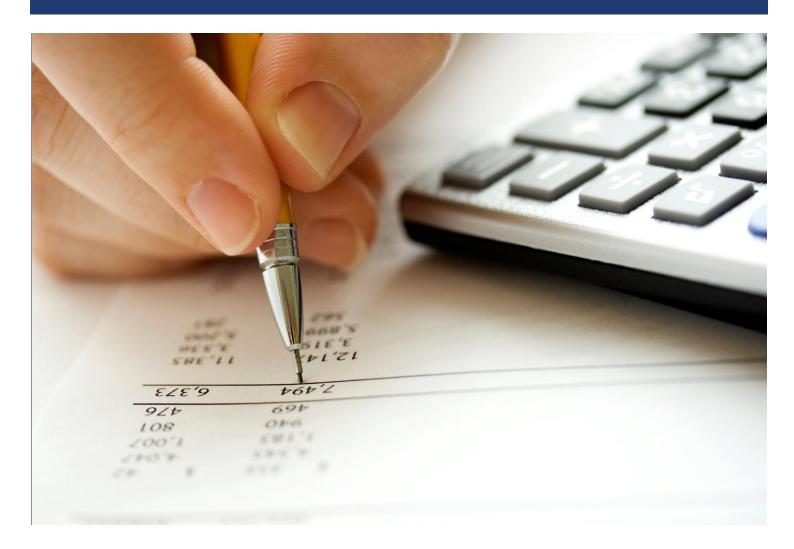
September 2011

# Report:

Commonwealth of Pennsylvania Actuarial Valuation of the Post-Retirement Medical Plan

# **HayGroup**<sup>®</sup>



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Section 1 - Executive Summary	1
Section 2 - Description of GASB 45	7
Section 3 - Valuation Results	10
Section 4 - Assets	18
Section 5 - Actuarial Assumptions	19
Section 6 - Financial Accounting Information	29
Section 7 - Summary of Plan Provisions	34
Section 8 - Participant Data	46
Appendix A - Hay Benefits Prevalence Report (HBR) Survey and Federal Employee Health Benefit Program Appendix B - Actuarial Assumptions	

# **Section 1 - Executive Summary**

The Commonwealth of Pennsylvania (The Commonwealth) sponsors two health care plans for eligible retirees. Eligible Commonwealth retirees and their dependents may continue subsidized health care coverage through the Commonwealth for the life of the retiree in the Retired Employee Health Program (REHP). In addition, eligible State Police annuitants and their dependents may continue coverage through the Retired Pennsylvania State Police Program (RPSPP) during the life of the retiree.

This valuation includes calculations made as of July 1, 2011 using census data collected as of December 2010 and health care claims costs for calendar 2010, for current retirees and future retirees eligible for coverage under these plans. The results as of July 1, 2011 were then projected using standard actuarial techniques to determine the liabilities and costs as of June 30, 2012. The Annual Required Contribution (ARC) and Annual Other Post Employment Benefits (OPEB) Cost (AOC) for the fiscal year ending June 30, 2011 was determined based on the prior valuation results, projected to FY2010-2011 using standard actuarial techniques.

The Commonwealth adopted GASB 45 effective July 1, 2007. During the fiscal year ended June 30, 2008, the Commonwealth fully funded the REHP ARC; therefore, no REHP OPEB liability was reported as of June 30, 2008. Since then, neither the REHP nor the RPSPP ARC has been fully funded.

### **GASB 45**

Before July 1, 2007, the Commonwealth reported the cost of retiree medical benefits on a cash basis. Beginning July 1, 2007, the Commonwealth implemented the new Governmental Accounting Standards Board (GASB) standard (Statement Number 45) on *Accounting and Financial Reporting by Employers for Post-employment Benefits Other Than Pensions*. The standard required the Commonwealth to account for these benefits on a full accrual basis. A description of the GASB standard can be found in Section 2.

### **Benefit Plans**

This valuation covers two separate health plans sponsored by the Commonwealth. The larger plan is the REHP which covers eligible retired Commonwealth employees and their dependents. The smaller plan is the RPSPP which covers eligible retired State Police enlisted members and their dependents. The eligibility conditions and benefit provisions for these two plans differ materially; therefore the valuation developed separate results for each plan and its covered population. The July 1, 2011 measurement includes the provisions from the recently concluded contract negotiations with the American Federation of State, County and Municipal Employees (AFSCME). The principal change in plan provisions was a change to the retiree contributions. The amount paid while non-Medicare-eligible has not changed, whereas the amount paid upon becoming Medicare-eligible is reduced from 3 percent of final annual salary to 1.5 percent of final annual salary. A description of the plan provisions can be found in Section 7.

### **Health Care Trend Rates**

The accounting standard requires employers to anticipate future health care costs by adjusting today's per capita health care costs with projected health care trend rates. As shown in Appendix A, health care cost

increases have outpaced general inflation and the annual rate of change has fluctuated significantly over time.

It is difficult to accurately predict health care cost increases even one or two years into the future. The assumed increase in health care costs varies by type of benefit and year. For the RPSPP the assumptions anticipate medical benefit costs increase by 7 percent in 2011, with the rate increase declining by 1 percent per year until the rate reaches 5 percent per year in 2013, the rate stays constant at 5 percent per year till 2023 in 2024 the rate of increase drops to 4.8 percent and in 2025 the ultimate trend rate of 4.75 percent per year is achieved.

For the REHP, the historical claims costs were adjusted to reflect the program changes either by direct adjustments to the per capita claims costs or by making adjustments to the healthcare cost trend rates. Effective April 1, 2008, most REHP Medicare-eligible retirees were enrolled in a Medicare Advantage Private Fee For Service plan (MAPFFS), Medicare Advantage HMO, or Medicare Advantage PPO. The cost for the Medicare Advantage plans is lower than the cost for the traditional Medicare supplement program. The cost to the plans is expected to increase significantly in the first few years as the cost represents the difference between the total cost for medical care and the amounts funded by the Centers for Medicare and Medicaid Services (CMS). Thus for the REHP the health care cost trend rates anticipate a variable trend rate reducing from an initial rate of 9.10 percent to an ultimate rate of 4.75 percent. The RPSPP Pharmacy benefit costs are assumed to increase by 6 percent in 2011, 5.75 percent in 2012 thereafter the rate of increase declines by 0.25 percent until it reaches 5 percent in 2015. The 5 percent increase continues till the year 2023. Thereafter, Pharmacy benefits costs are projected to increase by 4.75 percent annually. For the REHP pharmacy benefits the health care cost trend rate is assumed to increase by 6 percent in 2011 and 5 percent from 2012 to 2023. Thereafter, Pharmacy benefits costs are projected to increase by 4.75 percent annually. For RPSPP Dental benefit costs are assumed to increase by 6 percent for 2011 through 2013, then 5 percent from 2014 through 2023. Thereafter, dental benefit costs are projected to increase by 4.75 percent annually. This assumption set starts with the current consensus trend rate and changes smoothly to an assumed, ultimate trend rate. The projected increases in the Medicare Part B premium were taken from the 2010 Medicare Trustees report with an ultimate rate of increase of 4.75 percent.

The actuarial assumptions are described in Section 5, and shown in Appendix B.

# **Funding**

The Commonwealth established the OPEB Investment Pool during the fiscal year ended June 30, 2008 to advance-fund a portion of the REHP and RPSPP ARC for the fiscal year ended June 30, 2008. A description of the current funding policy and market value of assets is provided in Section 4.

