

October 14, 2008

# Actuarial Valuation Report

December 31, 2007

Oregon Public Employees Retirement System

***Tier 1/Tier 2 and OPSRP Pension Benefits  
RHIA/RHIPA Retiree Medical Benefits***

## MERCER



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## Executive Summary

Mercer has prepared this report for the **Oregon Public Employees Retirement System** to:

- Present system-wide results of the valuation of the Oregon Public Employees Retirement System, including pension benefits provided through Tier 1/Tier 2 and the Oregon Public Service Retirement Plan (OPSRP), and retiree medical benefits provided through the Retiree Health Insurance Account (RHIA) and the Retiree Health Insurance Premium Account (RHIPA), as of December 31, 2007,
- Provide information on system-wide employer contribution rates and employer contribution rates for each rate pool that will become effective July 1, 2009 through June 30, 2011,
- Provide the funded status as of December 31, 2007, and
- Provide reporting information for financial statements, government agencies and other interested parties, pursuant to GASB requirements.

This valuation does not cover the Individual Account Program (IAP).

## Employer Contribution Rates

This report develops the average employer contribution rates that will become effective on July 1, 2009. The December 31, 2005, valuation developed the employer contribution rates that are in effect through June 30, 2009.

Employer pension contribution rates consist of a normal cost rate and an amortization of the Unfunded Accrued Liability (UAL). Normal cost rates are calculated and charged separately to the Tier 1/Tier 2, OPSRP general service and OPSRP police and fire payrolls. UAL rates are calculated separately for Tier 1/Tier 2 and OPSRP, but each UAL rate is charged across all payrolls. Rates for individual employers are adjusted if the employer maintains a side account or has a pre-SLGRP liability or surplus. The table below compares the average employer contribution rates for each type of payroll calculated for this valuation and effective July 1, 2009 compared to the rates in effect from July 1, 2007 through June 30, 2009.

### Pension Contribution Rates

Payroll	Effective July 1, 2009			Effective July 1, 2007		
	Tier 1/Tier 2	OPSRP		Tier 1/Tier 2	OPSRP	
		General Service	OPSRP Police & Fire		General Service	OPSRP Police & Fire
Normal Cost Rate	6.08%	5.81%	8.52%	4.17%	5.82%	9.09%
Tier 1/Tier 2 UAL Rate	6.07%	6.07%	6.07%	10.23%	10.23%	10.23%
OPSRP UAL Rate	(0.08%)	(0.08%)	(0.08%)	0.00%	0.00%	0.00%
<b>Total Pension Rate</b>	<b>12.07%</b>	<b>11.80%</b>	<b>14.51%</b>	<b>14.40%</b>	<b>16.05%</b>	<b>19.32%</b>
Average Adjustment	(7.69%)	(7.69%)	(7.69%)	(7.03%)	(7.03%)	(7.03%)
<b>Net Pension Rate</b>	<b>4.38%</b>	<b>4.11%</b>	<b>6.82%</b>	<b>7.37%</b>	<b>9.02%</b>	<b>12.29%</b>

Investment returns for 2006 and 2007 were significantly greater than the assumed rate, causing UAL rates to decline. However, this decline is offset somewhat by rising Tier 1/Tier 2 normal cost rates as members under Money Match (with no normal cost) continue to retire and Tier 1/Tier 2 active members age.

## Executive Summary

### Employer Contribution Rates *(continued)*

The Tier 1/Tier 2 pension contribution rates differ for each rate pool and each independent employer. This report calculates the specific rates for each rate pool. Specific rates for independent employers are calculated in separate reports for each independent employer. Changes in pension contribution rates for each rate pool are confined to a collar depending on funded status. The table below shows the employer pension contribution rates that will become effective July 1, 2009 for each Tier 1/Tier 2 rate pool and the average adjustment to that rate for Side Accounts and Pre-SLGRP Liabilities. Please note that for the purposes of this exhibit as well as most other exhibits in this system-wide report, Independent Employers (including State Judiciary) are treated as a single rate pool.

#### Tier 1/Tier 2 Pension Contribution Rates

	Effective July 1, 2009		
	SLGRP	School Districts	Independent Employers
Normal Cost Rate	6.31%	5.19%	7.92%
Tier 1/Tier 2 UAL Rate	4.84%	8.82%	2.57%
<b>Total Pension Rate</b>	<b>11.15%</b>	<b>14.01%</b>	<b>10.49%</b>
Average Adjustment	(7.09%)	(10.51%)	(1.14%)
<b>Net Pension Rate</b>	<b>4.06%</b>	<b>3.50%</b>	<b>9.35%</b>

In addition to the pension contribution rates, employers also contribute to the Retirement Health Insurance Account (RHIA) and State Agencies and State Judiciary contribute to the Retiree Health Insurance Premium Account (RHIPA). Only Tier 1 and Tier 2 members are eligible for these benefits, so the normal cost rates are only charged to Tier 1/Tier 2 payroll, but the UAL rates are charged to all payrolls. The table below compares the employer contribution rates for each type of payroll that will become effective July 1, 2009 compared to the rates in effect from July 1, 2007 through June 30, 2009.

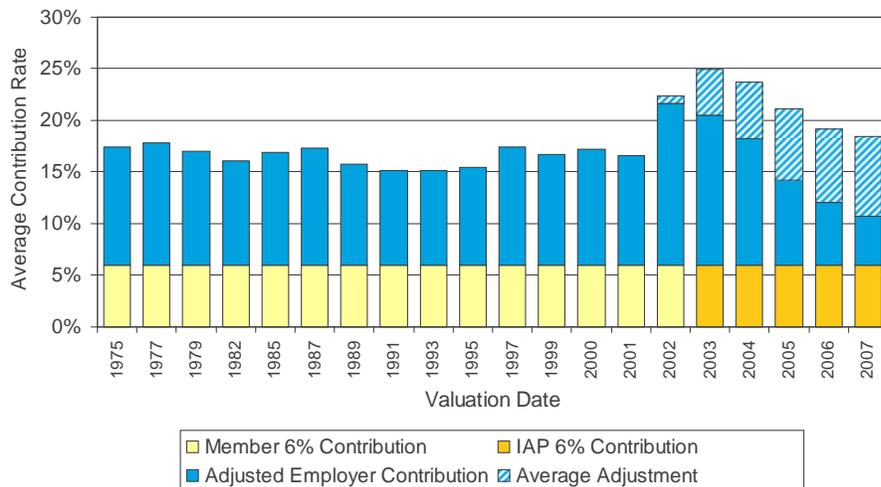
#### Retiree Healthcare Contribution Rates

Payroll	Effective July 1, 2009			Effective July 1, 2007		
	Tier 1/Tier 2	OPSRP General Service	OPSRP Police & Fire	Tier 1/Tier 2	OPSRP General Service	OPSRP Police & Fire
RHIA normal cost rate	0.10%	0.00%	0.00%	0.11%	0.00%	0.00%
RHIA UAL Rate	0.19%	0.19%	0.19%	0.26%	0.26%	0.26%
<b>Total RHIA rate</b>	<b>0.29%</b>	<b>0.19%</b>	<b>0.19%</b>	<b>0.37%</b>	<b>0.26%</b>	<b>0.26%</b>
RHIPA Normal Cost Rate	0.06%	0.00%	0.00%	0.07%	0.00%	0.00%
RHIPA UAL Rate	0.02%	0.02%	0.02%	0.03%	0.03%	0.03%
<b>Total RHIPA rate</b>	<b>0.08%</b>	<b>0.02%</b>	<b>0.02%</b>	<b>0.10%</b>	<b>0.03%</b>	<b>0.03%</b>

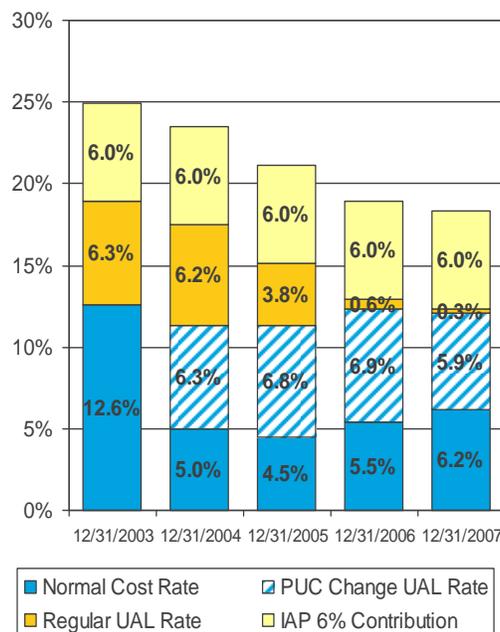
Combined pension and retiree healthcare employer contribution rates are still higher than their historical average, but as the graph below shows, rates as of the valuation date have improved significantly during the last three years.

# Executive Summary

## Employer Contribution Rates *(continued)*



As shown below, the average normal cost rate has declined dramatically since the 2003 valuation, primarily due to the change in the cost method. The new cost method reflects the frozen nature of the Money Match formula. As more active members move from Money Match benefits to Full Formula benefits, we expect the normal cost rate to increase. However, since the Tier 1/Tier 2 benefit structure is closed to new entrants, the increasing normal cost rate will apply to a declining population.



The Unfunded Accrued Liability (UAL) increased with the change in cost method, and this increase is being amortized over a rolling three-year period. The resulting increase in the UAL rate nearly offsets the decrease in the normal cost rate. As the normal cost rate increases in the next few years, the portion of the UAL rate due to the change in cost method is expected to decline such that the combined rate remains relatively

## Executive Summary

### Employer Contribution Rates *(continued)*

stable. The UAL attributable to gains and losses other than the cost method change has decreased significantly, and is the primary source of the reduction in contribution rates.

For an individual employer, the rates shown above are adjusted for Side Accounts. Side Accounts are the result of employer supplemental deposits (usually financed through a pension obligation bond). When a supplemental deposit is made, a side account is established (after any transition liabilities for joining the SLGRP have been paid) and used to offset the otherwise required contribution. As of December 31, 2007, the system has approximately \$7.7 billion in Side Accounts, an increase of about \$0.4 billion in the last year. Side Accounts now reduce the average employer contribution rate by about 7.20% of payroll, but there is wide variation between employers. Some employers are now unable to receive full credit for their Side Accounts as they have little or no contribution required for pension benefits. However, there is still a contribution required for retiree medical benefits.

For individual employers in the SLGRP, the rates shown above are also adjusted for amortization payments on pre-SLGRP liabilities. The average adjustment to individual employer rates due to Side Accounts and Pre-SLGRP liabilities is shown on a combined basis in the table on page 1.

The minimum and maximum rates that can be effective July 1, 2011 for each rate pool (prior to adjustments) are shown in the table below. The limits are calculated and applied on an individual employer basis for Independent Employers, but for purposes of the table below, all Independent Employers (including State Judiciary) are treated as a single rate pool. The contribution rates for individual employers are adjusted from the rates of the pool to reflect Side Accounts and pre-SLGRP liabilities. These adjustments are not limited by the rate collar.

#### Limits on Future Pension Contribution Rates

	Effective July 1, 2011		
	SLGRP	School Districts	Independent Employers
<b>Between 80% and 120% Funded</b>			
Minimum Rate	8.15%	11.01%	7.49%
Maximum Rate	14.15%	17.01%	13.49%
<b>Less than 80% or Greater than 120% Funded</b>			
Minimum Rate	5.15%	8.01%	4.49%
Maximum Rate	17.15%	20.01%	16.49%

# Executive Summary

## Funded Status

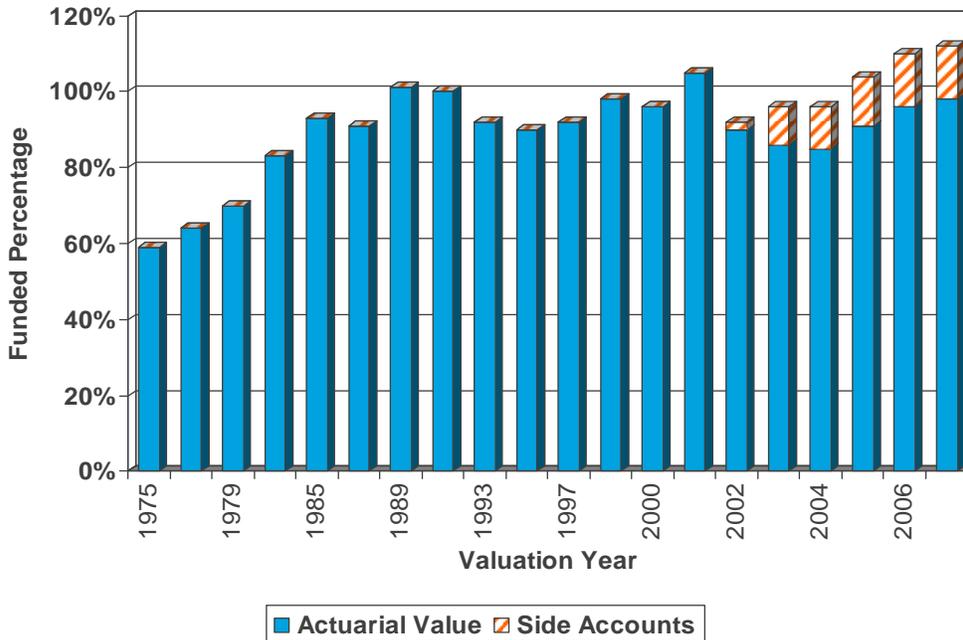
The table below shows the funded status of the various pension rate pools both on the basis used to calculate the contribution rate for each rate pool and after adjustment for Side Accounts (assuming Side Accounts offset Tier 1/Tier 2 liabilities).

	SLGRP	School Districts	Independent Employers	OPSRP	Pension System Totals <sup>1</sup>
December 31, 2007					
Actuarial accrued liability	\$ 26,883.1	\$ 21,299.3	\$ 4,423.2	\$ 203.0	\$ 52,871.2
Actuarial value of assets	\$ 26,674.2	\$ 20,156.5	\$ 4,645.0	\$ 275.1	\$ 51,669.7
<b>Funded percentage</b>	<b>99.2%</b>	<b>94.6%</b>	<b>105.0%</b>	<b>135.5%</b>	<b>97.7%</b>
Side accounts	\$ 3,640.6	\$ 3,897.1	\$ 120.5	\$ -	\$ 7,658.1
<b>Funded percentage reflecting side accounts</b>	<b>112.8%</b>	<b>112.9%</b>	<b>107.7%</b>	<b>135.5%</b>	<b>112.2%</b>
December 31, 2006					
Actuarial accrued liability	\$ 25,390.0	\$ 20,825.0	\$ 4,860.1	\$ 115.0	\$ 51,252.9
Actuarial value of assets	\$ 24,668.9	\$ 19,411.8	\$ 5,212.2	\$ 151.4	\$ 49,368.3
<b>Funded percentage</b>	<b>97.2%</b>	<b>93.2%</b>	<b>107.2%</b>	<b>131.6%</b>	<b>96.3%</b>
Side accounts	\$ 3,508.3	\$ 3,621.6	\$ 118.3	\$ -	\$ 7,248.2
<b>Funded percentage reflecting side accounts</b>	<b>111.0%</b>	<b>110.6%</b>	<b>109.7%</b>	<b>131.6%</b>	<b>110.5%</b>

Amounts in millions

<sup>1</sup> Includes Multnomah Fire District #10

As shown in the graph below, the funded status of the system generally improved until the market decline earlier this decade. The restatement of the December 31, 2001 actuarial valuation to reflect the impact of the 2003 reforms mitigates the impact on the reported funded status of the market downturn. Funded status is again generally improving with the better than expected returns in the last several years.



## Executive Summary

### Funded Status (*continued*)

The retiree medical benefits are funded using a 401(h) account within the pension trust. The table below shows the funded status of the retiree medical programs.

	December 31, 2007			December 31, 2006		
	RHIA	RHIPA	Total	RHIA	RHIPA	Total
Actuarial accrued liability	\$499.6	\$23.3	\$522.9	\$511.8	\$23.4	\$535.2
Actuarial value of assets	\$250.8	\$7.8	\$258.6	\$221.3	\$7.0	\$228.4
<b>Funded Percentage</b>	<b>50.2%</b>	<b>33.6%</b>	<b>49.5%</b>	<b>43.2%</b>	<b>30.0%</b>	<b>42.7%</b>

*Amounts in millions*

### Asset Changes

Since December 31, 2006, contributions (including supplemental deposits) for pension benefits have increased assets by approximately 1.4% while benefit payments decreased assets by about 4.6%. On the whole, assets increased over 6% due to investment returns of approximately 9%.

	Amount	Percentage of 12/31/2006 Market Value
All Reserves		
<b>Market value, December 31, 2006</b>	<b>\$ 58,945.9</b>	
Contributions	798.3	1.4%
Investment Income	5,536.9	9.4%
Benefit Payments	(2,697.6)	(4.6%)
<b>Market value, December 31, 2007</b>	<b>\$ 62,583.4</b>	<b>106.2%</b>

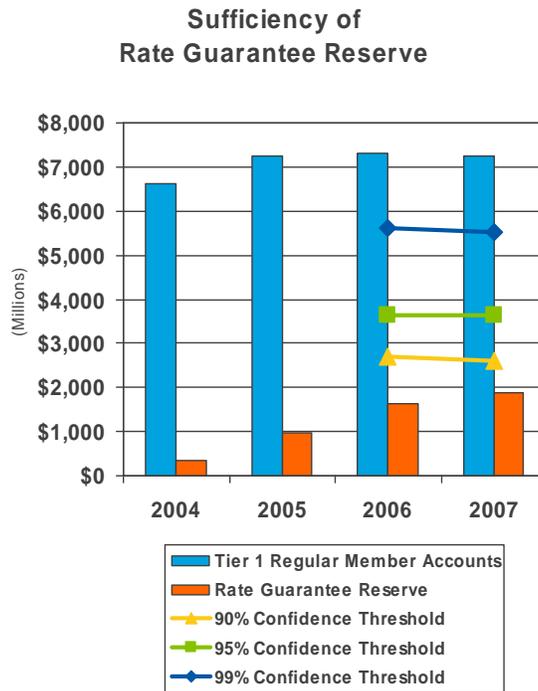
*Amounts in millions*

The Rate Guarantee reserve that is used to pay for the 8% interest crediting rate guarantee on active Tier 1 member accounts when actual investment earnings are below 8% has increased from \$1.6 billion as of December 31, 2006 to \$1.9 billion as of December 31, 2007. Active Tier 1 member accounts that are protected by the rate guarantee reserve remained relatively stable from December 31, 2006, to December 31, 2007, at a value of approximately \$7.3 billion.

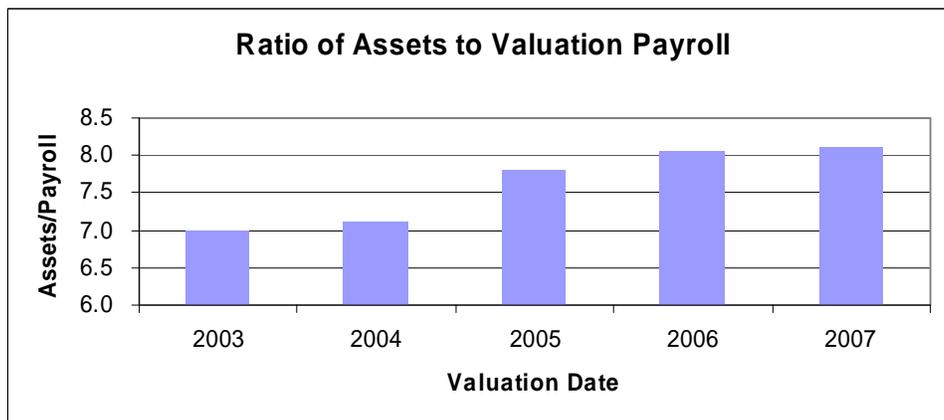
# Executive Summary

## Funded Status *(continued)*

At the March 30, 2007 Board meeting, we presented a study examining different thresholds for declaring the Rate Guarantee Reserve fully funded. As shown in the chart below, the Rate Guarantee Reserve does not exceed the 90%, 95% and 99% confidence thresholds used in that study.



The graph below shows the increasing ratio of valuation assets to combined valuation payroll. Any gain or loss due to investment returns is amortized over a 20-year period as a percentage of payroll for Tier 1/Tier 2 benefits and over a 16-year period as a percentage of payroll for OPSRP benefits. Consequently, as this ratio increases, the system becomes more and more sensitive to variability in investment returns. A 100 basis point variance in investment return for one year creates a 30 basis point change in employer contribution rates.



# Executive Summary

## Liability Changes

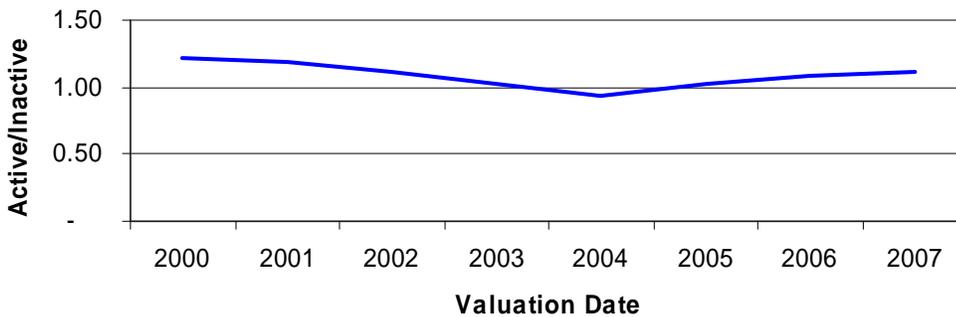
Since December 31, 2006, the system-wide actuarial accrued liability has increased primarily due to interest on the liability as current active members get closer to retirement. The normal cost, or the value of benefits attributable to that year of service, was about one-eighth of the value of benefits paid out during the year. Contributions during the year were almost two and a half times the normal cost. The remaining 0.2% decrease in the actuarial accrued liability was attributable to demographic experience.

	Amount	Percentage of 12/31/2006 AAL
<b>Actuarial Accrued Liability, December 31, 2006</b>	<b>\$ 51,788.2</b>	
Normal Cost	324.4	0.6%
Benefit Payments	(2,697.6)	(5.2%)
Interest	4,061.1	7.8%
Other	(81.9)	-0.2%
<b>Actuarial Accrued Liability, December 31, 2007</b>	<b>\$ 53,394.1</b>	<b>103.1%</b>

*Amounts in millions*

The Oregon Public Employees Retirement System is a very mature system. As shown in the chart below, there are currently 1.12 active members in the system for every inactive member. By comparison, the average ratio in NASRA's 2006 Public Fund Survey is 2.08. Since contributions to the system are based on active payroll, a lower ratio means there are fewer actives to support any gains or losses on the benefits of retirees.

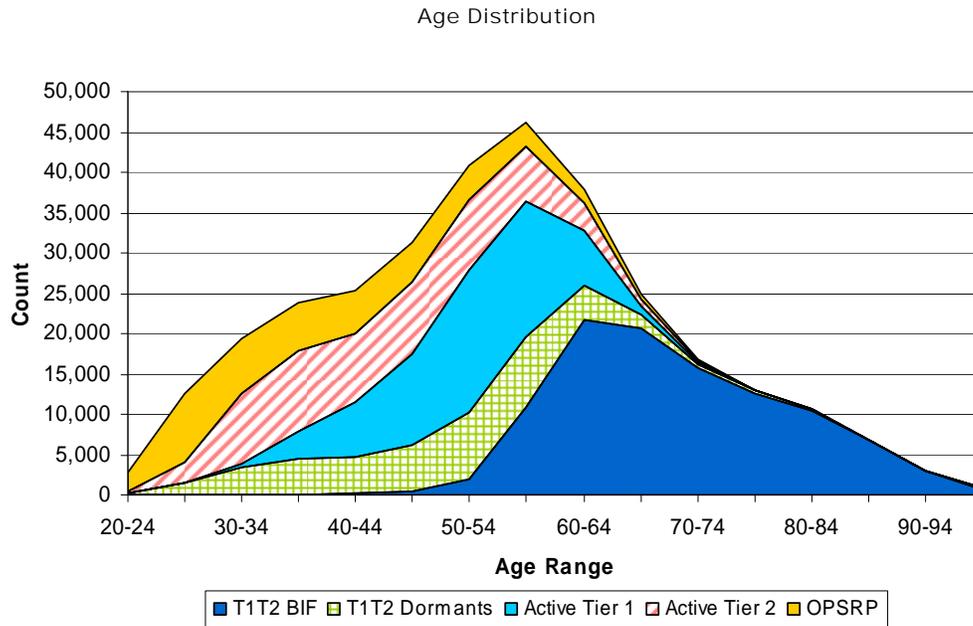
**Ratio of Active to Inactive Members**



# Executive Summary

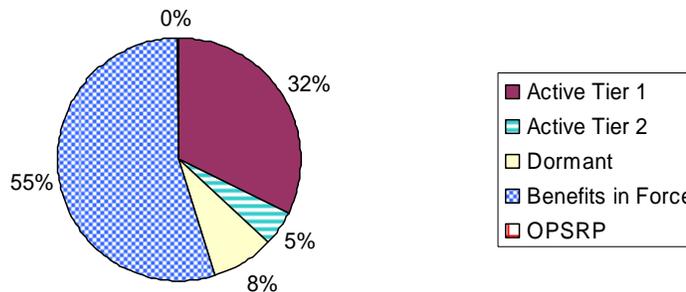
## Liability Changes *(continued)*

The ratio of active members to retired members is likely to decline further as a significant portion of the active members are currently eligible to retire. The graph below shows the distribution of members in the system by age and membership status.



The following chart illustrates the distribution of the system’s accrued liability by member age and status. While the majority of active liability is attributable to Tier 1 members, 63% of the system’s total accrued liability is due to members who are no longer actively working in covered employment. Only 5% of the liability is attributable to active Tier 2 and OPSRP members. Of the accrued liability that is attributable to actives, a large portion is located at or near prime retirement ages.

**Actuarial Accrued Liability by Member Category**



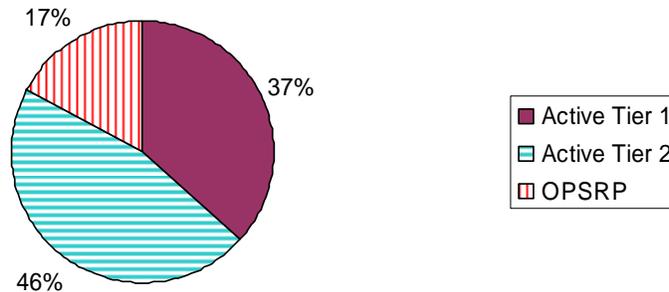
As shown below, Tier 2 members account for nearly half of the system’s normal cost compared to about 5% of the system’s accrued liability. Tier 2 members are likely to retire under the Full Formula calculation rather than the Money Match calculation. Because no additional Member contributions are permitted, the Money

# Executive Summary

## Liability Changes *(continued)*

Match formula is essentially frozen. Consequently, many Tier 1 Members who are expected to retire under the Money Match formula have no normal cost.

