
Total Contribution Rate (beginning 2014):	13.00%

**Alternative Plan**

Traditional Defined Benefit Plan

Benefit formula (Grandfathered):	2.3% of final average salary per year of service
Benefit formula (Not Grandfathered):	1.0% of final average salary per year of service
Grandfather Criteria:	Entrants Before January 1, 2014
Total Contribution Rate (Grandfathered):	13.00%
Total Contribution Rate (Not Grandfathered):	6.50%

Defined Contribution Plan

Total Contribution Rate (Not Grandfathered):	6.50%
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	Unfunded Accrued Liability	Funded Ratio	Annual Required Contribution		DB Unfunded Accrued Liability	DB Funded Ratio	DB Annual Required Contribution	DB + DC Annual Required Contribution
2011	5,052,682,797	82.60%	17.47%	2011	5,052,682,797	82.60%	17.47%	17.47%
2012	5,893,734,719	80.30%	18.24%	2012	5,893,734,719	80.30%	18.24%	18.24%
2013	6,716,453,880	78.30%	18.74%	2013	6,716,453,880	78.30%	18.74%	18.74%
2014	7,545,856,179	76.40%	19.21%	2014	7,545,856,179	76.40%	18.82%	19.16%
2015	8,324,567,377	74.70%	19.58%	2015	8,346,301,910	74.60%	18.84%	19.49%
2016	9,083,058,057	73.10%	19.89%	2016	9,150,000,420	72.90%	18.84%	20.03%
2017	9,836,102,273	71.60%	20.17%	2017	9,989,724,241	71.20%	18.84%	20.49%
2018	10,584,006,241	70.20%	20.40%	2018	10,866,307,958	69.40%	18.85%	20.90%
2019	11,326,129,559	68.80%	20.61%	2019	11,781,015,439	67.50%	18.88%	21.30%
2020	12,071,340,708	67.40%	20.79%	2020	12,745,688,692	65.60%	18.93%	21.69%
2021	12,812,137,880	66.00%	20.96%	2021	13,756,641,093	63.50%	19.02%	22.09%
2022	13,562,899,712	64.60%	21.10%	2022	14,832,616,878	61.30%	19.12%	22.49%
2023	14,315,818,296	63.20%	21.23%	2023	15,969,981,097	59.00%	19.26%	22.91%
2024	15,082,326,628	61.80%	21.35%	2024	17,185,746,590	56.50%	19.43%	23.34%
2025	15,861,353,030	60.40%	21.45%	2025	18,480,471,786	53.80%	19.63%	23.79%
2026	16,660,600,889	58.90%	21.54%	2026	19,867,158,474	50.90%	19.87%	24.23%
2027	17,480,890,093	57.30%	21.62%	2027	21,350,380,634	47.80%	20.13%	24.69%
2028	18,312,329,722	55.60%	21.72%	2028	22,926,908,254	44.50%	20.46%	25.23%
2029	19,175,980,689	53.90%	21.82%	2029	24,627,102,981	40.80%	20.81%	25.80%

**Employees Retirement System of Texas  
Plan Design Alternatives**

**Current Plan**

Traditional Defined Benefit Plan

Benefit formula (Grandfathered):	2.3% of final average salary per year of service
Benefit formula (Not Grandfathered):	Not applicable
Grandfather Criteria:	Not applicable
Total Contribution Rate (beginning 2014):	13.00%

**Alternative Plan**

Traditional Defined Benefit Plan

Benefit formula (Grandfathered):	2.3% of final average salary per year of service
Benefit formula (Not Grandfathered):	1.0% of final average salary per year of service
Grandfather Criteria:	Entrants Before January 1, 2014
Total Contribution Rate (Grandfathered):	13.00%
Total Contribution Rate (Not Grandfathered):	6.50%

Defined Contribution Plan

Total Contribution Rate (Not Grandfathered):	6.50%
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	Unfunded Accrued Liability	Funded Ratio	Annual Required Contribution	DB Unfunded Accrued Liability	DB Funded Ratio	DB Annual Required Contribution	DB + DC Annual Required Contribution
2030	20,071,240,887	52.00%	21.92%	2030	26,448,026,324	36.80%	26.39%
2031	21,016,772,797	50.00%	22.03%	2031	28,414,898,009	32.40%	26.96%
2032	22,008,379,955	47.80%	22.12%	2032	30,526,653,744	27.60%	27.55%
2033	23,047,699,654	45.50%	22.24%	2033	32,792,037,521	22.40%	28.19%
2034	24,148,983,978	42.90%	22.37%	2034	35,233,853,941	16.70%	28.87%
2035	25,322,489,783	40.20%	22.52%	2035	37,866,314,476	10.50%	29.58%
2036	26,580,891,921	37.10%	22.66%	2036	40,706,715,238	3.70%	30.30%
2037	27,937,963,818	33.80%	22.83%	2037	42,228,214,223	0.00%	42.09%
2038	29,404,807,762	30.30%	23.02%	2038	42,163,284,270	0.00%	51.61%
2039	30,993,464,798	26.40%	23.22%	2039	42,105,183,575	0.00%	50.06%
2040	32,726,109,861	22.20%	23.45%	2040	42,071,991,818	0.00%	48.51%
2041	34,614,723,193	17.70%	23.71%	2041	42,057,167,431	0.00%	47.11%
2042	36,667,324,017	12.80%	24.01%	2042	42,053,824,944	0.00%	45.78%
2043	38,909,526,610	7.50%	24.33%	2043	42,073,863,845	0.00%	44.46%
2044	41,375,153,129	1.80%	24.70%	2044	42,135,430,885	0.00%	43.17%
2045	42,257,084,040	0.00%	34.72%	2045	42,257,084,040	0.00%	41.90%
2046	42,385,390,191	0.00%	37.80%	2046	42,385,390,191	0.00%	40.82%
2047	42,563,510,946	0.00%	37.11%	2047	42,563,510,946	0.00%	39.79%
2048	42,794,083,590	0.00%	36.46%	2048	42,794,083,590	0.00%	38.74%

**Employees Retirement System of Texas  
Plan Design Alternatives**

**Current Plan**

Traditional Defined Benefit Plan

Benefit formula (Grandfathered):	2.3% of final average salary per year of service
Benefit formula (Not Grandfathered):	Not applicable
Grandfather Criteria:	Not applicable
Total Contribution Rate (beginning 2014):	13.00%

**Alternative Plan**

Traditional Defined Benefit Plan

Benefit formula (Grandfathered):	2.3% of final average salary per year of service
Benefit formula (Not Grandfathered):	1.0% of final average salary per year of service
Grandfather Criteria:	Entrants Before January 1, 2014
Total Contribution Rate (Grandfathered):	13.00%
Total Contribution Rate (Not Grandfathered):	6.50%

Defined Contribution Plan

Total Contribution Rate (Not Grandfathered):	6.50%
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	Unfunded Accrued Liability	Funded Ratio	Annual Required Contribution		DB Unfunded Accrued Liability	DB Funded Ratio	DB Annual Required Contribution	DB + DC Annual Required Contribution
2049	43,081,936,425	0.00%	35.85%	2049	43,081,936,425	0.00%	31.26%	37.74%
2050	43,416,315,796	0.00%	35.28%	2050	43,416,315,796	0.00%	30.30%	36.78%
2051	43,817,107,189	0.00%	34.83%	2051	43,817,107,189	0.00%	29.45%	35.94%
2052	44,272,895,173	0.00%	34.41%	2052	44,272,895,173	0.00%	28.65%	35.14%
2053	44,776,554,592	0.00%	34.02%	2053	44,776,554,592	0.00%	27.88%	34.38%
2054	45,363,759,508	0.00%	33.67%	2054	45,363,759,508	0.00%	27.15%	33.64%
2055	46,004,312,622	0.00%	33.33%	2055	46,004,312,622	0.00%	26.46%	32.96%
2056	46,734,693,269	0.00%	33.03%	2056	46,734,693,269	0.00%	25.82%	32.32%
2057	47,539,604,877	0.00%	32.77%	2057	47,539,604,877	0.00%	25.23%	31.73%
2058	48,402,318,564	0.00%	32.52%	2058	48,402,318,564	0.00%	24.69%	31.19%
2059	49,363,962,709	0.00%	32.31%	2059	49,363,962,709	0.00%	24.18%	30.68%
2060	50,387,338,215	0.00%	32.10%	2060	50,387,338,215	0.00%	23.72%	30.22%
2061	51,516,693,348	0.00%	31.92%	2061	51,516,693,348	0.00%	23.29%	29.79%
2062	52,733,470,544	0.00%	31.77%	2062	52,733,470,544	0.00%	22.89%	29.39%
2063	54,016,924,208	0.00%	31.63%	2063	54,016,924,208	0.00%	22.54%	29.04%
2064	55,415,237,092	0.00%	31.50%	2064	55,415,237,092	0.00%	22.21%	28.71%
2065	56,908,488,646	0.00%	31.39%	2065	56,908,488,646	0.00%	21.91%	28.41%
2066	58,473,547,556	0.00%	31.30%	2066	58,473,547,556	0.00%	21.65%	28.15%
2067	60,163,043,444	0.00%	31.23%	2067	60,163,043,444	0.00%	21.41%	27.91%

**Employees Retirement System of Texas  
Plan Design Alternatives**

**Current Plan**

Traditional Defined Benefit Plan

Benefit formula (Grandfathered):	2.3% of final average salary per year of service
Benefit formula (Not Grandfathered):	Not applicable
Grandfather Criteria:	Not applicable
Total Contribution Rate (beginning 2014):	13.00%

**Alternative Plan**

Traditional Defined Benefit Plan

Benefit formula (Grandfathered):	2.3% of final average salary per year of service
Benefit formula (Not Grandfathered):	1.0% of final average salary per year of service
Grandfather Criteria:	Entrants Before January 1, 2014
Total Contribution Rate (Grandfathered):	13.00%
Total Contribution Rate (Not Grandfathered):	6.50%

Defined Contribution Plan

Total Contribution Rate (Not Grandfathered):	6.50%
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	Unfunded Accrued Liability	Funded Ratio	Annual Required Contribution	DB Unfunded Accrued Liability	DB Funded Ratio	DB Annual Required Contribution	DB + DC Annual Required Contribution
2068	61,926,799,543	0.00%	31.17%	2068	61,926,799,543	0.00%	27.70%
2069	63,821,473,812	0.00%	31.12%	2069	63,821,473,812	0.00%	27.51%
2070	65,822,755,991	0.00%	31.09%	2070	65,822,755,991	0.00%	27.34%
2071	67,902,452,041	0.00%	31.05%	2071	67,902,452,041	0.00%	27.19%
2072	70,123,260,205	0.00%	31.03%	2072	70,123,260,205	0.00%	27.06%
2073	72,457,878,618	0.00%	31.03%	2073	72,457,878,618	0.00%	26.95%
2074	74,874,568,416	0.00%	31.03%	2074	74,874,568,416	0.00%	26.86%
2075	77,442,200,781	0.00%	31.03%	2075	77,442,200,781	0.00%	26.79%
2076	80,130,164,838	0.00%	31.05%	2076	80,130,164,838	0.00%	26.72%
2077	82,903,181,442	0.00%	31.07%	2077	82,903,181,442	0.00%	26.68%
2078	85,837,733,064	0.00%	31.10%	2078	85,837,733,064	0.00%	26.64%



## Appendix G – Actuarial Analysis of Option 5.4 – Mandatory DC Plan

New employees go to new DC plan effective FY 12

State contributes 6.5% to both the DB plan and DC plan

### Summary of Projected Asset Depletion

<b>Total Contribution Rate:</b>	13.00%
<b>State Contribution Rate:</b>	6.50%
<b>Projected Year of Fund Depletion:</b>	2038
<b>Unfunded Accrued Liability at Depletion:</b>	42,775,936,032
<b>Contribution at Depletion as a Percent of Payroll:</b>	527.51%