# **Key Valuation Results**

We have measured the post-retirement medical liabilities for the retirees currently covered by the post-retiree health plans and for employees covered under the Commonwealth health plan for active employees as of July 1, 2010 and July 1, 2011. The liabilities for the REHP and RPSPP were calculated using a discount rate of 5.00 percent for liabilities as of July 1, 2010 and 4.75 percent for liabilities as of July 1, 2011.

In Table 1.1 we have shown three measures of the liability: the present value of future benefits, the actuarial accrued liability, and the normal cost. The present value of future benefits is the discounted present value of all future employer-paid health premiums for both current and future retirees. The actuarial accrued liability is the portion of the present value of future benefits attributable to employee service rendered prior to measurement date. The normal cost is the portion of the present value of benefits earned in the Fiscal year. The table also shows the market value of assets and the unfunded actuarial accrued liability. The complete valuation results are shown Section 3.

Table 1.1 shows the valuation results.

Table 1.1 Postretirement Medical Benefit Valuation Results for REHP and RPSPP (Amounts in \$millions)				
	As of July 1, 2010	As of July 1, 2011		
Assumptions Discount rate Healthcare cost trend rates  • Medical benefit initial trend rate • Pharmacy benefit initial trend rate • Dental benefit initial trend rate • Ultimate rate	5.00% 18.80% 8.00% 7.00% 4.75%	4.75% 9.10% 6.00% 6.00% 4.75%		
Valuation Results  1. Present Value of Future Benefits 2. Actuarial Accrued Liability 3. Assets 4. Unfunded Actuarial Accrued Liability (actuarial accrued liability less assets)	\$19,698.94 15,883.71 104.00 15,779.71	\$20,242.82 15,400.07 130.64 15,269.43		
5. Normal Cost	344.70	371.81		

## **Annual Required Contribution and Annual OPEB Cost**

For an organization that fully funds the ARC each year, the ARC is simply the sum of the Normal Cost and the Amortization of the Unfunded Actuarial Accrued Liability.

The Annual OPEB Cost is the sum of four parts:

- (i) the Normal Cost,
- (ii) the Amortization payment on the Unfunded Actuarial Accrued Liability,
- (iii) interest on the unfunded ARC (or overfunded ARC) if any, and
- (iv) an adjustment to the ARC to prevent double accrual of principal payments on the unfunded actuarial accrued liability (if any).

The Commonwealth has decided to amortize the unfunded actuarial accrued liability over 30 years as a level percent of pay using 30 year open amortization. (fresh start amortization each year).

Table 1.2 shows the derivation of the Annual Required Contribution and Annual OPEB Cost.

	Table 1.2 Postretirement Medical Benefit Valuation Results Annual Required Contribution and AOC for REHP and RPSPP (Amounts in \$millions)					
Annual I	Required Contribution (ARC)	FY 2010/2011	FY 2011/2012			
1	Normal Cost	\$ 344.70	\$ 371.81			
2	Amortization Cost	692.84	669.19			
3	Annual Required Contribution	1,037.54	1,041.00			
4	Interest on unfunded (overfunded) ARC	41.60	57.47			
5	ARC adjustment	(36.53)	(53.03)			
6	Total Annual OPEB Cost	1,042.61	1,045.44			

Table 1.3 shows the development of the Net Other Post Employment Benefits Liability. The Net OPEB Liability is the excess of the Annual Required Contribution and Annual OPEB cost over the amount funded by the employer. As this is a projection for the amounts as of June 30, 2011 and June 30, 2012, the Net OPEB Liability is based on an expected employer contributions equal to expected benefit payments.

Table 1.3 Postretirement Medical Benefit Valuation Results Net OPEB Liability for REHP and RPSPP (Amounts in \$millions)						
	FY 2010/2011	FY 2011/2012				
1 Net OPEB Liability as of July 1	\$ 831.99	\$ 1,209.91				
2 Annual OPEB Cost	1,042.61	1,045.44				
3 Expected employer contribution	664.69	617.21				
4 Net OPEB Liability as of June 30	1,209.91	1,638.14				

The expected employer contribution is defined as

- amounts paid for claims and premiums incurred and paid during the year
- advance funding contributions to the OPEB Investment Pool

### Actuarial Certification

The Commonwealth retained Hay Group to perform an actuarial valuation of the Post-Retirement Medical Plan to provide an estimate of the actuarial accrued liability and the Annual Required Contribution in accordance with GASB standards numbered 43 and 45. Use of the valuation results for other purposes may not be appropriate.

This valuation has been conducted in accordance with generally accepted actuarial principles and practices.

The results shown in this report are reasonable actuarial results. However, a different set of results could also be considered reasonable actuarial results. Thus, reasonable results differing from those presented in this report could have been developed by selecting different points for various assumptions.

The actuaries certifying to this valuation are members of the Society of Actuaries and other professional actuarial organizations, and meet the General Qualification Standards of the American Academy of Actuaries for purposes of issuing Statements of Actuarial Opinion.

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September 2011

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# **Section 2 - Description of GASB 45**

### Governmental Accounting Standards Board (GASB)

In June, 2004, the Governmental Accounting Standards Board (GASB) issued its long awaited standard on *Accounting and Financial Reporting by Employers for Postemployment Benefits Other Than Pensions* (OPEBs).

The standard covers both post-retirement and post-employment benefits. The types of benefits covered include:

- Medical
- Dental
- Vision
- Hearing
- Life insurance
- Long term disability
- Long term care

However, if any of these benefits are provided through a pension plan they would be accounted for under GASB 25 — otherwise they will be accounted for under GASB 45.

It took GASB over 15 years to issue the standard as they first added OPEBs to their technical agenda in 1988. The delay helped governmental employers in several ways. Over the ensuing period, private sector firms learned to grapple with the issue after the Financial Accounting Standards Board (FASB) released its exposure draft and then after due deliberation issued the final standard (FAS 106) in 1990. The actuarial and accounting professions geared up to handle the change from cash to accrual accounting. Claims administrators are now experienced with meeting the special data requests, actuaries have refined their valuation models, and accountants understand the valuation results. The actuarial profession revised and updated its Actuarial Standard of Practice, reissuing ASOP #6 — Measuring Retiree Group Benefit Obligations in December 2001. The GASB standard directs users to this actuarial standard for guidance on selection of actuarial assumptions.

The effective date for the new standard depended on the size of the employer. For entities with revenues in FY 2000 over \$100 million, the effective date was the fiscal year beginning after December 15, 2006. The Commonwealth adopted the standard beginning with the 2007-2008 financial reporting year.

The purpose of the standard is to treat post-retirement benefit costs in a manner similar to pension costs. Governmental employers should recognize that OPEBs constitute compensation for employee service and they should recognize the cost of benefits during the periods when employee service is rendered. By accounting for OPEBs, GASB believes the accounting statement will improve the relevance and usefulness of financial reporting, provide information about the size of the liabilities and the extent to which they are funded, and ensure systematic accrual-basis measurement over employee service.

While the standard requires governmental employers to adopt accrual accounting, the standard sets out a broad range of valuation options for employers. These options included the ability to choose, within limits, the:

- Actuarial cost method,
- Period for amortizing the unfunded actuarial accrued liability
- Amortization method.
- Measurement date, and
- Frequency of valuations

The most common and most expensive of the OPEBs are retiree medical benefits, which provide a valuable component in employees' retirement benefits program. Most governmental employers currently fund their retiree medical plans on a pay-as-you-go basis. The GASB standard does not require employers to advance fund these benefits; however employers who do not advance fund these benefits must begin to report OPEB liabilities in their full accrual financial statements.

