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April 15, 2003

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via e:mail

Ms. Margaret Hallock
Policy Advisor for Labor, Workforce and Revenue
Office of the Governor

Re: PERS Reform Proposals

Dear Margaret:

The purpose of this letter is to present our response to proposed PERS reform legislation. When the proposal is drafted in bill form, we will need an opportunity to thoroughly review the language. In the meantime, please consider this response a draft and let us know if you have any questions about our interpretation of the proposed language.

Our understanding of the key elements of the proposal is described below. The information we are presenting in this letter should be viewed as an estimate since our findings were not calculated with the typical rigorous techniques of a full actuarial valuation. However, we believe these findings are reasonable and appropriate for making broad decisions about major changes to the System.

We have developed this analysis based on the data, methods, and assumptions contained in the actuarial valuation of the Oregon Public Employees Retirement System performed as of December 31, 2001. The overall funded position of the System shown in this report reflects the actuarial value of System assets as of December 31, 2001. In addition, we made the following assumptions with respect to this proposal:

- For purposes of this actuarial impact statement, we assumed that these are the only benefit provisions being considered. If other provisions are enacted, the impact associated with these provisions may be different.
- We have not made any adjustment for actuarial gains or losses that may have emerged since the last valuation date, December 31, 2001. We are aware of the significant investment losses (returns lower than 8% per year on a fair market value basis) in 2002. We will not be able to measure the actuarial gains or losses from other sources until we complete future valuations with updated census information. Therefore, although the incremental costs of this proposal are reasonable, the overall current funded position of the System may be



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significantly different than shown in this report.

- In addition to the actuarial impact statement, we have made projections of the average employer contribution rates. These projections are provided in a separate report.

These estimates are subject to the uncertainties of a regular actuarial valuation; the impacts are inexact because they are based on assumptions that are themselves necessarily inexact, even though we consider them reasonable. Thus, the emerging costs may vary from those presented in this letter to the extent actual experience differs from that projected by the actuarial assumptions.

Base Case: The “base case” shown in the table below represents the key elements of the 2001 Actuarial Valuation of the System. The Actuarial Liability less the Actuarial Value of Assets is equal to the Unfunded Actuarial Liability of \$5,613.4 million. The total employer contribution is 16.48% of salaries and the total contribution rate is 22.48% of salaries.

<i>(\$million)</i>	2001 Valuation
Actuarial Liability (Pension)	\$ 45,386.1
Assets	<u>39,772.7</u>
Unfunded Actuarial Liability	\$ 5,613.4
Employer Normal Cost	10.52%
UAL Amortization	5.28
Retiree Healthcare Cost	<u>0.68</u>
Employer Contributions	16.48%
Member Contributions	<u>6.00</u>
Total Contributions	22.48%

HB 2001 Enrolled: The bill prohibits the Retirement Board from crediting more than the assumed interest rate until the Deficit Reserve is eliminated and the Gain and Loss Reserve has been fully funded in each of the three immediately preceding calendar years. Due to these restrictions, and based on the assumed rate of return used in the actuarial valuation, we expect the assumption for the future interest credits to Tier One member accounts will be reduced to the net investment return assumption. The reduction in the assumed Tier One interest credit from 8.5% to 8.0% per year lowers the expected value of future Money Match retirement benefits.

We have previously provided an actuarial impact statement for HB 2001. The actuarial impact of adopting the revised actuarial assumption is shown below.



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(\$million)	2001 Valuation	New Assumed Tier One Interest Credit Rate	
		Change	Revised
Actuarial Liability (Pension)	\$ 45,386.1		\$ 44,482.1
Assets	<u>39,772.7</u>		<u>39,772.7</u>
Unfunded Actuarial Liability	\$ 5,613.4	\$ (904.0)	\$ 4,709.4
Employer Normal Cost	10.52%	(0.64)%	9.88%
UAL Amortization	5.28	(0.85)	4.43
Retiree Healthcare Cost	<u>0.68</u>	<u>(0.00)</u>	<u>0.68</u>
Employer Contributions	16.48%	(1.49)%	14.99%
Member Contributions	<u>6.00</u>	<u>(0.00)</u>	<u>6.00</u>
Total Contributions	22.48%	(1.49)%	20.99%

HB 2004 B-Engrossed: Adopting new actuarial factors to convert member account balances to monthly annuities reduces the Actuarial Liability significantly. We have previously provided an actuarial impact statement for HB 2004. The actuarial impact of adopting new actuarial equivalency factors for members retiring on or after July 1, 2003 is shown below.