Fiscal Year	CURRENT PLAN						NEW PLAN			
	Number of Active Members		State Contribution at 6.5%	Number of Retirees	From Trust Fund Annuity Payments	From General Fund Annuity Payments	Number of Active Members		State Contribution at 6.5%	Total State Cost
	Members	Payroll					Members	Payroll		
2011	137,293	5,795,185,115	376,687,032	168,315	1,928,421,019	-	-	-	-	376,687,032
2012	119,584	5,495,603,950	357,214,257	114,101	1,919,939,392	-	17,709	259,913,329	16,894,366	374,108,623
2013	106,147	5,279,953,129	343,196,953	121,289	2,029,939,688	-	31,146	655,170,900	42,586,109	385,783,062
2014	94,960	5,094,209,901	331,123,644	128,107	2,132,718,767	-	42,333	1,037,207,725	67,418,502	398,542,146
2015	85,316	4,921,270,184	319,882,562	134,295	2,231,968,674	-	51,977	1,418,357,966	92,193,268	412,075,830
2016	76,790	4,746,327,507	308,511,288	139,618	2,329,774,893	-	60,503	1,812,154,506	117,790,043	426,301,331
2017	69,104	4,565,545,608	296,760,465	144,193	2,425,263,205	-	68,189	2,223,281,460	144,513,295	441,273,760
2018	62,105	4,369,382,280	284,009,848	148,175	2,520,082,569	-	75,188	2,659,051,742	172,838,363	456,848,211
2019	55,680	4,159,818,747	270,388,219	151,603	2,612,417,666	-	81,613	3,117,359,242	202,628,351	473,016,570
2020	49,758	3,941,373,382	256,189,270	154,573	2,705,030,659	-	87,535	3,594,715,275	233,656,493	489,845,763
2021	44,245	3,721,261,734	241,882,013	157,076	2,794,288,704	-	93,048	4,080,663,782	265,243,146	507,125,159
2022	39,375	3,506,559,737	227,926,383	158,907	2,879,521,022	-	97,918	4,576,336,928	297,461,900	525,388,283
2023	35,007	3,303,292,669	214,714,023	160,106	2,961,929,034	-	102,286	5,065,607,934	329,264,516	543,978,539
2024	31,067	3,101,909,456	201,624,115	160,742	3,040,001,223	-	106,226	5,567,984,477	361,918,991	563,543,106
2025	27,474	2,900,865,885	188,556,283	160,893	3,114,538,779	-	109,819	6,082,488,345	395,361,742	583,918,025
2026	24,195	2,701,877,445	175,622,034	160,590	3,188,129,835	-	113,098	6,608,922,480	429,579,961	605,201,995
2027	21,110	2,503,029,897	162,696,943	159,954	3,257,789,776	-	116,183	7,147,321,483	464,575,896	627,272,839
2028	18,253	2,302,163,242	149,640,611	158,946	3,323,534,092	-	119,040	7,682,337,877	499,351,962	648,992,573
2029	15,603	2,095,203,178	136,188,207	157,587	3,382,414,544	-	121,690	8,236,340,098	535,362,106	671,550,313
2030	13,235	1,893,328,791	123,066,371	155,807	3,432,191,461	-	124,058	8,801,683,322	572,109,416	695,175,787
2031	11,135	1,695,924,527	110,235,094	153,631	3,474,058,353	-	126,158	9,383,038,893	609,897,528	720,132,622
2032	9,243	1,514,686,964	98,454,653	151,124	3,508,714,160	-	128,050	9,965,745,763	647,773,475	746,228,128
2033	7,532	1,343,193,686	87,307,590	148,319	3,533,405,390	-	129,761	10,546,158,181	685,500,282	772,807,872
2034	6,023	1,180,625,009	76,740,626	145,199	3,546,851,778	-	131,270	11,130,881,329	723,507,286	800,247,912
2035	4,711	1,021,872,014	66,421,681	141,782	3,545,199,103	-	132,582	11,723,559,305	762,031,355	828,453,036
2036	3,609	871,616,602	56,655,079	138,062	3,526,557,139	-	133,684	12,331,646,065	801,556,994	858,212,073
2037	2,720	733,105,688	47,651,870	134,049	3,491,260,050	-	134,573	12,949,539,468	841,720,065	889,371,935
2038	2,035	603,249,291	39,211,204	129,769	2,571,890,025	868,304,787	135,258	13,586,458,222	883,119,784	1,790,635,775
2039	1,516	490,690,270	31,894,868	125,274	-	3,313,143,725	135,777	14,229,780,948	924,935,762	4,269,974,355
2040	1,126	389,697,825	25,330,359	120,618	-	3,252,510,961	136,167	14,880,877,762	967,257,055	4,245,098,375

**Summary of Projected Asset Depletion**

**Total Contribution Rate:** 13.00%  
**State Contribution Rate:** 6.50%  
**Projected Year of Fund Depletion:** 2038  
**Unfunded Accrued Liability at Depletion:** 42,775,936,032  
**Contribution at Depletion as a Percent of Payroll:** 527.51%

Fiscal Year	CURRENT PLAN						NEW PLAN			
	Number of Active Members	Payroll	State Contribution at 6.5%	Number of Retirees	From Trust Fund Annuity Payments	From General Fund Annuity Payments	Number of Active Members	Payroll	State Contribution at 6.5%	Total State Cost
2041	838	302,236,931	19,645,401	115,846	-	3,181,916,015	136,455	15,525,263,323	1,009,142,116	4,210,703,532
2042	621	228,298,056	14,839,374	111,008	-	3,103,064,504	136,672	16,171,735,515	1,051,162,808	4,169,066,686
2043	456	166,870,631	10,846,591	106,140	-	3,017,067,566	136,837	16,824,542,344	1,093,595,252	4,121,509,409
2044	328	117,418,337	7,632,192	101,276	-	2,924,887,792	136,965	17,483,979,120	1,136,458,643	4,068,978,627
2045	229	79,019,485	5,136,267	96,442	-	2,827,993,718	137,064	18,152,490,047	1,179,911,853	4,013,041,838
2046	151	49,486,129	3,216,598	91,661	-	2,725,759,312	137,142	18,818,674,937	1,223,213,871	3,952,189,781
2047	94	30,051,180	1,953,327	86,945	-	2,618,938,409	137,199	19,496,870,622	1,267,296,590	3,888,188,326
2048	55	17,366,269	1,128,807	82,310	-	2,508,743,912	137,238	20,191,880,408	1,312,472,227	3,822,344,946
2049	32	9,659,619	627,875	77,770	-	2,396,868,612	137,261	20,905,969,749	1,358,888,034	3,756,384,521
2050	17	5,067,412	329,382	73,339	-	2,284,436,847	137,276	21,641,672,384	1,406,708,705	3,691,474,934
2051	8	2,323,558	151,031	69,027	-	2,171,899,196	137,285	22,393,393,483	1,455,570,576	3,627,620,803
2052	3	973,913	63,304	64,840	-	2,059,853,726	137,290	23,170,555,578	1,506,086,113	3,566,003,143
2053	1	392,860	25,536	60,784	-	1,948,782,719	137,292	23,974,432,486	1,558,338,112	3,507,146,367
2054	-	152,885	9,938	56,865	-	1,839,163,398	137,293	24,807,490,286	1,612,486,869	3,451,660,205
2055	-	54,481	3,541	53,086	-	1,731,394,505	137,293	25,670,809,222	1,668,602,599	3,400,000,645
2056	-	20,322	1,321	49,447	-	1,625,645,238	137,293	26,565,093,972	1,726,731,108	3,352,377,667
2057	-	7,559	491	45,948	-	1,522,117,825	137,293	27,489,815,503	1,786,838,008	3,308,956,324
2058	-	2,691	175	42,590	-	1,421,035,128	137,293	28,447,149,038	1,849,064,687	3,270,099,990
2059	-	927	60	39,371	-	1,322,603,950	137,293	29,439,176,021	1,913,546,441	3,236,150,451
2060	-	292	19	36,293	-	1,226,981,252	137,293	30,467,173,438	1,980,366,273	3,207,347,544
2061	-	72	5	33,353	-	1,134,308,472	137,293	31,532,792,463	2,049,631,510	3,183,939,987
2062	-	10	1	30,551	-	1,044,723,244	137,293	32,634,786,175	2,121,261,101	3,165,984,346
2063	-	-	-	27,885	-	958,368,661	137,293	33,775,830,574	2,195,428,987	3,153,797,648
2064	-	-	-	25,355	-	875,386,493	137,293	34,957,253,123	2,272,221,453	3,147,607,946
2065	-	-	-	22,960	-	795,907,315	137,293	36,180,840,158	2,351,754,610	3,147,661,925
2066	-	-	-	20,697	-	720,051,601	137,293	37,448,200,020	2,434,133,001	3,154,184,602
2067	-	-	-	18,567	-	647,914,449	137,293	38,759,617,902	2,519,375,164	3,167,289,613
2068	-	-	-	16,567	-	579,594,793	137,293	40,117,363,265	2,607,628,612	3,187,223,405
2069	-	-	-	14,696	-	515,186,571	137,293	41,522,805,905	2,698,982,384	3,214,168,955
2070	-	-	-	12,953	-	454,764,879	137,293	42,977,773,250	2,793,555,261	3,248,320,140

**Summary of Projected Asset Depletion**

**Total Contribution Rate:** 13.00%  
**State Contribution Rate:** 6.50%  
**Projected Year of Fund Depletion:** 2038  
**Unfunded Accrued Liability at Depletion:** 42,775,936,032  
**Contribution at Depletion as a Percent of Payroll:** 527.51%

Fiscal Year	CURRENT PLAN						NEW PLAN				
	Number of Active Members	Payroll	State Contribution at 6.5%	Number of Retirees	From Trust Fund Annuity Payments	From General Fund Annuity Payments	Number of Active Members	Payroll	State Contribution at 6.5%	Total State Cost	
2071	-	-	-	11,337	-	398,405,200	137,293	44,483,956,230	2,891,457,155	3,289,862,355	
2072	-	-	-	9,846	-	346,168,198	137,293	46,043,175,944	2,992,806,436	3,338,974,634	
2073	-	-	-	8,479	-	298,114,250	137,293	47,656,984,084	3,097,703,965	3,395,818,215	
2074	-	-	-	7,236	-	254,283,997	137,293	49,327,094,606	3,206,261,149	3,460,545,146	
2075	-	-	-	6,115	-	214,660,273	137,293	51,055,133,711	3,318,583,691	3,533,243,964	
2076	-	-	-	5,112	-	179,200,582	137,293	52,843,450,508	3,434,824,283	3,614,024,865	
2077	-	-	-	4,224	-	147,815,398	137,293	54,694,534,089	3,555,144,716	3,702,960,114	
2078	-	-	-	3,447	-	120,357,823	137,293	56,610,313,556	3,679,670,381	3,800,028,204	
2079	-	-	-	2,775	-	96,653,198	137,293	58,593,047,146	3,808,548,064	3,905,201,262	
2080	-	-	-	2,202	-	76,481,488	137,293	60,644,421,418	3,941,887,392	4,018,368,880	
2081	-	-	-	1,721	-	59,572,638	137,293	62,767,363,403	4,079,878,621	4,139,451,259	
2082	-	-	-	1,323	-	45,625,440	137,293	64,964,511,282	4,222,693,233	4,268,318,673	
2083	-	-	-	999	-	34,321,108	137,293	67,238,448,050	4,370,499,123	4,404,820,231	
2084	-	-	-	740	-	25,332,734	137,293	69,591,957,115	4,523,477,212	4,548,809,946	
2085	-	-	-	538	-	18,326,512	137,293	72,027,439,603	4,681,783,574	4,700,110,086	
2086	-	-	-	383	-	12,977,336	137,293	74,548,127,653	4,845,628,297	4,858,605,633	
2087	-	-	-	266	-	8,985,385	137,293	77,157,011,942	5,015,205,776	5,024,191,161	
2088	-	-	-	181	-	6,077,313	137,293	79,857,309,986	5,190,725,149	5,196,802,462	
2089	-	-	-	120	-	4,011,119	137,293	82,652,240,463	5,372,395,630	5,376,406,749	
2090	-	-	-	78	-	2,581,669	137,293	85,544,988,835	5,560,424,274	5,563,005,943	
2091	-	-	-	49	-	1,618,848	137,293	88,538,984,883	5,755,034,017	5,756,652,865	



# Common Appendix I: INTERIM BENEFIT STUDY PARTICIPANTS

**Figure CA.1 – Insurance Forum Participants**

Insurance Forum Presentations	
Group or Topic	Persons Involved
Legislation Requiring the Interim Benefits Study	Porter Wilson, Chief of Staff representing Senator Robert Duncan, Chairman Senate Committee on State Affairs
The Road Ahead – Health Care Strategies in an Era of Reform	Craig Dolezal, South Region Health & Benefits Practice Leader, Aon Hewitt, Atlanta, Georgia
Managing Health Plan Costs - What the "Thought Leaders" are Thinking	Mark E. Chronister, Principal, Mercer Health & Benefits LLC
Strategies for Sustaining the Employees Retirement System of Texas Medical Plan	Peter J. Maillet , Area Vice President, Gallagher Benefit Services
The State of the Market and the Future of Health Care	Eric Bassett, Senior Partner and Thought Leader for Mercer Health & Benefits LLC
	Deborah Hujar, Senior Policy Analyst, LBB, Texas Performance Review

**Figure CA.2 – Retirement Forum Participants**

Retirement Forum Presentations	
Group or Topic	Persons Involved
Legislative View of the Interim Benefits Study	Merita Zoga, Committee Clerk, House Committee on Pensions, Investments and Financial Services Representing Committee Chair State Representative Vicki Truitt
LBB Recommendation to the 82 <sup>nd</sup> Texas Legislature on Maintaining Solvency of ERS	Jennifer Jones, Analyst, Legislative Budget Board
The Fadeout or the Future of the Defined Benefit Plan	Gary B. Lawson, J.D.,LL.M., Partner, Strasburger & Price LLP
Current Status, Issues & Trends Impacting Public Pension Plans	Keith Brainard, Research Director, National Association of State Retirement Administrators
Legislative Perspective and History	The Honorable Sherri Greenberg, Interim Director at the Center for Politics and Governance at the LBJ School, Former State Representative and Chair, House Committee on Pensions and Investments
Defined Contribution Plans in the Public Sector	Greg Seller, Senior Vice President Government Markets, Great-West Retirement Services, Founding member of National Association of Government Defined Contribution Administrators