### **Actuarial Cost Method**

A fundamental principle in financing the liabilities of any retirement program is that the cost of the benefits should be related to the period in which benefits are earned, rather than to the period of benefit distribution. There are several acceptable actuarial methods prescribed in the GASB standard that are acceptable under the GASB standard. The Commonwealth directed the Hay Group to identify the actuarial cost method that would produce the lowest Annual Required Contribution. We evaluated each of the methods and determined that the Projected Unit Credit (PUC) Cost Method produced the lowest ARC/AOC.

Under the projected unit credit cost method, the actuary develops the discounted present value of all future benefit payments. For a retiree, this amount is the Actuarial Accrued Liability. For an employee that has not yet retired, the Actuarial Accrued Liability is determined as the ratio of the employee's service as of the valuation date to the expected service at retirement. As the valuation uses rates of retirement, the PUC method determines the Actuarial Accrued Liability as the weighted sum of the prorata calculations for expected retirements at each expected retirement age.

# **Actuarial Accrued Liability**

The actuarial accrued liability is that portion of the present value of projected benefits which has been accrued during the employee's working life from the date of hire to the valuation date. Another way of viewing this liability is as the portion of the present value of projected benefits that will not be funded by future normal costs. Therefore, as long as participants enter the system with no past service credit (as is assumed in this case), there is no actuarial liability for a new entrant. Furthermore, the full present value of benefits is accrued by the end of each employee's working life.

The difference between the actuarial accrued liability and the funds accumulated as of the valuation date is referred to as the unfunded actuarial accrued liability. Unfunded actuarial accrued liabilities generally exist when (1) the liabilities are not funded, (2) benefits have been earned for periods in which no normal cost has been paid or (3) the amounts that have been funded were inadequate because of losses, changes



in assumptions, changes in the funding method, or benefit improvements. The unfunded actuarial accrued liability equals the actuarial accrued liability less the value of the fund.

# **Development of the Normal Cost**

The normal cost represents the benefits earned during the current reporting period. As stated in the previous section, the projected unit credit actuarial cost method is used in determining the normal cost.

# **Amortization Method**

GASB 45 allows for the use of either a level dollar amortization or a level percentage of pay amortization. Members in the REHP who retired after July 1, 2005 are required to pay contributions based on their final salary. Given the use of pay for cost-sharing purposes with REHP members, the Commonwealth chose to use the level percentage of payroll in determining the amortization cost.

# **Section 3 - Valuation Results**

Table 3.1 shows the combined present value of future benefits, actuarial accrued liability, assets, unfunded actuarial accrued liability and the normal cost, as of June 30, 2010 and as of June 30, 2011.

Building on these values the table shows the Annual Required Contribution and Annual OPEB Cost amounts for FY 2010/11 and FY 2011/12.

Table 3.2 shows the results for current and future members of the REHP as of June 30, 2010 and June 30, 2011.

Table 3.3 shows the results for current and future members of the RPSPP as of June 30, 2010 and June 30, 2011.

Table 3.1 Post-Retirement Medical Valuation Total for REHP and RPSPP						
	As of	June 30, 2010	As of	June 30, 2011		
Present Value of Future Benefits						
Current Retirees		10,233.06		9,928.19		
Future Retirees		9,465.88		10,314.63		
Total	\$	19,698.94	\$	20,242.82		
Actuarial Accrued Liability						
Current Retirees		10,233.06		9,928.19		
Future Retirees		5,650.65		5,471.88		
Total	\$	15,883.71	\$	15,400.07		
Assets		104.00		130.64		
Unfunded Actuarial Accrued Liability	\$	15,779.71	\$	15,269.43		
	FY 2010/11		FY2011/12			
Amortization Cost		692.84		669.19		
Normal Cost		344.70		371.81		
Total Annual Required Contribution		1,037.54		1,041.00		
Interest on unfunded (over funded) ARC		41.60		57.47		
ARC adjustment		(36.53)		(53.03)		
Annual OPEB Cost	\$	1,042.61	\$	1,045.44		
Expected Employer Funding		004.00		047.04		
PAYG		664.69		617.21		
Advance Funding		-	_	-		
Total	\$	664.69	\$	617.21		
Net OPEB Liability						
Amount at beginning of Year		831.99		1,209.91		
Annual OPEB Cost		1,042.61		1,045.44		
Expected employer funding		664.69		617.21		
Amount at End of Year	\$	1,209.91	\$	1,638.14		

Table 3.2 Post-Retirement Medical Valuation of the REHP (dollars in millions)					
	As of	June 30, 2010	As of	June 30, 2011	
Present Value of Future Benefits					
Current Retirees		8,948.61		8,479.67	
Future Retirees		7,766.10		8,529.65	
Total	\$	16,714.71	\$	17,009.32	
Actuarial Accrued Liability				·	
Current Retirees		8,948.61		8,479.67	
Future Retirees		4,725.64		4,428.12	
Total	\$	13,674.25	\$	12,907.79	
Assets		56.32		70.74	
Unfunded Actuarial Accrued Liability	\$	13,617.93	\$	12,837.05	
	F	Y 2010/11	F	Y2011/12	
Amortization Cost		597.92		562.59	
Normal Cost		281.29		304.18	
Total Annual Required Contribution		879.21		866.77	
Interest on unfunded (over funded) ARC		32.40		44.31	
ARC adjustment		(28.45)		(40.88)	
Annual OPEB Cost	\$	883.16	\$	870.20	
Expected Employer Funding PAYG		598.34		547.17	
Advance Funding  Total	\$	- 598.34	\$	- 547.17	
1001	Ψ		Ψ	O-11.11	
Net OPEB Liability					
Amount at beginning of Year		647.96		932.78	
Annual OPEB Cost		883.16		870.20	
Expected employer funding		598.34		547.17	
Amount at End of Year	\$	932.78	\$	1,255.81	

Table 3.3 Post-Retirement Medical Valuation of the RPSPP (dollars in millions)					
	As of .	June 30, 2010	As of .	June 30, 2011	
Present Value of Future Benefits	7.00.0	, dii 00, 2010	7.00.0	20110 00, 2011	
Current Retirees		1,284.45		1,448.52	
Future Retirees		1,699.78		1,784.98	
Total	\$	2,984.23	\$	3,233.50	
Actuarial Accrued Liability		·			
Current Retirees		1,284.45		1,448.52	
Future Retirees		925.01		1,043.76	
Total	\$	2,209.46	\$	2,492.28	
Assets		47.68		59.90	
Unfunded Actuarial Accrued Liability	\$	2,161.78	\$	2,432.38	
	FY	/ 2010/11	F`	Y2011/12	
Amortization Cost		94.92		106.60	
Normal Cost		63.41		67.63	
Total Annual Required Contribution		158.33		174.23	
Interest on unfunded (over funded) ARC		9.20		13.16	
ARC adjustment		(8.08)		(12.15)	
Annual OPEB Cost	\$	159.45	\$	175.24	
Expected Employer Funding					
PAYG		66.35		70.04	
Advance Funding		-		-	
Total	\$	66.35	\$	70.04	
Net OPEB Liability					
Amount at beginning of Year		184.03		277.13	
Annual OPEB Cost		159.45		175.24	
Expected employer funding		66.35		70.04	
Amount at End of Year	\$	277.13	\$	382.33	

# **Allocation of the Annual OPEB Cost**

For financial planning and reporting purposes, the Commonwealth required that the valuation report include an allocation of the Annual OPEB Cost (AOC). A separate cost for the RPSPP was developed just for State Police enlisted members. The allocation of the REHP AOC was based on the ratio of the projected employees in each department supporting the government business activity or component unit or organization, to the total projected employment count for all employees.