### Normal Cost by Member Category



## Employers Joining the SLGRP

Effective January 1, 2008, 28 independent employers joined the State & Local Government Rate Pool (SLGRP). Their experience through December 31, 2007 was maintained independently, but they are included with the SLGRP in this report in order to develop contribution rates that will become effective July 1, 2009. The table below summarizes the changes to assets and liabilities for the SLGRP and Independent Employers due to these employers joining the SLGRP. Note that, by design, the UAL as a percentage of payroll does not change for the SLGRP ensuring the SLGRP's UAL rate is not affected by employers joining the pool.

	December 31, 2007		January 1, 2008		Net Change	
	SLGRP	Independent Employers	SLGRP	Independent Employers	SLGRP	Independent Employers
Actuarial accrued liability	\$ 26,233.4	\$ 5,072.9	\$ 26,883.1	\$ 4,423.2	\$ 649.7	\$ (649.7)
Actuarial value of assets	\$ 26,042.0	\$ 5,562.2	\$ 26,674.2	\$ 4,645.0	\$ 632.3	\$ (917.2)
Combined valuation payroll	\$ 3,908.8	\$ 1,102.3	\$ 4,264.2	\$ 746.9	\$ 355.4	\$ (355.4)
UAL as % of Payroll	4.9%	(44.4%)	4.9%	(29.7%)	0.0%	14.7%
Pre-SLGRP Liability / (Surplus)	\$ (169.7)	N/A	\$ (454.6)	N/A	\$ (284.9)	N/A

Amounts in millions

# Executive Summary

## Principal Valuation Results

A summary of principal valuation results from the current valuation and the prior valuation follows. Any changes in actuarial assumptions, methods or plan provisions between the two valuations are described after the summary. Combined valuation payroll includes Tier 1/Tier 2 payroll and OPSRP payroll.

	Actuarial Valuation as of		Percent Change	
	December 31, 2007	December 31, 2006		
<b>Tier 1/Tier 2 Pension</b>				
Actuarial accrued liability	\$ 52,668.1	\$ 51,137.9	3%	
Actuarial value of assets	\$ 51,394.6	\$ 49,216.8	4%	
Unfunded actuarial accrued liability	\$ 1,273.6	\$ 1,921.1	(34%)	
Funded status	98%	96%	1%	
Combined valuation payroll	\$ 7,721.8	\$ 7,326.8	5%	
UAL as a percentage of payroll	16%	26%	(37%)	
Normal cost	\$ 380.9	\$ 329.0	16%	
Tier 1/Tier 2 valuation payroll	\$ 6,261.9	\$ 6,336.4	(1%)	
Normal cost rate	6.08%	5.19%	17%	
<b>OPSRP Pension</b>				
Actuarial accrued liability	\$ 203.0	\$ 115.0	77%	
Actuarial value of assets	\$ 275.1	\$ 151.4	82%	
Unfunded actuarial accrued liability	\$ (72.1)	\$ (36.4)	98%	
Funded status	135%	132%	3%	
Combined valuation payroll	\$ 7,721.8	\$ 7,326.8	5%	
UAL as a percentage of payroll	(1%)	(0%)	88%	
Normal cost	\$ 88.3	\$ 61.7	43%	
OPSRP valuation payroll	\$ 1,459.9	\$ 990.4	47%	
Normal cost rate	6.05%	6.23%	(3%)	
<b>Combined Pension</b>				
Actuarial accrued liability	\$ 52,871.2	\$ 51,252.9	3%	
Actuarial value of assets	\$ 51,669.7	\$ 49,368.3	5%	
Unfunded actuarial accrued liability	\$ 1,201.5	\$ 1,884.7	(36%)	
Funded status	98%	96%	1%	
Combined valuation payroll	\$ 7,721.8	\$ 7,326.8	5%	
UAL as a percentage of payroll	16%	26%	(40%)	
Normal cost	\$ 469.2	\$ 390.7	20%	
Combined valuation payroll	\$ 7,721.8	\$ 7,326.8	5%	
Normal cost rate	6.08%	5.33%	14%	

Amounts in millions

# Executive Summary

## Principal Valuation Results *(continued)*

	Actuarial Valuation as of		Percent Change	
	December 31, 2007	December 31, 2006		
<b>RHIA</b>				
Actuarial accrued liability	\$ 499.6	\$ 511.8	(2%)	
Actuarial asset value	\$ 250.8	\$ 221.3	13%	
Unfunded actuarial accrued liability	\$ 248.8	\$ 290.5	(14%)	
Funded status	50%	43%	16%	
Combined valuation payroll	\$ 7,721.8	\$ 7,326.8	5%	
UAL as a percentage of payroll	3%	4%	(19%)	
Normal cost	\$ 6.6	\$ 6.6	(1%)	
Tier 1/Tier 2 valuation payroll	\$ 6,261.9	\$ 6,336.4	(1%)	
Normal cost rate	0.10%	0.10%	0%	
<b>RHIPA</b>				
Actuarial accrued liability	\$ 23.3	\$ 23.4	(0%)	
Actuarial asset value	\$ 7.8	\$ 7.0	11%	
Unfunded actuarial accrued liability	\$ 15.5	\$ 16.4	(6%)	
Funded status	34%	30%	12%	
Combined valuation payroll	\$ 2,080.2	\$ 1,946.8	7%	
UAL as a percentage of payroll	1%	1%	(12%)	
Normal cost	\$ 0.9	\$ 0.9	2%	
Tier 1/Tier 2 valuation payroll	\$ 1,692.1	\$ 1,665.7	2%	
Normal cost rate	0.06%	0.06%	0%	

*Amounts in millions*

# Executive Summary

## Data Summary

A brief summary of the data underlying the current and prior valuation follows. Additional detail can be found in the data section of this report.

	December 31					2006 Totals
	2007					
	Tier 1	Tier 2	OPSRP	Total		
<b>Active Members</b>						
Count	64,564	58,878	43,581	167,023		163,261
Average age	51.8	44.6	39.4	46.0		45.8
Average total service	18.4	7.2	2.3	10.3		10.3
Average valuation payroll	\$ 56,189	\$ 44,740	\$ 33,500	\$ 46,232	\$	\$ 44,878
<b>Dormant Members</b>						
Count	23,665	20,118	166	43,949		47,753
Average age	53.6	45.1	69.9	49.8		47.9
Average monthly deferred benefit	\$ 1,643	\$ 476	\$ 32	\$ 1,103	\$	\$ 1,136
<b>Retired Members and Beneficiaries</b>						
Count	103,641	1,695	0	105,336		103,287
Average age	70.2	63.5	n/a	70.1		69.8
Average monthly benefit	\$ 2,019	\$ 480	\$ 0	\$ 1,995	\$	\$ 1,919
<b>Total members</b>	<b>191,870</b>	<b>80,691</b>	<b>43,747</b>	<b>316,308</b>		<b>314,301</b>

## Executive Summary

### Effects of Changes

There were no changes to assumptions, methods or plan provisions since the December 31, 2006 actuarial valuation.

### ***Arken and Robinson Litigation***

We have made no adjustment in this valuation to reflect any interpretation of Judge Kantor's June 20, 2007 or May 27, 2008 rulings in the Arken and Robinson cases.

## Certification

Mercer has prepared this report exclusively for the Oregon Public Employees Retirement System for the following purposes:

- Present the results of a valuation of Oregon Public Employees Retirement System as of December 31, 2007
- Provide average employer contribution rates for the system as a whole and actual contribution rates effective July 1, 2009 for each rate pool
- Provide reporting information for financial statements pursuant to GASB 25 and 43.

This valuation report may not be relied upon for any other purpose. Mercer is not responsible for the consequences of any other use.

A valuation report is a snapshot of a plan's estimated financial condition at a particular point in time; it is neither a prediction of a pension plan's future financial condition nor a prediction of a pension plan's ability to pay benefits in the future.

Over time, a plan's total cost will depend on a number of factors, including the amount of benefits it pays, the number of people to whom it pays them, and the amount earned on any assets invested to pay the benefits. These amounts and others are uncertain and unknowable at the valuation date, but are predicted to fall within a reasonable range of possibilities. To prepare this report, *actuarial assumptions*, as described within, are used to select a single scenario from the range of possibilities. The results of that single scenario are included in this report. However, the future is uncertain and the plan's actual experience will differ from those assumptions; these differences may be significant or material. In addition, different assumptions or scenarios may also be within the reasonable range and results based on those assumptions would be different. Actuarial assumptions may also be changed from valuation to valuation based on experience, changes in expectations about the future, and other factors.

Because actual plan experience will differ from the assumptions, decisions about benefit changes, investment policy, funding amounts, benefit security and/or benefit related issues should be made only after careful consideration of alternative future financial conditions and scenarios, and not solely on the basis of a valuation report or reports.

## Data

The valuation is based on financial and membership data furnished by the System and summarized in this report. The System's actuary would not customarily verify this data. We have reviewed the information for internal consistency and reasonableness and have no reason to doubt its substantial accuracy.

## Contributions and Accounting

All costs, liabilities and other factors under the System were determined in accordance with generally accepted actuarial principles and procedures, in accordance with the provisions of current State statutes and regulations issued thereunder, using an actuarial cost method which we believe is appropriate. In our opinion, the actuarial assumptions set by the Board are a reasonable estimate of the anticipated experience under the System. This report fully and fairly discloses the actuarial position of the System on an ongoing basis.

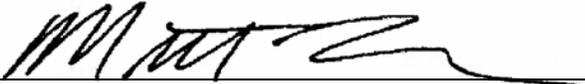
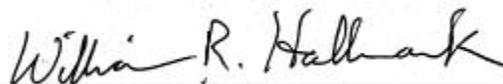
The accounting calculations reported herein are consistent with our understanding of the provisions of Government Account Standards Board (GASB) Statements Number 25 and 43.

There have been no changes in plan provisions, actuarial methods and actuarial assumptions since the last valuation of the plan.

# Certification

## Professional Qualifications

We are available to answer any questions on the material contained in the report, or to provide explanations or further details as may be appropriate. The undersigned credentialed actuaries meet the Qualification Standards of the American Academy of Actuaries to render the actuarial opinion contained in this report. We are not aware of any direct or material indirect financial interest or relationship, including investments or other services that could create a conflict-of-interest that would impair the objectivity of our work.

	October 14, 2008
<b>Matthew R. Larrabee, FSA, EA, MAAA</b> Principal	<b>Date</b>
	October 14, 2008
<b>William R. Hallmark, ASA, EA, MAAA</b> Principal	<b>Date</b>
I have reviewed and found acceptable the actuarial assumptions, methods and procedures used in this valuation.	
	October 14, 2008
<b>Michael Moehle, FSA, EA, MAAA</b> Principal	<b>Date</b>
Mercer (US), Inc. 111 SW Columbia Avenue, Suite 500 Portland, Oregon 97201-5839 503 273 5900	

The information contained in this document (including any attachments) is not intended by Mercer to be used, and it cannot be used, for the purpose of avoiding penalties under the Internal Revenue Code that may be imposed on the taxpayer.

## System-Wide Assets

The table below reconciles the market value of assets, as provided by PERS, to the asset values used in this valuation.

	Tier 1/ Tier 2	OPSRP	Side Accounts	Contingency and Capital Preservation Reserve	Rate Guarantee Reserve	RHIA and RHIPA	System Totals
<b>Amount reported by PERS</b>							
<b>December 31, 2007</b>	\$ 51,586.8	\$ 275.1	\$ 7,920.5	\$ 653.2	\$ 1,889.2	\$ 258.6	\$ 62,583.4
Side Account Transfers	\$ 262.4	-	\$ (262.4)	\$ -	\$ -	\$ -	\$ -
Net Pre-SLGRP Liabilities	\$ (454.6)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ (454.6)
<b>December 31, 2007 Actuarial Value of Assets</b>	\$ 51,394.6	\$ 275.1	\$ 7,658.1	\$ 653.2	\$ 1,889.2	\$ 258.6	\$ 62,128.8

*Amounts in millions*

PERS relied on Mercer to calculate the amount that should be transferred from Side Accounts to employer reserves in Tier 1/Tier 2 and OPSRP for rate relief provided through June 30, 2007. After that date, PERS began transferring these amounts, based on its own calculations, on a monthly basis. PERS does not track net Pre-SLGRP liabilities.

Employer supplemental deposits establish individual Side Accounts within the pension trust. The Side Accounts are treated as prepaid contributions. Employer contribution rates are first determined excluding Side Accounts. Then, an amortized portion of the Side Account is used to offset the contribution otherwise required for the individual employers that have Side Accounts. While Side Accounts are excluded from valuation assets in determining contribution rates for each of the rate pools, Side Accounts are included in valuation assets for financial reporting purposes such as the reporting of funded status.

In addition, pension assets are held in the Contingency reserve, the Capital Preservation reserve, and the Tier 1 Rate Guarantee reserve. These three reserves are excluded from valuation assets for all purposes. Finally, assets are held in separate accounts established under Internal Revenue Code Section 401(h) (the Retirement Health Insurance Account (RHIA) and the Retiree Health Insurance Premium Account (RHIPA)) to provide retiree medical benefits.

## System-Wide Assets

The following table reconciles the changes in the system-wide assets from December 31, 2006 to December 31, 2007. The reconciliation of assets is provided by PERS, except for item 1.b., "Transfer from side accounts," which was calculated by Mercer for rate relief through June 30, 2007, as part of the valuation process.

Reconciliation of Pension and Retiree Healthcare Assets	Tier 1/Tier 2	OPSRP	Side Accounts	Contingency Reserve	Capital Preservation Reserve	Rate Guarantee Reserve	RHIA and RHIPA	System Totals
<b>Additions</b>								
1. Contributions								
a. Employer	\$ 489.4	\$ 106.5	\$ 148.6	\$ -	\$ -	\$ -	\$ 37.6	\$ 782.1
b. Transfer from side accounts <sup>1</sup>	\$ 442.8	\$ -	\$ (442.8)	\$ -	\$ -	\$ -	\$ -	\$ -
c. Judge member contributions	\$ 1.4	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1.4
d. Member service purchases	\$ 14.8	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 14.8
e. Total	\$ 948.3	\$ 106.5	\$ (294.2)	\$ -	\$ -	\$ -	\$ 37.6	\$ 798.3
2. Net investment income								
a. Transfers	\$ 22.7	\$ -	\$ (22.7)	\$ -	\$ -	\$ -	\$ -	\$ -
b. From investments	\$ 4,224.6	\$ 24.0	\$ 727.1	\$ 357.9	\$ -	\$ 253.8	\$ 22.8	\$ 5,610.1
c. Total	\$ 4,247.3	\$ 24.0	\$ 704.4	\$ 357.9	\$ -	\$ 253.8	\$ 22.8	\$ 5,610.1
3. Other <sup>2</sup>	\$ (34.5)	\$ -	\$ -	\$ 0.0	\$ -	\$ (0.0)	\$ -	\$ (34.5)
<b>4. Total additions</b>	<b>\$ 5,161.1</b>	<b>\$ 130.6</b>	<b>\$ 410.2</b>	<b>\$ 357.9</b>	<b>\$ -</b>	<b>\$ 253.8</b>	<b>\$ 60.4</b>	<b>\$ 6,373.9</b>
<b>Deductions</b>								
5. Retirement and survivor benefits	\$ (2,622.4)	\$ (0.2)	\$ -	\$ -	\$ -	\$ -	\$ (29.2)	\$ (2,651.7)
6. Death Benefits	\$ (7.7)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ (7.7)
7. Refund of contributions	\$ (38.2)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ (38.2)
9. Administrative expenses	\$ (30.7)	\$ (6.7)	\$ (0.2)	\$ -	\$ -	\$ -	\$ (1.0)	\$ (38.7)
<b>10. Total deductions</b>	<b>\$ (2,699.0)</b>	<b>\$ (6.9)</b>	<b>\$ (0.2)</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ (30.2)</b>	<b>\$ (2,736.3)</b>
<b>11. Net change</b>	<b>\$ 2,462.0</b>	<b>\$ 123.6</b>	<b>\$ 410.0</b>	<b>\$ 357.9</b>	<b>\$ -</b>	<b>\$ 253.8</b>	<b>\$ 30.2</b>	<b>\$ 3,637.6</b>
12. Net assets held in trust for pension benefits								
a. Beginning of year	\$ 49,387.1	\$ 151.4	\$ 7,248.1	\$ 295.3	\$ -	\$ 1,635.4	\$ 228.4	\$ 58,945.8
<b>b. End of year</b>	<b>\$ 51,849.2</b>	<b>\$ 275.1</b>	<b>\$ 7,658.1</b>	<b>\$ 653.2</b>	<b>\$ -</b>	<b>\$ 1,889.2</b>	<b>\$ 258.6</b>	<b>\$ 62,583.4</b>

<sup>1</sup> Side account transfers shown in this exhibit are all credited to Tier 1/Tier 2 assets. We understand the portion to be credited to OPSRP is credited through the employer contribution line of the exhibit.

<sup>2</sup> Includes TRFA transfer from Metlife and adjustments by PERS.

Amounts in millions

## System-Wide Assets

### Reconciliation of Side Accounts

Side Accounts are established for employers who make supplemental payments (a lump sum payment in excess of the required employer contribution). For SLGRP employers, this supplemental payment is first applied toward the employer's Transition Liability, and any excess is established in a Side Account. A reconciliation of the Side Accounts from December 31, 2006, to December 31, 2007, is shown below on a rate pool basis. For this exhibit, all Independent Employers are grouped together.

	SLGRP	School Districts	Independent Employers	System Totals
<b>Side Accounts, December 31, 2006</b>	<b>\$ 3,508.3</b>	<b>\$ 3,621.6</b>	<b>\$ 118.3</b>	<b>\$ 7,248.2</b>
Deposits during 2007	-	148.6	-	148.6
Interest	353.8	361.3	11.9	727.1
Administrative expenses	(0.0)	(0.1)	(0.0)	(0.2)
Transfers to employer reserves	(223.3)	(234.2)	(7.9)	(465.5)
<b>Side Accounts, December 31, 2007</b>	<b>\$ 3,638.8</b>	<b>\$ 3,897.1</b>	<b>\$ 122.3</b>	<b>\$ 7,658.1</b>
Side accounts for new SLGRP employers	1.8	-	(1.8)	-
<b>Side Accounts, January 1, 2008</b>	<b>\$ 3,640.6</b>	<b>\$ 3,897.1</b>	<b>\$ 120.5</b>	<b>\$ 7,658.1</b>

*Amounts in millions*

### Development of Side Account Rate Relief

The rate relief attributable to an employer's side account is determined by amortizing the side account balance on the valuation date over the period ending December 31, 2027 and expressing the result as a percentage of combined valuation payroll. The table below shows the average rate relief attributable to Side Accounts for each rate pool.

	December 31, 2007			
	SLGRP	School Districts	Independent Employers	System Totals
1. Side Account	\$ 3,640.6	\$ 3,897.1	\$ 120.5	\$ 7,658.1
2. Combined valuation payroll	\$ 4,264.2	\$ 2,693.3	\$ 764.3	\$ 7,721.8
3. Amortization Factor	13.772	13.772	13.772	13.772
4. Average Side Account Rate Relief	6.20%	10.51%	1.14%	7.20%

*Amounts in millions*



# Pension Plan Valuation

## Tier 1/Tier 2 Valuation

### **Tier 1/Tier 2 Pension Assets**

#### *Summary of Actuarial Value of Assets*

This section summarizes the current Tier 1/Tier 2 pension valuation assets as of the current and prior actuarial valuation. For valuation purposes, pension assets are divided among the State & Local Government Rate Pool (SLGRP), the School District Pool, and various Independent Employers to determine employer contribution rates. For this system-wide report, all Independent Employers, including State Judiciary, have been grouped together as if they were a rate pool.

	SLGRP	School Districts	Independent Employers	Tier 1/Tier 2 Totals <sup>1</sup>
December 31, 2007				
Member reserves	\$ 5,113.1	\$ 3,268.0	\$ 843.1	\$ 9,225.0
Employer reserves	10,045.2	5,715.4	1,868.9	17,494.7
Benefit in force reserves	11,970.5	11,173.0	1,933.0	25,129.5
Net outstanding pre-SLGRP liabilities	(454.6)			(454.6)
<b>Total actuarial value of assets</b>	<b>\$ 26,674.2</b>	<b>\$ 20,156.5</b>	<b>\$ 4,645.0</b>	<b>\$ 51,394.6</b>
December 31, 2006				
Member reserves	\$ 4,987.0	\$ 3,379.1	\$ 1,044.0	\$ 9,410.8
Employer reserves	8,522.6	5,340.5	2,263.4	15,996.2
Benefit in force reserves	11,329.7	10,692.2	1,904.8	23,980.2
Net outstanding pre-SLGRP liabilities	(170.3)			(170.3)
<b>Total actuarial value of assets</b>	<b>\$ 24,668.9</b>	<b>\$ 19,411.8</b>	<b>\$ 5,212.2</b>	<b>\$ 49,216.8</b>

*Amounts in millions*

<sup>1</sup> Includes Multnomah Fire District #10.

Please note that pre-SLGRP liabilities are treated as loans from the SLGRP to the individual employer and pre-SLGRP surpluses are treated as loans from the individual employer to the SLGRP. The assets of the SLGRP used to calculate the pooled contribution rate reflect the net outstanding balance of these loans.

Side Accounts are treated as pre-paid contributions. Consequently, they are not reflected in the actuarial value of assets shown above. The actuarial value of assets for each rate pool is used to develop the contribution rate for that pool. Side Accounts are used to adjust the pooled contribution rate for individual employers. The net impact of Side Accounts is shown in a separate section of this report.

# Pension Plan Valuation

## Tier 1/Tier 2 Valuation (continued)

### **Tier 1/Tier 2 Pension Assets (continued)**

#### *Reconciliation of Actuarial Value of Assets*

The table below shows a reconciliation of the actuarial value of assets from the prior valuation to the current valuation for each of the rate pools. Again, Independent Employers, including State Judiciary, are treated as if they were a single rate pool for purposes of the system-wide report.

	SLGRP	School Districts	Independent Employers	Tier 1/Tier 2 Totals <sup>1</sup>
<b>Actuarial value of assets, December 31, 2006</b>	\$ 24,668.9	\$ 19,411.8	\$ 5,212.2	\$ 49,216.8
<b>Contributions</b>				
Employer	\$ 251.9	\$ 150.7	\$ 99.9	502.5
Side account transfers	\$ 212.6	\$ 222.6	\$ 7.6	442.8
Member	\$ 0.0	\$ 0.0	\$ 1.4	1.4
Total contributions	\$ 464.5	\$ 373.3	\$ 108.8	946.7
Investment income	2,161.3	1,705.9	464.8	4,323.5
Benefit payments	(1,259.0)	(1,186.4)	(217.3)	(2,668.3)
Adjustments <sup>2</sup>	6.2	(148.1)	(6.3)	(139.2)
<b>Actuarial value of assets, December 31, 2007</b>	\$ 26,042.0	\$ 20,156.5	\$ 5,562.2	\$ 51,679.5
Employers joining the SLGRP	632.3		(917.2)	(284.9)
<b>Actuarial value of assets, January 1, 2008</b>	\$ 26,674.2	\$ 20,156.5	\$ 4,645.0	\$ 51,394.6

Amounts in millions

<sup>1</sup> Includes Multnomah Fire District #10.

<sup>2</sup> Adjustments include a reallocation of the benefits in force reserve, transfers to Multnomah Fire District #10, member service purchases and other adjustments made by PERS.

## Pension Plan Valuation

### Tier 1/Tier 2 Valuation (*continued*)

#### **Tier 1/Tier 2 Pension Assets (*continued*)**

#### *Outstanding Balance of Pre-SLGRP Liabilities*

In the valuation, pre-SLGRP liabilities are treated as assets of the SLGRP. That is, a pre-SLGRP liability is essentially a debt owed to the SLGRP by the employer. Pre-SLGRP surpluses are essentially loans by employers to the SLGRP.

Prior to the formation of the SLGRP, the State and Community Colleges were pooled together and some employers participated in the Local Government Rate Pool (LGRP). The UAL attributable to the State and Community Colleges or the LGRP at the time the SLGRP was formed is maintained separately from the SLGRP, and is reduced by contributions and increased for interest charges at the assumed interest rate.

Similarly, when an independent employer joins the SLGRP, a transition liability or surplus is calculated to ensure that each employer enters the pool on a comparable basis. The transition liability is maintained separately from the SLGRP, and is reduced by contributions and increased for interest charges at the assumed interest rate. The table below shows the reconciliation of the pre-SLGRP pooled liability attributable to the State and Community Colleges and the LGRP from the last valuation to the current valuation. It also shows the reconciliation of the total transition liability or surplus from the last valuation to the current valuation.

	State and Community Colleges	Local Government Rate Pool	Transition	Total
<b>1. Pre-SLGRP liability/(surplus), December 31, 2006</b>	\$ 639.9	\$ (261.2)	\$ (549.0)	\$ (170.3)
2. Employer contributions attributable to liability/(surplus)	(47.3)	19.0	41.7	13.4
3. Supplemental payments	0.0	0.0	(0.2)	(0.2)
4. Interest	47.4	(19.4)	(40.6)	(12.6)
<b>5. Pre-SLGRP liability/(surplus), December 31, 2007 (1. + 2. + 3. + 4.)</b>	\$ 639.9	\$ (261.6)	\$ (548.0)	\$ (169.7)
6. Employers joining the SLGRP			\$ (284.9)	\$ (284.9)
<b>7. Pre-SLGRP liability/(surplus), January 1, 2008 (5. + 6.)</b>	\$ 639.9	\$ (261.6)	\$ (832.9)	\$ (454.6)

*Amounts in millions*

# Pension Plan Valuation

## Tier 1/Tier 2 Valuation (*continued*)

### **Tier 1/Tier 2 Pension Liabilities**

#### **Normal Cost**

The normal cost represents the value of benefits assigned to the next year of service by the actuarial cost method. If all actuarial assumptions are met, the normal cost represents the amount that would need to be contributed each year to fund plan benefits.

Because no additional Member contributions are permitted, the Money Match formula is essentially frozen. Consequently, Members who are expected to retire under the Money Match formula have no normal cost.

A summary of the normal cost by decrement is shown below on a system-wide basis for the Tier 1/Tier 2 pension benefits.

	12/31/2007	12/31/2006	Percent Change
<b>Normal Cost</b>			
Service Retirement	\$ 351.6	\$ 302.1	16.4%
Vested Benefits	15.9	14.1	12.2%
Duty Disability	1.6	1.5	5.5%
Nonduty Disability	11.8	11.3	4.9%
Death	0.0	0.0	5.9%
<b>Total Normal Cost</b>	<b>\$ 380.9</b>	<b>\$ 329.0</b>	<b>15.8%</b>

*Amounts in millions*

The increase in the normal cost since the prior valuation is primarily attributable to the expected increase in pension normal cost and demographic experience. The expected increase for the pension normal cost is due to both the aging of the Tier 1/Tier 2 membership and the expected shift from Money Match to Full Formula benefits. The table below reconciles the normal cost from the prior valuation to the current valuation.