**Figure CA.3 – Workforce Forum Participants**

Workforce Forum Presentations	
Group or Topic	Persons Involved
Recent State Auditor’s Office Reports Related to State Workforce Issues	John Keel, Texas State Auditor
Population Change in Texas: Implications for Education of the Labor Force and Economic Development	Steve Murdock, PhD., Founding Director of The Hobby Center for the Study of Texas
Pressures and Impacts of Changing Public Sector Benefits	Linda Kegerreis, Chief Workforce Officer for CPS HR Consulting

Workforce Forum Presentations	
Group or Topic	Persons Involved
<b>Panel Representing Higher Education Employers</b>	<p>Rey Garcia, Ph.D, President and CEO representing Texas Association of Community Colleges</p> <p>Jim Brunjes, Chief Financial Officer representing Texas Tech University System</p> <p>Katherine Justice, Executive Director of Human Resources representing University of Houston System</p>
<b>Panel Representing Employee Advocates</b>	<p>Sgt. Gary Chandler, President, and Senior Trooper Mark Proveaux, District 7/Capitol Headquarters, representing Texas Department of Public Safety Officers Association</p> <p>Andy Homer, Director of Public Relations for Texas Public Employee Association</p> <p>Mike Gross, Vice President representing Texas State Employees Union</p>
<b>Panel Representing State Agency Employers</b>	<p>George Ebart, Director of Human Resources for Texas Department of Transportation representing the State Agency Coordinating Committee (Large agencies)</p> <p>Brian White, Deputy Public Counsel/Chief of Staff for Office of Injured Employee Counsel representing Mid-Sized Agency Coordinating Council</p> <p>John Monk, Administrative Officer of Health Professions Council representing the Small State Agency Taskforce</p>

**Figure CA.4 – Stakeholder Meeting Participants**

Stakeholder Meetings	
Group or Topic	Persons Involved
Center for Public Policy Priorities	F. Scott McCown and Chandra Villanueva
Independent	Bill King – Founder and Former Chair of Texans for Public Pension Reform
Texas Conservative Coalition	John Colyandro and Tom Aldred
Texas Department of Aging and Disability Services	Chris Traylor-Commissioner, Tom Phillips-COO, and Gordon Taylor-CFO
Texas Department of Assistive and Rehabilitative Services	Debra Wanser-Commissioner, Alvin Miller-COO, Mary Wright-CFO, and Glenn Neal-Deputy Commissioner
Texas Department of Criminal Justice	Brad Livingston-Executive Director
Texas Department of Family and Protective Services	Howard Baldwin-Commissioner, Jennifer Sims-Deputy Commissioner, and Terri Ware-COO
Texas Department of Public Safety	Cheryl MacBride-Deputy Director, David Baker-Deputy Director, and Steve McCraw-Director
Texas Department of Transportation	Dee Porter- Chief Human Resources and Administrative Services Officer
Texas Health and Human Services Commission	Morris Arnold, HR Director
Texas Hospital Association.	Dan Stultz and Jack Hawkins
Texas Juvenile Justice Department	Cheryl Townsend-Executive Director
Texas Lottery Commission	Janine Mays, Director

Stakeholder Meetings	
Group or Topic	Persons Involved
Texas Medical Association	C. Bruce Malone, MD, Lou Goodman, PhD, Larry Stein, Lee Spangler, Darren Whitehurst, and Patricia Kolodzey
Texas Pension Review Board	Christopher Hanson, Executive Director and Emily Brandt, Research Specialist
Texas Pharmacy Association	Joe Da Silva, Sandra Nelson, Michael Wright, and Kim Roberson
Texas Public Policy Foundation	Talmadge Helfin and Arlene Wohlgelmoth

**Figure CA.5 – Solution Session Participants**

Solution Sessions	
Group or Topic	Persons Involved
Cerner	Doug Ervin, Grady Cusan, Robert Peeler, and Mike Heckman
Alere Wellbeing	Michele Rakoczy
National Teachers Associates Life Insurance Company	Ray Eliason and Jim Cothron
Aflac	Adam Bradshaw, Harold McKeever, and Kip Havel
Johnson & Johnson Ethicon	Richard Ponder, Frederic Pupprecht, Brady Berry, and Peter Hayes
ExtendHealth	Jon Andrews and Richard Wheeler
Humana	Tim Snyder, Laura Mansow, Tiffany Claderen, B. Walt, and C. Cude
Texas State Employees Union	Mike Gross
Alliance Work Partners	Rick Dielman, Ann Starr, and Barbara Wilson
MedeAnalytics	Dan West, Jim Maikranz
AON Hewitt	Brian Septon, Joe Grieco, Phil Peterson, Frank Easley, and John Adrian
AmWins	Donald Sheehan, Michael Hajdun, Bob Mitchell, and Philip Moroneso
Scott & White	Davidica Blum and Allan Einbodan
Part D Advisors	Pat Coleman, Eric Singer, Andrew Madonna, and Mike Tehan
Careington	Stuart Sweda and B. Williams
Texas Public Employees Association	Andy Homer, Ray Hymel, Gary Anderson, and Jan Thomas

**Figure CA.6 – Higher Education Employer Survey Participants**

Higher Education Employer Survey Respondents	
Group or Topic	Persons Involved
Angelina College	Dr. Larry Phillips
Angelo State University	Kurtis Neal
Blinn College	Karla Roper

Higher Education Employer Survey Respondents	
Group or Topic	Persons Involved
Central Texas College District	Holly Jordan
Clarendon College	Annette Ferguson
Del Mar College	Dr. Lee Sloan
Galveston College	Myles Shelton
Grayson College	Alan Scheibmeir
Houston Community College	Willie Williams Jr.
Kilgore College	William Holda
Lamar State College-Orange	Alicia Gray
Laredo Community College	Lee Spain
McLennan Community College	Lisa Wilhelmi
Northeast Texas Community College	Diana Hall
South Plains College	Anthony Riley
Southwest Texas Junior College	Anne H Tarski
Stephen F. Austin State University	Glenda F. Herrington
Sul Ross State University	Judy Perry
Temple College	Glenda O. Barron
Texarkana College	Jeffery D Teague
Texas State Technical College	Angela Ball
Texas State University	Michelle Moritz
Texas Tech University System	Martha Brown
Texas Woman's University	Lewis Benavides
Trinity Valley Community College	Jennifer Robertson
University of Houston Downtown	Betty Powell
University of Houston-Clear Lake	Michelle Dotter
Victoria College	Terri Kurtz
Wharton County Junior College	Judy J. Jones

**Figure CA.7 – Agency Employer Survey Participants**

State Agency Employer Online Survey Respondents	
Group or Topic	Persons Involved
Adjutant General's Department	Denice Wicks
Commission on State Emergency Communications	Brian Millington
Court of Appeals - 10th District	Tom Gray



**State Agency Employer Online Survey Respondents**

<b>Group or Topic</b>	<b>Persons Involved</b>
Court of Appeals - 14th District	Christopher Prine
Court of Appeals - 1st District	Sherry Radack
Court of Appeals - 2nd District	Debra Spisak
Court of Appeals - 3rd District	Jeffrey D. Kyle
Court of Appeals - 6th District	Josh Morriss
Court of Appeals - 8th	Ann Crawford McClure
Court of Criminal Appeals	Sharon Keller
Credit Union Department	Harold Feeny
Executive Council of Physical Therapy & Occupational Therapy Examiners	John Maline
Fire Fighters' Pension Commission	Sherri Walker
Health and Human Services Commission	Morris Arnold
Ninth Court of Appeals	Steve McKeithen
Office of Court Administration	Kate Oehlers
Office of Injured Employee Counsel	Erick Dunaway
Office of Public Insurance Counsel	Deeia Beck
Office of the Attorney General	John Poole
Office of the Fire Fighters' Pension Commissioner	Aslynn Rose
Railroad Commission of Texas	Mark Bogan
Securities Board	Carla James
State Commission on Judicial Conduct	John Brown
State Office of Administrative Hearings	Cathleen Parsley
State Office of Risk Management	Gail McAtee
Supreme Court of Texas	Jennifer Cafferty
Texas Animal Health Commission	Larissa Schmidt and Dr. Dee Ellis
Texas Board of Chiropractic Examiners	Yvette Yarbrough
Texas Board of Veterinary Medical Examiners	Nicole Oria
Texas Commission on Environmental Quality	Melissa Applegate
Texas Commission on Fire Protection	Don Wilson
Texas Commission on Jail Standards	Adan Munoz, Jr
Texas Commission on the Arts	Mary Lopez
Texas Comptroller of Public Accounts	Janet L. Bray
Texas Department of Agriculture	Cynthia Mendoza

State Agency Employer Online Survey Respondents	
Group or Topic	Persons Involved
Texas Department of Banking	Executive Team of the DOB
Texas Department of Housing and Community Affairs	Gina Esteves
Texas Department of Motor Vehicles	Sharon Brewer
Texas Department of Public Safety	(see stakeholder meeting)
Texas Education Agency	Harvester Pope
Texas Ethics Commission	David Reisman
Texas General Land Office	Terri Loeffler
Texas Historical Commission	Terry Colley
Texas Juvenile Justice Department	(see stakeholder meeting)
Texas Medical Board	Maria Moreno
Texas Parks and Wildlife Department	Al Bingham
Texas Pension Review Board	John Perryman
Texas School for the Blind & Visually Impaired	Charlotte Miller
Texas State Board of Examiners of Psychologists	Sherry Lee
Texas State Board of Pharmacy	Gay Dodson
Texas State Board of Plumbing Examiners	Lisa Hill
Texas Workforce Commission	Susanna Holt Cutrone

**Figure CA.8 – Benchmarking Survey Participants**

Benchmarking Survey Participants	
Group or Topic	Persons Involved
University of Texas at Austin	Claire Moore
State of Florida	Michael Talbot and Stephanie Leeds
City of Austin	Sheri Altes
City of Houston	Margaret Baptiste, Gerri Walker, and Jocelyn Wright
Travis County	Cindy Purinton
State of Pennsylvania	Christy Leo
State of Georgia	Pam Keene, Jean Giles, Trudie Nacin, and Peggy Woodruff
Texas A&M University	Ellen Gerescher
State of California	Elaine Smith
State of Ohio	James Knight, Harry Colson, and Brian Pack
State of Illinois	Pam Kogler
State of Michigan	Julie Creemers
State of North Carolina	Rita Jacobs Sandoval

## Common Appendix II: EMPLOYER SURVEY

### PARTICIPATION

All state employers were surveyed regarding the role of benefits in recruiting and retaining a qualified state workforce. There were different surveys for agency employers and higher education employers because higher education does not participate in the ERS retirement plans. Below are the responses from the participants.

### Agency Employers that Responded

66 of 120 AGENCIES RESPONDED TO THE SURVEY (55%)

**Figure CB.1 – Agency Survey Participant List**

Adjutant General's Department	Commission on State Emergency Communications	Texas Animal Health Commission	Texas Board of Chiropractic Examiners
Court of Appeals - 10th District	Court of Appeals - 14th District	Texas Board of Veterinary Medical Examiners	Texas Commission on Environmental Quality
Court of Appeals - 1st District	Court of Appeals - 2nd District	Texas Commission on Fire Protection	Texas Commission on Jail Standards
Court of Appeals - 3rd District	Court of Appeals - 6th District	Texas Commission on the Arts	Texas Comptroller of Public Accounts
Court of Appeals – 8th District	Court of Criminal Appeals	Texas Department of Agriculture	Texas Department of Banking
Credit Union Department	Department of Disability Services	Texas Department of Criminal Justice	Texas Department of Housing and Community Affairs
Department of Family Protective Services	Department of Rehabilitative Services	Texas Department of Motor Vehicles	Texas Department of Public Safety
Executive Council of Physical Therapy & Occupational Therapy Examiners	Fire Fighters' Pension Commission	Texas Department of Transportation	Texas Education Agency
Health and Human Services Commission	Lottery Commission	Texas Ethics Commission	Texas General Land Office
Ninth Court of Appeals	Office of Court Administration	Texas Historical Commission	Texas Juvenile Justice Department
Office of Injured Employee Counsel	Office of Public Insurance Counsel	Texas Medical Board	Texas Parks and Wildlife Department
Office of the Attorney General	Office of the Fire Fighters' Pension Commissioner	Texas Pension Review Board	Texas School for the Blind & Visually Impaired
Railroad Commission of Texas	Securities Board	Texas State Board of Examiners of Psychologists	Texas State Board of Pharmacy
State Commission on Judicial Conduct	State Office of Administrative Hearings	Texas State Board of Plumbing Examiners	Texas Workforce Commission
State Office of Risk Management	Supreme Court of Texas	<b>8 responses did not identify the agency</b>	

## Higher Education Employers that Responded

31 of 77 HIGHER EDUCATION INSTITUTIONS RESPONDED (40%)

**Figure CB.2 – Higher Education Survey Participant List**

Angelina College	Angelo State University
Blinn College	Central Texas College District
Clarendon College	Del Mar College
Galveston College	Grayson College
Houston Community College	Kilgore College
Lamar State College-Orange	Laredo Community College
McLennan Community College	Northeast Texas Community College

South Plains College	Southwest Texas Junior College
Stephen F. Austin State University	Sul Ross State University
Temple College	Texarkana College
Texas State Technical College	Texas State University
Texas Tech University System	Texas Woman's University
Trinity Valley Community College	University of Houston-Downtown
University of Houston-Clear Lake	Victoria College
Wharton County Junior College	<b>2 responses did not identify the institution</b>

## COMMON SURVEY QUESTIONS

The following questions were asked on both surveys.