Table 3.4 shows the allocated AOC for FY 2010/11 and Table 3.5 shows the allocated AOC for FY 2011/12.

Table 3.4 Commonwealth of Pennsylvania Post Retirement Benefit - Allocation of Annual OPEB Cost							
FY 2010-11  REHP Active RPSPP Active Employees Core Core Core Core Core Core Core Core							
AOC Allocated to:							
Government Activities							
Direction and supportive services	5,749		\$63,676.22				
Protection of persons and property	22,613	4,346	250,462.74	\$158,901.56			
Public education	507		5,615.56				
Health and human services	20,425		226,228.34				
Economic development	4,942		54,737.84				
Transportation	11,451		126,831.86				
Recreation and cultural enrichment	2,510		27,800.89				
Government Activities Subtotal	68,197	4,346	\$755,353.45	\$158,901.56			
Business-type Activities							
State Lottery Fund	390		\$4,319.66				
Minority Business Development Fund	3		33.23				
Machinery and Equipment Loan Fund	5		55.38				
Small Business First Fund	4		44.30				
Rehabilitation Center Fund	202		2,237.36				
State Workmen's Insurance Fund	310		3,433.58				
Coal and Clay Mine Subsidence Insurance	28		310.13				
State Stores Fund	3,334	15	36,927.55	\$548.44			
Purchasing Fund	122		1,351.28				

Table 3.4 Commonwealth of Pennsylvania Post Retirement Benefit - Allocation of Annual OPEB Cost							
FY 2010-11							
Manufacturing Fund	176		1,949.38				
Historical Preservation Fund	13		143.99				
Business-type Activities Subtotal	4,587	15	\$50,805.84	\$548.44			
Fiduciary Activities							
State Employees' Retirement Fund	181		\$2,004.77				
Underground Storage Tank Indemnific	8		88.61				
School Employees' Retirement Fund	287		3,178.83				
Med Care Avail & Reduct of Err Fund	55		609.18				
Fiduciary Activities Subtotal	531	-	\$5,881.39	\$-			
Component Units							
Ben Franklin Technology Development	3		\$33.23				
Port of Pittsburgh Commission Fund	4		44.30				
Pennvest	27		299.05				
Philadelphia Regional Port Authority	76		841.78				
Patient Safety Trust Fund	12		132.91				
State Public School Building Authority	12		132.91				
State System of Higher Education	3,782		41,889.62				
Thaddeus Stevens	140		1,550.65				
PHEAA	2,338		25,895.81				
Component Units Subtotal	6,394	-	\$70,820.26	<b>\$-</b>			
External Organizations							
Pennsylvania Municipal Retirement Fund	27		\$299.05				
External Organizations Subtotal	27	-	\$299.05	\$-			
			·				
Total REHP AOC Allocated	79,736		\$883,160				
Total RPSPP AOC Allocated		4,361		\$159,450			

Table 3.5 shows the allocated Annual OPEB Cost for FY 2011/12.

#### Table 3.5 Commonwealth of Pennsylvania Post Retirement Benefit - Allocation of Annual OPEB Cost FY 2011-12 **REHP Active RPSPP Active REHP Annual RPSPP Annual OPEB Cost Employees Employees OPEB Cost** Total Total (\$thousands) (\$thousands) **AOC** Allocated to: **Government Activities** Direction and supportive services 5,749 \$62,741.80 Protection of persons and property 22,613 4,346 246,787.31 \$174,637.25 Public education 507 5,533.15 Health and human services 20,425 222,908.54 Economic development 4,942 53,934.59 Transport ation 11,451 124,970.66 Recreation and cultural enrichment 2,510 27,392.92 **Government Activities Subtotal** 68,197 4,346 \$744,268.97 \$174,637.25 **Business-type Activities** 390 \$4,256.27 State Lottery Fund Minority Business Development Fund 3 32.74 Machinery and Equipment Loan Fund 5 54.57 Small Business First Fund 4 43.65 Rehabilitation Center Fund 202 2,204.53 State Workmen's Insurance Fund 310 3,383.19 Coal and Clay Mine Subsidence Insurance 28 305.58 \$602.75 State Stores Fund 3,334 15 36,385.66 Purchasing Fund 122 1,331.45 Manufacturing Fund 176 1,920.78 Historical Preservation Fund 13 141.88 **Business-type Activities Subtotal** 15 \$50,060.30 4,587 \$602.75 **Fiduciary Activities** State Employees' Retirement Fund 181 \$1,975.35 Underground Storage Tank Indemnific 8 87.31

\$175,240

#### Table 3.5 Commonwealth of Pennsylvania Post Retirement Benefit - Allocation of Annual OPEB Cost FY 2011-12 **REHP Active RPSPP Active REHP Annual RPSPP Annual OPEB Cost Employees Employees OPEB Cost** Total Total (\$thousands) (\$thousands) School Employees' Retirement Fund 287 3,132.18 Med Care Avail & Reduct of Err Fund 55 600.24 **Fiduciary Activities Subtotal** 531 \$5,795.08 \$-**Component Units** Ben Franklin Technology Development 3 \$32.74 4 Port of Pittsburgh Commission Fund 43.65 27 Pennvest 294.66 Philadelphia Regional Port Authority 76 829.43 Patient Safety Trust Fund 12 130.96 State Public School Building Authority 12\_ 130.96 State System of Higher Education 41,274.91 3,782 Thaddeus Stevens 140 1,527.89 **PHEAA** 2,338 25,515.80 **Component Units Subtotal** \$-6,394 \$69,781.00 **External Organizations** Pennsylvania Municipal Retirement Fund 27 \$294.66 **External Organizations Subtotal** 27 \$294.66 \$--**Total REHP AOC Allocated** 79,736 \$870,200

**Total RPSPP AOC Allocated** 

4,361

# **Section 4 - Assets**

The Commonwealth contributed funds to the Other Postemployment Benefits Investment Pool ("the Pool") during the fiscal year ended June 30, 2008. The Pool was established for purposes of advance funding retiree health benefits of current and future retirees. During the fiscal year ended June 30, 2008, the Commonwealth fully funded the REHP ARC; therefore, no REHP OPEB liability was reported as of June 30, 2008. Since then, neither the REHP nor the RPSPP ARC has been fully funded. Policy on advance funding is evaluated annually. No advance funding is currently planned for 2011/12.

Table 4.1 shows the market value of assets as of June 30, 2010 and June 30, 2011.

Table 4.1 Market Value of Assets Amounts in (\$millions)				
	REHP	RPSPP		
As of June 30, 2010	\$56.32	\$47.68		
As of June 30, 2011	\$70.74	\$59.90		

# **Section 5 - Actuarial Assumptions**

The selection of all actuarial assumptions, in valuations of post-retirement health care plans including the health care cost trend rate, should be guided by Actuarial Standard of Practice No. 6, *Measuring Retiree Group Benefit Obligations*, as revised from time to time by the Actuarial Standards Board. Accordingly, actuarial assumptions should be based on the actual experience of the covered group, to the extent that creditable experience data are available, but should emphasize expected long-term future trends rather than give undue weight to recent past experience. The reasonableness of each actuarial assumption should be considered independently based on its own merits, its consistency with each other assumption, and the combined impact of all assumptions.

The actuarial assumptions used to value the post-retirement medical liabilities can be categorized into three groups: economic assumptions, medical assumptions, and demographic assumptions

# **Economic Assumptions**

The two economic assumptions used in the valuation are the discount rate and the health care cost trend rates. The economic assumptions are used to account for changes in the cost of benefits over time and to discount future benefit payments for the time value of money.