	Tier 1/Tier 2 Pension	
<b>Normal Cost, December 31, 2006</b>	<b>\$</b>	<b>329.0</b>
Expected increase		40.2
Assumption changes		-
Plan changes		-
<b>Deviations from expected experience</b>		
Age and service retirements from active status		4.7
Active mortality and withdrawal		7.8
Pay increases		9.5
Interest Crediting Experience		(0.9)
All other sources		(9.4)
<b>Total demographic (gains) and losses</b>		<b>11.6</b>
<b>Normal Cost, December 31, 2007</b>	<b>\$</b>	<b>380.9</b>

*Amounts in millions*

## Pension Plan Valuation

### Tier 1/Tier 2 Valuation *(continued)*

#### ***Tier 1/Tier 2 Pension Liabilities (continued)***

A summary of the normal cost by Tier and employment category for each rate pool is shown below. Again, Independent Employers, including State Judiciary, are treated as if they were a single rate pool for purposes of the system-wide report. The normal cost attributable to employers joining the SLGRP effective January 1, 2008 is included in the SLGRP figures below.

	December 31, 2007				December 31, 2006		Percent Change
	SLGRP	School Districts	Independent Employers	Tier 1/ Tier 2 Totals	Tier 1/ Tier 2 Totals		
<b>Normal Cost</b>							
Tier 1 General Service	\$ 54.7	\$ 48.3	\$ 11.4	\$ 114.4	\$ 93.8		21.9%
Tier 2 General Service	87.8	64.5	13.7	166.0	147.4		12.6%
Tier 1 Police & Fire	39.7	0.4	14.9	55.1	48.4		13.8%
Tier 2 Police & Fire	35.5	0.2	9.8	45.4	39.4		15.3%
<b>Total Normal Cost</b>	<b>\$ 217.7</b>	<b>\$ 113.4</b>	<b>\$ 49.8</b>	<b>\$ 380.9</b>	<b>\$ 329.0</b>		<b>15.8%</b>

*Amounts in millions*

## Pension Plan Valuation

### Tier 1/Tier 2 Valuation (*continued*)

#### **Tier 1/Tier 2 Pension Liabilities (*continued*)**

##### **Actuarial Accrued Liability**

The actuarial accrued liability represents the value of benefits attributed to prior years of service by the actuarial cost method. A summary of the actuarial accrued liability by decrement is shown below on a system-wide basis for the Tier 1/Tier 2 pension benefits.

Actuarial Accrued Liability	12/31/2007	12/31/2006	Percent Change
<b>Active</b>			
Service Retirement	\$ 17,236.2	\$ 16,991.8	1.4%
Vested Benefits	1,417.6	1,564.2	(9.4%)
Duty Disability	50.7	50.1	1.2%
Nonduty Disability	510.4	511.2	(0.2%)
Death	265.8	267.9	(0.8%)
<b>Total Actives</b>	<b>\$ 19,480.7</b>	<b>\$ 19,385.2</b>	<b>0.5%</b>
<b>Dormant Members</b>	<b>4,420.5</b>	<b>4,450.0</b>	<b>(0.7%)</b>
<b>Retired Members and Beneficiaries</b>	<b>28,766.9</b>	<b>27,302.8</b>	<b>5.4%</b>
<b>Total Actuarial Accrued Liability</b>	<b>\$ 52,668.1</b>	<b>\$ 51,137.9</b>	<b>3.0%</b>

*Amounts in millions*

## Pension Plan Valuation

### Tier 1/Tier 2 Valuation *(continued)*

#### **Tier 1/Tier 2 Pension Liabilities *(continued)***

#### **Actuarial Accrued Liability *(continued)***

A summary of actuarial accrued liabilities based on member status, Tier and employment category is shown in the table below. For this exhibit, all Independent Employers, including State Judiciary, have been grouped together.

	December 31, 2007				December 31, 2006		Percent Change
	SLGRP	School Districts	Independent Employers	Tier 1 / Tier 2 Totals <sup>1</sup>	Tier 1 / Tier 2 Totals <sup>1</sup>		
<b>Active Members</b>							
Tier 1 General Service	\$ 7,417.0	\$ 6,408.6	\$ 1,420.0	\$ 15,245.8	\$ 15,463.8		(1.4%)
Tier 1 Police & Fire	1,281.0	6.8	521.3	1,810.0	1,795.8		0.8%
<b>Tier 1 Total</b>	<b>\$ 8,698.0</b>	<b>\$ 6,415.4</b>	<b>\$ 1,941.3</b>	<b>\$ 17,055.8</b>	<b>\$ 17,259.6</b>		<b>(1.2%)</b>
Tier 2 General Service	988.2	749.5	272.5	2,010.2	1,784.6		12.6%
Tier 2 Police & Fire	325.2	2.8	86.7	414.7	341.0		21.6%
<b>Tier 2 Total</b>	<b>\$ 1,313.4</b>	<b>\$ 752.3</b>	<b>\$ 359.2</b>	<b>\$ 2,424.9</b>	<b>\$ 2,125.6</b>		<b>14.1%</b>
<b>Total Active Members</b>	<b>\$ 10,011.4</b>	<b>\$ 7,167.7</b>	<b>\$ 2,300.5</b>	<b>\$ 19,480.7</b>	<b>\$ 19,385.2</b>		<b>0.5%</b>
Dormant Members	2,648.6	1,341.2	429.9	4,420.5	4,450.0		(0.7%)
Retired Members and Beneficiaries	13,573.5	12,790.3	2,342.5	28,766.9	27,302.8		5.4%
<b>Total Tier 1/ Tier 2 Pension Liability, December 31, 2007</b>	<b>\$ 26,233.4</b>	<b>\$ 21,299.3</b>	<b>\$ 5,072.9</b>	<b>\$ 52,668.1</b>	<b>\$ 51,137.9</b>		<b>3.0%</b>
Employers joining the SLGRP	649.7	-	(649.7)	-	-		
<b>Total Tier 1/ Tier 2 Pension Liability, January 1, 2008</b>	<b>\$ 26,883.1</b>	<b>\$ 21,299.3</b>	<b>\$ 4,423.2</b>	<b>\$ 52,668.1</b>	<b>\$ 51,137.9</b>		<b>3.0%</b>

*Amounts in millions*

<sup>1</sup> Includes Multnomah FD #10.

## Pension Plan Valuation

### Tier 1/Tier 2 Valuation *(continued)*

#### ***Tier 1/Tier 2 Pension Liabilities (continued)***

##### ***Actuarial Accrued Liability (continued)***

The change in actuarial accrued liability since the last valuation reflects the experience of the system. The table below reconciles the actuarial accrued liability from the last valuation to this valuation. The actuarial accrued liability is expected to increase due to benefits earned during the year and interest, and to decrease due to benefits paid during the year.

<b>Actuarial Accrued Liability 12/31/2006</b>	<b>\$</b>	<b>51,137.9</b>
Expected change		1,671.3
Assumption changes		-
Plan changes		-
<b>Deviations from expected experience</b>		
Retirements from active status		95.5
Active mortality and withdrawal		(60.7)
Pay increases		57.4
Interest Crediting Experience		(72.5)
Retirement, mortality and lump sums from dormant status		(124.5)
Retiree and beneficiary mortality		82.9
Data Corrections		(54.7)
Other		(64.5)
<b>Total demographic (gains) and losses</b>		<b>(141.1)</b>
<b>Actuarial Accrued Liability 12/31/2007</b>	<b>\$</b>	<b>52,668.1</b>

*Amounts in millions*

# Pension Plan Valuation

## Tier 1/Tier 2 Valuation (continued)

### **Tier 1/Tier 2 Pension Unfunded Accrued Liability (UAL)**

#### *Calculation of UAL*

The Unfunded Accrued Liability (UAL) represents the difference between the Actuarial Accrued Liability and the valuation assets. To determine employer contribution rates, the UAL is calculated excluding Side Accounts. The calculated contribution rate is later offset by an amortized portion of the Side Accounts for individual employers with such accounts. A summary of the UAL by rate pool is shown on the following table. All Independent Employers, including State Judiciary, have been grouped together, and employers joining the SLGRP effective January 1, 2008 are included in the SLGRP as of December 31, 2007 for purposes of this exhibit.

	SLGRP	School Districts	Independent Employers	Tier 1 / Tier 2 Totals <sup>1</sup>
<b>December 31, 2007</b>				
1. Actuarial accrued liability	\$ 26,883.1	\$ 21,299.3	\$ 4,423.2	\$ 52,668.1
2. Actuarial value of assets	\$ 26,674.2	\$ 20,156.5	\$ 4,645.0	\$ 51,394.6
3. Unfunded accrued liability	\$ 208.9	\$ 1,142.8	\$ (221.8)	\$ 1,273.6
4. Funded percentage (2. ÷ 1.)	99.2%	94.6%	105.0%	97.6%
5. Combined Valuation Payroll	\$ 4,264.2	\$ 2,693.3	\$ 764.3	\$ 7,721.8
6. Unfunded accrued liability as % of combined valuation payroll (3. ÷ 5.)	4.9%	42.4%	(29.0%)	16.5%
<b>December 31, 2006</b>				
1. Actuarial accrued liability	\$ 25,390.0	\$ 20,825.0	\$ 4,860.1	\$ 51,137.9
2. Actuarial value of assets	\$ 24,668.9	\$ 19,411.8	\$ 5,212.2	\$ 49,216.8
3. Unfunded accrued liability	\$ 721.0	\$ 1,413.2	\$ (352.1)	\$ 1,921.1
4. Funded percentage (2. ÷ 1.)	97.2%	93.2%	107.2%	96.2%
5. Combined Valuation Payroll	\$ 3,702.0	\$ 2,563.3	\$ 1,061.6	\$ 7,326.8
6. Unfunded accrued liability as % of combined valuation payroll (3. ÷ 5.)	19.5%	55.1%	(33.2%)	26.2%

Amounts in millions

<sup>1</sup> Includes Multnomah Fire District #10

# Pension Plan Valuation

## Tier 1/Tier 2 Valuation (continued)

### **Tier 1/Tier 2 Pension Unfunded Accrued Liability (UAL) (continued)**

#### **Actuarial Gain or Loss since Prior Valuation**

In every actuarial valuation, assumptions are made as to the future experience of the plan and covered group of participants. Whenever there is a difference between the actual experience and that anticipated by the actuarial assumptions, there is a gain or loss to the plan. Gains are the result of experience that is more favorable than anticipated (i.e., serves to reduce the unfunded actuarial liability or increase the surplus), while losses are the result of unfavorable experience.

The table below shows the development of the actuarial gain (or loss) for the Tier 1/Tier 2 pension benefits. For this exhibit, all Independent Employers, including State Judiciary, have been grouped together.

Tier 1/Tier 2 Pension	December 31, 2007			
	SLGRP	School District	Independent Employers	Tier 1/Tier 2 Totals <sup>1</sup>
1. Expected actuarial accrued liability				
a. Actuarial accrued liability at January 1, 2007	\$ 25,390.0	\$ 20,825.0	\$ 4,860.1	\$ 51,137.9
b. Normal cost at January 1, 2007	\$ 171.3	\$ 100.0	\$ 57.7	\$ 329.0
c. Benefit payments for fiscal year ending December 31, 2007	\$ (1,259.0)	\$ (1,186.4)	\$ (217.3)	\$ (2,668.3)
d. Interest	\$ 1,994.5	\$ 1,626.5	\$ 384.7	\$ 4,010.6
e. Expected actuarial accrued liability before changes (a. + b. + c. + d.)	\$ 26,296.8	\$ 21,365.1	\$ 5,085.2	\$ 52,809.2
f. Change in actuarial accrued liability at December 31, 2007, due to assumption changes	\$ 0.0	\$ 0.0	\$ 0.0	\$ 0.0
g. Expected actuarial accrued liability at December 31, 2007 (e. + f.)	\$ 26,296.8	\$ 21,365.1	\$ 5,085.2	\$ 52,809.2
2. Actuarial accrued liability at December 31, 2007	\$ 26,233.4	\$ 21,299.3	\$ 5,072.9	\$ 52,668.1
<b>3. Liability gain/(loss) (1.g. - 2)</b>	<b>\$ 63.4</b>	<b>\$ 65.8</b>	<b>\$ 12.4</b>	<b>\$ 141.1</b>
4. Expected actuarial value of assets				
a. Actuarial value of assets at January 1, 2007	\$ 24,668.9	\$ 19,411.8	\$ 5,212.2	\$ 49,216.8
b. Actual contributions for 2007	\$ 464.5	\$ 373.3	\$ 108.8	\$ 946.7
c. Benefit payments for fiscal year ending December 31, 2007	\$ (1,259.0)	\$ (1,186.4)	\$ (217.3)	\$ (2,668.3)
d. Interest	\$ 1,941.7	\$ 1,520.4	\$ 412.6	\$ 3,868.5
e. Expected actuarial value of assets before changes (a. + b. + c. + d.)	\$ 25,816.2	\$ 20,119.1	\$ 5,516.4	\$ 51,363.7
f. Change in actuarial value of assets at December 31, 2007, due to assumption changes	\$ 0.0	\$ 0.0	\$ 0.0	\$ 0.0
g. Expected actuarial value of assets at December 31, 2007 (e. + f.)	\$ 25,816.2	\$ 20,119.1	\$ 5,516.4	\$ 51,363.7
5. Actuarial value of assets as of December 31, 2007	\$ 26,042.0	\$ 20,156.5	\$ 5,562.2	\$ 51,679.5
<b>6. Asset gain/(loss) (5. - 4.g.)</b>	<b>\$ 225.8</b>	<b>\$ 37.4</b>	<b>\$ 45.8</b>	<b>\$ 315.8</b>
<b>7. Net actuarial gain/(loss) (3. + 6.)</b>	<b>\$ 289.2</b>	<b>\$ 103.2</b>	<b>\$ 58.2</b>	<b>\$ 456.9</b>

Amounts in millions

<sup>1</sup> Includes Multnomah Fire District #10

# Pension Plan Valuation

## Tier 1/Tier 2 Valuation (continued)

### **Tier 1/Tier 2 Pension Unfunded Accrued Liability (UAL) (continued)**

#### **Reconciliation of the UAL**

The UAL is divided into two components to develop employer rates: the UAL attributable to the change to Projected Unit Credit (PUC) funding method as of December 31, 2004, and the regular UAL. The table below develops the UAL attributable to the change to PUC. Contributions were first allocated to this portion of the UAL effective July 1, 2007. The remaining UAL is the Regular UAL.

	SLGRP	School Districts	Independent Employers	Tier 1 / Tier 2 Totals <sup>1</sup>
<b>UAL due to change to PUC, December 31, 2006</b>	\$ 679.2	\$ 595.8	\$ 161.3	\$ 1,436.3
Contributions Allocated	(119.7)	(94.6)	(29.4)	(243.6)
Interest @ 8.0%	44.8	40.1	10.6	95.4
<b>UAL due to change to PUC, December 31, 2007</b>	\$ 604.3	\$ 541.3	\$ 142.5	\$ 1,288.1
Employers joining SLGRP	54.9	0.0	(39.1)	15.9
<b>UAL due to change to PUC, January 1, 2008</b>	\$ 659.3	\$ 541.3	\$ 103.4	\$ 1,304.0
<b>Regular UAL, December 31, 2006</b>	41.8	817.4	(513.4)	484.8
Normal Cost	171.3	100.0	57.7	329.0
Contributions	(344.9)	(278.7)	(79.5)	(703.1)
Liability (gain) or loss	(63.4)	(65.8)	(12.4)	(141.1)
Asset (gain) or loss	(225.8)	(37.4)	(45.8)	(315.8)
Assumption changes	0.0	0.0	0.0	0.0
Interest @ 8.0%	8.0	66.0	(38.5)	46.7
<b>Regular UAL, December 31, 2007</b>	\$ (412.9)	\$ 601.5	\$ (631.8)	\$ (299.5)
Employers joining SLGRP	(37.5)	0.0	306.6	269.1
<b>Regular UAL, January 1, 2008</b>	\$ (450.4)	\$ 601.5	\$ (325.2)	\$ (30.4)
<b>Total UAL, January 1, 2008</b>	\$ 208.9	\$ 1,142.8	\$ (221.8)	\$ 1,273.6

Amounts in millions

<sup>1</sup> Includes Multnomah Fire District #10

The difference between the UAL as of December 31, 2007 and January 1, 2008 is due to the allocation of a portion of the UAL or surplus of employers joining the SLGRP to a transition liability or surplus. There is no change to the total UAL when transition liabilities or surpluses are included.

# Pension Plan Valuation

## Tier 1/Tier 2 Valuation (*continued*)

### **Tier 1/Tier 2 Pension Contribution Rate Development**

#### **Normal Cost Rates**

The table below shows the development of the system-wide weighted average normal cost rate.

	12/31/2007	12/31/2006	Percent Change
Normal Cost			
a. Service Retirement	\$ 351.6	\$ 302.1	16.4%
b. Vested Benefits	15.9	14.1	12.2%
c. Duty Disability	1.6	1.5	5.5%
d. Nonduty Disability	11.8	11.3	4.9%
e. Death	0.0	0.0	5.9%
<b>f. Total Normal Cost</b>	<b>\$ 380.9</b>	<b>\$ 329.0</b>	<b>15.8%</b>
<b>Tier 1/ Tier 2 Valuation Payroll</b>	<b>\$ 6,261.9</b>	<b>\$ 6,336.4</b>	<b>(1.2%)</b>
Average Normal Cost Rate			
a. Service Retirement	5.62%	4.77%	
b. Vested Benefits	0.25%	0.22%	
c. Duty Disability	0.03%	0.02%	
d. Nonduty Disability	0.19%	0.18%	
e. Death	0.00%	0.00%	
<b>f. Average Normal Cost Rate</b>	<b>6.08%</b>	<b>5.19%</b>	

*Amounts in millions*

# Pension Plan Valuation

## Tier 1/Tier 2 Valuation (continued)

### **Tier 1/Tier 2 Pension Contribution Rate Development (continued)**

#### **Normal Cost Rates (continued)**

The table below shows the development of the normal cost rate for the various rate pools. For this exhibit, all Independent Employers, including State Judiciary, have been grouped together.

Tier 1/Tier 2 Pension	December 31, 2007			
	SLGRP	School Districts	Independent Employers	Tier 1 / Tier 2 Totals
<b>Normal Cost</b>				
Tier 1 General Service	\$ 54.7	\$ 48.3	\$ 11.4	\$ 114.4
Tier 2 General Service	\$ 87.8	\$ 64.5	\$ 13.7	\$ 166.0
Tier 1 Police & Fire	\$ 39.7	\$ 0.4	\$ 14.9	\$ 55.1
Tier 2 Police & Fire	\$ 35.5	\$ 0.2	\$ 9.8	\$ 45.4
<b>Total Normal Cost</b>	<b>\$ 217.7</b>	<b>\$ 113.4</b>	<b>\$ 49.8</b>	<b>\$ 380.9</b>
<b>Tier 1/ Tier 2 Valuation Payroll</b>				
Tier 1 General Service	\$ 1,652.9	\$ 1,316.0	\$ 240.0	\$ 3,208.8
Tier 2 General Service	\$ 1,218.9	\$ 865.0	\$ 195.6	\$ 2,279.5
Tier 1 Police & Fire	\$ 304.6	\$ 2.9	\$ 111.5	\$ 419.0
Tier 2 Police & Fire	\$ 271.6	\$ 1.2	\$ 81.8	\$ 354.7
<b>Total Valuation Payroll</b>	<b>\$ 3,448.1</b>	<b>\$ 2,185.0</b>	<b>\$ 628.8</b>	<b>\$ 6,261.9</b>
<b>Average Normal Cost Rates</b>				
Tier 1 General Service	3.31%	3.67%	4.77%	3.57%
Tier 2 General Service	7.20%	7.46%	6.99%	7.28%
Tier 1 Police & Fire	13.04%	15.43%	13.36%	13.14%
Tier 2 Police & Fire	13.06%	15.66%	11.95%	12.81%
<b>Average Rates</b>				
Tier 1 Average	4.82%	3.69%	7.49%	4.67%
Tier 2 Average	8.27%	7.47%	8.46%	8.03%
<b>System Average</b>	<b>6.31%</b>	<b>5.19%</b>	<b>7.92%</b>	<b>6.08%</b>
Member Contributions			0.19%	0.02%
<b>Employer System Average</b>	<b>6.31%</b>	<b>5.19%</b>	<b>7.73%</b>	<b>6.06%</b>

Amounts in millions

# Pension Plan Valuation

## Tier 1/Tier 2 Valuation (continued)

### **Tier 1/Tier 2 Pension Contribution Rate Development (continued)**

#### UAL Rates

The Regular UAL rate is determined by amortizing the unfunded actuarial accrued liability over the period ending December 31, 2027 and expressing the result as a percentage of combined valuation payroll.

The change in the unfunded actuarial accrued liability due to the change to the Projected United Credit funding method is amortized over a rolling three-year period and is also expressed as a percentage of combined valuation payroll.

The following table develops the UAL rate separately for each of the rate pools. For this exhibit, all Independent Employers, including State Judiciary, have been grouped together.

	December 31, 2007			
	SLGRP	School Districts	Independent Employers	Tier 1 / Tier 2 Totals <sup>1</sup>
1. Total UAL	\$ 208.9	\$ 1,142.8	\$ (221.8)	\$ 1,273.6
2. Change due to change in actuarial cost method	659.3	541.3	103.4	1,304.0
3. Regular UAL (1. - 2.)	\$ (450.4)	\$ 601.5	\$ (325.2)	\$ (30.4)
4. Combined valuation payroll	\$ 4,264.2	\$ 2,693.3	\$ 764.3	\$ 7,721.8
5. 3-year Amortization Factor	2.831	2.831	2.831	2.831
6. Regular Amortization Factor	13.772	13.772	13.772	13.772
<b>7. UAL rate - change to PUC</b>	<b>5.46%</b>	<b>7.10%</b>	<b>4.78%</b>	<b>5.97%</b>
<b>8. UAL rate - regular UAL</b>	<b>(0.77%)</b>	<b>1.62%</b>	<b>(3.09%)</b>	<b>(0.03%)</b>

Amounts in millions

<sup>1</sup> While the Tier 1/Tier 2 Total UAL amount includes the UAL for Multnomah Fire District #10 (MFD), the UAL rate for MFD is developed separately in this report and is added to the rates shown in this table.

## Pension Plan Valuation

### Tier 1/Tier 2 Valuation (*continued*)

#### **Tier 1/Tier 2 Pension Contribution Rate Development (*continued*)**

##### *Pre-SLGRP Pooled Rate*

Prior to the formation of the SLGRP, the State and Community Colleges were pooled together and some employers participated in the Local Government Rate Pool (LGRP). The UAL attributable to the State and Community Colleges and the LGRP at the time the SLGRP was formed is maintained separately from the UAL for the SLGRP. The balance of the pre-SLGRP pooled liability attributable to the State and Community Colleges or the LGRP on the valuation date is amortized over the period ending December 31, 2027, and expressed as a percentage of combined valuation payroll.

	12/31/2007	12/31/2006
<b>State and Community College Pool</b>		
1. Total pre-SLGRP pooled liability	\$ 639.9	\$ 639.9
2. Combined valuation payroll	\$ 2,393.1	\$ 2,256.3
3. Amortization Factor	13.772	14.212
4. Pre-SLGRP pooled rate (1. ÷ 2. ÷ 3.)	1.94%	2.00%
<b>Local Government Rate Pool</b>		
1. Total pre-SLGRP pooled liability	\$ (261.6)	\$ (261.2)
2. Combined valuation payroll	\$ 1,073.7	\$ 1,024.1
3. Amortization Factor	13.772	14.212
4. Pre-SLGRP pooled rate (1. ÷ 2. ÷ 3.)	(1.77%)	(1.79%)

*Amounts in millions*

## Pension Plan Valuation

### Tier 1/Tier 2 Valuation (*continued*)

#### **Tier 1/Tier 2 Pension Contribution Rate Development (*continued*)**

##### *Transition Liability or Surplus Rate*

When an employer joins the SLGRP, a transition liability or surplus is calculated to ensure that each employer enters the pool on a comparable basis. The transition liability is maintained separately from the UAL for the SLGRP. Like the UAL, the transition liability for an employer who joined the SLGRP after the change to the PUC method is divided into a portion attributable to the change to PUC and a regular transition liability. The balance of the transition liability remaining on the valuation date attributable to the PUC change is amortized over a rolling three-year period and the balance attributable to the regular transition liability is amortized over the period ending December 31, 2027. Both amortizations are expressed as a percentage of combined valuation payroll.

	12/31/2007	12/31/2006
1. Total transition liability / (surplus)	\$ (832.9)	\$ (549.0)
2. Transition liability / (surplus) - change to PUC	\$ (16.9)	\$ (1.2)
3. Transition liability / (surplus) - regular UAL (1. - 2.)	\$ (816.0)	\$ (547.8)
4. Combined valuation payroll	\$ 1,770.3	\$ 1,350.1
5. 3-Year amortization factor	2.831	2.831
6. Amortization Factor	13.772	14.212
7. <b>Average transition liability/(surplus) - change to PUC (2. ÷ 4. ÷ 5.)</b>	<b>(0.34%)</b>	<b>(0.03%)</b>
8. <b>Average transition liability/(surplus) - regular UAL (3. ÷ 4. ÷ 6.)</b>	<b>(3.35%)</b>	<b>(2.85%)</b>

*Amounts in millions*

# Pension Plan Valuation

## Tier 1/Tier 2 Valuation (continued)

### **Tier 1/Tier 2 Pension Contribution Rate Development (continued)**

#### **Multnomah FD #10 UAL Rate**

The Multnomah FD #10 UAL rate is determined by amortizing Multnomah FD #10's unfunded actuarial accrued liability over the period ending December 31, 2027, and expressing the result as a percentage of combined valuation payroll.

As part of the 2003 Legislation, the Multnomah FD#10 UAL was allocated to Tier 1/Tier 2 employers. Multnomah FD#10 was allocated \$50,000 of the outstanding UAL, which was fully paid in November, 2003. Of the remaining UAL, City of Portland is allocated 21.8743%, while all Tier 1/Tier 2 employers, including City of Portland, share in the remaining 78.1257%. In addition, four other employers (City of Gresham, City of Fairview, City of Wood Village, and City of Troutdale) are required to pay twice the rate that is determined under item 6.b. below. Thus, the combined valuation payroll for all Tier 1/Tier 2 employers, shown below in item 4.b., includes twice the valuation payroll for those four employers.