<b>What role do state benefits play in recruiting and/or retaining qualified employees for your institution?</b>
<b>Agency Employer Responses</b>
<p><b>Common Feedback</b></p> <ul style="list-style-type: none"> <li>State benefits play a large role in recruiting and retaining qualified employees, particularly at the lower end of the salary ranges and for all employees with a spouse and/or children.</li> <li>State benefits are the major tool in attracting and retaining employees. Because there is a significant salary differential for many positions with similar private sector or even federal or local government positions, the benefit package is sometimes the only competitive advantage offered by state employment.</li> <li>Employees consistently advise that salary and benefits play a significant role in job satisfaction.</li> </ul>

<b>What role do state benefits play in recruiting and/or retaining qualified employees for your institution?</b>
<b>Agency Employer Responses</b>
<p><b>Agency Specific</b></p> <p><b>DPS</b> - Some local law enforcement entities allow their officers to retire at an earlier age and have higher pay--DPS is competing against these employers for commissioned officers. We currently have over 400 vacant commissioned positions. Turnover in the entry level of Schedule C is very high--over 30%. Diluting benefits will only make this turnover rate increase.</p> <p><b>Parks and Wildlife</b> - The state benefits package is absolutely critical to our ability to attract and retain highly qualified employees. Although Texas Parks and Wildlife Department's average salary is higher than the state average, comparable market-level salaries are typically 5-15% higher. So we rely heavily on the state's benefit package to boost our competitiveness, especially for professional level positions.</p>

**What role do state benefits play in recruiting and/or retaining qualified employees for your institution?**

**Higher Education Responses**

**Common Feedback**

- State benefits are critical in recruiting and retaining employees.
- State benefits are an offset to low state salaries.
- State paid benefits are very important to recruiting.
- State benefits are often stated as the decision point for accepting employment and reason for not leaving.

**Institution Specific**

**Lamar State College** – Orange - The importance of state benefits can be shown in the fact that only 3.8% of our employees have waived or opted out of the state health insurance.

**Texas State Technical College** - For retention, benefits are the single biggest factor that employees list as a reason they stay other than job satisfaction.

**What are your challenges in recruiting employees?**

(What are your issues with filling vacancies?)

**Agency Employer Responses**

**Common Feedback**

- Finding minority applicants with degrees and experience in the needed fields is difficult.
- Finding people with the right credentials at the salaries we offer is difficult. Sometimes benefits will fill the gap but often not for highly competitive positions where the salary differential is wide,
- We cannot offer help with moving expenses if needed in another geography.
- Applicants find higher pay at other agencies (same benefits), city or federal government for same type position.
- We cannot indicate when there might be a salary increase – many private sector positions have a starting salary and 6-month or first year bump after probation.

**What are your challenges in recruiting employees?**

(What are your issues with filling vacancies?)

**Agency Employer Responses**

**Specific Jobs or Agencies**

**Attorneys** - The main challenge in hiring attorneys is the level of compensation. According to national statistics published by the Bureau of Labor Statistics, attorneys in state government are paid less than other industry sectors, including local and federal government. In FY 2009, the annual mean wage for attorneys in state government was \$82,750 compared to \$91,040 for local government and \$127,550 for federal government. Currently, Texas courts of appeals have a rider that limits the pay of newly hired or promoted attorneys to \$79,750.

**Rural District Positions** – The main challenges with staffing or retaining rural positions are low salary combined with moving away from nuclear family support for things like child care and lack of employment for the spouse.

**HHSC** - The greatest challenge in effective recruiting is attracting qualified applicants with related work experience. Compensation and benefits pay a large part in effective recruiting.

**TCEQ** - Our recruitment challenges include attracting the skill sets necessary to fulfill the agency's mission, as well as our objective to attract and retain a workforce representative of the state's labor force in terms of ethnicity and gender. We find ourselves competing with other entities who are also seeking qualified minorities, especially Hispanic candidates, for technical and professional jobs. These organizations can often offer higher salaries.

<p><b>What are your challenges in recruiting employees?</b> (What are your issues with filling vacancies?)</p>
<p align="center"><b>Higher Education Responses</b></p>
<p><b>Common Feedback</b></p> <ul style="list-style-type: none"> <li>• The inability to offer a salary compensation that is competitive with private industry.</li> <li>• A lack of local credentialed personnel in applicant pool in rural areas – its very difficult to attract highly qualified specialty staff to areas far from a large city when pay is low, and pay is not competitive with larger neighboring colleges.</li> </ul>
<p><b>Specific Jobs or Institutions</b></p> <p><b>Angelina College</b> - Our challenge is hiring master's degree faculty at salaries that are \$5,000-\$8,000 below starting salaries for bachelor's degree teachers at the elementary and secondary levels in the metropolitan areas and asking hourly classified staff to start at hourly rates \$1.00-\$1.50 below comparable jobs in local industry and business. We are able to compete only because of the benefits.</p> <p><b>University of Houston Downtown</b> - State budget cuts have created some challenges in recruiting employees. There are fewer funds available for advertising, participating in job fairs, and training. Our major challenge is in the recruitment of faculty, where salaries are not at the level they should be to compete with larger more established universities. Our physical location also presents a challenge in recruiting qualified and experienced staff employees. UHD must compete with other major employers in the Downtown Houston area for the best employees.</p>

<p><b>What are your challenges in retaining employees?</b> (What are the factors contributing to your high turnover positions?)</p>
<p align="center"><b>Agency Employer Responses</b></p>
<p><b>Common Feedback</b></p> <ul style="list-style-type: none"> <li>• Low salary and the lack of regular cost of living salary increases are challenges.</li> <li>• The lack of pay for performance programs – even modest one-time merits.</li> <li>• Workload increases, especially after mandatory reductions in force.</li> <li>• Staff have limited career advancement opportunities.</li> <li>• Some agencies pay higher than others for same job positions, which causes internal agency job hopping to get more money.</li> <li>• The lack of money or time for training employees.</li> <li>• We are in competition with oil field wages. Private sector competition in certain positions.</li> </ul>

<p><b>What are your challenges in retaining employees?</b> (What are the factors contributing to your high turnover positions?)</p>
<p align="center"><b>Agency Employer Responses</b></p>
<p><b>Agency Specific</b></p> <p><b>Commission on State Emergency Communications</b> - Agency has a very low turnover rate. An improving Austin economy could change that quickly. Wages and the low public appreciation/perceptions given to state employees are the main challenges.</p> <p><b>Court of Appeals – 8th District</b> - Surprisingly, the greatest challenge is work ethic among young attorneys. Generally speaking, state employees work 40-hour weeks. The case load of this court has increased due to the creation of new lower courts and docket equalization. We are a three-judge court, meaning that there is only one panel unless recusal issues arise. Our attorneys do not have the luxury of off-panel months, and this court has traditionally granted oral argument upon request. To meet our legislatively imposed performance measures, our attorneys often work many more hours per week as well as some weekends and holidays. They are exempt employees and do not receive overtime pay. We offer comp time, of course, but many begin to feel that if they are going to be working as many hours as those in the private sector, they might as well receive the salary benefits that the private sector can offer.</p> <p><b>Credit Union</b> - We have the highest turnover in the financial examiner positions. Generally, they leave for higher pay or because of the extensive travel.</p> <p><b>DPS</b> - Low salaries. Better pay with similar or better benefits at other employers. Many of our employees have to work second jobs to make ends meet. This can often affect performance on the primary job. Many of our Driver License employees make about \$5,000 per year less than McDonald's first line supervisors.</p> <p><b>Department of Banking</b> - Historically, employees choose to leave employment with the agency for two main reasons: higher compensation and reduced travel. Due to the nature of the profession (financial institution examiners), it is very difficult for the agency to reduce the level of travel. Compensation and other benefits, like flexible work schedules, are offered to help compensate for the stress of travel. To the extent that benefit packages are reduced, retaining employees will become increasingly more difficult.</p> <p><b>Parks and Wildlife</b> - In the past, employees perceived that state employment offered greater long-term security than private sector employment.</p>

**What are your challenges in retaining employees?**  
(What are the factors contributing to your high turnover positions?)

**Agency Employer Responses**

Recent state agency budget reductions and funding shortages, coupled with rising out-of-pocket expenses for health coverage and potential changes to the retirement plan, may cause many to re-think their options. This is especially true for employees in lower salaried/hourly positions or those with highly marketable skills.

**Texas Workforce Commission** - The Consumer Price Index has increased 11.4% since 2007, but state budget constraints have led to fewer merit or promotion increases. As reported in December 2011 by the SAO, state agencies awarded 55.3% fewer merits in 2011 than they did in 2007. Added to this (or from the employee's point view, deducted) were increases to the employee costs for retirement and insurance coverage. This has produced a situation where employees see it is easier to increase their salary by changing jobs (within the agency, with other agencies, or in the private sector) than to progress in their current one.

**What are your challenges in retaining employees?**  
(What are the factors contributing to your high turnover positions?)

**Higher Education Responses**

**Common Feedback**

- Turnover is mostly due to salary.
- Reduction in benefits is moving away from benefits being a motivator to stay.
- One edge is the State continues benefits in retirement.
- Salary increases have not only been behind the public sector bur also below the CPI.
- The high costs for dependent premiums.

**Specific Job or Institution**

**Stephen F. Austin University** - Our challenges include a lack of promotional opportunities, low salaries, and to some extent our geographic location.

**When talking with potential hires, are there specific benefits they ask about or that are offered by the competition that the State does not offer?**

**Agency Employer Responses**

**Aggregate of all agency feedback**

- Optical Plan
- Benefits for elderly parents as dependents
- Better dental choices – too expensive
- Help with moving expenses
- Signing bonuses
- After Probation Salary increase
- High level positions expect some amount of starting vacation time reflecting their level of position
- Flexible working environments –remote working
- Matching 401K – this is offset by current retirement offering
- Increasing interest in coverage for preventive treatments
- Transportation benefits - bus, rail reimbursements, or free passes
- Employee wellness facilities —a gym facility, running track, showers, etc. or assistance with joining a facility
- Lasik surgery coverage
- Worksite day care
- Lower copays
- Tuition reimbursement

**When talking with potential hires, are there specific benefits they ask about or that are offered by the competition that the State does not offer?**

**Higher Education Responses**

**Aggregate of all institution feedback**

- Work/life balance options
- Supplemental insurance
- Bonuses
- Vision plan
- Day care allowance
- Better dental coverage – lots of complaints – same with vision
- Option to purchase additional life insurance on spouse and children
- Want ability to tailor plans so they don't pay for what they don't need
- Free tuition at any state institution (realize this is beyond ERS)
- Relocation expenses
- Employer subsidized day care
- PTO – paid time off
- Remove 3 month wait

**Is the 90-DAY wait for benefits a deterrent to your ability to attract employees?**

**Agency Employer Responses**

**Common Feedback**

- Responses were mixed – problem at some agencies but not others.
- COBRA is expensive – suggestions were to reduce the wait to 30 days and/or to allow use of the pre-tax flexible spending account to help offset the high expense.
- Persons with pre-existing conditions deterred from accepting employment.

**Agency Specific**

**DPS** - We have 50 or more recruits going through recruit school without health insurance. These employees are working and living in close quarters in extremely challenging conditions and, although their injuries are considered workers compensation, they would not be covered for other health issues and their families are of major concern. Asking these men and women who are currently covered by insurance to go without coverage or pay COBRA prices results in losing good candidates.

**TDCJ** – We want a wait period to continue for protection of the employer against recruits only applying to get the insurance then immediately go on sick leave.

**Is the 90-DAY wait for benefits a deterrent to your ability to attract employees?**

**Higher Education Responses**

**Common Feedback**

- Responses range from definitely detrimental to disappointing but it doesn't change decision for employment.
- Mainly detrimental on non-local recruitment – especially if coming from private business that do not have a wait.