# Discount Rate

The Governmental Accounting Standards Board prescribed approach for selecting the discount rate is to examine the expected long-term returns on the assets expected to be used for paying the benefits. Currently, the Commonwealth plans to fund the benefits on a "pay-as-you-go" (PAYG) basis, i.e. using assets from the Short-Term Investment Pool.

Based on the historical performance on the STIP, the compound annualized returns have ranged between 3.4% to 7.6% over 5-year periods, and over 4.0% to 6.4% over 10-year periods. The table below shows the historical average over the last 5, 10, 15, 20, and 25 years.

Averaging Period	5-years	10-years	15-years	20-years	25-years
Annual Rate	4.5%	4.5%	4.8%	4.9%	5.4%

Given the consistency of the rates over long time periods, the Commonwealth experience supports a rate in the 4.5 to 5.0 range. For the prior valuation, the valuation discount rate was 5.0 percent. Since that valuation, an experience study was performed for the State Employees' Retirement System covering both demographic and economic assumptions. The experience study recommended and the SERS Board adopted a lower rate of inflation (2.75 percent, down from 3.00 percent). Consistent with that lower rate of expected inflation, we recommended and

the Commonwealth has accepted using a rate of 4.75% for the June 30, 2011 measurement. For June 30, 2010 measurement the Commonwealth used a discount rate of 5.00 percent.

Table 5.1 shows the health care cost trend rates that were used for the actuarial valuation of the RPSPP Post-Retirement Medical Plan.

Table 5.1 Health Care Cost Trend Rate Assumptions for RPSPP									
Year	Medical Benefits	Pharmacy Benefits	Dental Benefits	Part B Premiums					
2011	7.00%	6.00%	6.00%	3.70%					
2012	6.00%	5.75%	6.00%	-0.70%					
2013	5.00%	5.50%	6.00%	2.70%					
2014	5.00%	5.25%	5.00%	3.00%					
2015	5.00%	5.00%	5.00%	2.30%					
2016	5.00%	5.00%	5.00%	3.30%					
2017	5.00%	5.00%	5.00%	3.50%					
2018	5.00%	5.00%	5.00%	3.80%					
2019	5.00%	5.00%	5.00%	3.90%					
2020	5.00%	5.00%	5.00%	4.90%					
2021	5.00%	5.00%	5.00%	4.85%					
2022	5.00%	5.00%	5.00%	4.80%					
2023	5.00%	5.00%	5.00%	4.75%					
2024	4.80%	4.75%	4.75%	4.75%					
2025	4.75%	4.75%	4.75%	4.75%					

Note: Short-term Part B Premium trend rates are based on the 2010 Medicare Trustees Report.

Table 5.2 Health Care Cost Trend Rate Assumptions for REHP								
Year	Medicare-Retiree Medical Benefits	Non-Medicare-Retiree Medical Benefits	Pharmacy Benefits					
2011	10.00%	7.50%	6.00%					
2012	13.00%	7.00%	5.00%					
2013	12.00%	6.50%	5.00%					
2014	11.00%	6.00%	5.00%					
2015	10.00%	5.50%	5.00%					
2016	9.10%	5.00%	5.00%					
2017	8.40%	5.00%	5.00%					
2018	7.70%	5.00%	5.00%					
2019	7.10%	5.00%	5.00%					
2020	6.60%	5.00%	5.00%					
2021	6.10%	5.00%	5.00%					
2022	5.60%	5.00%	5.00%					
2023	5.20%	5.00%	5.00%					
2024	4.80%	4.75%	4.75%					
2025+	4.75%	4.75%	4.75%					

Table 5.2 shows the health care cost trend rates that were used for the actuarial valuation of the REHP Post-Retirement Medical Plan.

Appendix A contains a chart showing the historical increases in health care premiums from two sources: the Hay Benefits Report and the Federal Employees Health Benefit Plan for the period 1982 through 2010.

# **Medical Assumptions**

A fundamental building block of the actuarial valuation is the current per capita cost of benefits.

Detailed age-specific claims costs were gathered for the prior valuation and used to develop Commonwealth specific aging factors by benefit coverage. For this valuation we obtained 2008 claims data in summary format and used that data, together with the aging factors developed in the prior valuation to develop age-specific per capita claims costs.

In early 2008, the Commonwealth enrolled most of the REHP retirees who were Medicare eligible in a Private Fee for Service Medicare Advantage Plan. The sponsor of that PFFS Medicare Advantage Plan announced that the coverage would not be available in 2010. The cost of the MPPO Plan was projected to increase rapidly due to the funding constraints placed on

payments to Medicare Advantage plans. While the specific insurance arrangements for Medicare-eligible retirees in the REHP were not confirmed prior to issuance of the valuation report, the per capita cost projected for 2010 based on the projected cost from 2009 appears reasonable for use as a base.

A small number of REHP members over age 65 are not eligible for Medicare, therefore the plan is primary and the expected cost for members over age 70 is in excess of \$10,000.

Table 5.3 shows the baseline per capita claims costs that were used in the valuation for REHP for current retirees.

Table 5.3 REHP Per Capita Claims Costs in 2008								
Age	Med	lical	Pharmacy					
	Employer Primary	Medicare Primary						
<50	\$ 3,242	\$ 2,727	\$ 1,601					
50 - 54	4,227	2,727	1,601					
55 - 59	5,005	2,727	1,875					
60 - 64	6,194	2,727	1,999					
65 - 69	7,906	1,094	2,722					
70 - 74	9,852	1,094	2,925					
75 - 79	11,987	1,094	3,052					
80 - 84	14,236	1,094	3,012					
85 - 89	16,504	1,094	2,848					
90+	18,673	1,094	2,399					

The per capita claim costs shown in Table 5.3 are the appropriate rates for retirees covered by the benefit plan design in force as of June 30, 2008. The rates reflect the fully-insured Medicare Advantage plans for Medicare-eligible retirees.

Separate health care claims costs were developed for RPSPP members. These costs reflect several differences between the benefits and population of the State Police. One key difference is their eligibility for Medicare. State Police enlisted members hired before 1986 were not required to pay the Medicare Hospital Insurance contributions and therefore upon attainment of age 65 are not eligible for Medicare Part A and the RPSPP remains primary for their medical benefits. Accordingly, we developed both non-Medicare-eligible and Medicare-eligible rates for retirees over age 65. For State Police hired after 1986, and other members who enroll in Medicare having earned eligibility through a spouse or other employment, the Commonwealth pays the Part B premium for the Medicare-enrolled retiree. The RPSPP also includes coverage

for dental benefits. Table 5.4 shows the baseline per capita claims costs that were used in the valuation of the State Police current retirees.

	Table 5.4									
	RPSPP									
	Per Capita Claims Costs in 2008									
Age	Med	dical	Phari	macy	Dental	Part B				
	Employer Primary	Medicare Primary	Pre July 2007 Retirees	Post July 2007 Retirees						
<50	\$ 3,081	\$ 6,748	\$ 1,037	\$ 1,170	\$536	\$ -				
50 - 54	4,025	6,129	1,454	1,639	536	-				
55 - 59	4,772	5,509	1,702	1,919	536	-				
60 - 64	5,916	4,889	1,815	2,047	536	-				
65 - 69	6,491	4,270	2,178	2,457	536	1,157				
70 - 74	7,737	4,124	2,341	2,640	536	1,157				
75 - 79	9,305	4,649	2,442	2,754	536	1,157				
80 - 84	10,882	4,943	2,410	2,718	536	1,157				
85 - 89	12,403	5,007	2,279	2,570	536	1,157				
90+	13,924	5,295	1,920	2,165	536	1,157				

# **Updated Per Capita Claims Cost Experience**

For this valuation, we obtained 2010 claims data in aggregate format and used that data, together with the aging factors developed in the prior valuation, to develop pre-65 and post-65 per capita claims costs. For each category that had fewer than 5,000 enrollees in 2010, the actual claims cost data was combined with the prior data, trended forward to 2010 using credibility factors.