(\$million)	2001 Valuation	New Actuarial Factors	
		Change	Revised
Actuarial Liability (Pension)	\$ 45,386.1		\$ 43,798.1
Assets	<u>39,772.7</u>		<u>39,772.7</u>
Unfunded Actuarial Liability	\$ 5,613.4	\$ (1,588.0)	\$ 4,025.4
Employer Normal Cost	10.52%	(0.59)%	9.93%
UAL Amortization	5.28	(1.50)	3.78
Retiree Healthcare Cost	<u>0.68</u>	<u>(0.00)</u>	<u>0.68</u>
Employer Contributions	16.48%	(2.09)%	14.39%
Member Contributions	<u>6.00</u>	<u>(0.00)</u>	<u>6.00</u>
Total Contributions	22.48%	(2.09)%	20.39%

Member Contributions: The third element of the proposal is the diversion of member contributions to the individual account program of the successor Oregon Retirement Plan after June 30, 2003 (except for judge members, for whom there will be no change). The PERS pension plan would be financed solely by employer contributions. The impact of this proposal will be to reduce the actuarial liabilities for the Money Match formula, particularly for members that are still many years away from retirement. Eventually, Tier One and Tier Two members with significant service in the future will



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retire under the Full Formula pension method. There is only a minor impact for Tier One members currently eligible for retirement, or within a few years of retirement eligibility.

The actuarial impact of diverting future member contributions to another plan effective July 1, 2003 is shown below.

<i>(\$million)</i>	2001 Valuation	<u>No Future Member Ctrbs</u> Change Revised	
Actuarial Liability (Pension)	\$ 45,386.1		\$ 43,471.3
Assets	<u>39,772.7</u>		<u>39,772.7</u>
Unfunded Actuarial Liability	\$ 5,613.4	\$ (1,914.8)	\$ 3,698.6
Employer Normal Cost	10.52%	0.82%	11.34%
UAL Amortization	5.28	(1.80)	3.48
Retiree Healthcare Cost	<u>0.68</u>	<u>(0.00)</u>	<u>0.68</u>
Employer Contributions	16.48%	(0.98)%	15.50%
Member Contributions	<u>6.00</u>	<u>(6.00) *</u>	<u>0.00 *</u>
Total Contributions	22.48%	(6.98)%	15.50%

** on July 1, 2003*

It should be noted that the combined impact of this element of the proposal and HB 2004 is less than the sum of the two parts. We will address the interdependence later.

Suspension of Cost-of-Living Adjustments: Members who retired in the past, or who retire prior to the crediting of interest for 2003, will have an adjustment to their benefits. The adjustment is designed to reflect the crediting of Tier One interest for calendar year 1999 in excess of the Retirement Board’s policy. Based on information we received from PERS staff, the 1999 earnings credit for Tier One would have been 11.33% instead of 20.00% if the Board had allocated the maximum amount to its Gain and Loss Reserve and Contingency Reserve. PERS will calculate the benefit that would have been paid had the 1999 earnings been credited at 11.33%. Future cost-of-living adjustments will be suspended until such time as the recalculated benefit catches up to the current benefit. However, no retired member shall receive less than a benefit determined under the Full Formula with a normal cost-of-living adjustment.

For example, consider a member who retired with a benefit three years ago that is deemed to be 10% too high. If the initial benefit was \$110.00 per month, the current benefit is \$116.73 per month after three 2% adjustments. If the benefit should have been \$100.00 under this proposal, the member will need to wait until the recalculated benefit catches up.



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		Originally Calculated	Recalculated Amount	Actually Paid	Future Reduction
1	2000	\$110.00	\$100.00	\$110.00	
2	2001	112.20	102.00	112.20	
3	2002	114.44	104.04	114.44	
4	2003	116.73	106.12	116.73	
5	2004	119.07	108.24	116.73	\$ 2.34
6	2005	121.45	110.41	116.73	4.72
7	2006	123.88	112.62	116.73	7.15
8	2007	126.36	114.87	116.73	9.63
9	2008	128.88	117.17	117.17	11.71

The benefit would continue to increase based on the amounts in the "Actually Paid" column.

Not all of the impact of the difference in the 1999 Tier One interest credits will be recovered from retirees. We understand there will be no attempt to recover any amounts paid through July of 2003. The cost-of-living adjustments, beginning with those scheduled for August of 2003, will be suspended for retirees who received an interest credit for 1999 earnings. The actuarial impact of this partial recovery of earnings is shown below.