**What impact would changes to the current health insurance program have on your workforce?**

Consider the following: A – higher premiums or out-of-pocket costs for same coverage. B – changing to a high deductible/health savings account style plan. C – offering a lower base level of state-provided benefits with member-paid options for additional insurance choices.

**Agency Employer Responses**

**Common Feedback**

- Of the options, employers feel their staff want to pay less for a lower base level of state provided benefits with member options for additional insurance choices.

**What impact would changes to the current health insurance program have on your workforce?**

Consider the following: A – higher premiums or out-of-pocket costs for same coverage. B – changing to a high deductible/health savings account style plan. C – offering a lower base level of state-provided benefits with member-paid options for additional insurance choices.

**Agency Employer Responses**

- To the extent employees' share of insurance costs must go up, the structure should also be adjusted so everyone shares in those increases fairly and those who want more benefits, pay more, e.g. employees would like a plan where you could choose co-pay levels versus premium levels--in other words, the flexibility to choose the plan that works best for the employee and the employee only pays for what is needed.
- Fear is if the State moves to a lower level of benefits and the market place moves back up with its benefits, the state workforce will be left with only those applicants that cannot get jobs in the private sector.
- Implementation of any of the listed factors would create hardships for those employees making smaller salaries. Without any additional compensation in their salaries they could not afford the increases. Many do not carry family insurance and are not seeking medical attention they need due to the cost of current insurance.
- Cost shifting changes are essentially pay cuts – particularly bad since no merits or raises in years.
- Higher cost changes will cause a rush to retire.

**What impact would changes to the current health insurance program have on your workforce?**

Consider the following: A – higher premiums or out-of-pocket costs for same coverage. B – changing to a high deductible/health savings account style plan. C – offering a lower base level of state-provided benefits with member-paid options for additional insurance choices.

**Higher Education Responses**

**Common Feedback**

- Any of the options would cripple the community colleges which are already underfunded – especially harmful to the rural areas.
- These options would create a financial hardship for the majority of the employees impacting lower paid employees the most.
- It would be more difficult to retain employees – colleges would lose critical staff.



**What impact would changes to the current health insurance program have on your workforce?**

Consider the following: A – higher premiums or out-of-pocket costs for same coverage. B – changing to a high deductible/health savings account style plan. C – offering a lower base level of state-provided benefits with member-paid options for additional insurance choices.

**Higher Education Responses**

- Instead of incentivizing wellness - would foster more illness since staff would not go to the doctor when needed due to higher cost of deductibles or dropping insurance coverage altogether.

**Job or Institution Specific:**

**Central Texas College District** - Employees would complain about any change to benefits, and, if the change is a reduction in benefits, it would decrease morale. Reduced health benefits would create a financial hardship for the majority of our employees. Some employees might even terminate and apply for Medicaid. Other employees might drop coverage and hope they didn't get sick/ill. Higher premiums/out of pocket costs with the same coverage will impact the lower paid employees more. For example, many of our facilities employees make \$8.30/hour. This is \$1,400 gross per month. Right now the employee and family health premium takes up almost 1/2 of their take home pay. I have concerns about the high-deductible or HSA. Concern is if the plan would cover employees 65 years and older and would depend heavily on how high the deductibles are. Providing lower base level coverage all depends on how reduced the benefit share.

**Any other ideas or issues that you would like documented as part of the study?**

**Agency Employer Responses**

**Aggregate of Agency Suggestions**

- Provide an Optical Plan option.
- Allow the TexFlex account balance to roll over for the next plan year rather than taking a loss.
- Offer options of better health and dental coverage with more carriers from which to choose.
- State contributes to cost of retirement and insurance products that the individual purchases on their own, and owns themselves, not dependent on state employment.
- Give individuals the option to get the products they want based on their needs.
- Need to focus on providing some level of secure benefits and not continuous flux. If we lose the element of security and things within state employment, like benefits, start bouncing around

**Any other ideas or issues that you would like documented as part of the study?**

**Agency Employer Responses**

annually like the private sector, then we lose a significant non-tangible benefit. Thus, a commitment to a base level of benefits is more important than fluctuating benefits, even if they are going up in value, if there is some assurance of not going down, or if they do go down in a tough economy, they will be restored when the economy picks back up before other increases in spending are considered.

- Consider a larger contribution by employees, but maintain benefits.
- Employee benefits are the sole real factor differentiating us from employers in the private sector. Without them, or with lesser benefits or more costs to employees, that sole advantage is eliminated or minimized. Bad can only result.
- Our return-to-work retiree program works very well and benefits everyone involved. It is much more fair and cost-effective to the State than paying full salaries, it gives us the benefit of experienced employees, and our employees are very happy with it and appreciative of it.
- If these changes were made to the state employee benefits package during "good times," you would see a much higher than average turnover throughout the workforce. If these changes are made right now, there would not be a significant change to the turnover rate; but once economic conditions changed for the better; there would be a significant increase in employee turnover. I saw this in the later 2000s. The potential qualified employee pool also shrinks, resulting in hiring average vs. good to excellent employees. You get what you pay for.
- The State of Texas has always had the reputation of being a prestigious employer and one served their job with pride. Anyone who held a state job was considered lucky because the State rewarded their employees with much deserved benefits. These benefits were in lieu of loftier salaries that could be obtained in the public sector. A person that takes a state job does it out of service; a dedication to the greater good. Today there is substantial discontent and poor morale because benefits have continued to be slashed and taken away. The state worker feels devalued. Pride has been replaced by anger and resentment. Being told

**Any other ideas or issues that you would like documented as part of the study?**

**Agency Employer Responses**

to be grateful to have a job does not endear an employee to his job. Something needs to be done to make the State the prideful place to work again. The way we are going is not working.

- The job itself, pay, benefits, promotion opportunities, supervision, and coworkers are all important to an individual's overall job satisfaction.
- Consider converting to a PTO system. Under the present system, employees not nearing retirement have an incentive to abuse sick leave.
- For years state employees have countered lower pay in comparison to the private sector with stable, valuable benefits (retirement and insurance). If these benefits were diminished, there would be very little motivation to work for the State, as many employees could make significantly more money in the private sector.
- ERS has a difficult task before it, and SOAH appreciates the thoughtful approach ERS is taking with this study, and the opportunity to provide input. SOAH's employees want a stable, strong, and actuarially sound employee retirement system, and no one disputes that the issues ERS is currently facing will have to be addressed. At the risk of being repetitive, it is important to say again that while the agency's employees understand that state salaries are lower than those in the private sector, the bargain they have made in exchange is that the State will provide good health care insurance and a stable retirement plan. Changes to the retirement and health plans that hit employees directly in the already-stretched-thin pocketbook are going to be difficult, especially if salary increases are not on the horizon to help them recoup increased health care costs and/or costs or losses resulting from a market-based retirement plan.
- Develop a long term, employee oriented pay and benefit system that is outside of the normal legislative activities.
- Legislative action that restricts agency mission makes it hard to manage budget and accomplish goals.
- If retirement eligibility rules change, including the inability to use sick leave and vacation leave accruals towards the retirement eligibility, current employees would need to be grandfathered because having so many employees trying to use

**Any other ideas or issues that you would like documented as part of the study?**

**Agency Employer Responses**

up their hours would be detrimental to our agency.

- Any reduction to longevity and vacation/sick leave monthly accruals would negatively impact both current employees and our ability to recruit quality applicants without other flexibility or incentives that could attract employees.
- State employment benefits may be the biggest selling point for recruitment and retention. Reducing those benefits should be weighed very carefully.
- Wages and all state benefits should be viewed not only as expenses but also as investments for the State. Offering the best benefits can help reduce turnover. Staffing levels also impact the equation. FTE caps mean in many instances that state employees are actually required to do far more than is widely known or contemplated.
- A qualified and stable state workforce is needed to meet demands for quality service delivery to a growing state population. The State's value proposition as an employer is its benefit and pension plan.
- There seems to be a misperception coming through the media that the State's benefit programs are overly generous and unduly expensive to the State. The pension program has been managed conservatively. We have no automatic cost of living increases, we don't allow spiking, there have not been contribution holidays, and investment policy has been conservative yet diversified. It doesn't seem fair to lump the State's benefit programs in with other retirement programs that are not managed as well. State employees have invested their lives in state service with the expectation that these benefits will be available to support them at retirement.
- Do not reduce or eliminate state benefits. They are vital to our recruiting and retention programs due to low state salaries.
- To help minimize the impact of benefit changes on agencies' ability to recruit and hire talent, consideration should be given to leaving the employee-only benefits as intact as possible. This is the benefit all employees receive, so it should be maintained as high as possible. While family benefits are important features of the State's total compensation package, care should be taken to make sure to these additional benefit costs are fair

**Any other ideas or issues that you would like documented as part of the study?**

**Agency Employer Responses**

and reduced as far as is reasonable before cutting the employee-only benefits. For example, consider having tiered insurance premiums based on the number of family members covered and not covering spouses of employees who have access to other health insurance.

- Bringing HMO health like options into the Austin area service coverage would be an improvement.
- For potential benefit design change options, we prefer options that would have the minimum impact on our ability to attract new hires or retain current employees.
- I believe that ERS' implementation of Roth 401(k)s and 457s was an excellent addition to the benefits program and another resource to recruit qualified employees.
- Despite the lack of pay raises and the difficulties that that causes, the high quality of state benefits in the past has allowed most state agencies to continue to hire qualified and competent staff. As those benefits continue to erode, we believe that the likelihood of being able to secure that type of new employee in the future will diminish accordingly.
- Some of these ideas may be feasible for new hires or even those not yet tenured. However, many of the benefits offered by the State make it possible to get some of the best of the best for employees. Knowledge, experience, and loyalty are the tradeoff.
- In an improving economy it will become much more difficult for state agencies to hold onto employees without being able to offer benefits beyond salary. The theory of reshaping state benefits to be comparable with private industry will necessitate restructuring salary and bonuses to be similarly comparable to the private industry. Given the current fiscal environment, this is anticipated to be difficult, at best.
- It is flat out unfair to change the retirement rules on folks who have already worked for the State for several years. If they must be changed prospectively, that will hurt hiring, but at least it is fair. I know that it is easier to hire right now, but the economy is improving. Once we are past this bump in the road people will leave for better jobs with better pay and benefits in the private sector.

**Any other ideas or issues that you would like documented as part of the study?**

**Agency Employer Responses**

- I would be interested in the impact of a demoralized workforce on productivity. I believe we already expect a tremendous amount of commitment from staff - to further reduce benefits is frightening.
- Use-it-or-lose-it annual time. Prevent abuse of sick leave that by awarding comp time for employees who do not use any sick leave in a calendar year. This encourages employees to use their vacation time, instead of sick time.
- Texas state government does not pay competitive salaries for professional staff. Cutting benefits will only make recruitment more difficult. The State should be doing what it can to recruit the best and the brightest into public service because the need is great and getting more acute with the turbulent financial times ahead of Texas. Cutting retirement and/or health benefits will not only negatively impact the quality of the state work force it will also have a negative impact on the State's economy as a whole.
- The business of the government must be competitive with the private sector, not just in its ability to recruit and retain employees, but also to ensure that its employees have the skills and resources necessary to participate in a global workforce. Regulatory agencies must have employees who have access to the same technology, training, and tools that the private sector they regulate does. Agencies that provide services to the public must have employees who have access to the same training, technology, and tools that allow the private sector service industry to work smarter and to reach the individuals they serve. Agencies that provide services to other agencies must have access to the same training, technology, and tools that allow private sector business to business providers to offer innovative and effective solutions. Reductions that eliminate access to training and to current professional resources make it extremely difficult for staff to stay abreast of changes and innovations in their fields. Changes in benefits to classes of employees who have made career decisions based on current benefit promises will gut an aging workforce and when coupled with low salaries and few training dollars, government will not have a skilled workforce capable of providing services or

**Any other ideas or issues that you would like documented as part of the study?**

**Agency Employer Responses**

regulating industries. If the state decides to change its benefits, changes will have to address the salary disparities among the public and private sector. One-time merit payments are a good idea, if there is money to fund them.

**Any other ideas or issues that you would like documented as part of the study?**

**Higher Education Responses**

**Aggregate of all institution feedback**

- There are fewer and fewer physicians and dentists in network in rural areas.
- Discrimination against community colleges is apparent in the latest funding provided for benefits by the last Legislature.
- Give consideration to adding a vision plan, improving disability coverage, and reducing waiting periods.
- DHMO providers are lacking – expand providers or do away with the plan.
- Minimize the negative impact caused by reduction in state funding.
- Continuing cuts in community college funding places an ever-increasing burden on taxpayers and students that cannot be sustained.
- Get rid of the 90-day wait.
- If we have to cut somewhere – charging retirees based on years of service is perceived to be equitable.
- Need to significantly expand the UnitedHealthcare network in West Texas to avoid cost increases for out of network coverage.
- Consider offering agencies incentives or rebates for lower claims and/or expenditures. There is no incentive for employers to develop programs to help people change lifestyle or engage in wellness programs.
- Community colleges need to be able to offer the same salaries and benefits as 4 year institutions – more students are having to attend community college due to lack of skills or enter and/or stay in 4 year institutions.