	December 31, 2007	December 31, 2006
1. Actuarial accrued liability		
a. Active members	\$ 1.1	\$ 1.2
b. Dormant members	\$ 0.8	\$ 0.7
c. Retired members and beneficiaries	\$ 60.6	\$ 61.0
d. Total actuarial accrued liability	\$ 62.5	\$ 62.9
2. Actuarial value of assets		
a. Employer reserve	\$ (134.8)	\$ (130.3)
b. Members reserve	\$ 0.7	\$ 0.7
c. Benefits in force reserve	\$ 53.0	\$ 53.5
d. Total actuarial value of assets	\$ (81.2)	\$ (76.1)
3. Multnomah FD #10 UAL	\$ 143.7	\$ 139.0
a. Portion allocated to City of Portland (21.8743% x 3.)	\$ 31.4	\$ 30.4
b. Portion allocated to all T1/T2 employers (78.1257% x 3.)	\$ 112.3	\$ 108.6
4. Combined valuation payroll		
a. City of Portland	\$ 259.9	\$ 242.3
b. All Tier 1 / Tier 2 employers	\$ 7,766.0	\$ 7,368.3
5. Amortization factor	13.772	14.212
6. Multnomah FD #10 UAL Rate		
a. City of Portland (3.a. ÷ 4.a. ÷ 5.)	0.88%	0.88%
b. All Tier 1 / Tier 2 employers (3.b. ÷ 4.b. ÷ 5.)	0.10%	0.10%
7. Total Multnomah FD #10 UAL Rate		
a. City of Portland (6.a. + 6.b.)	0.98%	0.98%
b. City of Gresham, City of Fairview, City of Wood Village, City of Troutdale (2 x 6.b.)	0.20%	0.20%
c. All other Tier 1 / Tier 2 employers (6.b.)	0.10%	0.10%

Amounts in millions

## Pension Plan Valuation

### Tier 1/Tier 2 Valuation (*continued*)

#### **Tier 1/Tier 2 Pension Contribution Rate Development (*continued*)**

##### **Calculated Employer Contribution Rate Summary (*Pre-Rate Collar*)**

The following table summarizes the development of the total Tier 1/Tier 2 contribution rate for each rate pool as of the valuation date. The normal cost rates apply to Tier 1/Tier 2 payroll only, but all other rates are applied to combined valuation payroll. These rates are adjusted on an individual employer basis for Side Accounts and pre-SLGRP liabilities, if applicable. Weighted average adjustments for Side Account and pre-SLGRP liabilities are shown in the table. For individual employers, these adjustments cannot reduce the pension contribution rate below 0.0%. For purposes of this exhibit, Independent Employers, including State Judiciary, have been treated as a single rate pool.

	December 31, 2007			
	SLGRP	School Districts	Independent Employers	Tier 1 / Tier 2 Totals
<b>Tier 1/Tier 2 pension contribution rates</b>				
Employer normal cost rate	6.31%	5.19%	7.73%	6.06%
Member normal cost rate			0.19%	0.02%
UAL - regular rate	(0.77%)	1.62%	(3.09%)	(0.03%)
UAL - PUC change rate	5.46%	7.10%	4.78%	5.97%
Multnomah FD #10 rate	0.15%	0.10%	0.10%	0.13%
<b>Total Tier 1/Tier 2 pension rate</b>	<b>11.15%</b>	<b>14.01%</b>	<b>9.71%</b>	<b>12.15%</b>
<b>Average adjustments</b>				
Pre-SLGRP liability/(surplus) rate	(0.89%)	N/A	N/A	(0.49%)
Side Account Rate	(6.20%)	(10.51%)	(1.14%)	(7.20%)
<b>Total average adjustment</b>	<b>(7.09%)</b>	<b>(10.51%)</b>	<b>(1.14%)</b>	<b>(7.69%)</b>
<b>Net pension contribution rate</b>	<b>4.06%</b>	<b>3.50%</b>	<b>8.57%</b>	<b>4.46%</b>

# Pension Plan Valuation

## Tier 1/Tier 2 Valuation (continued)

### **Tier 1/Tier 2 Pension Contribution Rate Development (continued)**

#### **Calculation of Rate Collar**

Employer contribution rates cannot change by more than the greater of 3 percentage points or 20% from the current contribution rate. However, if the funded percentage is below 80% or above 120%, the size of the collar is doubled. All collar calculations are performed excluding amounts and contribution rates attributable to pre-SLGRP liabilities, Side Accounts and member contributions. Retiree medical rates are also excluded from the rate collar calculation.

The table below develops the impact of the collar for each of the Tier 1/Tier 2 rate pools. Although the calculation is performed individually for Independent Employers, the table shows the calculation as if Independent Employers were a pool. Note that Independent Employers, other than the State Judiciary, are subject to a minimum employer contribution rate of 6.0% that is not taken into account in the calculation below.

Calculation of Collar Adjustments	July 1, 2009			
	SLGRP	School Districts	Independent Employers	Tier 1 / Tier 2 Totals
1. Current employer contribution rate <sup>1</sup>	13.84%	17.27%	13.49%	15.00%
2. Size of rate collar				
a. Preliminary size of rate collar ( <i>maximum of 3% or 20% x 1.</i> )	3.00%	3.45%	3.00%	3.00%
b. Funded percentage	99.2%	94.6%	105.0%	97.6%
<b>c. Size of rate collar (If b. &lt; 80% or b. &gt; 120%, 2 x a., otherwise a.)</b>	<b>3.00%</b>	<b>3.45%</b>	<b>3.00%</b>	<b>3.00%</b>
3. 7/1/2009 Minimum employer contribution rate (1. - 2.c.)	10.84%	13.82%	10.49%	12.00%
4. 7/1/2009 Maximum employer contribution rate (1. + 2.c.)	16.84%	20.72%	16.49%	18.00%
5. 12/31/2007 employer contribution rate before collar	11.15%	14.01%	9.71%	12.15%
6. 12/31/2007 employer contribution rate after collar (5., but not less than 3. or more than 4.)	11.15%	14.01%	10.49%	12.15%
<b>7. Impact of collar (6. - 5.)</b>	<b>0.00%</b>	<b>0.00%</b>	<b>0.78%</b>	<b>0.00%</b>

<sup>1</sup> The Independent Employers rate has increased from 9.95% as a result of employers joining the SLGRP.

## Pension Plan Valuation

### Tier 1/Tier 2 Valuation (*continued*)

#### ***Tier 1/Tier 2 Pension Contribution Rate Development (continued)***

##### ***Calculated Employer Contribution Rate Summary (Post Rate Collar)***

Any adjustment for the collar is made to the regular UAL rate. The table below summarizes the average rates that will be effective July 1, 2009 by pool and component. Although the rate collar is applied individually for Independent Employers, the table shows the average rates as if Independent Employers were a pool. Note that Independent Employers, other than the State Judiciary, are subject to a minimum employer contribution rate of 6.0% that is not taken into account in the average rates below.

	December 31, 2007			
	SLGRP	School Districts	Independent Employers	Tier 1 / Tier 2 Totals
<b>Tier 1/Tier 2 pension contribution rates</b>				
Employer normal cost rate	6.31%	5.19%	7.73%	6.06%
Member normal cost rate			0.19%	0.02%
UAL - regular rate	(0.77%)	1.62%	(2.31%)	(0.03%)
UAL - PUC change rate	5.46%	7.10%	4.78%	5.97%
Multnomah FD #10 rate	0.15%	0.10%	0.10%	0.13%
<b>Total Tier 1/Tier 2 pension rate</b>	<b>11.15%</b>	<b>14.01%</b>	<b>10.49%</b>	<b>12.15%</b>
<b>Average adjustments</b>				
Pre-SLGRP liability/(surplus) rate	(0.89%)	N/A	N/A	(0.49%)
Side Account Rate	(6.20%)	(10.51%)	(1.14%)	(7.20%)
<b>Total average adjustment</b>	<b>(7.09%)</b>	<b>(10.51%)</b>	<b>(1.14%)</b>	<b>(7.69%)</b>
<b>Net pension contribution rate</b>	<b>4.06%</b>	<b>3.50%</b>	<b>9.35%</b>	<b>4.46%</b>

# Pension Plan Valuation

## OPSRP Valuation

### **OPSRP Assets**

Information on OPSRP assets is shown in the section of this report covering the system-wide assets. As of December 31, 2007, the actuarial value of assets for OPSRP is \$275.1 million.

### **OPSRP Liabilities**

#### *Normal Cost*

The normal cost represents the value of benefits assigned to the next year of service by the actuarial cost method. If all actuarial assumptions are met, the normal cost represents the amount that would need to be contributed each year to fund plan benefits.

A summary of the normal cost by decrement is shown below for the current and prior year.

Normal Cost	December 31, 2007			December 31, 2006		
	General Service	Police & Fire	Total	General Service	Police & Fire	Total
<b>Pre-Retirement Disability</b>						
Duty	\$ 0.2	\$ 0.2	\$ 0.3	\$ 0.1	\$ 0.1	\$ 0.2
Non-Duty	3.1	0.3	3.4	2.0	0.2	2.2
<b>Total Pre-Retirement Disability</b>	<b>\$ 3.3</b>	<b>\$ 0.5</b>	<b>\$ 3.7</b>	<b>\$ 2.1</b>	<b>\$ 0.3</b>	<b>\$ 2.4</b>
<b>Other Benefits</b>						
Service Retirement	\$ 55.7	\$ 8.2	\$ 64.0	\$ 37.6	\$ 5.4	\$ 43.0
Vested Benefits	8.1	0.9	9.0	5.2	0.5	5.8
Death	0.8	0.1	0.9	0.6	0.1	0.6
Duty Disability Retirement	0.1	0.1	0.3	0.1	0.1	0.2
Non-Duty Disability Retirement	1.7	0.2	1.9	1.1	0.1	1.3
<b>Total Other Benefits</b>	<b>\$ 66.5</b>	<b>\$ 9.6</b>	<b>\$ 76.0</b>	<b>\$ 44.6</b>	<b>\$ 6.2</b>	<b>\$ 50.8</b>
Assumed Administrative Expenses	\$ 7.8	\$ 0.7	\$ 8.5	\$ 7.8	\$ 0.7	\$ 8.5
<b>Total Normal Cost</b>	<b>\$ 77.5</b>	<b>\$ 10.8</b>	<b>\$ 88.3</b>	<b>\$ 54.5</b>	<b>\$ 7.2</b>	<b>\$ 61.7</b>

*Amounts in millions*

The increase in the normal cost since the prior valuation is primarily attributable to the new entrants to the OPSRP program. The table below reconciles the normal cost from the prior valuation to the current valuation.

	OPSRP
<b>Normal Cost, December 31, 2006</b>	<b>\$ 61.7</b>
Expected increase	2.3
Assumption changes	-
Plan changes	-
New entrants	22.1
Deviations from expected experience	2.2
<b>Normal Cost, December 31, 2007</b>	<b>\$ 88.3</b>

*Amounts in millions*

# Pension Plan Valuation

## OPSRP Valuation (continued)

### OPSRP Liabilities (continued)

#### Actuarial Accrued Liability

The actuarial accrued liability represents the value of benefits attributed to prior years of service by the actuarial cost method. A summary of the actuarial accrued liability by decrement is shown below for the current and prior year.

Summary of Actuarial Accrued Liability	December 31, 2007			December 31, 2006		
	General Service	Police & Fire	Total	General Service	Police & Fire	Total
<b>Active Members</b>						
Pre-retirement Duty Disability	\$ 0.5	\$ 0.4	\$ 0.9	\$ 0.3	\$ 0.2	\$ 0.5
Pre-retirement Non-Duty Disability	\$ 7.8	\$ 0.8	\$ 8.6	\$ 4.3	\$ 0.4	\$ 4.7
Service Retirement	\$ 142.1	\$ 20.6	\$ 162.7	\$ 81.9	\$ 10.9	\$ 92.8
Vested Benefits	\$ 20.3	\$ 2.1	\$ 22.4	\$ 11.3	\$ 1.1	\$ 12.4
Death	\$ 2.1	\$ 0.2	\$ 2.3	\$ 1.2	\$ 0.1	\$ 1.3
Duty Disability Retirement	\$ 0.4	\$ 0.3	\$ 0.7	\$ 0.2	\$ 0.2	\$ 0.4
Non-Duty Disability Retirement	\$ 4.2	\$ 0.6	\$ 4.8	\$ 2.4	\$ 0.3	\$ 2.7
<b>Total Active Members</b>	<b>\$ 177.3</b>	<b>\$ 25.1</b>	<b>\$ 202.4</b>	<b>\$ 101.6</b>	<b>\$ 13.2</b>	<b>\$ 114.8</b>
Dormant Members			\$ 0.6			\$ 0.2
Retired Members and Beneficiaries			\$ 0.0			\$ 0.0
<b>Total Actuarial Accrued Liability</b>			<b>\$ 203.0</b>			<b>\$ 115.0</b>

Amounts in millions

The change in actuarial accrued liability since the last valuation reflects the experience of the system. The table below reconciles the actuarial accrued liability from the last valuation to this valuation. The actuarial accrued liability is expected to increase due to benefits earned during the year and interest, and to decrease due to benefits paid during the year.

#### Reconciliation of Changes in Actuarial Accrued Liability

	OPSRP
<b>Actuarial Accrued Liability 12/31/2006</b>	<b>\$ 115.0</b>
Expected change	66.5
Assumption changes	-
Plan changes	-
New entrants	27.7
<b>Deviations from expected experience</b>	
Retirements from active status	0.6
Active mortality and withdrawal	(3.6)
Pay increases	11.2
Other <sup>1</sup>	(14.4)
<b>Total demographic (gains) and losses</b>	<b>(6.2)</b>
<b>Actuarial Accrued Liability 12/31/2007</b>	<b>\$ 203.0</b>

Amounts in millions

<sup>1</sup> Includes \$(12.1) for actual vs. estimated changes in retirement credit amounts under the new retirement credit definition in ORS 238A.140, and \$(2.3) for other deviations from expected experience.

## Pension Plan Valuation

### OPSRP Valuation *(continued)*

#### **OPSRP Unfunded Accrued Liability (UAL)**

##### *Calculation of UAL*

The Unfunded Accrued Liability (UAL) represents the difference between the Actuarial Accrued Liability and the valuation assets. The UAL is amortized over combined valuation payroll. The table below shows the OPSRP UAL, funded status, and UAL as a percentage of combined valuation payroll.

Unfunded Accrued Liability	December 31, 2007		December 31, 2006	
1. Actuarial accrued liability	\$	203.0	\$	115.0
2. Actuarial value of assets	\$	275.1	\$	151.4
3. Unfunded accrued liability	\$	(72.1)	\$	(36.4)
4. Funded percentage (2. ÷ 1.)		135%		132%
5. Combined valuation payroll	\$	7,721.8	\$	7,326.8
6. Unfunded accrued liability as % of combined valuation payroll		(1%)		(0%)

*Amounts in millions*

# Pension Plan Valuation

## OPSRP Valuation *(continued)*

### **OPSRP Unfunded Accrued Liability (UAL) *(continued)***

#### **Actuarial Gain or Loss since Prior Valuation**

In every actuarial valuation, assumptions are made as to the future experience of the plan and covered group of participants. Whenever there is a difference between the actual experience and that anticipated by the actuarial assumptions, there is a gain or loss to the plan. Gains are the result of experience that is more favorable than anticipated (i.e., serves to reduce the unfunded actuarial liability or increase the surplus), while losses are the result of unfavorable experience. The 2007 liability loss is primarily due to new entrants to the OPSRP program and pay increases greater than anticipated.

The table below develops the actuarial gain or loss for OPSRP for the year ending December 31, 2007.

1. Expected actuarial accrued liability		
a. Actuarial accrued liability at December 31, 2006	\$	115.0
b. Normal cost at December 31, 2006 (excluding administrative expenses)	\$	53.2
c. Benefit payments (excluding administrative expenses) for year ending December 31, 2007	\$	(0.2)
d. Interest	\$	13.5
e. Expected actuarial accrued liability before changes <i>(a. + b. + c. + d.)</i>	\$	181.5
f. Change in actuarial accrued liability at December 31, 2007, due to assumption changes	\$	0.0
g. Change in actuarial accrued liability at December 31, 2007, due to plan changes	\$	0.0
h. Expected actuarial accrued liability at December 31, 2007 <i>(e. + f. + g.)</i>	\$	181.5
2. Actuarial accrued liability at December 31, 2007	\$	203.0
<b>3. Liability gain/(loss) (1.g. - 2)</b>	<b>\$</b>	<b>(21.5)</b>
4. Expected actuarial value of assets		
a. Actuarial value of assets at December 31, 2006	\$	151.4
b. Actual contributions for 2007	\$	106.5
c. Benefit payments and administrative expenses for fiscal year ending December 31, 2007	\$	(6.9)
d. Interest	\$	15.8
e. Expected actuarial value of assets at December 31, 2007 <i>(a. + b. + c. + d. + e.)</i>	\$	266.9
5. Actuarial value of assets as of December 31, 2007	\$	275.1
<b>6. Asset gain/(loss) (5. - 4e.)</b>	<b>\$</b>	<b>8.2</b>
<b>7. Net actuarial gain/(loss) (3. + 6.)</b>	<b>\$</b>	<b>(13.3)</b>

*Amounts in millions*

# Pension Plan Valuation

## OPSRP Valuation *(continued)*

### **OPSRP Unfunded Accrued Liability (UAL) *(continued)***

#### *Reconciliation of the UAL*

The table below summarizes the changes in UAL since the prior valuation.

	OPSRP
<b>UAL, December 31, 2006</b>	<b>\$ (36.4)</b>
Normal Cost (including actual administrative expenses)	60.0
Contributions	(106.5)
Liability (gain) or loss	21.5
Asset (gain) or loss	(8.2)
Assumption changes	0.0
Plan changes	0.0
Interest @ 8.0%	(2.4)
<b>UAL, December 31, 2007</b>	<b>\$ (72.1)</b>

*Amounts in millions*

# Pension Plan Valuation

## OPSRP Valuation *(continued)*

### **OPSRP Contribution Rate Development**

#### **Normal Cost Rates**

The table below shows the development of the OPSRP normal cost rates.

Development of Normal Cost Rate	December 31, 2007			December 31, 2006		
	General Service	Police & Fire	Average Rate	General Service	Police & Fire	Average Rate
<b>Normal Cost</b>						
Pre-retirement Disability Benefits	\$ 3.3	\$ 0.5	\$ 3.7	\$ 2.1	\$ 0.3	\$ 2.4
All Other Benefits	\$ 66.5	\$ 9.6	\$ 76.0	\$ 44.6	\$ 6.2	\$ 50.8
Assumed Administrative Expenses	\$ 7.8	\$ 0.7	\$ 8.5	\$ 7.8	\$ 0.7	\$ 8.5
<b>Total Normal Cost</b>	<b>\$ 77.5</b>	<b>\$ 10.8</b>	<b>\$ 88.3</b>	<b>\$ 54.5</b>	<b>\$ 7.2</b>	<b>\$ 61.7</b>
OPSRP Valuation Payroll	\$ 1,333.2	\$ 126.7	\$ 1,459.9	\$ 908.8	\$ 81.6	\$ 990.4
<b>Normal Cost Rate</b>						
Pre-retirement Disability Benefits	0.24%	0.39%	0.26%	0.23%	0.36%	0.24%
All Other Benefits	4.99%	7.55%	5.21%	4.91%	7.65%	5.13%
Assumed Administrative Expenses	0.58%	0.58%	0.58%	0.86%	0.86%	0.86%
<b>Total Normal Cost</b>	<b>5.81%</b>	<b>8.52%</b>	<b>6.05%</b>	<b>6.00%</b>	<b>8.87%</b>	<b>6.23%</b>

Amounts in millions

#### **UAL Rates**

The OPSRP UAL rate is determined by amortizing the unfunded actuarial accrued liability over 16 years as a level percentage of combined valuation payroll.

Development of UAL Rate	December 31, 2007	December 31, 2006
1. UAL	\$ (72.1)	\$ (36.4)
2. Combined valuation payroll	\$ 7,721.8	\$ 7,326.8
3. Amortization Factor	11.825	11.825
4. UAL rate	(0.08%)	(0.04%)

Amounts in millions

# Pension Plan Valuation

## OPSRP Valuation *(continued)*

### **OPSRP Contribution Rate Development *(continued)***

#### *Calculated Employer Contribution Rates (Pre-Rate Collar)*

The following table summarizes the OPSRP contribution rate for general service and police & fire members as of the valuation date prior to application of the collar.

The normal cost rates apply to OPSRP payroll only, but the UAL rate is applied to combined valuation payroll. These rates, after the application of the collar, are combined with each employer's Tier 1/Tier 2 rates (other than Tier 1/Tier 2 normal cost rate) to determine each employer's contribution rate on OPSRP payroll.

Calculated OPSRP Contribution Rates	General		
	Service	Police & Fire	Average Rate
<b>December 31, 2007</b>			
Total normal cost rate	5.81%	8.52%	6.05%
Total UAL rate	(0.08%)	(0.08%)	(0.08%)
<b>Total OPSRP contribution rate</b>	<b>5.73%</b>	<b>8.44%</b>	<b>5.97%</b>
<b>December 31, 2006</b>			
Total normal cost rate	6.00%	8.87%	6.23%
Total UAL rate	(0.04%)	(0.04%)	(0.04%)
<b>Total OPSRP contribution rate</b>	<b>5.96%</b>	<b>8.83%</b>	<b>6.19%</b>

# Pension Plan Valuation

## OPSRP Valuation *(continued)*

### **OPSRP Contribution Rate Development *(continued)***

#### *Calculation of Rate Collar*

The rate collar restricts the average OPSRP contribution rate so it cannot change by more than the greater of 3 percentage points or 20 percent from the current average OPSRP contribution rate. However, if the funded percentage is below 80 percent or above 120 percent, the size of the collar is doubled. All collar calculations are performed based on the weighted average OPSRP contribution rate, and any adjustment due to the collar is applied to the OPSRP UAL rate.

The table below shows the calculation of and any adjustment for the rate collar.

Calculation of Collar Adjustments	General Service	Police & Fire	Average Rate
1. Current employer contribution rate	6.09%	9.41%	6.33%
2. Size of rate collar			
a. Preliminary size of rate collar (Maximum of 3% or 20% of 1.)			3.00%
b. Funded percentage			135.5%
c. Size of rate collar (If b. < 80% or b. > 120%, 2 x a., otherwise a.)			6.00%
3. 7/1/2009 Minimum contribution rate (1. - 2.c.)			0.33%
4. 7/1/2009 Maximum contribution rate (1. + 2.c.)			12.33%
5. 12/31/2007 employer contribution rate before collar	5.73%	8.44%	5.97%
6. 12/31/2007 employer contribution rate after collar	5.73%	8.44%	5.97%
7. <b>Impact of collar (6. - 5.)</b>	<b>0.00%</b>	<b>0.00%</b>	<b>0.00%</b>

# Retiree Healthcare Valuation

## Retiree Healthcare Assets

### Assets

A reconciliation of retiree healthcare assets is shown below.

Reconciliation of Assets <sup>1</sup>	RHIA	RHIPA	Retiree Healthcare Totals
<b>Additions</b>			
1. Employer contributions	\$ 35.5	\$ 2.1	\$ 37.6
2. Net investment income	\$ 22.1	\$ 0.7	\$ 22.8
3. Other	\$ 0.0	\$ 0.0	\$ 0.0
<b>4. Total additions</b>	<b>\$ 57.5</b>	<b>\$ 2.8</b>	<b>\$ 60.4</b>
<b>Deductions</b>			
4. Healthcare Premium Subsidies	(27.2)	(1.9)	(29.2)
5. Administrative expenses	(0.9)	(0.1)	(1.0)
<b>6. Total deductions</b>	<b>(28.1)</b>	<b>(2.0)</b>	<b>(30.2)</b>
<b>7. Net change</b>	<b>29.4</b>	<b>0.8</b>	<b>30.2</b>
8. Net assets held in trust for benefits			
a. Beginning of year	221.3	7.0	228.4
<b>b. End of year</b>	<b>250.8</b>	<b>7.8</b>	<b>258.6</b>

Amounts in millions.

<sup>1</sup> The reconciliation of assets is provided by PERS.

# Retiree Healthcare Valuation

## Retiree Healthcare Liabilities

### **Normal Cost**

A summary of the normal cost by decrement is shown below for the retiree healthcare benefits.

	RHIA			RHIPA		
	12/31/2007	12/31/2006	Percent Change	12/31/2007	12/31/2006	Percent Change
<b>Normal Cost</b>						
Service Retirement	\$ 5.8	\$ 5.7	0.6%	\$ 0.9	\$ 0.8	2.2%
Vested Benefits	0.6	0.7	(11.4%)	0.0	0.0	0.0%
Duty Disability	0.0	0.0	(4.2%)	0.0	0.0	(1.7%)
Nonduty Disability	0.1	0.1	(2.7%)	0.1	0.1	(3.8%)
Death	0.1	0.1	0.6%	0.0	0.0	0.5%
<b>Total Normal Cost</b>	<b>\$ 6.6</b>	<b>\$ 6.6</b>	<b>(0.7%)</b>	<b>\$ 0.9</b>	<b>\$ 0.9</b>	<b>1.7%</b>

*Amounts in millions*

The table below reconciles the normal cost from the prior valuation to the current valuation.

	RHIA	RHIPA
<b>Normal Cost 12/31/2006</b>	<b>\$6.6</b>	<b>\$0.9</b>
Expected increase	-	-
Assumption changes	-	-
Plan changes	-	-
<b>Deviations from expected experience</b>		
Demographic (gains) or losses	(0.0)	0.0
<b>Normal Cost 12/31/2007</b>	<b>\$6.6</b>	<b>\$0.9</b>

*Amounts in millions*

# Retiree Healthcare Valuation

## Retiree Healthcare Liabilities (*continued*)

### **Actuarial Accrued Liability**

A summary of the actuarial accrued liability by decrement is shown below for the retiree healthcare benefits.

	RHIA			RHIPA		
	12/31/2007	12/31/2006	Percent Change	12/31/2007	12/31/2006	Percent Change
<b>Active</b>						
Service Retirement	\$ 86.5	\$ 81.8	5.7%	\$ 14.8	\$ 14.2	4.1%
Vested Benefits	7.2	7.5	(4.0%)	0.0	0.0	0.0%
Duty Disability	0.1	0.1	1.9%	0.1	0.1	6.6%
Nonduty Disability	1.1	1.1	2.3%	0.9	0.8	3.2%
Death	1.6	1.5	6.2%	0.2	0.2	6.8%
<b>Total Actives</b>	<b>\$ 96.4</b>	<b>\$ 91.9</b>	<b>4.9%</b>	<b>\$ 15.9</b>	<b>\$ 15.3</b>	<b>4.1%</b>
<b>Dormant Members</b>	<b>20.1</b>	<b>19.5</b>	<b>3.2%</b>	<b>0.0</b>	<b>0.0</b>	<b>0.0%</b>
<b>Retired Members and Beneficiaries</b>	<b>383.1</b>	<b>400.4</b>	<b>(4.3%)</b>	<b>7.3</b>	<b>8.1</b>	<b>(9.1%)</b>
<b>Total Actuarial Accrued Liability</b>	<b>\$ 499.6</b>	<b>\$ 511.8</b>	<b>(2.4%)</b>	<b>\$ 23.3</b>	<b>\$ 23.4</b>	<b>(0.5%)</b>

*Amounts in millions*

The change in actuarial accrued liability since the last valuation reflects the experience of the system. The table below reconciles the actuarial accrued liability from the last valuation to this valuation. The actuarial accrued liability is expected to increase due to benefits earned during the year and interest, and to decrease due to benefits paid during the year.