We have completed our review of the recent claims cost experience. We compared the actual experience from 2010 with the expected costs based on the prior valuation. We also performed a consistency check on the aggregate claims information. The claims data was found to be in line with the expected costs based on the prior valuation and also with current year accounting records. The actual experience for the REHP is 92 percent of the projected. The experience for the RPSPP is 99 percent of the projected cost as shown in Table 5.5.

Table 5.5 – Comparison of Actual to Projected Claims Cost								
	Projecte	ed From Prior Val	Actual	Ratio				
	FY 08-09	FY 09-10	FY 10-11	FY 10-11	Act / Projected			
REHP	\$505.6	\$574.8	\$616.2	\$568.7	92%			
RPSPP	\$54.6	\$62.0	\$65.0	\$64.6	99%			

# **Retired Employees Health Program**

Table 5.6 shows the REHP experience. Section A shows the 2008 valuation rates. For ease of comparison, the age-banded rates are condensed into pre-65 and post-65 rates. Section B shows the projected 2010 rates based on the 2008 valuation rates and the valuation trend assumptions. Section C shows the actual 2010 experience and compares the actual 2010 claims experience with the expected costs. This shows that the pharmacy costs are in line with expectations, while the emerging experience is 14 percent lower than expected medical costs for employer primary coverage and 27 percent lower than expected medical costs for Medicare primary coverage. Section D shows the credibility factors – i.e. the degree to which we can rely on just the 2010 new claims experience. Section E shows the blended rates, taking the new 2010 claims information if the credibility is 100%, and a blend of the rates in Section B and C if the credibility is less than 100%.

	Table 5.6 – REHP Per Capita Claims Costs									
		Medical - Employer Primary	Medical - Medicare Primary	Pharmacy						
A.	2008 Valuation Rates									
	■ Pre-65	\$5,581	\$2,727	\$1,909						
	• 65 & over	\$8,170	\$1,094	\$2,835						
	<ul><li>Combined</li></ul>	\$5,704	\$1,255	\$2,473						
В.	Projected 2010 Rates									
	■ Pre-65	\$6,692	\$4,045	\$2,165						
	■ 65 & over	\$9,796	\$1,623	\$3,215						
	<ul><li>Combined</li></ul>	\$6,839	\$1,861	\$2,805						
C.	Actual 2010 Experience									
	<ul><li>Combined</li></ul>	\$5,878	\$1,358	\$2,801						
	<ul><li>Actual / Expected</li></ul>	86%	73%	100%						
D.	Credibility									
	■ Pre-65	100%	87%	100%						
	• 65 & over	43%	100%	100%						
	<ul><li>Combined</li></ul>	100%	100%	100%						
E.	Blended 2010 Rates									
	■ Pre-65	\$5,751	\$2,951	\$2,162						
	■ 65 & over	\$8,419	\$1,184	\$3,210						
	<ul><li>Combined</li></ul>	\$5,878	\$1,358	\$2,801						
F.	Blended / Expected									
	■ Pre-65	86%	73%	100%						
	■ 65 & over	86%	73%	100%						

Overall, the experience has been favorable, so the 2011 valuation will reflect some "actuarial gains" from the use of lower starting per capita claims costs than was expected based on the prior valuation.

Offsetting this reduction in liability will be an increase due to the change in retiree contributions.

# Retired Pennsylvania State Police Program

Table 5.7 shows the RPSPP experience. Section C shows the actual 2010 experience and compares the actual 2010 claims experience with the expected costs. This shows that the emerging medical experience is 10 percent lower than expected for employer primary coverage and 12 percent lower than expected medical costs for Medicare primary coverage.

The pharmacy costs for the closed group of pre-1995 retirees are 50 percent higher than expected. The pharmacy costs for the post-1995 retirees are 18 percent higher than expected. These large increases are due to incomplete data used in the prior valuation. The prior valuation included Medco claims costs only whereas this valuation included pharmacy claims costs from both Medco and Express Scripts. In addition, we have developed separate rates for the cohort of RPSPP retirees who have a \$1 co-pay plan design. Their costs will be valued at 9 percent higher than the other post-1995 retirees to reflect the additional cost associated with their lower copays. Dental costs are 8 percent lower than expected.

These emerging costs are blended with the expected costs based on the credibility of the new claims experience.

	Table 5.7 – RPSPP Per Capita Claims Costs									
		Medical Employer Primary	Medical Medicare Primary	Pharmacy Pre July 1995 Retirees	Pharmacy Post July 1995 Retirees	Dental				
A.	2008 Valuation Rates			•						
	<ul><li>Pre-65</li></ul>	\$5,077	\$5,227	\$1,849	\$1,646	\$536				
	■ 65 & over	\$7,545	\$4,406	\$2,533	\$2,255	\$536				
	<ul><li>Combined</li></ul>	\$5,650	\$4,421	\$2,175	\$1,935	\$536				
B.	Projected 2010 Rates									
	■ Pre-65	\$6,087	\$6,267	\$2,107	\$1,875	\$602				
	■ 65 & over	\$9,047	\$5,283	\$2,887	\$2,569	\$602				
	<ul><li>Combined</li></ul>	\$6,774	\$5,300	\$2,478	\$2,206	\$602				
C.	Actual 2010 Experience	!								
	<ul> <li>Combined</li> </ul>	\$6,114	\$4,666	\$3,709	\$2,612	\$551				
	<ul> <li>Actual / Expected</li> </ul>	90%	88%	150%	118%	92%				
D.	Credibility									
	■ Pre-65	62%	7%	27%	55%	63%				
	■ 65 & over	34%	49%	58%	26%	60%				
	<ul><li>Combined</li></ul>	71%	49%	64%	61%	87%				
E.	Blended 2010 Rates		·							
	■ Pre-65	\$5,664	\$5,896	\$2,695	\$2,271	\$558				
	■ 65 & over	\$8,419	\$4,970	\$3,395	\$3,281	\$558				
	<ul> <li>Combined</li> </ul>	\$6,304	\$4,986	\$3,271	\$2,453	\$558				
F.	Blended / Expected		<u>-</u>			_				
	■ Pre-65	93%	94%	128%	121%	93%				
	■ 65 & over	93%	94%	118%	128%	93%				

Table 5.8 shows the baseline per capita claims costs that were used in the valuation for RPSPP current retirees. A small number of RPSPP members over age 65 are not eligible for Medicare, therefore the employer coverage is primary.

Table 5.8 RPSPP Per Capita Claims Costs in 2010						
Age	Medic	Pharmacy				
Age	Employer Primary	Medicare Primary	Tilailiacy			
Pre-65	\$5,751	\$2,951	\$2,162			
65 & over	8,419	1,184	3,210			
Combined	5,878	1,358	2,801			

The per capita claim costs shown in Table 5.8 are the appropriate rates for retirees covered by the benefit plan design in force as of June 30, 2010. The rates reflect the fully-insured Medicare Advantage plans for Medicare-eligible retirees.