(\$million)	2001 Valuation	Suspension of COLAs	
		Change	Revised
Actuarial Liability (Pension)	\$ 45,386.1		\$ 44,972.4
Assets	<u>39,772.7</u>		<u>39,772.7</u>
Unfunded Actuarial Liability	\$ 5,613.4	\$ (413.7)	\$ 5,199.7
Employer Normal Cost	10.52%	0.00	10.52%
UAL Amortization	5.28	(0.39)	4.89
Retiree Healthcare Cost	<u>0.68</u>	<u>(0.00)</u>	<u>0.68</u>
Employer Contributions	16.48%	(0.39)%	16.09%
Member Contributions	<u>6.00</u>	<u>(0.00)</u>	<u>6.00</u>
Total Contributions	22.48%	(0.39)%	22.09%

Suspension of Minimum Interest Credit: Tier One member accounts are currently subject to a minimum interest credit equal to the long-term net assumed investment return for the PERS assets used in the actuarial valuation. The proposal will suspend the minimum interest rate as long as there is a Deficit Reserve. Any positive earnings on such accounts shall be used first to eliminate the Deficit Reserve.

When the Deficit Reserve is eliminated, the regular accounts of active and inactive Tier One members will be credited with actual earnings up to the assumed interest rate. If



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actual earnings are less than the assumed interest rate, any credit balance in the Gain and Loss Reserve will be used to bring the credited earnings up to the assumed interest rate. However, a crediting rate shall not be applied above the amount supported by the Gain and Loss Reserve balance, since that would create a new Deficit Reserve.

Notwithstanding the above, at the end of each calendar year, each Tier One member account must not be less than the member contributions accumulated at the actual earnings rate through 1973, and the guaranteed earnings rate in effect for each calendar year beginning with 1974.

The above changes will take effect with the earnings rate credited to the regular accounts of active and inactive members for 2003. Crediting of the assumed interest rate to the accounts of members retiring in 2003 shall cease effective June 30, 2003.

The actuarial impact of this suspension of the guaranteed earnings credit to Tier One member accounts is shown below.

(\$million)	2001 Valuation	Suspension of Tier One Minimum Interest Rate	
		Change	Revised
Actuarial Liability (Pension)	\$ 45,386.1		\$ 40,787.4
Assets	<u>39,772.7</u>		<u>39,772.7</u>
Unfunded Actuarial Liability	\$ 5,613.4	\$ (4,598.7)	\$ 1,014.7
Employer Normal Cost	10.52%	0.00	10.52%
UAL Amortization	5.28	(4.32)	0.96
Retiree Healthcare Cost	<u>0.68</u>	<u>(0.00)</u>	<u>0.68</u>
Employer Contributions	16.48%	(4.32)%	12.16%
Member Contributions	<u>6.00</u>	<u>(0.00)</u>	<u>6.00</u>
Total Contributions	22.48%	(4.32)%	18.16%

Combined Impact: The final step is to combine the impact of each step. The combinations are not additive because of the interaction of the lower account balances (without future member contributions and with an expected reduction in interest credits) and the revised actuarial equivalency factors.

The following table summarizes our findings for these proposals.



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<i>(\$million)</i>	2001 Valuation	<u>PERS Reform Proposal</u> Change Revised	
Actuarial Liability (Pension)	\$ 45,386.1		\$ 36,286.3
Assets	<u>39,772.7</u>		<u>39,772.7</u>
Unfunded Actuarial Liability	\$ 5,613.4	\$ (9,099.8)	\$ (3,486.4)
Employer Normal Cost	10.52%	(0.01)%	10.51%
UAL Amortization	5.28	(8.56)	(3.28)
Retiree Healthcare Costs	<u>0.68</u>	<u>(0.00)</u>	<u>0.68</u>
Employer Contributions	16.48%	(8.57)%	7.91%
Member Contributions	<u>6.00</u>	<u>(6.00)</u>	<u>0.00</u>
Total Contributions	22.48%	(14.57)%	7.91%

Successor Plan: This report provides our actuarial impact for the combination of HB 2001, HB 2004, and the transition elements of Tier One and Tier Two. The impact of a successor plan will be provided in separate reports.

I trust this is responsive to the proposal. I would be pleased to meet with you to discuss our findings.

If you have any questions, please let me know.

Sincerely,

Mark O. Johnson, F.S.A.
Consulting Actuary

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