	RHIA	RHIPA	Total
<b>Actuarial Accrued Liability 12/31/2006</b>	<b>\$ 511.8</b>	<b>\$ 23.4</b>	<b>\$ 535.2</b>
Expected Change	19.7	0.9	20.6
Assumption Changes	-	-	-
Plan changes	-	-	-
<b>Deviations from expected experience</b>			
Demographic (gains) or losses	(32.0)	(1.0)	(33.0)
<b>Actuarial Accrued Liability 12/31/2007</b>	<b>\$ 499.6</b>	<b>\$ 23.3</b>	<b>\$ 522.9</b>

*Amounts in millions*

## Retiree Healthcare Valuation

### Retiree Healthcare Unfunded Accrued Liability (UAL)

#### **Calculation of UAL**

The Unfunded Accrued Liability (UAL) represents the difference between the Actuarial Accrued Liability and the valuation assets. A summary of the UAL by program is shown on the following table.

	RHIA			RHIPA		
	12/31/2007	12/31/2006	Percent Change	12/31/2007	12/31/2006	Percent Change
1. Actuarial accrued liability	\$ 499.6	\$ 511.8	(2.4%)	\$ 23.3	\$ 23.4	(0.5%)
2. Actuarial value of assets	\$ 250.8	\$ 221.3	13.3%	\$ 7.8	\$ 7.0	11.4%
3. Unfunded accrued liability	\$ 248.8	\$ 290.5	(14.3%)	\$ 15.5	\$ 16.4	(5.6%)
4. Funded percentage (2. ÷ 1.)	50.2%	43.2%	16.1%	33.6%	30.0%	12.0%
5. Combined valuation payroll	\$ 7,721.8	\$ 7,326.8	5.4%	\$ 2,080.2	\$ 1,946.8	6.9%
6. Unfunded accrued liability as % of combined valuation payroll (3. ÷ 5.)	3.2%	4.0%	(18.7%)	0.7%	0.8%	(11.6%)

*Amounts in millions*

# Retiree Healthcare Valuation

## Retiree Healthcare Unfunded Accrued Liability (UAL) *(continued)*

### Actuarial Gain or Loss since Prior Valuation

In every actuarial valuation, assumptions are made as to the future experience of the plan and covered group of participants. Whenever there is a difference between the actual experience and that anticipated by the actuarial assumptions, there is a gain or loss to the plan. Gains are the result of experience that is more favorable than anticipated (i.e., serves to reduce the unfunded actuarial liability or increase the surplus), while losses are the result of unfavorable experience.

The table below shows the development of the actuarial gain (or loss) for RHIA and RHIPA.

	RHIA	RHIPA	Retiree Healthcare Totals
<b>Retiree Healthcare</b>			
1. Expected actuarial accrued liability			
a. Actuarial accrued liability at December 31, 2006	\$ 511.8	\$ 23.4	\$ 535.2
b. Normal cost at December 31, 2006	\$ 6.6	\$ 0.9	\$ 7.5
c. Benefit payments for fiscal year ending December 31, 2007	\$ (27.2)	\$ (1.9)	\$ (29.2)
d. Interest	\$ 40.4	\$ 1.9	\$ 42.3
e. Expected actuarial accrued liability before changes (a. + b. + c. + d.)	\$ 531.6	\$ 24.3	\$ 555.9
f. Change in actuarial accrued liability at December 31, 2007, due to assumption changes	\$ -	\$ -	\$ -
g. Change in actuarial accrued liability at December 31, 2007, due to plan changes	\$ -	\$ -	\$ -
h. Expected actuarial accrued liability at December 31, 2007 (e. + f. + g.)	\$ 531.6	\$ 24.3	\$ 555.9
2. Actuarial accrued liability at December 31, 2007	\$ 499.6	\$ 23.3	\$ 522.9
<b>3. Liability gain/(loss) (1.h. - 2)</b>	<b>\$ 32.0</b>	<b>\$ 1.0</b>	<b>\$ 33.0</b>
4. Expected actuarial value of assets			
a. Actuarial value of assets at December 31, 2006	\$ 221.3	\$ 7.0	\$ 228.4
b. Actual contributions for 2007	\$ 35.5	\$ 2.1	\$ 37.6
c. Benefit payments for fiscal year ending December 31, 2007	\$ (27.2)	\$ (1.9)	\$ (29.2)
d. Interest	\$ 18.0	\$ 0.6	\$ 18.6
e. Expected actuarial value of assets before changes (a. + b. + c. + d.)	\$ 247.6	\$ 7.8	\$ 255.4
f. Change in actuarial value of assets at December 31, 2007, due to assumption changes	\$ -	\$ -	\$ -
g. Change in actuarial value of assets at December 31, 2007, due to plan changes	\$ -	\$ -	\$ -
h. Expected actuarial value of assets at December 31, 2007 (e. + f. + g.)	\$ -	\$ -	\$ -
5. Actuarial value of assets at December 31, 2007	\$ 250.8	\$ 7.8	\$ 258.6
<b>6. Actuarial asset gain/(loss) (5. - 4.h.)</b>	<b>\$ 3.2</b>	<b>\$ 0.0</b>	<b>\$ 3.2</b>
<b>7. Net actuarial gain/(loss) (3. + 6.)</b>	<b>\$ 35.1</b>	<b>\$ 1.0</b>	<b>\$ 36.1</b>

Amounts in millions

## Retiree Healthcare Valuation

### Retiree Healthcare Unfunded Accrued Liability (UAL) *(continued)*

#### **Reconciliation of UAL**

The table below summarizes the changes in UAL since the prior valuation.

		RHIA	RHIPA
<b>UAL due to change to PUC, December 31, 2006</b>	\$	(14.8)	\$ (3.5)
Contributions Allocated		2.5	1.3
Interest @ 8.0%		(1.1)	(0.2)
<b>UAL due to change to PUC, December 31, 2007</b>	\$	<b>(13.4)</b>	\$ <b>(2.5)</b>
<b>Total UAL, December 31, 2006</b>	\$	305.3	\$ 19.9
Normal Cost		6.6	0.9
Contributions		(37.9)	(3.4)
Liability (gain) or loss		(32.0)	(1.0)
Asset (gain) or loss		(3.2)	(0.0)
Assumption changes		-	-
Interest @ 8.0%		23.4	1.5
<b>Regular UAL, December 31, 2007</b>	\$	<b>262.2</b>	\$ <b>18.0</b>
<b>Total UAL, December 31, 2007</b>	\$	<b>248.8</b>	\$ <b>15.5</b>

*Amounts in millions*

# Retiree Healthcare Valuation

## Retiree Healthcare Contribution Rate Development

### **Normal Cost Rate**

The table below shows the development of the retiree healthcare normal cost rates. For RHIA, valuation payroll is shown on a system-wide basis. For RHIPA, valuation payroll is for the State of Oregon and the State Judiciary only.

Retiree Healthcare	RHIA		RHIPA	
	December 31, 2007	December 31, 2006	December 31, 2007	December 31, 2006
Normal Cost	\$ 6.6	\$ 6.6	\$ 0.9	\$ 0.9
Tier 1/Tier 2 Valuation Payroll	\$ 6,261.9	\$ 6,336.4	\$ 1,692.1	\$ 1,665.7
<b>Normal Cost Rate</b>	<b>0.10%</b>	<b>0.10%</b>	<b>0.06%</b>	<b>0.06%</b>

*Amounts in millions*

The table below shows the development of the retiree healthcare normal cost rates for the various rate pools. For RHIA, valuation payroll is shown on a system-wide basis. For RHIPA, valuation payroll is for the State of Oregon and the State Judiciary only. For this exhibit, all Independent Employers, including State Judiciary, have been grouped together.

Retiree Healthcare	December 31, 2007				Retiree Healthcare Total
	SLGRP	School Districts	Independent Employers		
Tier 1/ Tier 2 Valuation Payroll					
a. Tier 1/Tier 2	\$ 3,448.1	\$ 2,185.0	\$ 628.8	\$	\$ 6,261.9
b. State Only Payroll	\$ 1,674.7	\$ 0.0	\$ 17.4	\$	\$ 1,692.1
Normal Cost Rate					
a. RHIA	0.10%	0.10%	0.10%		0.10%
b. RHIPA	0.06%	0.00%	0.06%		0.06%
<b>Weighted Average Normal Cost Rate</b>	<b>0.13%</b>	<b>0.10%</b>	<b>0.10%</b>		<b>0.12%</b>

*Amounts in millions*

## Retiree Healthcare Valuation

### Retiree Healthcare Contribution Rate Development (*continued*)

#### **UAL Rate**

The RHIA and RHIPA Regular UAL rates are determined by amortizing the unfunded actuarial accrued liability over the period ending December 31, 2027, and expressing the result as a percentage of combined valuation payroll.

The change in the unfunded actuarial accrued liability due to the change to the Projected United Credit funding method is amortized over a rolling three-year period and expressed as a percentage of combined valuation payroll.

	RHIA	RHIPA
1. Total UAL	\$ 248.8	\$ 15.5
2. Change due to change in actuarial cost method	(13.4)	(2.5)
3. Regular UAL (1. - 2.)	\$ 262.2	\$ 18.0
4. Combined valuation payroll	\$ 7,721.8	\$ 2,080.2
5. 3-year Amortization Factor	2.831	2.831
6. Regular Amortization Factor	13.772	13.772
7. UAL rate - change to PUC	(0.06%)	(0.04%)
8. UAL rate - regular UAL	0.25%	0.06%

*Amounts in millions*

## Retiree Healthcare Valuation

### Retiree Healthcare Contribution Rate Development (*continued*)

#### **Calculated Employer Contribution Rate Summary**

The following table summarizes the calculated employer contribution rates for the retiree healthcare programs. The normal cost rates are applied against Tier 1/Tier 2 payroll, but the UAL rates are applied against all payroll.

	December 31, 2007		
	State Agencies and Judiciary	All Other Employers	Retiree Healthcare Total
<b>Normal Cost Rates</b>			
RHIA	0.10%	0.10%	0.10%
RHIPA	0.06%	0.00%	0.02%
<b>Total normal cost rate</b>	<b>0.16%</b>	<b>0.10%</b>	<b>0.12%</b>
<b>UAL Rates</b>			
RHIA regular UAL	0.25%	0.25%	0.25%
RHIA PUC change	(0.06%)	(0.06%)	(0.06%)
RHIPA regular UAL	0.06%	0.00%	0.02%
RHIPA PUC change	(0.04%)	0.00%	(0.01%)
<b>Total UAL rate</b>	<b>0.21%</b>	<b>0.19%</b>	<b>0.20%</b>
<b>Total retiree healthcare rate</b>	<b>0.37%</b>	<b>0.29%</b>	<b>0.32%</b>



## Accounting/CAFR Exhibits

The following information as of December 31, 2007, has been prepared and provided to Oregon PERS for inclusion in the Actuarial Section of the 2008 Comprehensive Annual Financial Report (CAFR):

- Schedule of Active Member Valuation Data
- Schedule of Retirees and Beneficiaries Added to and Removed from Rolls
- Schedules of Funding Progress by Rate Pool
- Solvency Test
- Analysis of Financial Experience

In addition, the Schedules of Funding Progress, the Schedules of Employer Contributions and the Notes to Required Supplementary Schedules are provided for the Financial Section of the CAFR. Amounts shown for the December 31, 2003 actuarial valuation and earlier are the amounts reported by the prior actuary for those valuations. All data and amounts shown for the December 31, 2005 and later actuarial valuations include both Tier 1/Tier 2 and OPSRP member and employer counts, assets and liabilities.

Some employers have made supplemental deposits in addition to their regularly scheduled contributions. These deposits are placed in a side account within the pension trust and used to offset future contribution requirements of that employer. For financial reporting purposes, supplemental deposits are not considered as contributions toward meeting the Annual Required Contribution (ARC) or the contractually required contribution for employers in a cost-sharing pool. The Schedule of Funding Progress and Solvency Test also include Side Accounts as part of the Plan's assets.

Mercer prepared the Schedule of Employer Contributions exhibit for 2006 and subsequent years. Our understanding is that prior schedules were prepared by Oregon PERS. Due to the significant contribution rate increases indicated by the December 31, 2003 valuation, the Board elected to phase-in the rate increases to allow employers time to adjust. Consequently, the schedule indicates that only a portion of the pension annual required contribution (ARC) was contributed in 2006 and 2007. Effective July 1, 2007, contribution rates were implemented to return pension contributions for the system to the full ARC.

The exhibits are provided on the following pages.

# Accounting/CAFR Exhibits

## Actuarial Schedules

### **Schedule of Active Member Valuation Data**

Valuation Date	Count	Annual Payroll (in Thousands)	Average Annual Pay	% Increase in Average Pay	Number of Participating Employers <sup>1</sup>
12/31/1993	137,513	\$ 4,466,797	\$ 32,483	4.9%	N/A
12/31/1995	141,471	\$ 4,848,058	\$ 34,269	2.7%	N/A
12/31/1997	143,194	\$ 5,161,562	\$ 36,045	2.6%	N/A
12/31/1999	151,262	\$ 5,676,606	\$ 37,528	2.0%	N/A
12/31/2000	156,869	\$ 6,195,862	\$ 39,497	5.2%	N/A
12/31/2001	160,477	\$ 6,520,225	\$ 40,630	2.9%	N/A
12/31/2001	160,477	\$ 6,253,965	\$ 38,971	—	N/A
12/31/2002	159,287	\$ 6,383,475	\$ 40,075	2.8%	N/A
12/31/2003	153,723	\$ 6,248,550	\$ 40,648	1.4%	N/A
12/31/2004	142,635	\$ 6,306,447	\$ 44,214	8.8%	806
12/31/2005 <sup>3</sup>	156,501	\$ 6,791,891	\$ 43,398	-1.8%	810
12/31/2006	163,261	\$ 7,326,798	\$ 44,878	3.4%	758
12/31/2007	167,023	\$ 7,721,819	\$ 46,232	3.0%	760

Old Basis  
New Basis<sup>2</sup>

<sup>1</sup> Effective in 2006, participating employers are defined for this purpose as any employer with covered payroll during the prior year. In prior years, employers with liabilities but without covered payroll were included as well.

<sup>2</sup> Effective in 2001, the Annual Payroll excludes the member pick-up, if any.

<sup>3</sup> Effective with the 12/31/2005 valuation, OPSRP members and payroll are included.

### **Schedule of Retirees and Beneficiaries Added to and Removed from Rolls**

Annual Allowances are shown in thousands.

Valuation Date	Added to Rolls		Removed from Rolls		Rolls - End of Year		% Increase in Annual Allowances <sup>1</sup>	Average Annual Allowances
	Count	Annual Allowances	Count	Annual Allowances	Count	Annual Allowances		
12/31/1993					60,841	\$ 564,341	27.6%	\$ 9,276
12/31/1995					64,796	\$ 700,171	24.1%	\$ 10,806
12/31/1997					69,624	\$ 919,038	31.3%	\$ 13,200
12/31/1999					82,819	\$ 1,299,380	41.4%	\$ 15,689
12/31/2000					82,458	\$ 1,385,556	6.6%	\$ 16,803
12/31/2001					85,216	\$ 1,514,491	9.3%	\$ 17,772
12/31/2002					89,482	\$ 1,722,865	13.8%	\$ 19,254
12/31/2003					97,777	\$ 2,040,533	8.4%	\$ 20,869
12/31/2004 <sup>2</sup>	6,754	\$ 149,474	2,863	\$ 35,151	101,668	\$ 2,154,856	5.6%	\$ 21,195
12/31/2005 <sup>2</sup>	4,472	\$ 149,127	3,217	\$ 36,784	102,923	\$ 2,267,198	5.2%	\$ 22,028
12/31/2006 <sup>2,3</sup>	5,060	\$ 151,240	3,263	\$ 39,735	104,720	\$ 2,378,704	4.9%	\$ 22,715
12/31/2007 <sup>2,3</sup>	5,385	\$ 294,737	3,304	\$ 40,590	106,801	\$ 2,521,345	6.0%	\$ 23,608

<sup>1</sup> Since last valuation date.

<sup>2</sup> Annual allowances reflect estimated adjustments to retiree benefits due to the implementation of the Strunk v. PERB, et al. and City of Eugene v. State of Oregon, PERB, et al. decisions.

<sup>3</sup> Annual allowances do not reflect adjustments due to any interpretation of Judge Kantor's June 20, 2007 ruling in the Arken and Robinson cases.

# Accounting/CAFR Exhibits

## GASB Nos. 25 and 43 Information

### **Schedule of Funding Progress by Rate Pool**

The GASB Statement Nos. 25 and 43 liabilities and assets resulting from the last three actuarial valuations are as follows (**dollar amounts in millions**):

Actuarial Valuation Date	Actuarial Value of Assets <sup>1</sup> (a)	Actuarial Accrued Liability (AAL) (b)	Unfunded AAL (UAAL) <sup>2</sup> (b-a)	Funded Ratio (a/b)	Covered Payroll <sup>3</sup> (c)	UAAL as a % of Covered Payroll ((b-a)/c)
<b>Tier 1/Tier 2 State &amp; Local Government Rate Pool</b>						
12/31/2004	\$ 22,768.1	\$ 23,407.2	\$ 639.1	97.3%	\$ 3,171.0	20.2%
12/31/2005 <sup>4</sup>	\$ 25,556.3	\$ 24,450.3	\$ (1,106.0)	104.5%	\$ 3,089.8	(35.8%)
12/31/2006	\$ 28,177.2	\$ 25,390.0	\$ (2,787.3)	111.0%	\$ 3,174.6	(87.8%)
12/31/2007 <sup>5</sup>	\$ 30,314.8	\$ 26,883.1	\$ (3,431.7)	112.8%	\$ 3,448.1	(99.5%)
<b>Tier 1/Tier 2 School District Rate Pool</b>						
12/31/2004	\$ 18,679.3	\$ 19,483.0	\$ 803.7	95.9%	\$ 2,173.6	37.0%
12/31/2005	\$ 21,095.0	\$ 20,151.8	\$ (943.2)	104.7%	\$ 2,126.5	(44.4%)
12/31/2006	\$ 23,033.4	\$ 20,825.0	\$ (2,208.4)	110.6%	\$ 2,233.7	(98.9%)
12/31/2007	\$ 24,053.6	\$ 21,299.3	\$ (2,754.3)	112.9%	\$ 2,185.0	(126.1%)
<b>Tier 1/Tier 2 Independent Employers and Judiciary</b>						
12/31/2004	\$ 4,195.1	\$ 4,444.4	\$ 249.3	94.4%	\$ 961.9	25.9%
12/31/2005 <sup>4</sup>	\$ 4,742.9	\$ 4,575.0	\$ (167.9)	103.7%	\$ 894.9	(18.8%)
12/31/2006	\$ 5,330.5	\$ 4,860.1	\$ (470.4)	109.7%	\$ 928.1	(50.7%)
12/31/2007 <sup>5</sup>	\$ 4,765.5	\$ 4,423.2	\$ (342.3)	107.7%	\$ 628.8	(54.4%)
<b>OPSRP Rate Pool</b>						
12/31/2005	\$ 55.0	\$ 53.8	\$ (1.2)	102.2%	\$ 680.7	(0.2%)
12/31/2006	\$ 151.4	\$ 115.0	\$ (36.4)	131.6%	\$ 990.4	(3.7%)
12/31/2007	\$ 275.1	\$ 203.0	\$ (72.1)	135.5%	\$ 1,459.9	(4.9%)
<b>Postemployment Healthcare Benefits - Retirement Health Insurance Account</b>						
12/31/2004	\$ 148.0	\$ 556.9	\$ 408.9	26.6%	\$ 6,306.4	6.5%
12/31/2005	\$ 181.0	\$ 495.9	\$ 314.9	36.5%	\$ 6,111.2	5.2%
12/31/2006	\$ 221.3	\$ 511.8	\$ 290.5	43.2%	\$ 6,336.4	4.6%
12/31/2007	\$ 250.8	\$ 499.6	\$ 248.8	50.2%	\$ 6,261.9	4.0%
<b>Postemployment Healthcare Benefits - Retiree Health Insurance Premium Account</b>						
12/31/2004	\$ 5.2	\$ 28.2	\$ 23.0	18.4%	\$ 1,701.0	1.4%
12/31/2005	\$ 6.1	\$ 27.0	\$ 20.9	22.7%	\$ 1,621.2	1.3%
12/31/2006	\$ 7.0	\$ 23.4	\$ 16.4	30.0%	\$ 1,665.7	1.0%
12/31/2007	\$ 7.8	\$ 23.3	\$ 15.5	33.6%	\$ 1,692.1	0.9%

Notes:

<sup>1</sup> Side account assets are included with Tier 1/Tier 2 assets

<sup>2</sup> Excludes UAAL for Multnomah Fire District (\$144 million as of 12/31/2007)

<sup>3</sup> Covered payroll is shown for the rate group. Tier 1/Tier 2 payroll is shown for Postemployment Healthcare Benefits. However, the UAL is amortized using combined Tier 1/Tier 2 and OPSRP payroll.

<sup>4</sup> Reflects the transfer in assets and liabilities for new employers that joined the SLGRP effective 1/1/2006.

<sup>5</sup> Reflects the transfer in assets and liabilities for new employers that joined the SLGRP effective 1/1/2008.

## Accounting/CAFR Exhibits

### Solvency Test

#### **Pension and Retiree Healthcare Plans**

Valuation Date <sup>1</sup>	Actuarial Accrued Liability			Valuation Assets <sup>2</sup>	Portion of Actuarial Accrued Liabilities Covered by Assets		
	Active Member Contributions	Retired Members and Beneficiaries	Other Members		(1)	(2)	(3)
	(1)	(2)	(3)				
12/31/1995	\$ 5,753.0	\$ 7,492.8	\$ 10,002.8	\$ 20,957.6	100%	100%	77%
12/31/1997	\$ 8,135.4	\$ 9,994.9	\$ 13,534.6	\$ 29,108.2	100%	100%	81%
12/31/1999	\$ 8,238.1	\$ 14,333.7	\$ 18,336.1	\$ 39,964.8	100%	100%	95%
12/31/2000	\$ 10,142.5	\$ 15,664.1	\$ 17,543.9	\$ 41,804.6	100%	100%	91%
12/31/2001	\$ 10,252.8	\$ 17,465.9	\$ 18,229.0	\$ 39,852.2	100%	100%	67%
12/31/2001 <sup>3</sup>	\$ 10,252.8	\$ 17,340.0	\$ 10,228.8	\$ 39,852.2	100%	100%	120%
12/31/2002 <sup>3</sup>	\$ 9,940.7	\$ 19,339.0	\$ 10,240.8	\$ 36,316.8	100%	100%	69%
12/31/2003 <sup>3</sup>	\$ 9,005.8	\$ 23,625.9	\$ 11,993.9	\$ 42,874.4	100%	100%	85%
12/31/2004 <sup>4,5</sup>	\$ 9,073.0	\$ 25,363.0	\$ 13,547.6	\$ 45,735.3	100%	100%	83%
12/31/2005 <sup>6,7</sup>	\$ 9,169.7	\$ 26,602.4	\$ 14,044.7	\$ 51,569.6	100%	100%	112%
12/31/2006	\$ 9,410.8	\$ 27,711.3	\$ 14,666.2	\$ 56,844.8	100%	100%	134%
12/31/2007 <sup>8</sup>	\$ 9,225.0	\$ 29,157.3	\$ 15,011.8	\$ 59,586.4	100%	100%	141%

<sup>1</sup> An extensive revision of the actuarial assumptions occurs prior to each odd-year valuation; therefore, the figures are not directly comparable. Effective with the 12/31/2006 valuation, revisions to actuarial assumptions occur prior to each even-year valuation.

<sup>2</sup> Effective with the 12/31/2002 valuation, includes the value of UAL Lump Sum Side Accounts.

<sup>3</sup> The 2001 valuation was revised to include the impact of PERS Reform Legislation enacted in 2003. Figures through 12/31/2003 do not reflect the judicial review or subsequent Board action.

<sup>4</sup> Effective with the 2004 valuation, the Oregon Supreme Court rulings in *Strunk v. PERB, et al.* (Issued March 8, 2005) and *City of Eugene v. State of Oregon, PERB, et al.* (Issued August 11, 2005) are reflected.

<sup>5</sup> Effective with the 2004 valuation, the cost method was changed from Entry Age Normal to Projected Unit Credit, and the actuarial value of assets was changed from a 4-year smoothed value to market value.

<sup>6</sup> Assets and liabilities for OPSRP are first valued in the 2005 valuation.

<sup>7</sup> Reflects the transfer in assets and liabilities for new employers that joined the SLGRP effective 1/1/2006.

<sup>8</sup> Reflects the transfer in assets and liabilities for new employers that joined the SLGRP effective 1/1/2008.