Separate health care claims costs were developed for RPSPP members. These costs reflect several differences between the benefits and population of the State Police. One key difference is their eligibility for Medicare. State Police enlisted members hired before 1986 were not required to pay the Medicare Hospital Insurance contributions and therefore, upon attainment of age 65, are not eligible for Medicare Part A and the RPSPP remains primary for their medical benefits. Accordingly, we developed both non-Medicare-eligible and Medicare-eligible rates for retirees over age 65. For State Police hired after 1986, and other members who enroll in Medicare having earned eligibility through a spouse or other employment, the Commonwealth pays the Part B premium for the Medicare-enrolled retiree. The RPSPP also includes coverage for dental benefits. Table 5.9 shows the baseline per capita claims costs that were used in the valuation of the State Police current retirees.

Table 5.9 RPSPP Per Capita Claims Costs in 2010								
Age	Med Employer Primary	ical Medicare Primary	Phari Pre 1986 Retirees	nacy Post 1986 Retirees	Dental	Part B		
Pre-65	\$5,664	\$5,896	\$2,695	\$2,271	\$558			
65 & over	8,419	4,970	3,395	3,281	558	1,157		
Combined	6,304	4,986	3,271	2,453	558	1,157		

The age-specific claims costs were developed based on the pre-65 and post-65 claims analysis shown in Tables 5.8 and 5.9, and the aging factors developed in the prior valuation. A detailed listing of the age-specific claims costs is shown in the appendix.

# Medicare Prescription Drug, Improvement, and Modernization Act of 2003

In December 2003, President Bush signed into law the Medicare Prescription Drug Modernization and Improvement Act of 2003. The Act effective January 1, 2006 added a voluntary prescription drug benefit to the Medicare program.

# Overview of the prescription drug benefit

Beginning in 2006, Medicare beneficiaries had the option of obtaining prescription drug coverage through stand-alone private drug plans or through private preferred provider organizations or health maintenance organizations. Beneficiaries pay monthly premiums. Under the Standard Design, after an annual deductible, beneficiaries pay 25 percent of up to the Initial Coverage Level for all prescription drug costs, with Medicare paying 75 percent. Once annual drug costs reach the initial coverage level, beneficiaries pay 100 percent of their drug costs until their out-of-pocket expenses reach a maximum out of pocket threshold. Above that level the catastrophic coverage feature of Medicare pays 95 percent of the drug costs with beneficiaries paying just 5 percent.

To encourage employers to continue providing retiree health coverage, qualifying retiree plans would receive subsidies for 28 percent of the drug costs from a cost threshold to a cost limit for their retirees who are enrolled in Medicare.

Table 5.10 Medicare Part D Thresholds										
	2006	2007	2008	2009	2010	2011				
	Sta	ndard Part	D plans							
Deductible	\$250	\$265	\$275	\$295	\$310	\$310				
Initial Coverage Limit	2,250	2,400	2,510	2,700	2,830	2,840				
Out of Pocket Threshold	3,600	3,850	4,050	4,350	4,550	4,550				
Catastrophic Coverage	5,100	5,451	5,726	6,154	6,440	6,478				
Copays above 4.										
a. Generic/ Preferred Multi	2.00	2.15	2.25	2.40	2.50	2.50				
b. Other	5.00	5.35	5.60	6.00	6.30	6.30				
	Re	tiree Drug S	Subsidy							
Cost Threshold	250	265	275	295	310	310				
Cost Limit	5,000	5,350	5,600	6,000	6,300	6,300				
Medicare Trustee RDS Estimate	527	558	597	636	678	613				

## Healthcare Reform

Included in the Patient Protection and Affordable Care Act of 2010 (PPACA), was a provision to amend the Medicare Part D program. Starting in 2011, Part D enrollees will receive a 50% discount on the total cost of their brand-name drugs incurred in the coverage gap. The full retail cost of the drugs will still apply to TrOOP even though 50% was paid for by the pharmaceutical

manufacturers. For 2011, enrollees will pay a maximum of 93% coinsurance on generic drugs while in the coverage gap. The generic drug coinsurance reduces annually until it reaches 25% in 2010.

# **Demographic Assumptions**

The demographic assumptions used for valuing the liabilities of the post-retirement medical plan are those used for the actuarial valuation of the State Employees' Retirement System.

The demographic assumptions include the rate of mortality, the rate of withdrawal, the rate of retirement, and the rate of disability. Ancillary demographic assumptions include the age of female spouses, coverage rates, and participation rates. The complete set of demographic assumptions is included in Appendix B.

# **Section 6 - Financial Accounting Information**

In addition to establishing the Annual Required Contribution (ARC) and Annual OPEB cost (AOC), this report shows the progress toward funding of the plan benefits. This section includes a schedule of the funding progress, which is a statement of disclosure to report the information required by Governmental Accounting Standards Board (GASB) Statement No. 45.

Also included is a schedule of employer contributions. This schedule compares the expected contribution to the plan with the ARC and AOC. Since there is a lag-period between the determination of the ARC and AOC and the determination of the amounts actually funded, the tables show estimated amounts based on the funding policy as of the measurement date.

# **GASB 45 Disclosures**

Table 6.1 shows the schedule of funding progress for the Retired Employees Health Program (REHP) and Table 6.2 shows the schedule of funding progress for the Retired Pennsylvania State Police Program (RPSPP).

Table 6.3 (for the REHP) and Table 6.4 (for the RPSPP) show the projected Annual Required Contribution for FY 2007/08, FY 2008/09, FY 2009/10, FY 2010/11 and FY2011/12, and the projected employer contributions. The ratio of the projected employer contributions to the ARC is the percentage of the ARC that is funded.

Table 6.1 Retired Employees Health Program Schedule of Funding Progress (dollars in millions)							
Fiscal Year Ending June 30	Actuarial Value of Assets (a)	Actuarial Accrued Liability (AAL) (b)	Unfunded Actual Liability (UAAL) (b-a)	Funded Ratio (a/b)	Estimated Covered Payroll (c)	UAAL as a Percentage of Covered Payroll ((b-a)/c)	
2008	\$60.00	\$12,863.27	\$12,803.27	0.47%	\$3,559	360%	
2009	\$47.92	\$13,257.57	\$13,209.65	0.36%	\$4,093	323%	
2010	\$56.32	\$13,674.25	\$13,617.93	0.41%	\$3,786	360%	
2011	\$70.74	\$12,907.79	\$12,837.05	0.55%	\$3,839	334%	

Table 6.2 Retired Pennsylvania State Police Program Schedule of Funding Progress (dollars in millions)							
Fiscal Year Ending June 30	Actuarial Value of Assets (a)	Actuarial Accrued Liability (AAL) (b)	Unfunded Actual Liability (UAAL) (b-a)	Funded Ratio (a/b)	Estimated Covered Payroll (c)	UAAL as a Percentage of Covered Payroll ((b-a)/c)	
2008	\$50.80	\$1,999.50	\$1,948.70	2.61%	\$314	621%	
2009	\$40.57	\$2,104.24	\$2,063.67	1.97%	\$337	612%	
2010	\$47.68	\$2,209.46	\$2,161.78	2.15%	\$435	497%	
2011	\$59.90	\$2,492.28	\$2,432.38	2.40%	\$447	544%	

Table 6.3 Retired Employees Health Program Schedule of Employer Contributions (dollars in millions)					
Fiscal Year Ending June 30	Annual Required Contribution	Expected Employer Contribution	Percentage Contributed		
2008	\$590.40	\$590.40	100%		
2009	\$818.51	\$505.56	62%		
2010	\$848.53	\$515.43	61%		
2011	\$879.21	\$598.34	68%		
2012	\$866.77	\$547.17*	63%		

Table 6.4 Retired Pennsylvania State Police Program Schedule of Employer Contributions (dollars in millions)						
Fiscal Year Ending June 30	Annual Required Contribution	Employer Contribution	Percentage Contributed			
2008	\$120.29	\$114.79	95%			
2009	\$143.35	\$ 54.57	38%			
2010	\$151.15	\$ 62.02	41%			
2011	\$158.33	\$ 66.35	42%			
2012	\$174.23	\$ 70.04*	40%			

<sup>\*</sup>Tables 6.3 and 6.4 show expected employer contributions based on information available at the date the report was prepared. Future events including emerging health care cost experience for retirees and hiring of new employees will affect the expected amounts.