**RETIREMENT BENEFIT QUESTIONS FOR AGENCY EMPLOYEES**

The following questions were only on the agency employer survey because higher education does not participate in the main ERS Retirement Plan.

**What impact would changes to the current pension program have on your workforce?**

Consider the following: A – changing to a 401(k) style plan. B – offering a hybrid 401(k) and defined benefit option. C – delaying retirement eligibility. D – lowering existing benefits.

**Agency Employer Responses**

**Common Feedback**

- Of all options, moving away from a defined benefit plan is identified as the most detrimental
- Will increase loss of much needed skilled resources in areas where private sector competes
- Will promote rush to retire which negatively impacts the plan
- Will reduce ability to recruit
- Devastating to morale
- Most of workforce not educated in how to invest a DC plan resulting in inadequate funds to retire further taxing state services to support a higher level of aging poverty

**How would your agency be affected if you were not able to hire return to work retirees?**

**Agency Employer Responses**

**Common Feedback**

- Most agencies only hire return-to-work retirees for jobs needing expertise that requires a lot of experience or training
- Sometimes only option to get institutional knowledge
- Provides a way to deal with resource shortages for critical staffing
- In many cases, use as a cost savings since they hire back at a lower salary

**Agency Specific**

**Court of Criminal Appeals** - We hire return-to-work retirees at 65% of their old salary, after giving them a one-time 25% bonus. We modeled our procedure on the legislative retirement-incentive program from a few years ago. If we were not allowed to hire back

**How would your agency be affected if you were not able to hire return to work retirees?**

**Agency Employer Responses**

retirees, we would have less-experienced staff. Also, with our plan, the Court saves 35% of the salary expense for as long as that employee stays. Our plan benefits the Court and the retiree, and it saves money for the State.

**Office of Administrative Hearings** - A number of employees in both the ALJ and staff ranks have many years of experience with SOAH and a thorough knowledge of the agency's mission and its operations. If we were barred from bringing them back in appropriate circumstances, we would be unable to take advantage of irreplaceable institutional knowledge and experience, as well as invaluable knowledge of administrative law.

**DPS** - DPS rehires retired officers in hardship locations and will expand it to other locations to address critical shortfalls in staffing. This will help to fill commissioned vacancies. Additionally, strategic positions have benefitted from hiring employees for non-commissioned positions. Having this option is still beneficial to the agency. DPS is trying to be prudent about rehires and not abuse the privilege.

**A number of agencies – typically smaller ones** – indicated they do not hire return-to-work retirees and there would be no impact.

**How would your workforce react if annual and sick leave were no longer counted towards retirement eligibility?**

**Agency Employer Responses**

**Common Opinion – Multiple Agencies**

- Significant impact if not grandfathered
- Would result in staff 'burning' sick leave causing resource shortages and difficulty providing some services.
- No incentive to work more than 40 hours or skeleton crew days, reducing ability to meet service needs.
- Some positions have had mandated layoffs or are staffed below FTE caps due to budget or lack of available resources, which results in remaining staff having to work instead of take vacation to meet needs. The only reason they agree is that their vacation and sick time will be retained to count towards retirement – if this is taken away, staff will not forgo vacation to provide critical services which increases the FTE count required to meet needs.



## Common Appendix III: THE STATE WORKFORCE

### Key Findings

The Texas workforce as a whole is challenged by skill shortages for critical occupations. The challenge to the public sector workforce, and to the State, is even higher. Robust benefit packages have the potential of at least partially counteracting the effect of low wages and encouraging highly educated employees to seek and retain work in the public sector. Wages and benefits are not only expenses, but investments for the State — investments that can help reduce turnover and ensure the State has the skilled workforce it needs to provide the essential services so many Texans rely on.

Policymakers will need to address the competing interests and philosophies for how best to provide retirement plans and health care benefits for employees and retirees that are in line with employer and employee resources. Whether the State maintains or modifies its current benefit structures, a broad-based perspective will ensure that sustainable, competitive benefits are provided at a reasonable cost for all concerned — without compromising the quality of the state workforce.

### Ensuring a Qualified Workforce

The state public sector is a significant percentage of the overall job market in Texas and instrumental in ensuring the safety and care of our citizens. It's these 151,779 Texans working for publicly funded organizations — 15% of the state's total workforce<sup>1</sup> — who deliver varied and integral services, as authorized and funded by the Texas Legislature, which Texas citizens rely on. As the State Legislature evaluates the role of pensions and level of health care offered to our state workers, the weight these benefits carry in ensuring a qualified workforce should be considered.

Over the next decade, the State faces a number of challenges that are common throughout public sector (federal, state, and local) organizations. The economic downturn has resulted in budget cuts and reduced staffing levels at a time when the demand, especially for health, public safety, and correctional services, is increasing. Higher-level professional and specialized occupations require skilled, educated, and well-trained workers, but lower wage structures are likely to make it increasingly difficult for the public sector to recruit and retain these workers.<sup>2</sup>

According to national research, all public workers earn less than the private sector, and state employee salary levels are about 10% below market. In Texas, the State Auditor's Office\* (SAO) found that most general state employees within benchmark positions had wages well below those of comparable jobs in the overall labor market. Almost one-fifth — 17,342 — are paid salaries that are more than 20% behind market rates.<sup>3</sup>

Overall, the highest-paid public sector workers earn 12% less than their private sector counterparts, while the lowest paid workers make 3.4% more.<sup>4</sup> This pay discrepancy is explained by the number of professional positions the state workforce requires. State government positions often require specific expertise and more training than those in the private sector. The two workforces also have inherent differences, making direct comparisons difficult. For example, manufacturing and sales account for a large part of private industry work and typically require a lower skill set. These same jobs are rare in the State, where professional and administrative support occupations (including teachers) account for two-thirds of the state and local government workforce, compared with one-half of private industry.<sup>5</sup>

#### State employees:

- Build and maintain highways
- Collect tax revenue
- Guard prisoners
- Patrol the highways
- Protect vulnerable children and adults
- Regulate environmental resources to ensure clean air, water and responsible waste
- Support the health and safety of children
- Care for the deaf, visually impaired, mentally handicapped

**Benchmark Positions:  
Comparison of Salary  
Ranges with Average  
Market Pay**

The State Classification Team conducted market analysis to determine the “going rate” for positions in the market. This analysis used benchmarks, which are jobs in the private and public sector that strongly match corresponding state jobs in terms of duties, scope, and responsibility. For the referenced report, the State Classification Team compared the midpoints of state salary ranges for job classifications with the average market pay for corresponding benchmark or comparable positions to determine whether salary ranges for state positions were competitive with the market. In analyzing the competitiveness of salary ranges, a job classification series’ salary range was generally considered competitive if within 10% of the market average.

The State Auditor’s 2010 market analysis shows that almost 40% of state jobs do not have a close equivalent in the rest of the job market. It’s because of lower wages and the State’s inability to offer the compensation and retention tools comparable to the private sector — bonuses, stock options, expense accounts — that the public sector relies heavily on competitive benefit packages to attract and retain its workforce.

This appendix focuses on general state agencies whose employees receive retirement benefits managed through the Employees Retirement System of Texas (ERS) — and does not include employees in higher education. The State also has directed the ERS to study group benefit programs in an interim legislative study. The goal here, however, is to provide insight into employers’ ability to hire and retain valued workers.

\*Information from the SAO is based on the FY2011 reports, which are periodically reissued based on current information.

**Understanding the State Workforce**

The State Auditor analyzes the workforce by considering full time equivalent (FTE) positions. Different from headcount, an FTE is any combination of employees whose hours total 40 per week. For example, two employees who each work 20-hours per week equal one FTE.

More than half of the state’s FTE positions are in higher education while the remaining are in 116 general state agencies. About 70% of state agency employees work for health and human services or public safety and criminal justice agencies — agencies supporting countless citizens throughout our state. It’s these employees who

provide health care and immunizations to those living in poverty, help children and seniors escape abuse and neglect, give those with disabilities and developmental delays opportunities for independence, preserve our natural resources to ensure clean air and water, and protect our safety on the roads, in the wake of a natural disaster, and from criminal activity at every level. While demands on these agencies increase, state agency employment dropped by 0.9%, or -1,441.9 FTEs, between FY2010 (September 1, 2009 – August 31, 2010) and FY2011.<sup>6</sup>

*Different from headcount, an FTE is any combination of employees whose hours total 40 per week. For example, two employees who each work 20-hours per week equal one FTE.*



**Figure CC.1 - Distribution of State FTEs – FY2011**

General Appropriation Act Article	Number of FTEs	Percentage of Total State Govt. Workforce	Percentage of State Agency Workforce
Higher Education	159,746	51.30%	N/A
Health and Human Services	55,685	17.90%	36.70%
Public Safety and Criminal Justice	52,393	16.80%	34.50%
Business and Economic Development	15,960	5.10%	10.50%
General Government	9,460	3.00%	6.20%
Natural Resources	8,388	2.70%	5.50%
Regulatory	3,466	1.10%	2.30%
Public Education	2,404	0.80%	1.60%
Legislature	2,332	0.70%	1.50%
The Judiciary	1,691	0.50%	1.10%
<b>Total – Institutions of Higher Education</b>	<b>159,746</b>	<b>51.3%</b>	<b>N/A</b>
<b>Total – General State Agencies</b>	<b>151,779</b>	<b>48.7%</b>	<b>100%</b>
<b>Grand Total</b>	<b>311,525</b>	<b>100%</b>	<b>N/A</b>

Source: State Auditor's Office of Texas

Note: Numbers and percentages do not add up exactly due to rounding errors.

## Lagging State Wages

Policymakers in Texas had the foresight to designate a legislative agency to advise the State Legislature on compensation issues. The Classification Team, located within the SAO, is responsible for maintaining the State's compensation and classification system, analyzing state workforce issues, and providing information on employee compensation issues to the Legislature.

Because of the economic downturn, increased attention has been focused on public sector costs, including wages and their levels relative to the private sector. Most recent studies on wage levels agree that in a head-to-head comparison between like positions, public sector wages are lower, especially when education, demographics, and other factors are the same. The Center for Retirement Research found that public sector wages nationally are 9.5% lower than the private sector.<sup>7</sup> While the National Institute on Retirement Security (NIRS) found public sector wages in Texas to be 15% lower than those for similar workers doing similar work in the private sector.<sup>8</sup>

In its FY2011 workforce study, the State Auditor found that more than two-thirds of state employees made less than \$40,000 per year, while less than one-fifth made more than \$50,000.<sup>9</sup>

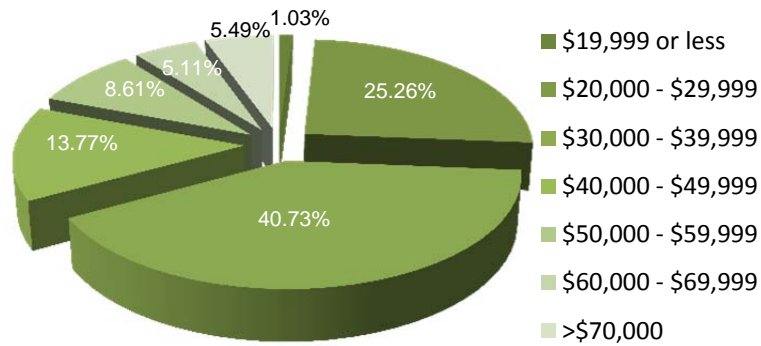
**Balancing Act: Public Sector Wages Consistently Lower at the National Level**  
Economists and compensation specialists generally use private sector comparisons to judge whether public sector wages are at the right level. Excessive pay in the public sector may overburden taxpayers, while lower pay makes it difficult, if not impossible, to attract workers of the quality needed to provide the services demanded by citizens. In the last 20 years, earnings for state and local employees nationally have, in general, declined relative to comparable private sector employees.<sup>1</sup>

### Catching Up: The Cost of Wage Alignment

In a separate study, the SAO compared the salaries and benefits of classified law enforcement officers with those of seven large local law enforcement agencies in Texas. State-level peace officers are licensed by the Texas Commission on Law Enforcement Officers Standards and Education and are employed by the Department of Public Safety; the Parks and Wildlife Department; the Alcoholic Beverage Commission; and the Department of Criminal Justice. The SAO found that it would cost \$27.7 million in additional state funds to align the wages of 4,420 underpaid peace officers with the market mid-range pay of these local law enforcement agencies.