## Accounting/CAFR Exhibits

### Actuarial Schedules

#### **Analysis of Financial Experience**

#### *Gains and Losses in Accrued Liability During Year Ended 2007 Resulting from Differences Between Assumed Experience and Actual Experience*

Pension and Retiree Healthcare Plans	\$ Gain (or Loss) for Year	
	2007	2006
<b>Type of Activity</b>		
Retirements from Active Status	\$ (96.2)	\$ (205.4)
Active Mortality and Withdrawal	64.3	20.9
Pay Increases	(68.6)	(23.3)
Contributions	65.4	36.3
Interest Crediting Experience	72.5	(79.3)
Investment Income	327.2	2,699.0
Retirement, Mortality and Lump Sums from Dormant Status	124.5	94.0
Retiree and Beneficiary Mortality	(82.9)	(52.4)
Data Corrections	54.7	-
Other	84.3	(116.7)
<b>Gain (or Loss) During Year From Financial Experience</b>	<b>\$ 545.3</b>	<b>\$ 2,373.1</b>
<b>Non-Recurring Items</b>		
Assumption Changes	-	(74.0)
<b>Composite Gain (or Loss) During Year</b>	<b>\$ 545.3</b>	<b>\$ 2,299.2</b>

# Accounting/CAFR Exhibits

## GASB Nos. 25 and 43 Required Supplementary Information

### **Schedules of Funding Progress (dollar amounts in millions)**

Actuarial Valuation Date	Actuarial Value of Assets (a)	Actuarial Accrued Liability (AAL) (b)	Unfunded AAL (UAAL) (b-a)	Funded Ratio (a/b)	Covered Payroll (c)	UAAL as a % of Covered Payroll ((b-a)/c)
<b>Pension Benefits<sup>1</sup></b>						
12/31/2000	41,739.6	42,783.9	1,044.3	97.6%	6,195.9	16.9%
12/31/2001	39,772.7	45,386.1	5,613.4	87.6%	6,254.0 <sup>2</sup>	89.8%
12/31/2001 <sup>3</sup>	39,772.7	37,258.3	(2,514.4)	106.7%	6,254.0	(40.2%)
12/31/2002 <sup>3</sup>	35,446.9	38,947.0	3,500.1	91.0%	6,383.5	54.8%
12/31/2003 <sup>3</sup>	42,753.3	44,078.1	1,324.8	97.0%	6,248.5	21.2%
12/31/2004 <sup>4,5</sup>	45,581.1	47,398.6	1,817.5	96.2%	6,772.4 <sup>6</sup>	26.8%
12/31/2005 <sup>6,7</sup>	51,382.6	49,294.0	(2,088.6)	104.2%	6,791.9	(30.8%)
12/31/2006	56,616.5	51,252.9	(5,363.5)	110.5%	7,326.8	(73.2%)
12/31/2007 <sup>8</sup>	59,327.8	52,871.2	(6,456.7)	112.2%	7,721.8	(83.6%)
<b>Postemployment Healthcare Benefits - Retirement Health Insurance Account</b>						
12/31/2000	62.1	543.5	481.4	11.4%	6,195.9	7.8%
12/31/2001	76.6	532.1	455.5	14.4%	6,254.0 <sup>2</sup>	7.3%
12/31/2001 <sup>3</sup>	76.6	533.2	456.6	14.4%	6,254.0	7.3%
12/31/2002 <sup>3</sup>	87.4	542.3	454.9	16.1%	6,383.5	7.1%
12/31/2003 <sup>3</sup>	117.1	522.5	405.4	22.4%	6,248.5	6.5%
12/31/2004 <sup>5</sup>	148.0	556.9	408.9	26.6%	6,772.4 <sup>6</sup>	6.0%
12/31/2005	181.0	495.9	314.9	36.5%	6,791.9	4.6%
12/31/2006	221.3	511.8	290.5	43.2%	7,326.8	4.0%
12/31/2007	250.8	499.6	248.8	50.2%	7,721.8	3.2%
<b>Postemployment Healthcare Benefits - Retiree Health Insurance Premium Account</b>						
12/31/2000	2.9	23.1	20.2	12.6%	1,984.0	1.0%
12/31/2001	3.0	29.5	26.5	10.2%	1,954.1 <sup>2</sup>	1.4%
12/31/2001 <sup>3</sup>	2.9	29.6	26.7	9.8%	1,954.1	1.4%
12/31/2002 <sup>3</sup>	2.9	30.1	27.2	9.6%	1,741.9	1.6%
12/31/2003 <sup>3</sup>	4.0	25.0	21.0	16.0%	1,711.9	1.2%
12/31/2004 <sup>5</sup>	5.2	28.2	23.0	18.4%	1,851.4 <sup>6</sup>	1.2%
12/31/2005	6.1	27.0	20.9	22.7%	1,827.0	1.1%
12/31/2006	7.0	23.4	16.4	30.0%	1,946.8	0.8%
12/31/2007	7.8	23.3	15.5	33.6%	2,080.2	0.7%

Notes:

<sup>1</sup> Includes UAAL for Multnomah Fire District (\$144 million as of 12/31/2007)

<sup>2</sup> Effective with the 2001 valuation, Annual Active Member Payroll excludes the member pick-up, if any.

<sup>3</sup> The 2001 valuation was revised to include the impact of PERS Reform Legislation enacted in 2003. Figures through 12/31/2003 do not reflect the judicial review or subsequent Board action.

<sup>4</sup> Effective with the 2004 valuation, the Oregon Supreme Court rulings in *Strunk v. PERB, et al.* (Issued March 8, 2005) and *City of Eugene v. State of Oregon, PERB, et al.* (Issued August 11, 2005) are reflected.

<sup>5</sup> Effective with the 2004 valuation, the cost method was changed from Entry Age Normal to Projected Unit Credit, and the actuarial value of assets was changed from a 4-year smoothed value to market value.

<sup>6</sup> Assets and liabilities for OPSRP are first valued in the 2005 valuation. OPSRP payroll, however, was included in the amortization of the UAAL beginning with the 2004 valuation.

<sup>7</sup> Reflects the transfer in assets and liabilities for new employers that joined the SLGRP effective 1/1/2006.

<sup>8</sup> Reflects the transfer in assets and liabilities for new employers that joined the SLGRP effective 1/1/2008.

## Accounting/CAFR Exhibits

### GASB Nos. 25 and 43 Required Supplementary Information (continued)

#### **Schedules of Employer Contributions**

Dollar amounts in millions.

Actuarial Valuation Date	Annual Required Contribution <sup>1</sup>	Percentage Contributed
<b>Defined Benefit Pension Plan</b>		
12/31/2006	\$938.64	63.4%
12/31/2007	\$805.67	74.0%
<b>Postemployment Healthcare Benefits - Retirement Health Insurance Account</b>		
12/31/2006	\$44.32	89.1%
12/31/2007	\$38.82	91.3%
<b>Postemployment Healthcare Benefits - Retiree Health Insurance Premium Account</b>		
12/31/2006	\$2.54	90.1%
12/31/2007	\$2.73	78.7%

<sup>1</sup> The Annual Required Contribution prior to 7/1/2007 is based on the 7/1/2005 rates developed in the 12/31/2003 Milliman valuation prior to the adjustment to phase-in the rate increase and adjusted for supplemental payments since 12/31/2003. For most employers, the actual pension amount contributed from 7/1/2005 to 6/30/2007 was based on the phased-in rates.

## Accounting/CAFR Exhibits

### GASB Nos. 25 and 43 Required Supplementary Information (continued)

#### **Notes to Required Supplementary Schedules**

Valuation Date:	December 31, 2007
Actuarial Cost Method:	Projected Unit Credit
Amortization Method	The UAL is amortized as a level percentage of payroll. The change in UAL due to the change from Entry Age Normal to Projected Unit Credit on December 31, 2004 is amortized over a rolling 3-year period. The Tier 1/Tier 2 regular UAL and Retiree Healthcare regular UAL as of December 31, 2007 is amortized over a closed 20-year period. Gains and losses between subsequent odd-year valuations are amortized as a level percentage of combined valuation payroll over a closed 20 years from the odd-year valuation in which they are first recognized. Gains and losses for OPSRP benefits are amortized over a closed 16 years from the odd-year valuation in which they are first recognized.

#### Equivalent Single Amortization Period:

Pension	3 years
RHIA	30 years
RHIPA	30 years

The Equivalent Single Amortization Period calculation is performed with the ARC-setting valuation. This was calculated most recently in the December 31, 2007 actuarial valuation.

#### Actuarial Assumptions:

Investment Rate of Return:	8.00 percent
Payroll Growth:	3.75 percent
Consumer Price Inflation:	2.75 percent
Health Cost Inflation:	Graded from 8.0 percent in 2008 to 5.0 percent in 2013.
Cost-of-Living Adjustments:	2.00 percent
Method used to Value Assets:	The actuarial value of assets equals the fair market value of assets, excluding the Contingency, Capital Preservation and Rate Guarantee Reserve.

## Data

This valuation is based upon the membership of the System as of December 31, 2007.

### System Wide Data Exhibits

#### **Valuation Pay and Census Exhibit**

The following tables illustrate the breakdown of member counts and valuation payroll for the SLGRP, School District Pool, and Independent Employers.

#### **SLGRP**

	General Service	Police & Fire	Total		
Tier 1	1,652,868,000	304,614,072	1,957,482,072		
Tier 2	1,218,948,062	271,627,454	1,490,575,516		
Tier 1/Tier 2 Valuation Payroll	2,871,816,062	576,241,526	3,448,057,588		
OPSRP Valuation Payroll	719,461,592	96,668,619	816,130,211		
<b>Combined Valuation Payroll</b>	<b>3,591,277,654</b>	<b>672,910,145</b>	<b>4,264,187,799</b>		

	December 31				2006
	2007			Total	
	Tier 1	Tier 2	OPSRP		
<b>Active Members</b>					
General Service	28,440	25,592	19,490	73,522	67,289
Police & Fire	4,253	4,517	2,015	10,785	10,282
Total	32,693	30,109	21,505	84,307	77,571
Average Age	51.8	45.0	39.4	46.2	46.0
Average Service	18.5	7.4	2.3	10.4	10.3
Average Valuation Pay	\$ 59,875	\$ 49,506	\$ 37,951	\$ 50,579	\$ 47,766
<b>Active Members outside the Pool with previous Segments in the Pool</b>					
General Service	7,031	3,649		10,680	12,496
Police & Fire	538	388		926	933
Total	7,569	4,037		11,606	13,429
Average Age	51.0	41.5		47.7	48.1
Average Service	2.3	1.4		2.0	2.8
<b>Dormant Members<sup>1</sup></b>					
General Service	14,859	11,245	86	26,190	23,105
Police & Fire	706	643	3	1,352	1,344
Total	15,565	11,888	89	27,542	24,449
Average Age	53.2	45.1	70.3	49.8	48.2
Average Monthly Benefit	\$ 1,559	\$ 476	\$ 35	\$ 1,087	\$ 1,208
<b>Retired Members and Beneficiaries<sup>1</sup></b>					
General Service	51,338	927		52,265	50,714
Police & Fire	6,793	186		6,979	6,636
Total	58,131	1,113		59,244	57,350
Average Age	69.2	63.1		69.1	68.8
Average Monthly Benefit	\$ 1,714	\$ 460		\$ 1,690	\$ 1,630
<b>Grand Total Number of Members</b>	<b>113,958</b>	<b>47,147</b>	<b>21,594</b>	<b>182,699</b>	<b>172,799</b>

<sup>1</sup> Dormant and Retiree counts are by lives within each rate pool. As a result, some individuals may be counted more than once.

## Data

## System Wide Data Exhibits (continued)

**Valuation Pay and Census Exhibit (continued)****School District Pool**

	General Service	Police & Fire	Total
Tier 1	1,315,952,625	2,883,511	1,318,836,136
Tier 2	864,966,579	1,229,561	866,196,140
Tier 1/Tier 2 Valuation Payroll	2,180,919,204	4,113,072	2,185,032,276
OPSRP Valuation Payroll	507,791,072	484,125	508,275,197
<b>Combined Valuation Payroll</b>	<b>2,688,710,276</b>	<b>4,597,197</b>	<b>2,693,307,473</b>

	December 31				2006
	2007				
	Tier 1	Tier 2	OPSRP	Total	
<b>Active Members</b>					
General Service	26,353	23,555	18,647	68,555	65,868
Police & Fire	52	28	11	91	84
Total	26,405	23,583	18,658	68,646	65,952
Average Age	51.9	44.3	39.5	45.9	45.8
Average Service	18.3	7.1	2.3	10.1	10.2
Average Valuation Pay	\$ 49,946	\$ 36,730	\$ 27,242	\$ 39,235	\$ 38,908
<b>Active Members outside the Pool with previous Segments in the Pool</b>					
General Service	2,621	1,417		4,038	3,859
Police & Fire	13	5		18	15
Total	2,634	1,422		4,056	3,874
Average Age	52.1	42.7		48.8	48.6
Average Service	4.2	2.1		3.5	3.4
<b>Dormant Members<sup>1</sup></b>					
General Service	9,253	7,447	61	16,761	17,275
Police & Fire	54	27	0	81	29
Total	9,307	7,474	61	16,842	17,304
Average Age	54.0	44.9	69.4	50.0	48.1
Average Monthly Benefit	\$ 1,260	\$ 408	\$ 28	\$ 877	\$ 947
<b>Retired Members and Beneficiaries<sup>1</sup></b>					
General Service	52,440	459		52,899	51,991
Police & Fire	116	10		126	114
Total	52,556	469		53,025	52,105
Average Age	70.2	63.4		70.1	70.0
Average Monthly Benefit	\$ 1,783	\$ 446		\$ 1,771	\$ 1,707
<b>Grand Total Number of Members</b>	<b>90,902</b>	<b>32,948</b>	<b>18,719</b>	<b>142,569</b>	<b>139,235</b>

<sup>1</sup> Dormant and Retiree counts are by lives within each rate pool. As a result, some individuals may be counted more than once.

## Data

## System Wide Data Exhibits (continued)

**Valuation Pay and Census Exhibit (continued)****Independents**

	General Service	Police & Fire	Total
Tier 1	239,969,609	111,470,344	351,439,953
Tier 2	195,579,852	81,824,952	277,404,804
Tier 1/Tier 2 Valuation Payroll	435,549,461	193,295,296	628,844,757
OPSRP Valuation Payroll	105,969,580	29,509,749	135,479,329
<b>Combined Valuation Payroll</b>	<b>541,519,041</b>	<b>222,805,045</b>	<b>764,324,086</b>

	December 31				2006
	2007				
	Tier 1	Tier 2	OPSRP	Total	
<b>Active Members</b>					
General Service	4,090	4,009	2,866	10,965	16,659
Police & Fire	1,376	1,177	552	3,105	3,079
Total	5,466	5,186	3,418	14,070	19,738
Average Age	51.0	43.9	38.6	45.4	44.9
Average Service	18.2	7.4	2.3	10.4	10.2
Average Valuation Pay	\$ 64,296	\$ 53,491	\$ 39,637	\$ 54,323	\$ 53,930
<b>Active Members outside the Pool with previous Segments in the Pool</b>					
General Service	1,864	1,251		3,115	3,308
Police & Fire	440	305		745	748
Total	2,304	1,556		3,860	4,056
Average Age	50.2	41.5		46.7	46.3
Average Service	3.9	1.9		3.1	3.0
<b>Dormant Members<sup>1</sup></b>					
General Service	2,015	1,620	16	3,651	7,916
Police & Fire	231	154	0	385	323
Total	2,246	1,774	16	4,036	8,239
Average Age	52.5	45.1	69.7	49.3	46.8
Average Monthly Benefit	\$ 1,297	\$ 482	\$ 27	\$ 934	\$ 1,008
<b>Retired Members and Beneficiaries<sup>1</sup></b>					
General Service	7,000	183		7,183	8,430
Police & Fire	2,279	33		2,312	2,337
Total	9,279	216		9,495	10,767
Average Age	68.2	63.5		68.1	67.4
Average Monthly Benefit	\$ 1,714	\$ 424		\$ 1,685	\$ 1,467
<b>Grand Total Number of Members</b>	<b>19,295</b>	<b>8,732</b>	<b>3,434</b>	<b>31,461</b>	<b>42,800</b>

<sup>1</sup> Dormant and Retiree counts are by lives within each rate pool. As a result, some individuals may be counted more than once.

## Data

System Wide Data Exhibits (*continued*)**Valuation Pay and Census Exhibit (*continued*)****Total**

	General Service	Police & Fire	Total
Tier 1	3,208,790,234	418,967,927	3,627,758,161
Tier 2	2,279,494,493	354,681,967	2,634,176,460
Tier 1/Tier 2 Valuation Payroll	5,488,284,727	773,649,894	6,261,934,621
OPSRP Valuation Payroll	1,333,222,244	126,662,493	1,459,884,737
<b>Combined Valuation Payroll</b>	<b>6,821,506,971</b>	<b>900,312,387</b>	<b>7,721,819,358</b>

	December 31				
	2007				2006
	Tier 1	Tier 2	OPSRP	Total	
<b>Active Members</b>					
General Service	58,883	53,156	41,003	153,042	149,816
Police & Fire	5,681	5,722	2,578	13,981	13,445
Total	64,564	58,878	43,581	167,023	163,261
Average Age	51.8	44.6	39.4	46.0	45.8
Average Service	18.4	7.2	2.3	10.3	10.3
Average Valuation Pay	\$ 56,189	\$ 44,740	\$ 33,500	\$ 46,232	\$ 44,878
<b>Dormant Members<sup>1</sup></b>					
General Service	26,127	20,312	163	46,602	48,296
Police & Fire	991	824	3	1,818	1,696
Total	27,118	21,136	166	48,420	49,992
Average Age	53.4	45.0	69.9	49.8	47.9
Average Monthly Benefit	\$ 1,435	\$ 452	\$ 32	\$ 1,001	\$ 1,085
<b>Retired Members and Beneficiaries<sup>1</sup></b>					
General Service	110,778	1,569		112,347	111,135
Police & Fire	9,188	229		9,417	9,087
Total	119,966	1,798		121,764	120,222
Average Age	69.6	63.2		69.5	69.2
Average Monthly Benefit	\$ 1,744	\$ 452		\$ 1,725	\$ 1,649
<b>Grand Total Number of Members</b>	<b>211,648</b>	<b>81,812</b>	<b>43,747</b>	<b>337,207</b>	<b>333,475</b>

<sup>1</sup> Dormant and Retiree counts are by lives within each rate pool. As a result, some individuals may be counted more than once.

## Data

System Wide Data Exhibits (*continued*)**Age/Service and Valuation Payroll by Tier and Job Class****Tier 1 General Service Active Members**

	0-4	5-9	10-14	15-19	20-24	25-29	30-34	35-39	40+	Total
20-24	0	0	0	0	0	0	0	0	0	0
\$	0	0	0	0	0	0	0	0	0	0
25-29	0	0	3	0	0	0	0	0	0	3
\$	0	0	*	0	0	0	0	0	0	*
30-34	0	46	241	10	0	0	0	0	0	297
\$	0	35,032	44,254	*	0	0	0	0	0	43,119
35-39	8	218	2,007	480	10	0	0	0	0	2,723
\$	*	36,262	53,025	52,274	*	0	0	0	0	51,430
40-44	12	229	2,612	2,313	508	12	0	0	0	5,686
\$	*	37,366	54,117	58,721	54,270	*	0	0	0	55,327
45-49	29	259	3,090	3,506	2,413	703	0	0	0	10,000
\$	39,851	40,231	49,158	55,467	60,709	55,626	0	0	0	54,354
50-54	15	241	3,965	5,038	3,328	3,639	64	0	0	16,290
\$	*	38,087	47,152	53,863	59,565	61,778	60,667	0	0	54,946
55-59	15	216	3,477	5,228	3,504	3,529	125	5	0	16,099
\$	*	38,380	47,547	53,273	58,678	63,764	69,213	*	0	55,448
60-64	13	92	1,503	2,268	1,460	1,063	52	4	0	6,455
\$	*	38,750	49,321	53,210	56,422	61,658	75,755	*	0	54,373
65-69	4	34	311	414	201	154	11	2	0	1,131
\$	*	29,115	45,970	51,171	58,013	61,422	*	*	0	51,764
70-74	2	10	53	42	29	16	4	0	0	156
\$	*	*	*	*	*	*	*	0	0	*
75+	0	2	14	17	4	6	0	0	0	43
\$	0	*	*	*	*	*	0	0	0	*
<b>Total</b>	<b>98</b>	<b>1,347</b>	<b>17,276</b>	<b>19,316</b>	<b>11,457</b>	<b>9,122</b>	<b>256</b>	<b>11</b>	<b>0</b>	<b>58,883</b>
\$	<b>40,286</b>	<b>37,504</b>	<b>49,270</b>	<b>54,237</b>	<b>58,690</b>	<b>61,897</b>	<b>67,538</b>	<b>*</b>	<b>0</b>	<b>54,487</b>

Valuation payroll excludes projected pay for members over the mandatory retirement age. Average payroll information is not shown for age/service cells with fewer than 20 members. However, these amounts are included in the calculation of average valuation pay.

## Data

System Wide Data Exhibits (*continued*)**Age/Service and Valuation Payroll by Tier and Job Class (*continued*)****Tier 2 General Service Active Members**

	0-4	5-9	10-14	15-19	20-24	25-29	30-34	35-39	40+	Total
20-24	103	35	0	0	0	0	0	0	0	138
\$	22,106	25,680	0	0	0	0	0	0	0	23,013
25-29	1,286	950	17	0	0	0	0	0	0	2,253
\$	36,336	37,277	*	0	0	0	0	0	0	36,756
30-34	1,930	5,070	304	0	0	0	0	0	0	7,304
\$	39,151	44,376	48,288	0	0	0	0	0	0	43,158
35-39	1,555	5,803	983	0	0	0	0	0	0	8,341
\$	39,760	46,701	51,161	0	0	0	0	0	0	45,933
40-44	1,338	5,375	859	0	0	0	0	0	0	7,572
\$	38,440	44,982	50,175	0	0	0	0	0	0	44,415
45-49	1,320	5,951	1,115	0	0	0	0	0	0	8,386
\$	36,618	41,980	46,842	0	0	0	0	0	0	41,782
50-54	1,155	5,944	1,258	0	0	0	0	0	0	8,357
\$	37,018	42,409	45,194	0	0	0	0	0	0	42,083
55-59	900	4,482	1,014	0	0	0	0	0	0	6,396
\$	38,160	43,802	45,624	0	0	0	0	0	0	43,297
60-64	477	2,339	498	0	0	0	0	0	0	3,314
\$	39,952	44,555	46,868	0	0	0	0	0	0	44,240
65-69	120	599	124	0	0	0	0	0	0	843
\$	30,597	39,558	45,246	0	0	0	0	0	0	39,119
70-74	32	142	23	0	0	0	0	0	0	197
\$	*	*	*	0	0	0	0	0	0	*
75+	12	39	4	0	0	0	0	0	0	55
\$	*	*	*	0	0	0	0	0	0	*
<b>Total</b>	<b>10,228</b>	<b>36,729</b>	<b>6,199</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>53,156</b>
<b>\$</b>	<b>37,739</b>	<b>43,568</b>	<b>47,272</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>42,878</b>

Valuation payroll excludes projected pay for members over the mandatory retirement age. Average payroll information is not shown for age/service cells with fewer than 20 members. However, these amounts are included in the calculation of average valuation pay.

## Data

## System Wide Data Exhibits (continued)

**Age/Service and Valuation Payroll by Tier and Job Class (continued)****Tier 1 Police and Fire Active Members**

	0-4	5-9	10-14	15-19	20-24	25-29	30-34	35-39	40+	Total
20-24	0	0	0	0	0	0	0	0	0	0
\$	0	0	0	0	0	0	0	0	0	0
25-29	0	0	1	0	0	0	0	0	0	1
\$	0	0	*	0	0	0	0	0	0	*
30-34	1	6	68	2	0	0	0	0	0	77
\$	*	*	74,209	*	0	0	0	0	0	72,526
35-39	0	12	642	147	2	0	0	0	0	803
\$	0	*	74,987	78,922	*	0	0	0	0	75,491
40-44	0	10	460	702	100	2	0	0	0	1,274
\$	0	*	75,132	77,359	78,742	*	0	0	0	76,422
45-49	0	6	242	533	410	117	0	0	0	1,308
\$	0	*	70,282	74,139	81,007	84,617	0	0	0	76,385
50-54	0	3	161	369	340	331	10	0	0	1,214
\$	0	*	64,301	70,140	77,712	80,706	*	0	0	74,376
55-59	0	3	105	230	182	176	13	0	0	709
\$	0	*	59,582	65,290	68,868	78,834	*	0	0	68,874
60-64	0	5	45	94	56	49	1	1	0	251
\$	0	*	56,582	66,133	62,499	79,843	*	*	0	66,487
65-69	0	1	12	14	5	4	0	0	0	36
\$	0	*	*	*	*	*	0	0	0	*
70-74	0	0	3	1	1	1	1	0	0	7
\$	0	0	*	*	*	*	*	0	0	*
75+	0	0	0	1	0	0	0	0	0	1
\$	0	0	0	*	0	0	0	0	0	*
<b>Total</b>	<b>1</b>	<b>46</b>	<b>1,739</b>	<b>2,093</b>	<b>1,096</b>	<b>680</b>	<b>25</b>	<b>1</b>	<b>0</b>	<b>5,681</b>
<b>\$</b>	<b>*</b>	<b>54,804</b>	<b>71,304</b>	<b>72,949</b>	<b>76,317</b>	<b>80,202</b>	<b>74,286</b>			<b>73,821</b>

Valuation payroll excludes projected pay for members over the mandatory retirement age. Average payroll information is not shown for age/service cells with fewer than 20 members. However, these amounts are included in the calculation of average valuation pay.

## Data

System Wide Data Exhibits *(continued)***Age/Service and Valuation Payroll by Tier and Job Class (continued)****Tier 2 Police and Fire Active Members**

	0-4	5-9	10-14	15-19	20-24	25-29	30-34	35-39	40+	Total
20-24	5	0	0	0	0	0	0	0	0	5
\$	*	0	0	0	0	0	0	0	0	*
25-29	153	172	0	0	0	0	0	0	0	325
\$	53,250	62,232	0	0	0	0	0	0	0	58,004
30-34	197	1,106	103	0	0	0	0	0	0	1,406
\$	58,089	65,191	68,318	0	0	0	0	0	0	64,425
35-39	127	1,114	314	0	0	0	0	0	0	1,555
\$	58,314	65,703	69,677	0	0	0	0	0	0	65,902
40-44	84	626	202	0	0	0	0	0	0	912
\$	53,907	63,311	67,290	0	0	0	0	0	0	63,326
45-49	55	411	112	0	0	0	0	0	0	578
\$	53,686	59,220	59,844	0	0	0	0	0	0	58,814
50-54	39	305	87	0	0	0	0	0	0	431
\$	56,862	56,028	61,722	0	0	0	0	0	0	57,253
55-59	39	233	54	0	0	0	0	0	0	326
\$	48,131	55,899	58,596	0	0	0	0	0	0	55,417
60-64	17	114	22	0	0	0	0	0	0	153
\$	*	55,048	49,016	0	0	0	0	0	0	54,526
65-69	3	11	6	0	0	0	0	0	0	20
\$	*	*	*	0	0	0	0	0	0	*
70-74	0	7	1	0	0	0	0	0	0	8
\$	0	*	*	0	0	0	0	0	0	*
75+	0	2	1	0	0	0	0	0	0	3
\$	0	*	*	0	0	0	0	0	0	*
<b>Total</b>	<b>719</b>	<b>4,101</b>	<b>902</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>5,722</b>
<b>\$</b>	<b>55,293</b>	<b>62,511</b>	<b>65,214</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>62,030</b>

Valuation payroll excludes projected pay for members over the mandatory retirement age. Average payroll information is not shown for age/service cells with fewer than 20 members. However, these amounts are included in the calculation of average valuation pay.

## Data

## System Wide Data Exhibits (continued)

**Age/Service and Valuation Payroll by Tier and Job Class (continued)****All Tier 1/Tier 2 Active Members**

	0-4	5-9	10-14	15-19	20-24	25-29	30-34	35-39	40+	Total
20-24	108	35	0	0	0	0	0	0	0	143
\$	22,885	25,680	0	0	0	0	0	0	0	23,569
25-29	1,439	1,122	21	0	0	0	0	0	0	2,582
\$	38,134	41,103	43,125	0	0	0	0	0	0	39,465
30-34	2,128	6,228	716	12	0	0	0	0	0	9,084
\$	40,894	48,021	52,273	*	0	0	0	0	0	46,697
35-39	1,690	7,147	3,946	627	12	0	0	0	0	13,422
\$	41,056	49,375	57,459	58,522	*	0	0	0	0	51,130
40-44	1,434	6,240	4,133	3,015	608	14	0	0	0	15,444
\$	39,450	46,547	56,281	63,061	58,295	*	0	0	0	52,190
45-49	1,404	6,627	4,559	4,039	2,823	820	0	0	0	20,272
\$	37,353	42,984	49,976	57,931	63,657	59,763	0	0	0	50,702
50-54	1,209	6,493	5,471	5,407	3,668	3,970	74	0	0	26,292
\$	37,730	42,886	47,438	54,973	61,247	63,356	63,377	0	0	51,792
55-59	954	4,934	4,650	5,458	3,686	3,705	138	5	0	23,530
\$	38,959	44,143	47,527	53,779	59,181	64,480	69,826	*	0	52,549
60-64	507	2,550	2,068	2,362	1,516	1,112	53	5	0	10,173
\$	40,342	44,856	48,885	53,724	56,646	62,460	75,562	*	0	51,373
65-69	127	645	453	428	206	158	11	2	0	2,030
\$	29,183	38,271	43,945	49,498	56,605	59,867	*	*	0	45,085
70-74	34	159	80	43	30	17	5	0	0	368
\$	*	*	*	*	*	*	*	0	0	0
75+	12	43	19	18	4	6	0	0	0	102
\$	*	*	*	*	*	*	0	0	0	0
<b>Total</b>	<b>11,046</b>	<b>42,223</b>	<b>26,116</b>	<b>21,409</b>	<b>12,553</b>	<b>9,802</b>	<b>281</b>	<b>12</b>	<b>0</b>	<b>123,442</b>
<b>\$</b>	<b>38,902</b>	<b>45,227</b>	<b>50,814</b>	<b>56,067</b>	<b>60,229</b>	<b>63,166</b>	<b>68,138</b>	<b>*</b>	<b>0</b>	<b>50,728</b>

Valuation payroll excludes projected pay for members over the mandatory retirement age. Average payroll information is not shown for age/service cells with fewer than 20 members. However, these amounts are included in the calculation of average valuation pay.

## Data

System Wide Data Exhibits (*continued*)**Age/Service and Valuation Payroll by Rate Pool****SLGRP Active Members**

	0-4	5-9	10-14	15-19	20-24	25-29	30-34	35-39	40+	Total
20-24	66	26	0	0	0	0	0	0	0	92
\$	25,357	27,229	0	0	0	0	0	0	0	25,886
25-29	579	678	14	0	0	0	0	0	0	1,271
\$	38,634	42,100	*	0	0	0	0	0	0	40,553
30-34	880	2,922	476	6	0	0	0	0	0	4,284
\$	42,130	50,119	53,286	*	0	0	0	0	0	48,838
35-39	783	3,687	2,075	427	8	0	0	0	0	6,980
\$	45,348	51,772	59,036	58,409	*	0	0	0	0	53,612
40-44	649	3,207	2,232	1,622	384	12	0	0	0	8,106
\$	45,671	51,300	58,562	63,781	58,103	*	0	0	0	55,682
45-49	617	3,244	2,292	2,132	1,359	514	0	0	0	10,158
\$	44,491	50,080	55,978	60,127	64,052	59,843	0	0	0	55,543
50-54	596	3,184	2,524	2,779	1,928	1,695	54	0	0	12,760
\$	44,778	50,280	54,536	59,893	63,944	62,990	62,597	0	0	56,764
55-59	490	2,594	2,284	2,656	1,911	1,805	86	3	0	11,829
\$	44,497	50,078	53,636	59,294	63,843	66,384	67,559	*	0	57,442
60-64	321	1,494	1,134	1,340	854	650	35	3	0	5,831
\$	45,612	49,035	53,283	57,894	61,633	68,519	68,927	*	0	55,843
65-69	67	365	281	268	126	98	9	1	0	1,215
\$	33,462	44,496	48,266	54,230	60,657	70,607	*	*	0	50,922
70-74	16	89	42	23	22	14	4	0	0	210
\$	*	*	*	*	*	*	*	0	0	*
75+	6	28	12	15	1	4	0	0	0	66
\$	*	*	*	*	*	*	0	0	0	*
<b>Total</b>	<b>5,070</b>	<b>21,518</b>	<b>13,366</b>	<b>11,268</b>	<b>6,593</b>	<b>4,792</b>	<b>188</b>	<b>7</b>	<b>0</b>	<b>62,802</b>
<b>\$</b>	<b>43,213</b>	<b>49,868</b>	<b>55,487</b>	<b>59,723</b>	<b>62,991</b>	<b>64,593</b>	<b>65,362</b>	<b>*</b>	<b>0</b>	<b>54,842</b>

Valuation payroll excludes projected pay for members over the mandatory retirement age. Average payroll information is not shown for age/service cells with fewer than 20 members. However, these amounts are included in the calculation of average valuation pay.

## Data

System Wide Data Exhibits (*continued*)**Age/Service and Valuation Payroll by Rate Pool (*continued*)****School District Active Members**

	0-4	5-9	10-14	15-19	20-24	25-29	30-34	35-39	40+	Total
20-24	26	8	0	0	0	0	0	0	0	<b>34</b>
\$	19,238	*	0	0	0	0	0	0	0	<b>19,744</b>
25-29	758	297	4	0	0	0	0	0	0	<b>1,059</b>
\$	36,214	33,479	*	0	0	0	0	0	0	<b>35,439</b>
30-34	1,078	2,685	140	3	0	0	0	0	0	<b>3,906</b>
\$	38,154	43,284	42,714	*	0	0	0	0	0	<b>41,848</b>
35-39	767	2,741	1,437	116	1	0	0	0	0	<b>5,062</b>
\$	35,102	43,779	52,003	52,295	*	0	0	0	0	<b>44,994</b>
40-44	673	2,432	1,510	1,073	143	1	0	0	0	<b>5,832</b>
\$	31,832	37,728	50,256	59,519	54,080	*	0	0	0	<b>44,701</b>
45-49	683	2,892	1,943	1,527	1,225	221	0	0	0	<b>8,491</b>
\$	28,503	33,517	41,001	52,622	61,451	54,467	0	0	0	<b>42,837</b>
50-54	529	2,791	2,524	2,177	1,417	1,957	15	0	0	<b>11,410</b>
\$	28,485	32,957	38,685	47,082	56,364	62,522	*	0	0	<b>44,728</b>
55-59	382	1,930	2,017	2,351	1,502	1,641	41	0	0	<b>9,864</b>
\$	30,636	34,675	39,213	46,549	52,455	61,545	72,023	0	0	<b>45,610</b>
60-64	141	831	771	833	546	390	12	1	0	<b>3,525</b>
\$	28,436	35,863	41,000	46,129	48,395	51,703	*	*	0	<b>43,046</b>
65-69	46	221	150	119	67	49	2	1	0	<b>655</b>
\$	23,187	27,430	35,911	39,259	49,268	42,179	*	*	0	<b>34,728</b>
70-74	16	55	34	14	4	2	0	0	0	<b>125</b>
\$	*	*	*	*	*	*	0	0	0	<b>*</b>
75+	5	10	6	1	2	1	0	0	0	<b>25</b>
\$	*	*	*	*	*	*	0	0	0	<b>*</b>
<b>Total</b>	<b>5,104</b>	<b>16,893</b>	<b>10,536</b>	<b>8,214</b>	<b>4,907</b>	<b>4,262</b>	<b>70</b>	<b>2</b>	<b>0</b>	<b>49,988</b>
\$	<b>33,061</b>	<b>37,281</b>	<b>42,723</b>	<b>49,361</b>	<b>55,316</b>	<b>60,454</b>	<b>73,114</b>	<b>*</b>	<b>0</b>	<b>43,782</b>

Valuation payroll excludes projected pay for members over the mandatory retirement age. Average payroll information is not shown for age/service cells with fewer than 20 members. However, these amounts are included in the calculation of average valuation pay.

## Data

System Wide Data Exhibits (*continued*)**Age/Service and Valuation Payroll by Rate Pool (*continued*)***Independent Employers Active Members*

	0-4	5-9	10-14	15-19	20-24	25-29	30-34	35-39	40+	Total
20-24	16	1	0	0	0	0	0	0	0	17
\$	*	*	0	0	0	0	0	0	0	*
25-29	102	147	3	0	0	0	0	0	0	252
\$	49,563	51,904	*	0	0	0	0	0	0	50,892
30-34	170	621	100	3	0	0	0	0	0	894
\$	51,870	58,632	60,835	*	0	0	0	0	0	57,629
35-39	140	719	434	84	3	0	0	0	0	1,380
\$	49,678	58,414	67,983	67,692	*	0	0	0	0	61,086
40-44	112	601	391	320	81	1	0	0	0	1,506
\$	49,178	56,865	66,522	71,289	66,643	*	0	0	0	62,394
45-49	104	491	324	380	239	85	0	0	0	1,623
\$	53,130	51,858	61,338	66,945	72,721	73,046	0	0	0	61,546
50-54	84	518	423	451	323	318	5	0	0	2,122
\$	45,942	50,938	57,322	62,748	66,576	70,447	*	0	0	59,883
55-59	82	410	349	451	273	259	11	2	0	1,837
\$	44,642	51,161	55,600	58,993	63,551	69,798	*	*	0	58,307
60-64	45	225	163	189	116	72	6	1	0	817
\$	40,051	50,324	55,590	57,637	58,769	66,025	*	*	0	55,402
65-69	14	59	22	41	13	11	0	0	0	160
\$	*	40,372	43,525	48,283	*	*	0	0	0	43,165
70-74	2	15	4	6	4	1	1	0	0	33
\$	*	*	*	*	*	*	*	0	0	*
75+	1	5	1	2	1	1	0	0	0	11
\$	*	*	*	*	*	*	0	0	0	*
<b>Total</b>	<b>872</b>	<b>3,812</b>	<b>2,214</b>	<b>1,927</b>	<b>1,053</b>	<b>748</b>	<b>23</b>	<b>3</b>	<b>0</b>	<b>10,652</b>
<b>\$</b>	<b>48,027</b>	<b>54,240</b>	<b>61,103</b>	<b>63,272</b>	<b>65,830</b>	<b>69,486</b>	<b>75,689</b>	<b>*</b>	<b>0</b>	<b>59,066</b>

Valuation payroll excludes projected pay for members over the mandatory retirement age. Average payroll information is not shown for age/service cells with fewer than 20 members. However, these amounts are included in the calculation of average valuation pay.

## Data

System Wide Data Exhibits (*continued*)**Age/Service and Valuation Payroll by Rate Pool (*continued*)****OPSRP Active Members Age and Valuation Payroll**

Age	General Service	Police and Fire	Total
<b>&lt;20</b>	139		139
	\$ 9,274		\$ 9,274
<b>20-24</b>	2,114	167	2,281
	\$ 22,223	\$ 42,165	\$ 23,683
<b>25-29</b>	7,778	771	8,549
	\$ 31,282	\$ 50,565	\$ 33,021
<b>30-34</b>	6,208	595	6,803
	\$ 35,055	\$ 50,427	\$ 36,399
<b>35-39</b>	5,680	388	6,068
	\$ 35,348	\$ 50,079	\$ 36,290
<b>40-44</b>	5,044	217	5,261
	\$ 32,728	\$ 49,309	\$ 33,412
<b>45-49</b>	4,783	170	4,953
	\$ 32,336	\$ 46,280	\$ 32,815
<b>50-54</b>	4,123	119	4,242
	\$ 33,498	\$ 52,212	\$ 34,023
<b>55-59</b>	2,965	97	3,062
	\$ 35,153	\$ 46,921	\$ 35,526
<b>60-64</b>	1,582	39	1,621
	\$ 32,236	\$ 47,883	\$ 32,612
<b>65-69</b>	404	12	416
	\$ 25,158	*	\$ 24,432
<b>70-74</b>	118	2	120
	*	*	\$ -
<b>75+</b>	65	1	66
	*	*	-
<b>TOTAL</b>	<b>41,003</b>	<b>2,578</b>	<b>43,581</b>
	<b>\$ 32,515</b>	<b>\$ 49,132</b>	<b>\$ 33,498</b>

Valuation payroll excludes projected pay for members over the mandatory retirement age. Average payroll information is not shown for age/service cells with fewer than 20 members. However, these amounts are included in the calculation of average valuation pay.

## Data

### System Wide Data Exhibits (*continued*)

#### **Inactive Member Data Exhibits**

For the following exhibits, inactive members are counted by lives, not by segments.

#### *Total Tier 1/ Tier 2*

##### **Dormants**

	Count	Average Monthly Benefit
0-20	0	0
20-24	246	99
25-29	1,426	313
30-34	3,334	794
35-39	4,276	1,131
40-44	4,425	1,288
45-49	5,722	1,368
50-54	8,402	1,414
55-59	8,748	1,191
60-64	4,322	761
65-69	1,575	585
70-74	520	400
75+	787	335
<b>Total</b>	<b>43,783</b>	<b>1,107</b>

##### **Benefits in Force**

	Count	Average Monthly Benefit
0-45	513	1,195
45-49	421	1,520
50-54	1,914	2,749
55-59	10,900	2,889
60-64	21,653	2,563
65-69	20,662	2,206
70-74	15,734	1,891
75-79	12,568	1,567
80-84	10,449	1,215
85-90	6,765	911
90-94	2,922	733
95-99	731	678
100+	104	545
<b>Total</b>	<b>105,336</b>	<b>1,995</b>

#### *OPSRP*

##### **Dormants**

	Count	Average Monthly Benefit
0-20	0	0
20-24	0	0
25-29	0	0
30-34	0	0
35-39	0	0
40-44	0	0
45-49	0	0
50-54	0	0
55-59	0	0
60-64	10	29
65-69	102	34
70-74	34	34
75+	20	20
<b>Total</b>	<b>166</b>	<b>32</b>

##### **Benefits in Force**

	Count	Average Monthly Benefit
0-45	0	0
45-49	0	0
50-54	0	0
55-59	0	0
60-64	0	0
65-69	0	0
70-74	0	0
75-79	0	0
80-84	0	0
85-90	0	0
90-94	0	0
95-99	0	0
100+	0	0
<b>Total</b>	<b>0</b>	<b>0</b>

## Data

System Wide Data Exhibits (*continued*)**Inactive Member Data Exhibits (*continued*)****System-Wide Totals****Dormants**

	Average Monthly Benefit	
	Count	Benefit
0-20	0	0
20-24	246	99
25-29	1,426	313
30-34	3,334	794
35-39	4,276	1,131
40-44	4,425	1,288
45-49	5,722	1,368
50-54	8,402	1,414
55-59	8,748	1,191
60-64	4,332	760
65-69	1,677	552
70-74	554	378
75+	807	327
<b>Total</b>	<b>43,949</b>	<b>1,103</b>

**Benefits in Force**

	Average Monthly Benefit	
	Count	Benefit
0-45	513	1,195
45-49	421	1,520
50-54	1,914	2,749
55-59	10,900	2,889
60-64	21,653	2,563
65-69	20,662	2,206
70-74	15,734	1,891
75-79	12,568	1,567
80-84	10,449	1,215
85-90	6,765	911
90-94	2,922	733
95-99	731	678
100+	104	545
<b>Total</b>	<b>105,336</b>	<b>1,995</b>



## Actuarial Methods and Assumptions — Tier 1/Tier 2

### Actuarial Methods and Valuation Procedures

The Board adopted the following actuarial methods and valuation procedures for the December 31, 2006 and 2007, actuarial valuations of PERS Tier 1/Tier 2 benefits. The actuarial methods and procedures were first adopted effective December 31, 2004.

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#### *Actuarial cost method*

**Projected Unit Credit.** Under the Projected Unit Credit cost method, the objective is to fund each member's benefit under the plan as it accrues, taking into consideration expected future compensation increases. Thus, the total pension to which each member is expected to become entitled at retirement is broken down into units, each associated with a year of past or future credited service. Typically, when this method is introduced, there will be an initial liability for benefits credited for service prior to that date, and to the extent that the liability is not covered by assets of the plan, there is an unfunded liability to be funded over a stipulated period in accordance with an amortization schedule.

A detailed description of the calculation follows:

- An individual member's **accrued benefit** for valuation purposes related to a particular separation date is the accrued benefit described under the plan, determined using the projected compensation and service that would be used in the calculation of the benefit on the expected separation date, multiplied by the ratio of credited service as of the valuation date over credited service as of the expected separation date. In no event can this be less than the accrued benefit described under the plan, determined using the compensation and service as of the valuation date.
- The **benefit** deemed to accrue for an individual member during a plan year is the excess of the accrued benefit for valuation purposes at the end of the plan year over the accrued benefit for valuation purposes at the beginning of the plan year. Both accrued benefits are calculated from the same projections to the various anticipated separation dates as described above.
- An individual member's **accrued liability** is the present value of the accrued benefit for valuation purposes at the beginning of the plan year, and an individual member's **normal cost** is the present value of the benefit deemed to accrue in the plan year. The accrued liability and the normal cost for an individual member are the sum of the component accrued liabilities and normal costs associated with the various anticipated separation dates. Such accrued liabilities and normal costs reflect the accrued benefits as modified to obtain the benefits payable on those dates and the probability of the member separating on those dates.
  - The plan's **normal cost** is the sum of the individual member normal costs, and the plan's **accrued liability** is the sum of the accrued liabilities for all members under the plan.

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#### *Amortization of change in Unfunded Actuarial Liability (UAL) due to change in actuarial cost method (PUC change UAL)*

The change in UAL due to the change from Entry Age Normal to Projected Unit Credit on December 31, 2004 is amortized as a level percentage of combined valuation payroll over a rolling three-year period.

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## Actuarial Methods and Assumptions – Tier 1/Tier 2

### Actuarial Methods and Valuation Procedures (*continued*)

<i>Tier 1/Tier 2 UAL and Retiree Healthcare UAL amortization</i>	The Tier 1/Tier 2 regular UAL and Retiree Healthcare regular UAL as of December 31, 2007 are amortized as a level percentage of combined valuation payroll over a closed 20-year period. Gains and losses between subsequent odd-year valuations are amortized as a level percentage of combined valuation payroll over 20 years from the odd-year valuation in which they are first recognized.
<i>Asset valuation method</i>	The actuarial value of assets equals the market value of assets, excluding the Contingency, Capital Preservation and Rate Guarantee Reserves.
<i>Contribution rate stabilization method</i>	Contribution rates are confined to a collar based on the prior contribution rate (prior to application of side accounts). The new contribution rate will not increase or decrease from the prior contribution rate by more than the greater of 3 percentage points or 20 percent of the prior contribution rate. If the funded percentage drops below 80% or increases above 120%, the size of the collar doubles.

### Economic Assumptions

The Board adopted the following economic assumptions for the December 31, 2006 and 2007 actuarial valuations. The investment return assumption was first adopted in 1989, and the interest crediting assumptions were adopted in 2003. All other economic assumptions were first adopted in 2005.

<i>Investment return</i>	8.0% compounded annually														
<i>Interest crediting</i>	8.0% compounded annually on members' regular account balances 8.5% compounded annually on members' variable account balances														
<i>Inflation</i>	2.75% compounded annually														
<i>Payroll growth</i>	3.75% compounded annually. This assumption represents the sum of the inflation assumption and a real wage growth assumption of 100 basis points.														
<i>Healthcare cost inflation</i>	Health cost trend rates are used to predict increases in the RHIPA Maximum Subsidy.														
	<table border="1"> <thead> <tr> <th style="text-align: center;">Year<sup>1</sup></th> <th style="text-align: center;">Rate</th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">2008</td> <td style="text-align: center;">8.0%</td> </tr> <tr> <td style="text-align: center;">2009</td> <td style="text-align: center;">7.0%</td> </tr> <tr> <td style="text-align: center;">2010</td> <td style="text-align: center;">6.5%</td> </tr> <tr> <td style="text-align: center;">2011</td> <td style="text-align: center;">6.0%</td> </tr> <tr> <td style="text-align: center;">2012</td> <td style="text-align: center;">5.5%</td> </tr> <tr> <td style="text-align: center;">2013+</td> <td style="text-align: center;">5.0%</td> </tr> </tbody> </table>	Year <sup>1</sup>	Rate	2008	8.0%	2009	7.0%	2010	6.5%	2011	6.0%	2012	5.5%	2013+	5.0%
Year <sup>1</sup>	Rate														
2008	8.0%														
2009	7.0%														
2010	6.5%														
2011	6.0%														
2012	5.5%														
2013+	5.0%														

<sup>1</sup> For valuation purposes, the health cost trend rates are assumed to be applied at the beginning of the plan year.

## Actuarial Methods and Assumptions – Tier 1/Tier 2

### Demographic Assumptions

The Board adopted the following demographic assumptions for the December 31, 2006 and 2007 actuarial valuations.

#### ***Mortality***

The following mortality tables were used in the December 31, 2007 valuation. Mortality rates for School District males and General Service males were first adopted effective December 31, 2005. All other mortality rates were adopted effective December 31, 2001.

#### ***Healthy Retired Members***

Basic Table	RP 2000, Combined Active/Healthy Retired, No Collar, Sex Distinct
School District male	Set back 36 months
Other General Service male	Set back 24 months
Police & Fire male	Set back 12 months
School District female	Set back 36 months
Other female	Set back 18 months
Beneficiary male	Set back 24 months
Beneficiary female	Set back 18 months

The following disabled retiree mortality rates were used for the December 31, 2007 actuarial valuation. These rates were first adopted effective December 31, 2005.

#### ***Disabled Retired Members***

Basic Table	RP 2000, Combined Active/Healthy Retired, No Collar, Sex Distinct
Male	Set Forward 36 months, min of 2.5%
Female	Set Forward 36 months, min of 2.75%

The following mortality rates were used for non-retired members for the December 31, 2007 actuarial valuation. The Board adopted the rates below for non-retired members effective with the December 31, 2005 actuarial valuation, except for School District females, which were adopted with the December 31, 2001 actuarial valuation.

#### ***Non-Retired Members***

Basic Table	Percent of Healthy Retired Mortality Tables
Police & Fire Male	70%
Other Male	65%
School District Female	50%
Other Female	55%

## Actuarial Methods and Assumptions – Tier 1/Tier 2

### Demographic Assumptions (*continued*)

#### **Retirement Assumptions**

The retirement assumptions used in the actuarial valuation include the following:

- Retirement from active status/dormant status
- Probability a member will elect a lump sum option at retirement
- Percentage of members who elect to purchase credited service at retirement.

#### **Rates of Retirement from Active Status**

The following retirement rate assumptions were used in the December 31, 2007 valuation. These rates were first adopted December 31, 2005, but were adjusted for certain age ranges for the December 31, 2006 valuation.

Judge members are assumed to retire at age 63.

Age	Police & Fire		School District		Other General Service		General Service
	< 25 yrs	25+ yrs	Tier 1 < 30 yrs	Tier 2 < 30 yrs	Tier 1 < 30 yrs	Tier 2 < 30 yrs	30+ yrs
	< 50						
50	7.5%	50.0%					40.0%
51	7.5%	25.0%					45.0%
52	7.5%	25.0%					55.0%
53	7.5%	25.0%					55.0%
54	7.5%	25.0%					55.0%
55	15.0%	20.0%	14.0%	7.0%	10.0%	5.0%	40.0%
56	8.5%	20.0%	7.0%	3.5%	5.0%	2.5%	25.0%
57	8.5%	20.0%	10.0%	5.0%	7.5%	3.75%	25.0%
58	8.5%	20.0%	15.0%	5.0%	10.0%	3.75%	25.0%
59	8.5%	20.0%	10.0%	5.0%	7.5%	3.75%	25.0%
60	15.0%	20.0%	10.0%	10.0%	7.5%	7.5%	13.0%
61	15.0%	40.0%	15.0%	15.0%	10.0%	10.0%	13.0%
62	25.0%	50.0%	15.0%	15.0%	14.0%	14.0%	25.0%
63	5.0%	40.0%	10.0%	10.0%	12.0%	12.0%	20.0%
64	5.0%	40.0%	15.0%	15.0%	12.0%	12.0%	20.0%
65	100.0%	100.0%	22.0%	22.0%	24.0%	24.0%	28.0%
66			10.0%	10.0%	10.0%	10.0%	20.0%
67			10.0%	10.0%	10.0%	10.0%	20.0%
68			4.00%	4.0%	10.0%	10.0%	20.0%
69			4.00%	4.0%	10.0%	10.0%	20.0%
70			100%	100%	100%	100%	100%

## Actuarial Methods and Assumptions — Tier 1/Tier 2

### Demographic Assumptions (*continued*)

#### ***Retirement Assumptions (continued)***

##### *Retirement from Dormant Status*

Dormant members are assumed to retire at Normal Retirement Age (age 58 for Tier 1, age 60 for Tier 2, age 60 for Judges, and age 55 for Police & Fire) or at the first unreduced retirement age (30 years of service, or age 50 with 25 years of service for Police & Fire).

##### *Lump Sum Option at Retirement*

Members retiring may elect to receive a full or partial lump sum at retirement. The probability that a retiring member will elect a lump sum at retirement is summarized in the table below. These rates were first adopted effective December 31, 2006.

Partial Lump Sum:	7% for all years
Total Lump Sum:	7% for 2007, declining by 0.5% per year until reaching 0.0%
No Lump Sum:	86% in 2007, increasing by 0.5% until reaching 93.0%

##### *Purchase of Credited Service at Retirement*

The following percentages of members are assumed to purchase credit for the six-month waiting period at retirement. These rates were first adopted effective December 31, 2005.

Money Match Retirements:	0%
Non-Money Match Retirements:	45%

##### *Judge Member Plan Election*

All judge members are assumed to elect to retire under the provisions of Plan B.

## Actuarial Methods and Assumptions – Tier 1/Tier 2

### Demographic Assumptions (*continued*)

#### **Disability Assumptions**

There are two disability assumptions used in the valuation - duty disability and ordinary disability. Duty Disability rates are separated between Police & Fire and General Service, while ordinary disability is the same for all members. The rates for ordinary disability were first adopted effective December 31, 2005. The rates for duty disability were first adopted effective December 31, 2006.

Age	Duty Disability Police & Fire	Duty Disability General Service	Ordinary Disability
Less than age 35	0.020%	0.002%	0.050%
35-39	0.030%	0.002%	0.100%
40-44	0.030%	0.004%	0.150%
45-49	0.075%	0.010%	0.200%
50+	0.150%	0.015%	0.300%

#### **Termination Assumptions**

The termination assumptions used in the actuarial valuation include the following assumptions:

- Termination from active status prior to retirement eligibility
- Probability that a member will not take a lump sum distribution prior to retirement.

All of the termination assumptions were first adopted effective December 31, 2006.