Unfortunately, these pay differentials could get worse, especially in light of the economic downturn. According to a national survey by the International Public Management Association for Human Resources, 91% of state governments report suspensions of pay increases and 73% report suspensions of pay-structure adjustments. Although Texas-specific data is not available in this survey, it's likely that Texas, along with other states, will find it increasingly difficult to compete successfully with other public and private sector organizations for skilled workers. To that point, the state employers survey indicated that the main recruiting challenge state agencies face is low salary.<sup>1</sup>

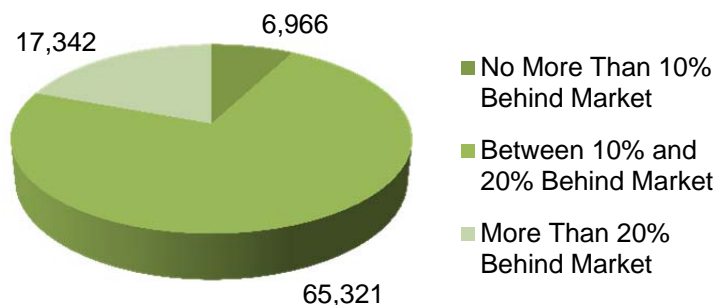
**Figure CC.2 - Salary Distribution for Full-time Classified Employees – FY2011**



Source: State Auditor's Office of Texas, includes employees in Salary Schedules A and B.<sup>10</sup>

The SAO also evaluated general state agency compensation against other government organizations and the private sector. The 2010 market analysis identified 421 state classification titles out of 856 that could be compared to similar positions in the private sector or other public organizations. (However, as mentioned earlier, the private sector includes certain work that is not part of state employment, such as manufacturing and sales.) Of full-time classified employees, 60.2% worked in these 421 titles, called “benchmark positions,” each of which corresponds to a salary group that provides the minimum, midpoint, and maximum salary rates.<sup>11</sup>

**Figure CC.3 - Number and Percentage of State Employees Paid Below Market Rates Average of First and Second Quarters – FY2010**



Source: State Auditor's Office of Texas (2010)

## Decreasing State Employment

Across the U.S., state governments are reducing the size of their workforce through layoffs, furloughs and early retirement incentives. Other personnel decisions also affect the size of state government, including hiring freezes, pay freezes, and pay cuts.<sup>12</sup> The 82<sup>nd</sup> Texas Legislature (2011) reduced the State's budget by 8.1% for the 2012-2013 biennium,<sup>13</sup> which will support fewer workers and could impact the State's ability to deliver services.

*The state agency workforce is already lean, having grown by only 2% over the past decade, even as Texas' population grew ten times*

The state agency workforce is already lean, having grown by only 2% over the past decade, even as Texas' population grew ten times

faster.<sup>14</sup> Between 2011 and 2012, the headcount of full-time employees dropped from 152,657 to 147,600 (number of actual employees, which is a higher number than FTE positions).<sup>15</sup>

**Figure CC.4 - Full-Time Staffing Levels for State Agencies by Occupational Category: FY2012 Compared to FY2011**

Occupational Category	Average Headcount 2011	Average Headcount 2012	Change from 2011 to 2012	% Change
Accounting, Auditing, and Finance	5,630.50	5,465.00	-165.50	-2.94%
Administrative Support	17,306.50	16,548.50	-758.00	-4.38%
Criminal Justice	34,496.75	33,050.00	-1,446.75	-4.19%
Custodial	3,932.25	3,850.50	-81.75	-2.08%
Education	147.00	122.00	-25.00	-17.01%
Employment	923.75	907.50	-16.25	-1.76%
Engineering and Design	7,934.25	7,747.00	-187.25	-2.36%
Human Resources	1,382.25	1,331.00	-51.25	-3.71%
Information Technology	4,643.00	4,430.50	-212.50	-4.58%
Inspectors and Investigators	2,968.50	2,880.00	-88.50	-2.98%
Insurance	1,099.25	1,049.00	-50.25	-4.57%
Land Surveying, Appraising, and Utilities	267.75	259.50	-8.25	-3.08%
Law Enforcement	4,513.50	4,405.00	-108.50	-2.40%
Legal	3,065.50	2,993.00	-72.50	-2.37%
Library and Records	201.75	185.50	-16.25	-8.05%
Maintenance	3,532.25	3,769.00	236.75	6.70%
Medical and Health	6,281.50	6,141.00	-140.50	-2.24%
Natural Resources	2,748.00	2,343.50	-404.50	-14.72%
Office Services	201.00	154.50	-46.50	-23.13%
Planning, Research, and Statistics	540.50	529.00	-11.50	-2.13%
Procedures and Information	723.00	695.00	-28.00	-3.87%
Program Management	13,609.75	12,473.00	-1,136.75	-8.35%
Property Management and Purchasing	2,154.75	2,134.00	-20.75	-0.96%
Public Safety	1,138.00	1,169.00	31.00	2.72%
Safety	252.50	250.50	-2.00	-0.79%
Social Services	32,963.75	32,717.50	-246.25	-0.75%
<b>TOTAL EMPLOYEES</b>	<b>152,657.50</b>	<b>147,600.00</b>	<b>-5,057.50</b>	<b>-3.31%</b>

Source: State Auditor's Office of Texas

## Recognizing the Positive and Negative Impact of Turnover

When employees leave, or positions turn over, the implications can be costly. The department loses training, in terms of dollars and time, and often invaluable institutional knowledge walks out the door. Both losses can negatively impact the agency's productivity. The overall and voluntary turnover rates as well as voluntary separations were on the rise in FY2011.

The State Auditor cited several possible reasons for this increase in turnover rates. Exit surveys pointed to a perceived lack of employment stability due to budget cuts, and the key reason for voluntary separations and turnover, aside from retirement, was better pay and benefits. For example, in the Texas Department of Criminal Justice (TDCJ), correctional officer positions are turning over the fastest. Most vacancies are within 10-12 of the more than 100 units, and these officers are leaving for higher paying oil field work — salaries the State cannot offer. In addition, there were a reduced number of salary actions for state employees — with 7,161 fewer merits and 4,142 fewer one-time merit increases in FY2011 compared to FY2010.<sup>16</sup> Turnover rates rise when merits and pay increases aren't offered for several years. According to the employer survey, this is true for parole officers, who particularly tend to have high turnover during this time. With vacancies reaching the 2,000 mark for this position, it's becoming difficult to provide needed services.<sup>17</sup>

**Figure CC.5 - Voluntary Employee Separations for FY2010 and FY2011**

Separation Type	FY2010	FY2011	Percent Change
Retirement	3,696	4,411	19.3%
Voluntary Separation from Agency	12,535	13,909	11.0%
Total Voluntary Separations	16,231	18,320	12.9%

Source: State Auditor's Office of Texas using data from Uniform Statewide Payroll/Personnel System, Human Resources Information System, and Standardized Payroll/Personnel Reporting System.

The state workforce is older than that of the private sector (median age of 44.0 compared to 40.3), and its median tenure level is higher (7.1 years compared to 4.5 years). The average tenure is six years with an agency and 10 years with the State.

State employees between 40 and 49 years of age were the largest group, at 27.8% of the state's workforce, but only represented 16.5% of the state's turnover. In contrast, the turnover rate was highest (32.5%) among employees who were under 30 years of age; this group comprised only 15.7% of state employees, but represented 30.2% of the state's turnover.<sup>18</sup>

**Figure CC.6 - Turnover by Age Group for FY2011**

Age Group	Average Headcount	Percentage of Headcount	Separations	Percentage of Separations	Turnover Rate
16 to 29	24,183.00	15.7%	7,868	30.2%	32.5%
30 to 39	33,144.25	21.4%	5,315	20.5%	16.0%
40 to 49	42,895.75	27.8%	4,282	16.5%	10.0%
50 to 59	39,785.75	25.8%	5,194	20.0%	13.1%
60 to 69	13,512.50	8.7%	3,100	11.9%	22.9%
70 or older	965.00	0.6%	269	1.0%	27.9%
<b>Totals</b>	<b>154,486.50</b>	<b>100.0%</b>	<b>26,028</b>	<b>100.0%</b>	<b>16.8%</b>

Source: State Auditor's Office of Texas using data from Uniform Statewide Payroll/Personnel System, Human Resources Information System, and Standardized Payroll/Personnel Reporting System.

Many state jobs with high turnover rates have high education and training requirements, making those positions hard to fill and retain under the best circumstances. This is especially true in Texas, where there is competition for skilled workers in an overall market that is experiencing skill shortages in such occupations as public safety, health care, law enforcement, and other professional and technical positions.<sup>19</sup> Such circumstances, according to the state employer survey, put a strain on the affected agencies and could reduce their ability over time to deliver consistent, effective services to citizens.<sup>20</sup>

**Figure CC.7 - Hard-to-fill Positions in the Public Sector**

Job Class Title	Average Headcount	Terminations	Turnover Rate
Correctional Officer I	677.25	405	60%
Correctional Officer II	1862.75	1055	57%
Mental Retardation Assistant I	5436.25	2809	52%
Licensed Vocational Nurse III	462	179	39%
Psychiatric Nursing Assistant I	1860.25	717	39%
Juvenile Correctional Officer IV	1104	398	36%
Human Services Specialist I	400.5	142	36%
Child Protective Services Specialist II	2531.75	862	34%
Correctional Officer III	7487.25	2541	34%
Licensed Vocational Nurse II	786	251	32%
Human Services Specialist II	1376.5	422	31%
Food Service Worker I	659	198	30%
Mental Retardation Assistant II	1421.75	418	29%
Nurse II	793.5	211	27%
Nurse III	1019	251	25%
Clerk III	2405.25	515	21%
Mental Retardation Assistant III	704.75	149	21%
Custodian I	608	128	21%
Child Protective Services Specialist III	1231.75	257	21%
Food Service Manager II	445	93	21%
Clerk II	2147.75	426	20%
Psychiatric Nursing Assistant II	570	111	20%

Source: State Auditor's Office of Texas Workforce data for FY2011, considering positions with more than 400 staff statewide and a turnover rate of more than 20%.

According to the SAO, if skill-shortage trends continue, the State should expect significant competition in recruiting and retaining employees. Competition will be especially difficult in the following State jobs, which are already experiencing turnover rates that exceed 20%.<sup>21</sup>

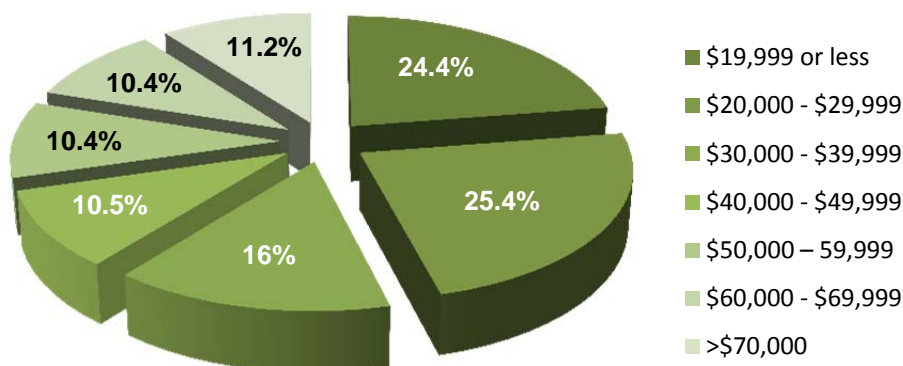
**Figure CC.8 - Selected State Jobs with High Turnover for FY2011**

Job Titles	Average Headcount FY2011	Overall Turnover Rate Including Retirement.	Percentage of Headcount
Mental Retardation Assistant	7,884.0	42.2%	5.1%
Juvenile Correctional Officer	1,887.75	39.6%	1.2%
Licensed Vocational Nurse	1,253.25	33.5%	0.8%
Psychiatric Nursing Assistant	3,075.75	28.9%	2.0%
Child Protective Services Specialist	5,309.75	23.5%	3.4%
Trooper Trainee/Probationary Trooper	240.25	23.3%	0.2%
Correctional Officer	27,296.5	22.3%	17.7%

Source: State Auditor's Office of Texas using data from Uniform Statewide Payroll/Personnel System, Human Resources Information System, and Standardized Payroll/Personnel Reporting System.

Employees paid less than \$30,000 annually left state employment at a much higher rate than those earning above this level.<sup>22</sup>

**Figure CC.9 - Turnover Rates among State Employee by Salary Breakdown for FY2011**



Source: State Auditor's Office of Texas using data from Uniform Statewide Payroll/Personnel System, Human Resources Information System, and Standardized Payroll/Personnel Reporting System.

The cost to an organization for each position that is turned over has been estimated at anywhere from 100-300% of the departing employee's annual salary. The estimate varies depending on the type of position being filled and the departing employee's performance level.<sup>23</sup> The general guideline for turnover cost is one-third of an employee's salary, with the potential of increased costs related to orienting and training new employees. This is particularly true for jobs that require new hires to undergo extensive training, such as peace officers and public safety personnel. For example, according to the Department of Public Safety, it costs \$30,186 to train each new recruit, and this is in addition to the officer's salary. If that officer leaves after several months, the State loses that investment when the officer walks out the door. What makes the issue more difficult is that many of the hard-to-fill jobs described earlier are in higher demand during economic downturns.<sup>24</sup>

Turnover can have both positive and negative effects on an organization. For example, it can replace low-performing employees with high-performing ones. There can also be a financial benefit as a result of the difference between the salary paid to an experienced employee who leaves an agency with the lower salary paid to a new employee. However, when agencies lose highly skilled, experienced employees, turnover may negatively affect their business operations — productivity could be lowered while key positions are vacant and new employees are trained.<sup>25</sup>

Some agencies are able to hire return-to-work (RTW) retirees at a reduced salary. Without this option, these agencies would lose the institutional knowledge and training these candidates bring (back) to the table. According to employer survey feedback, the RTW program gives employers access to an experienced candidate pool at a competitive salary rate, especially in times of critical staffing shortfalls. The feedback also indicated that it would be counterproductive in providing quality services to prevent an agency from hiring the most qualified candidate simply because they had previously retired from the State.<sup>26</sup> The RTW program offers a cost-effective alternative to training a new candidate, fills the gap for critical staffing, and saves the State some salary expense. In addition, employers continue to contribute to the retirement fund of RTW employees. Therefore, the RTW program exists without any negative impact to the fund.

### **Acknowledging the Value of Retirement Benefits**

The U.S. employee benefit system is a shared responsibility among businesses, individuals and the government. Employee benefits are a competitive incentive used by businesses and public sector organizations to attract and retain qualified employees. Benefits also increase an employee's economic security and improve morale. Certain benefits, including Social Security, unemployment insurance, workers' compensation, and family and medical leave, are mandatory for certain types and size employers. General categories of benefits include retirement; health insurance; vacation, sick, and holiday pay; longevity pay; life and disability insurance; and education, among others.<sup>27</sup>

Employer-sponsored retirement plans are just one tool for attracting and retaining the most qualified employees to meet the goals and business needs of an organization. These plans provide individual financial security through pensions, individual retirement accounts, disability benefits, and/or tax-free death benefits. Such plans are protected and regulated by state and federal law, managed as trust funds, and overseen by boards of trustees.<sup>28</sup>

For large private companies (500-plus employees), 76% of the workforce participates in retirement programs — 43% in defined benefit (DB) and 60% in defined contribution (DC) plans. In the public sector, 88% of the workforce participates in retirement plans — 82% in DB and 17% in DC plans. These numbers compare participation rates; however, when comparing access to retirement programs versus participation in the public sector, only about half of those with access to a DC plan participate.<sup>29</sup> Texas, as with most states, provides their employees with DB pension plans with lifetime payments to eligible retirees based on salary, years of service, and a funding formula. Texas also offers an optional DC plan.

According to state employers surveyed, retirement benefits play a significant role in recruiting and retaining the workforce needed to provide state government services. Employees and potential employees view such benefits as an incentive, while also helping ensure retirement security. Any changes to the retirement benefits are expected to increase the turnover rate, and many employers mentioned that grandfathering long-serving employees would reduce the risk of losing a trained workforce.<sup>30</sup> With several plan structures, their impact on the workforce varies and appeals to different employers and employees depending on the goals of each.

If the employer’s workforce is highly mobile, a plan design that quickly gives employees a right to their benefits and allows them to take the benefits with them when they change employers will be attractive to such workers. Rapid vesting and broad portability are key advantages of the DC plan. While this design may attract workers, it’s less likely to retain them.

If the employer wants to encourage long-term service to retain a workforce that has the unique skills and experience required to provide goods and services, then a better retirement plan design would reward long-term service. This is the key advantage of the DB plan. This design provides an incentive for longer-term service, which can both reduce turnover rates and increase the return-on-investment of employer training costs, especially those associated with new employees.

The American Academy of Actuaries has found that for employees, the most beneficial plan largely depends on age and the projected length of service with the State. Changing to a DC or hybrid plan

would be most beneficial for younger employees with shorter state employment who leave before retirement eligibility. This change would be least beneficial for employees at mid-career with approximately 15 years of service.<sup>31</sup>

Texas taxpayers get a highly efficient workforce for significantly less cost than most other employers.

### Offsetting Lower Wages

Total compensation (or total rewards) describes the complete reward and recognition package that an employee receives. Use of the total compensation package allows employers to leverage multiple factors to

attract, motivate, and retain employees. This package includes an employee’s base salary, benefits, and other rewards — the largest component, by far, being salary. While enhanced retirement and health benefits cost more relative to wages for state-local workers than for those in the private sector, they are not high enough to offset lower overall wages. With research showing that state-level salaries are, on average, 15-20% lower than wages paid in comparable private sector jobs in Texas, the SAO found that state health and retirement benefits are not disproportionately more expensive. This means total compensation costs for state employees are, on average, lower than what other employers pay. Texas taxpayers get a highly efficient workforce for significantly less cost than most other employers.<sup>32</sup>

The SAO identified the value of an average, classified regular FTE’s total compensation package in FY2011.<sup>33</sup>

**Figure CC.10 - Total Compensation Components and Percentages in FY2011**

Component	Includes	Percentage of Total Compensation	Percentage of Total State Budget
Base Salary	Compensation	67.7%	7.03%
Paid time off	Holidays, sick leave, and annual leave	10.4%	1.08%
Health Insurance		10.4%	1.08%
Employer payroll expenses	Social Security and Medicare taxes, unemployment compensation, and worker’s compensation	5.7%	0.59%
Retirement Contributions		4.1%	0.43%
Longevity Pay		1.7%	0.18%
<b>Total</b>		<b>100%</b>	<b>10.39%</b>

Source: State Auditor’s Office of Texas (FY2011).

The State offers other benefits excluded from the SAO assessment of the compensation package and the above figures, such as: state compensatory time; military leave; emergency leave; parent-teacher conference leave; volunteer firefighters and emergency medical services training leave; court-appointed special advocates volunteer leave; and extended sick leave. Some agencies also are able to budget for state-paid or -sponsored professional development and training, but many agencies no longer have the budget for it.



Since the slight public-sector advantage in benefit percentages does not counterbalance much lower wages paid to state workers in Texas, as described earlier, it's important that policymakers avoid reducing public sector benefits in isolation of wage considerations.<sup>34</sup> Any reduction in benefits is viewed by state employers as a direct pay cut, according to employer survey feedback. Should public sector benefits deteriorate without wage increases, hard-to-fill positions will likely remain vacant longer, or remain unfilled, creating a risk for citizens requiring the services authorized by the Texas Legislature. Survey feedback also indicates that more state workers would likely move to higher-paying positions in other governmental entities or the private sector, increasing turnover costs, and lowering the quality of services the State can deliver.<sup>35</sup>

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<sup>1</sup> Governing, *Census: Government's Share of Workforce Varied Greatly Among States*, by Mike Maciag, September 29, 2011. <http://www.governing.com/gov-data/2010-census-acs-data-public-government-employee-workforce.html> using Census data from the 2010 American Community Survey

<sup>2</sup> The PublicManager.org, *Future Compensation of the State and Local Workforce*, by Joshua M. Franzelm, Summer 2009. <http://www.slge.org/vertical/Sites/%7BA260E1DF-5AEE-459D-84C4-876EFE1E4032%7D/uploads/%7B2861CCEA-7045-4C8D-86F0-1C5323204D17%7D.PDF>

<sup>3</sup> State Auditor's Office, *The State's Position Classification Plan: A Biennial Report*, August 2010, Report No. 10-708, pp. 1 – 4. <http://www.sao.state.tx.us/reports/main/10-708.pdf>

<sup>4</sup> Center for Economic and Policy Research, *The Wage Penalty for State and Local Government Employees*, John Schmitt, May 2010, pp. 1-9. [www.cepr.net/index.php/publications/reports/wage-penalty-state-local-gov-employees/](http://www.cepr.net/index.php/publications/reports/wage-penalty-state-local-gov-employees/)

<sup>5</sup> Bureau of Labor Statistics, *Employer Costs for Employee Compensation*, March 2010, [www.bls.gov/news.release/ecec.htm](http://www.bls.gov/news.release/ecec.htm)

<sup>6</sup> State Auditor's Office, *Full-Time Equivalent State Employees for Fiscal Year 2011*, Report No. 12-702, January 2012, p. 9: <http://www.sao.state.tx.us/reports/main/12-702.pdf>

<sup>7</sup> Center for Retirement Research at Boston College, *Comparing Compensation: State-Local Versus Private Sector Workers*, by Alicia H. Munnell, Jean-Pierre Aubry, Josh Jurwitz, and Laura Quinby, September 2011. [http://crr.bc.edu/briefs/comparing\\_compensation\\_state-local\\_versus\\_private\\_sector\\_workers.html](http://crr.bc.edu/briefs/comparing_compensation_state-local_versus_private_sector_workers.html)

<sup>8</sup> See #3

<sup>9</sup> State Auditor's Office Website: [http://www.hr.sao.state.tx.us/apps/eclass/\(S\(l1uelejftivwnn55robivu45\)\)/default.aspx](http://www.hr.sao.state.tx.us/apps/eclass/(S(l1uelejftivwnn55robivu45))/default.aspx)

<sup>10</sup> Salary Schedule A includes paraprofessional, administrative support, maintenance, service, and technical positions, and Salary Schedule B includes mainly professional and managerial positions

<sup>11</sup> See #3

<sup>12</sup> Kaiser Family Foundation, "Staying on Top of Health Reform: An Early look at Workforce Challenges in Five States," September 2010, page 9. <http://www.kff.org/healthreform/upload/8106.pdf>

<sup>13</sup> Legislative Budget Board, *Summary of Conference Committee Report for House Bill 1, 2012-13 Biennial Recommendations*, Recommendations by Method of Financing, All Funds. [http://www.lbb.state.tx.us/Bill\\_82/1\\_Recommend/MOF%20Tables.pdf](http://www.lbb.state.tx.us/Bill_82/1_Recommend/MOF%20Tables.pdf)

<sup>14</sup> Texas Public Employees Association, ERS Solution Session Presentation, January 25, 2012

<sup>15</sup> See #9

<sup>16</sup> State Auditor's Office, *Classified Employee Turnover for Fiscal Year 2011*, December 2010, Report No. 12-701, pp. 1-3. <http://www.sao.state.tx.us/reports/main/12-701.pdf>

<sup>17</sup> Employees Retirement System of Texas, *Employer Survey, Common Appendix B*, May 2012. Note: ERS surveyed employees in 2008 and most recently employers with feedback documented in this Appendix.

<sup>18</sup> State Auditor's Office, *Classified Employee Turnover for Fiscal Year 2011*, December 2010, Report No. 12-701, p. 7. <http://www.sao.state.tx.us/reports/main/12-701.pdf>

<sup>19</sup> Texas Workforce Investment Council, *Texas Index*, September 2010, pp. 10-11. <http://www.window.state.tx.us/specialrpt/workforce/demo.php>

<sup>20</sup> See #18

<sup>21</sup> See #17

<sup>22</sup> IBID

<sup>23</sup> IBID

<sup>24</sup> See #2

<sup>25</sup> Inventive Talent Consulting Society for Human Resource Management webcast, *Measuring and Mitigating the Cost of Employee Turnover*, July 2012. [http://www.shrm.org/multimedia/webcasts/Documents/12ruyle\\_2.pdf](http://www.shrm.org/multimedia/webcasts/Documents/12ruyle_2.pdf)

<sup>26</sup> See #18

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<sup>27</sup> United States Government Accounting Office, *State and Local Government Pension Plans: Current Structure and Funded Status*, Statement of Barbara D. Bovbjerg, Director Education, Workforce, and Income Security, Testimony Before the Joint Economic Committee, July 10, 2008. <http://www.gao.gov/new.items/d08983t.pdf>

<sup>28</sup> IBID

<sup>29</sup> U.S. Department of Labor, Bureau of Labor Statistics, *National Compensation Survey: Employee Benefits in the United States*, March 2011, Bulletin 2771, September 2011. <http://www.bls.gov/ebs/benefits/2011/ebb10048.pdf>

<sup>30</sup> See #27

<sup>31</sup> American Academy of Actuaries, *A Balancing Act: Achieving Adequacy and Sustainability in Retirement Income Reform*, "What are the Trade-Offs – Defined Benefit vs. Defined Contribution Systems," by Ron Gebhardtbauer, FSA, MAAA, Senior Pension Fellow, Presentation in Brussels, Belgium, March 4, 2004. [http://www.actuary.org/pdf/pension/tradeoffs\\_030404.pdf](http://www.actuary.org/pdf/pension/tradeoffs_030404.pdf)

<sup>32</sup> State Auditor's Office, *State Employee Benefits as a Percentage of Total Compensation*, February 2011, Report No. 11-704. <http://www.sao.state.tx.us/reports/main/11-704.pdf>

<sup>33</sup> State Auditor's Office, *State Employee Benefits as a Percentage of Total Compensation*, February 2012, Report No. 12-705. <http://www.sao.state.tx.us/reports/main/12-705.pdf>

<sup>34</sup> See #8

<sup>35</sup> See #27

# Study on the State of Texas Retirement Program Report to the 82nd Texas Legislature

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