#### **Termination Rates**

Sample termination rates are shown for each group below:

Age	School District	OHSU	Independent				
			SLGRP General Service Male	SLGRP General Service Female	Independent Employers General Service Male	Independent Employers General Service Female	Police & Fire
30	5.94%	9.89%	6.97%	7.49%	6.11%	9.10%	3.45%
40	3.31%	6.20%	4.38%	4.52%	3.84%	5.70%	2.17%
50	2.26%	4.27%	2.96%	3.09%	2.47%	3.58%	1.24%

## Actuarial Methods and Assumptions — Tier 1/Tier 2

### Demographic Assumptions (*continued*)

#### ***Termination Assumptions (continued)***

##### ***No Lump Sum Before Retirement***

The following table shows the probability that vested terminated members will elect to receive a deferred benefit instead of withdrawing accumulated member contributions for sample ages:

Age	General	
	Service	Police & Fire
30	77.50%	60.00%
40	77.50%	64.00%
50	90.00%	100.00%

# Actuarial Methods and Assumptions – Tier 1/Tier 2

## Demographic Assumptions *(continued)*

### **Salary Increase Assumptions**

The salary increase assumptions reflected in the actuarial valuation include:

- Merit scale increases in addition to the payroll growth increase
- Unused Sick Leave adjustments
- Vacation Pay adjustments

### **Merit Increases**

Merit increases are based on duration of service for the following groups. The rates for school districts were first adopted effective December 31, 2005. All other rates were adopted December 31, 2003.

Duration	School District	OHSU	SLGRP General Service	SLGRP Police & Fire	Independent Employers General Service	Independent Employers Police & Fire
5	1.90%	1.00%	1.80%	2.30%	1.80%	2.50%
10	1.20%	0.30%	0.90%	1.10%	1.00%	1.30%
15	0.60%	0.25%	0.40%	0.60%	0.55%	0.80%
20	0.26%	0.00%	0.10%	0.30%	0.30%	0.50%

### **Unused Sick Leave**

Members covered by the provision allowing unused sick leave to be used to increase final average salary are assumed to receive increases in their final average salary in accordance with the table below. This adjustment is not applied to disability benefits. The rates for local general service females were first adopted December 31, 2001. All other rates were adopted effective December 31, 2005.

Actives	Rates
State GS Male	5.75%
State GS Female	4.75%
School District Male	7.25%
School District Female	6.75%
Local GS Male	3.50%
Local GS Female	3.00%
Police & Fire	8.75%

Dormants	Rates
All members	3.50%

## Actuarial Methods and Assumptions — Tier 1/Tier 2

### Demographic Assumptions (*continued*)

#### *Vacation Pay*

Members eligible to receive a lump sum payment of unused vacation pay are assumed to receive increases in their final average salary in accordance with the table below. This adjustment is not applied to disability benefits.

	Rates
Tier 1 Non-School District	2.8%
Tier 1 School District	1.4%
Tier 2 / Judges	0.0%

# Actuarial Methods and Assumptions — Tier 1/Tier 2

## Demographic Assumptions (*continued*)

### **Retiree Healthcare Participation**

The following percentages of eligible retiring members are assumed to elect RHIPA and RHIA coverage:

RHIPA	11%
RHIA	
▪ Healthy Retired	50%
▪ Disabled Retired	25%

These rates were first adopted effective December 31, 2005.

## Actuarial Methods and Assumptions — OPSRP

Most of the methods and assumptions adopted for the OPSRP valuation are the same as those used for Tier 1/ Tier 2. A summary of the methods and assumptions that differ for OPSRP are summarized below.

### Actuarial Methods and Valuation Procedures

<i>OPSRP UAL amortization</i>	Gains and losses between odd-year valuations are amortized as a level percentage of combined valuation payroll (Tier 1/ Tier 2 plus OPSRP payroll) over 16 years from the valuation in which they are first recognized.
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### Economic Assumptions

<i>Administrative expenses</i>	\$8.5 million per year is added to the normal cost.
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### Demographic Assumptions

#### **Retirement Assumptions**

##### *Retirement from Active Status*

Age	Police & Fire		General Service	
	< 25 years	25+ years	<30 years	30+ years
50	3.75%	7.50%		
51	3.75%	7.50%		
52	3.75%	7.50%		
53	3.75%	50.00%		
54	3.75%	25.00%		
55	4.25%	20.00%	5.00%	5.00%
56	4.25%	20.00%	2.50%	2.50%
57	4.25%	20.00%	3.75%	3.75%
58	4.25%	20.00%	3.75%	40.00%
59	4.25%	20.00%	3.75%	25.00%
60	30.00%	20.00%	3.75%	13.00%
61	15.00%	40.00%	5.00%	13.00%
62	25.00%	50.00%	7.00%	25.00%
63	5.00%	40.00%	6.00%	20.00%
64	5.00%	40.00%	6.00%	20.00%
65	100.00%	100.00%	50.00%	28.00%
66			10.00%	20.00%
67			10.00%	20.00%
68			10.00%	20.00%
69			10.00%	20.00%
70			100.00%	100.00%

##### *Retirement from Dormant Status*

Dormant members are assumed to retire at Normal Retirement Age.

# Actuarial Methods and Assumptions — OPSRP

## Demographic Assumptions (*continued*)

### **Termination Assumptions**

The termination rates are based on 3-year select and ultimate rates, with the ultimate rates being the same as the Tier 1/ Tier 2 termination rates.

Age	School District				OHSU			
	1st Select	2nd Select	3rd Select	Ultimate	1st Select	2nd Select	3rd Select	Ultimate
	Period	Period	Period		Period	Period	Period	
30	13.35%	10.34%	7.56%	5.94%	15.23%	13.43%	11.43%	9.89%
40	10.76%	7.42%	5.50%	3.31%	11.15%	8.82%	6.91%	6.20%
50	9.87%	6.31%	4.38%	2.26%	9.44%	6.16%	4.02%	4.27%

Age	Independent Employers General Service Male				Independent Employers General Service Female			
	1st Select	2nd Select	3rd Select	Ultimate	1st Select	2nd Select	3rd Select	Ultimate
	Period	Period	Period		Period	Period	Period	
30	18.74%	14.74%	8.74%	6.11%	18.20%	15.88%	12.16%	9.10%
40	16.22%	12.22%	6.22%	3.84%	13.68%	11.80%	8.64%	5.70%
50	13.84%	9.84%	3.84%	2.47%	11.79%	9.93%	6.76%	3.58%

Age	SLGRP General Service Male				SLGRP General Service Female			
	1st Select	2nd Select	3rd Select	Ultimate	1st Select	2nd Select	3rd Select	Ultimate
	Period	Period	Period		Period	Period	Period	
30	16.65%	13.36%	10.12%	6.97%	18.15%	15.87%	12.13%	7.49%
40	12.08%	9.22%	6.77%	4.38%	13.58%	11.77%	8.58%	4.52%
50	10.17%	7.34%	4.82%	2.96%	11.67%	9.97%	6.73%	3.09%

Age	Police & Fire			
	1st Select	2nd Select	3rd Select	Ultimate
	Period	Period	Period	
30	8.29%	6.04%	4.73%	3.45%
40	6.68%	4.43%	3.30%	2.17%
50	4.66%	2.41%	1.89%	1.24%

## Actuarial Methods and Assumptions — Tier 1/ Tier 2 and OPSRP

There were no changes in methods or assumptions since the December 31, 2006 actuarial valuation.



## Summary of Plan Provisions

The following section summarizes the plan provisions considered in the actuarial valuation. A more detailed description of plan provisions is available from the PERS administrative office.

<i>Membership</i>	All employees of public employers participating in this System who are in qualifying positions become members of the System after completing six months of service except those who are eligible for and have elected to participate in an optional retirement plan. Different benefit provisions of the plan apply based on date of hire.	
	<b>Tier 1</b>	Hired prior to 1996
	<b>Tier 2</b>	Hired after 1995 and before August 29, 2003
	<b>OPSRP</b>	Hired after August 28, 2003, not a judge, and not a former Tier 1/Tier 2 member eligible to reestablish Tier 1/Tier 2 membership
	<b>Judges</b>	Members of the State Judiciary
<i>Employee Contributions</i>	<b>Judges</b>	7% of salary
	<b>All others</b>	None
<i>Employer Contributions</i>	Actuarially determined	

## Summary of Chapter 238 Provisions — Tier 1/Tier 2 and Judges

<i>Normal Retirement Date</i>	<b>Police and Fire</b>	Age 55						
	<b>Judges</b>	Age 65						
	<b>Tier 1 General Service</b>	Age 58						
	<b>Tier 2 General Service</b>	Age 60						
<i>Normal Retirement Allowance</i>	For Members who are not Judges, the greatest of the Full Formula benefit, the Money Match benefit, or the Formula Plus Annuity benefit (only available to Members who made contributions before August 21, 1981).							
	<b>Full Formula</b>	The percentage multiplier from the table below multiplied by final average pay and years of credited service plus a prior service pension, if applicable.						
		<table border="1"> <thead> <tr> <th style="text-align: left;">Percentage Multiplier</th> <th style="text-align: left;">Membership Classification</th> </tr> </thead> <tbody> <tr> <td>2.00%</td> <td>Fire, Police and Legislators</td> </tr> <tr> <td>1.67%</td> <td>All other members</td> </tr> </tbody> </table>	Percentage Multiplier	Membership Classification	2.00%	Fire, Police and Legislators	1.67%	All other members
Percentage Multiplier	Membership Classification							
2.00%	Fire, Police and Legislators							
1.67%	All other members							
	<b>Money Match</b>	The Member's account balance and a matching employer amount converted to an actuarially equivalent annuity.						
	<b>Formula Plus Annuity</b>	The Member's account balance converted to an actuarially equivalent cash refund annuity plus the percentage multiplier from the table below multiplied by final average pay and years of credited service, plus a prior service pension, if applicable.						
		<table border="1"> <thead> <tr> <th style="text-align: left;">Percentage Multiplier</th> <th style="text-align: left;">Membership Classification</th> </tr> </thead> <tbody> <tr> <td>1.35%</td> <td>Fire, Police and Legislators</td> </tr> <tr> <td>1.00%</td> <td>All other members</td> </tr> </tbody> </table>	Percentage Multiplier	Membership Classification	1.35%	Fire, Police and Legislators	1.00%	All other members
Percentage Multiplier	Membership Classification							
1.35%	Fire, Police and Legislators							
1.00%	All other members							

## Summary of Plan Provisions

### Summary of Chapter 238 Provisions — Tier 1/Tier 2 and Judges (continued)

<i>Normal Retirement Allowance (continued)</i>	<b>Judges</b>	Final average pay multiplied by the first percentage multiplier from the table below for up to 16 years of service plus the second percentage multiplier for any service in excess of 16 years, but not to exceed the maximum percentage of final average pay also shown below. Judges must elect Plan A or Plan B no later than age 60. A "Plan B" judge must serve as a pro tem judge for a total of 175 days postretirement.		
		<b>Plan</b>	<b>Percentage Factor (up to 16 years)</b>	<b>Percentage Factor (after 16 years)</b>
			<b>Maximum Percentage of Final Average Pay</b>	
		A	2.8125%	1.67%
		B	3.75%	2.00%
				65%
				75%
<i>SB 656/HB 3349 Adjustment</i>	All members receive an increase to their monthly retirement benefit equal to the greater of the increase under Senate Bill 656 (SB 656) or House Bill 3349 (HB 3349).			
	<b>SB 656 Increase</b>	<b>Years of Service</b>	<b>General Service</b>	<b>Police &amp; Fire</b>
		0-9	0.0%	0.0%
		10-14	1.0	1.0
		15-19	1.0	1.0
		20-24	2.0	2.5
		25-29	3.0	4.0
		30 & Over	4.0	4.0
	<b>HB 3349 Increase</b>	1	Service prior to October 1, 1991	
		1 – maximum Oregon personal income tax rate	×	All Service
<i>Early Retirement Eligibility</i>	<b>Police and Fire</b>	Age 50 or 30 years of service		
	<b>Judges</b>	Age 60		
	<b>General Service</b>	Age 55 or 30 years of service		
<i>Early Retirement Allowance</i>	Normal retirement allowance, actuarially reduced to early retirement age. However, there is no reduction applied if a member has completed 30 years of service (25 years for police & fire members) or for judges in Plan B.			
<i>Vesting</i>	Five years or attainment of normal retirement age.			
<i>Termination Benefits</i>	<b>Non-Vested</b>	Payment of member's account balance.		
	<b>Vested</b>	Same as normal (or early) retirement allowance, but commencement is deferred to normal (or early) retirement date.		

# Summary of Plan Provisions

## Summary of Chapter 238 Provisions — Tier 1/Tier 2 and Judges (continued)

<i>Optional Forms of Retirement Allowance</i>	<p>The normal form of benefit is a cash refund annuity (joint and two-thirds survivor contingent annuity for a married judge). All optional amounts are adjusted to be actuarially equivalent.</p> <p><b>Options Available</b></p> <ul style="list-style-type: none"> <li>a. Life annuity</li> <li>b. Cash refund annuity</li> <li>c. Life annuity guaranteed 15 years</li> <li>d. Joint and 50% or 100% survivor contingent annuity, with or without pop-up feature</li> <li>e. Lump sum of member contribution account (under any form) plus a pension from employer contributions under the Full Formula or Money Match method.</li> <li>f. Lump sum of member contribution account plus a matching employer amount.</li> </ul>
<i>Preretirement Death Benefit Eligibility</i>	<p><b>Judges</b> Six or more years of service.</p> <p><b>All others</b> Death occurring while the member is an employee of a participating employer or within 120 days of termination provided the employee does not withdraw the account balance or retire, or a result of injuries received while in the service of a participating employer.</p>
<i>Preretirement Death Benefit</i>	<p><b>Judges</b> The spouse shall receive a life pension equal to two-thirds of the service retirement allowance. The beneficiary of an unmarried judge shall receive the member's accumulated contributions with interest.</p> <p><b>All others</b> The member's account balance plus a matching employer amount.</p>
<i>Additional Police &amp; Fire Death Benefits</i>	<p>Upon the death of a retired police officer or firefighter, the surviving spouse or dependent children under age 18 will receive a monthly benefit based on 25% of the cash refund retirement allowance due to police and fire service.</p>
<i>Disability Benefit Eligibility</i>	<p><b>Duty</b> Disablement occurring as a direct result of a job-related injury or illness, regardless of length of service.</p> <p><b>Non-Duty</b> Disablement occurring after ten years of service (six years, if a judge), but prior to normal retirement eligibility.</p>
<i>Disability Benefits</i>	<p>The normal retirement allowance calculated based on the service credit that would have been earned if the member had continued working to age 58 (age 55 for police and fire, age 65 for judge members) payable commencing immediately.</p> <p><b>Fire and Police Members' Alternative</b></p> <p>In lieu of the above, firefighters and police officers who qualify for duty disability may elect to receive a benefit of 50% of final average monthly salary at the time of disablement.</p> <p><b>Minimum Monthly Retirement Allowance</b></p> <p>Judges..... 45% of final average monthly salary.</p> <p>All others ..... \$100 for a member with at least 15 years of credited service, actuarially reduced if an optional form of benefit is chosen.</p> <p><b>Reduction of Benefits</b></p> <p>Whenever a disabled employee's disability benefit and earned income for any month exceed the monthly salary received at the time of disablement or \$400, if greater, the disability benefit will be reduced by the excess.</p> <p>For Tier Two members, the sum of the disability benefit and any workers' compensation benefits may not exceed the member's salary at the time of disablement.</p>

## Summary of Plan Provisions

### Summary of Chapter 238 Provisions — Tier 1/Tier 2 and Judges (continued)

<i>Police &amp; Fire Unit Purchases</i>	Police & fire members may purchase 60-month annuity benefits (up to \$80 per month) that must be paid out by age 65 and cannot commence prior to the earliest retirement age. The amount purchased by the member is matched by the employer. In certain situations, such as termination of employment prior to retiring, or working beyond age 65, the employer's matching purchase is forfeited.
<i>Postretirement Adjustments</i>	<p>All monthly pension and annuity benefits except unit purchases are eligible for postretirement adjustments.</p> <p><b>Automatic Adjustments</b> Benefits are adjusted annually to reflect the increase or decrease in the Consumer Price Index (Portland area - all items) as published by the Bureau of Labor Statistics. The maximum adjustment to be made for any year is 2% of the previous year's benefit. Any CPI change in excess of 2% is accumulated for future benefit adjustments which would otherwise be less than 2%. No benefit will be decreased below its original amount.</p> <p><b>Ad Hoc Adjustments</b> From time to time, as granted by the Legislature, retired members and beneficiaries have received increases in their monthly benefits.</p>
<i>Variable Annuity Program</i>	<p><b>Contributions</b> Prior to January 1, 2004, a member could elect to have 25, 50 or 75 percent of his or her contributions invested in the variable account.</p> <p><b>Benefit</b> At retirement, a member may elect to receive a variable annuity with the funds accumulated in his or her variable account. Alternatively, a member may elect to have all or a portion of the funds in his or her variable account transferred back to the regular account and receive an annuity from the System as though no variable annuity program existed. The employer provided benefit, however, is based on the earnings the member would have received in the regular account.</p>
<i>Interest Credit on Member Accounts</i>	<p><b>Tier 1 Regular</b> Actuarially assumed rate of return until the rate guarantee reserve has been fully funded for three consecutive years and the Board elects to credit additional interest.</p> <p><b>Tier 2 Regular</b> Amount determined by the Board based on actual investment earnings of the regular account.</p> <p><b>Variable</b> Actual earnings in variable account.</p>
<i>Retiree Healthcare – Medicare Supplement (RHIA)</i>	<p><b>Eligibility</b> All of the following must be met:</p> <ul style="list-style-type: none"> <li>(a) Currently receiving a retirement allowance from the System,</li> <li>(b) Covered for eight years before retirement,</li> <li>(c) Enrolled in a PERS-sponsored health plan, and</li> <li>(d) Enrolled in both Medicare Part A and Part B.</li> </ul> <p><b>Benefit Amount</b> A monthly contribution of up to \$60 per retiree is applied to PERS-sponsored Medicare supplemental insurance costs.</p>

## Summary of Plan Provisions

### Summary of Chapter 238 Provisions — Tier 1/Tier 2 and Judges (continued)

<i>Retiree Healthcare – Under Age 65 (RHIPA)</i>	<b>Eligibility</b>	Retired state employees enrolled in a PERS-sponsored health plan.	
	<b>Benefit</b>	A percentage (as shown in the table below) of the maximum monthly subsidy based on years of service. The maximum monthly subsidy is calculated annually as the average difference between the health insurance premiums paid by active state employees and the premium retirees would pay if they were rated separately from active state employees.	
		<b>Years of Service</b>	<b>Subsidized Amount</b>
		Under 8	0%
		8-9	50
		10-14	60
		15-19	70
		20-24	80
		25-29	90
		30 & Over	100
<i>Benefits Not Included in the Valuation</i>	No material benefits have been excluded from the liabilities.		
<i>Changes in Plan Provisions</i>	▪ None		

## Summary of Plan Provisions

### Summary of Chapter 238A Provisions — OPSRP

<i>Normal Retirement Date</i>	<b>Police &amp; Fire</b>	Age 60 or age 53 with 25 years of retirement credit
	<b>General Service</b>	Age 65 or age 58 with 30 years of retirement credit
	<b>School Districts</b>	Age 65 or age 58 with 30 calendar years of active membership
<i>Normal Retirement Allowance</i>	A single life annuity equal to final average salary times years of retirement credit attributable to service as fire and police times 1.8% plus final average salary times all other years of retirement credit times 1.5%	
<i>Early Retirement Eligibility</i>	<b>Police &amp; Fire</b>	Age 50 and 5 years of vesting service
	<b>General Service</b>	Age 55 and 5 years of vesting service
<i>Early Retirement Allowance</i>	Normal retirement allowance, actuarially reduced to early retirement age.	
<i>Vesting</i>	Five years or attainment of normal retirement age.	
<i>Vested Termination Benefit</i>	Same as normal (or early) retirement allowance, but commencement is deferred to normal (or early) retirement date.	
<i>Optional Forms of Retirement Benefit</i>	The normal form of benefit is a life annuity. All optional amounts are adjusted to be actuarially equivalent. <b>Options Available</b> a. Life annuity b. Joint and 50% or 100% survivor contingent benefit, with or without pop-up feature c. Lump sum if monthly normal retirement benefit is less than \$200 or if lump sum value is less than \$5,000.	
<i>Preretirement Death Benefit Eligibility</i>	Death of a vested member before retirement benefits begin.	
<i>Preretirement Death Benefit</i>	If member was eligible for early retirement, the actuarial equivalent of 50% of the early retirement benefit the participant was eligible to receive at date of death. If member was not eligible for early retirement, the actuarial equivalent of 50% of the early retirement benefit the participant would have been eligible to receive if he terminated employment on his date of death and retired at the earliest possible date.	
<i>Disability Benefit Eligibility</i>	<b>Duty</b>	Disablement occurring as a direct result of a job-related injury or illness, regardless of length of service.
	<b>Non-Duty</b>	Disablement occurring after ten years of service, but prior to normal retirement eligibility.

## Summary of Plan Provisions

### Summary of Chapter 238A Provisions — OPSRP (*continued*)

<i>Disability Benefit Amounts</i>	<b>Preretirement Benefit</b>	45% of salary during last full month of employment before disability, reduced if total benefit including workers' compensation exceeds 75% of salary. Benefit is payable monthly until normal retirement age.
	<b>Retirement Benefit</b>	Same formula as Normal Retirement Benefit, except: Final average salary is adjusted to reflect cost-of-living increases from date of disability to normal retirement age, and Retirement credits continue to accrue from date of disability to normal retirement age.
<i>Postretirement Adjustments</i>		All monthly pension and annuity benefits are eligible for postretirement adjustments.
	<b>Automatic Adjustments</b>	Benefits are adjusted annually to reflect the increase or decrease in the Consumer Price Index (Portland area - all items) as published by the Bureau of Labor Statistics.  The maximum adjustment to be made for any year is 2% of the previous year's benefit. Any CPI change in excess of 2% is accumulated for future benefit adjustments which would otherwise be less than 2%. No benefit will be decreased below its original amount.
	<b>Ad Hoc Adjustments</b>	From time to time, as granted by the Legislature, retired members and beneficiaries have received increases in their monthly benefits.
<i>Changes in Plan Provisions</i>	▪ None	



## Glossary

**Actuarial Accrued Liability.** The portion of the present value of prospective benefits allocated to service before the valuation date in accordance with the actuarial cost method.

**Actuarial Asset Value.** The value of assets used in calculating the required contributions. The actuarial asset value may be equal to the fair market value of assets, or it may spread the recognition of certain investment gains or losses over a period of years in accordance with an asset valuation method.

**Actuarial Assumptions.** Assumptions as to the occurrence of future events affecting pension costs, such as: mortality, withdrawal, disablement and retirement; rates of investment earnings and other relevant items.

**Actuarial Cost Method.** Sometimes called “funding method,” a particular technique used by actuaries to establish the amount and incidence of the annual actuarial cost of pension plan benefits, or normal cost, and the related unfunded actuarial accrued liability. Ordinarily, the annual contribution to the plan comprises the normal cost and an amount for amortization of the unfunded actuarial accrued liability.

**Actuarial Gain or (Loss).** A measure of the difference between actual experience and that expected based upon a set of actuarial assumptions, during the period between two actuarial valuation dates, as determined in accordance with a particular actuarial cost method.

**Agent Multiple-Employer Plan (Agent Plan).** An aggregation of single-employer plans, with pooled administrative and investment functions. Separate accounts are maintained for each employer so that the employer’s contributions provide benefits only for the employees of that employer. A separate actuarial valuation is performed for each individual employer’s plan to determine the employer’s periodic contribution rate and other information for the individual plan.

**Annual Pension Cost.** A measure of the periodic cost of an employer’s participation in a defined benefit pension plan.

**Annual Required Contributions (ARC).** The employer’s periodic required contributions to a defined benefit pension plan, calculated in accordance with the parameters of GASB 27.

**Combined Valuation payroll.** Projected payroll for the calendar year following the valuation date for both Tier 1, Tier 2 and OPSRP active members. This payroll is used to calculate UAL rates.

**Contribution Deficiencies (excess contributions).** The difference between the annual required contributions of the employer(s) (ARC) and the employer’s actual contributions in relation to the ARC.

**Cost Sharing Multiple-Employer Plan.** A single plan with pooling (cost-sharing) arrangements for the participating employers. All risks, rewards, and costs, including benefit costs, are shared and are not attributed individually to employers. A single actuarial valuation covers all plan members and the same contribution rate(s) applies for each employer.

**Employer’s Contributions.** Contributions made in relation to the annual required contributions of the employer (ARC).

**Funded Ratio.** The actuarial value of assets expressed as a percentage of the actuarial accrued liability.

**Net Pension Obligation (NPO).** The cumulative difference since the effective date of GASB 27 between annual pension cost and the employer’s contributions to the plan, including the pension liability (asset) at transition, and excluding (a) short-term differences and (b) unpaid contributions that have been converted to pension-related debt.

**Normal Cost.** The annual cost assigned to the current year, under the actuarial cost method in use.

**OPSRP Valuation payroll.** Projected payroll for the calendar year following the valuation date for OPSRP active members. This payroll is used to calculate OPSRP normal cost rates.

**Pre-SLGRP Liability.** The sum of Pre-SLGRP Pooled Liabilities and Transition Liabilities.

**Pre-SLGRP Pooled Liability.** The difference between the total UAL and the UAL attributable to the SLGRP for a pool of employers that joined the SLGRP. There are currently two pre-SLGRP pools. One was created

## Glossary

for State Agencies and Community Colleges when the SLGRP was formed. The other one was created when the Local Government Rate Pool joined the SLGRP.

**Present Value.** Sometimes called “actuarial present value,” the current worth (on the valuation date) of an amount or series of amounts payable or receivable in the future. The present value is determined by discounting the future payments at a predetermined rate of interest, taking into account the probability of payment.

**Required Supplementary Information (RSI).** Schedules, statistical data, and other information that are an essential part of financial reporting and should be presented with, but are not part of, the basic financial statements of a governmental entity.

**Statement No. 25 of the Governmental Accounting Standards Board (GASB 25).** The accounting standard establishing financial reporting standards for defined benefit pension plans.

**Statement No. 27 of the Governmental Accounting Standards Board (GASB 27).** The accounting standard governing a state or local governmental employer’s accounting for pensions.

**Statement No. 43 of the Governmental Accounting Standards Board (GASB 43).** The accounting standard establishing financial reporting standards for post-employment benefits other than pensions.

**Statement No. 45 of the Governmental Accounting Standards Board (GASB 45).** The accounting standard governing a state or local governmental employer’s accounting for post-employment benefits other than pensions.

**Tier 1/Tier 2 Valuation payroll.** Projected payroll for the calendar year following the valuation date for Tier 1 and Tier 2 active members. This payroll is used to calculate Tier 1/Tier 2 normal cost rates.

**Transition Liability.** The difference between the total UAL and the UAL attributable to the SLGRP for an individual employer that joined the SLGRP or the Local Government Rate Pool.

**Unfunded Actuarial Accrued Liability.** The excess of the Actuarial Accrued Liability over the Actuarial Value of Assets.

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