# GASB No. 45 Disclosure Development of Net OPEB Obligation

Table 6.5 Postretire ment Medical Benefits REHP							
Actuarial Valuation Date	Annual Required Contribution (a)	Interest on Unfunded ARC (b)	Adjustment of the ARC (c)	Annual OPEB Cost (d) = (a) + (b) + (c)	Actual Contribution (e)	Increase in OPEB obligation (f) = (d) – (e)	Net OPEB liability at end of year (g) = prior year (g) + (f)
7/1/2007	\$590.4	\$0.00	\$0.00	\$590.4	\$590.4	\$0	\$0
7/1/2008	\$818.51	\$0.00	\$0.00	\$818.51	\$505.56	\$312.95	\$312.95
7/1/2009	\$848.53	\$15.65	(\$13.74)	\$850.44	\$515.43	\$335.01	\$647.96
7/1/2010	\$879.21	\$32.40	(\$28.45)	\$883.16	\$598.34	\$284.82	\$932.78
7/1/2011	\$866.77	\$44.31	(\$40.88)	\$870.20	TBD	TBD	TBD

32/47

Table 6.6 Postretirement Medical Benefits RPSPP							
Actuarial Valuation Date	Annual Required Contribution (a)	Interest on Unfunded ARC (b)	Adjustment of the ARC (c)	Annual OPEB Cost (d) = (a) + (b) + (c)	Actual Contribution (e)	Increase in OPEB obligation (f) = (d) – (e)	Net OPEB liability at end of year (g) = prior year (g) + (f)
7/1/2007	\$120.29	\$0.00	\$0.00	\$120.29	\$114.79	\$5.50	\$5.50
7/1/2008	\$143.35	\$0.28	(\$0.24)	\$143.39	\$54.57	\$88.82	\$94.32
7/1/2009	\$151.15	\$4.72	(\$4.14)	\$151.73	\$62.02	\$89.71	\$184.03
7/1/2010	\$158.33	\$9.20	(\$8.08)	\$159.45	\$66.35	\$93.10	\$277.13
7/1/2011	\$174.23	\$13.16	(\$12.15)	\$175.24	TBD	TBD	TBD

# **Section 7 - Summary of Plan Provisions**

# **Retired Employees Health Program**

Employees who retire from the state at any age with 25 years of service and receive an immediate pension are eligible for coverage under the REHP. In addition, the employees who retire at or over age 60 with a minimum of 20 years of service, and receive an immediate pension are eligible for coverage under the REHP.

Eligible retirees have various options, depending on (a) their date of retirement and (b) their Medicare status.

Table 7.1						
	Non-Medicare Ret	irees	Medicare-Eligible Retirees			
Retirement date	Prior to 7/1/04	On or after 7/1/04	Prior to 7/1/04	On or after 7/1/04		
Medical Plan Options	Basic	Not available	Prior to May 1, 2008: Medicare Supplement & PEBTF Major Medical	Prior to May 1, 2008: Medicare Supplement & PEBTF Major Medical		
	НМО	НМО	Medicare Advantage Plans	Medicare Advantage Plans		
	PPO	PPO	From May 1, 2008 :	From May 1, 2008 :		
		CDHP	Medicare Advantage	Medicare Advantage		
Pharmacy Plan	Three tier co-pay	Retail: \$10 for Generic, \$18 for Preferred Brand, \$36 for Non Preferred Brand	Three tier co-pay	Retail: \$10 for Generic, \$18 for Preferred Brand, \$36 for Non Preferred Brand		

Non-Medicare eligible retirees who retired prior to 7/1/04 have three options: Basic, HMO, and PPO. Non-Medicare eligible retirees who retired after or on 7/1/04 also have three options: PPO, HMO, and a Consumer Driven option.

The summaries of the plan provisions described below are those of the HMO Option.

Table 7.2 HMO Option					
<u> </u>					
	Retiree Co	st Sharing			
Benefit	Retired Prior to 7/1/2004	Retired on or after 7/1/2004			
Deductible (Applies to all benefits unless otherwise noted)	None	None			
OOP Max	None	None			
Physician Visits					
PCP	\$15 co-pay	\$15 co-pay			
Specialist	\$25 co-pay	\$25 co-pay			
Preventive Care					
Adult					
Routine Physical	\$15 co-pay	\$15 co-pay			
Annual Routine Gynecological exams	\$25 co-pay	\$25 co-pay			
Annual Routine Mammograms	0% coinsurance	0% coinsurance			
Pediatric					
Routine Physical	\$15 co-pay	\$15 co-pay			
Immunizations	0% coinsurance	0% coinsurance			
Emergency Room	\$50 (waived if admitted)	\$50 (waived if admitted)			
Hospital Expenses	0% coinsurance semi- private room (private if medically necessary	0% coinsurance semi- private room (private if medically necessary			
Medical/Surgical					
Expenses	0% coinsurance	0% coinsurance			
SNF	0% coinsurance (180 day max)	0% coinsurance (180 day max)			
Home Health	0% coinsurance (60 visits in 90 days)	0% coinsurance (60 visits in 90 days)			
Chiropractic Care	\$15 co-pay initial visit only(combined 60 visits/year max)	\$15 co-pay per visit(combined 60 visits/year max)			
MH and Substance Abuse	Provided by UBH	Provided by UBH			

The summaries of the plan provisions described below are those of the PPO Option.

Table 7.3 PPO Option							
	Retiree Cost Sharing						
	Retired Pr	ior to 7/1/2004	Retired on o	or after 7/1/2004			
Benefit	In Network	Out-of-Network	In Network	Out-of-Network			
Deductible (Applies to all benefits unless otherwise noted)	None	\$250 Individual; \$500 family	None	\$400 per person;			
OOP Max	None	\$1,000 individual; \$2,000 family	None	\$1,500 individual; \$3,000 family			
Physician Visits							
PCP	\$15 co-pay	20% coinsurance	\$15 co-pay	30% coinsurance			
Specialist	\$25 co-pay	20% coinsurance	\$25 co-pay	30% coinsurance			
Preventive Care							
Adult							
Routine Physical	\$15 co-pay	20% coinsurance	\$15 co-pay	30% coinsurance			
Annual Routine Gynecological exams	\$25 co-pay	20% coinsurance (OON ded. waived)	\$25 co-pay	30% coinsurance (OON ded. waived)			
Annual Routine Mammograms	0% coinsurance	20% coinsurance (OON ded. waived)	0% coinsurance	30% coinsurance (OON ded. waived)			
Pediatric							
Routine Physical	\$15 co-pay	20% coinsurance	\$15 co-pay	30% coinsurance			
Immunizations	0% coinsurance	20% coinsurance (OON ded. waived)	0% coinsurance	30% coinsurance (OON ded. waived)			
Emergency Room	\$50 (waived if admitted)	\$50 (waived if admitted)	\$50 (waived if admitted)	\$50 (waived if admitted)			
Hospital Expenses	0% coinsurance	20% coinsurance	0% coinsurance	30% coinsurance			
Medical/Surgical Expenses	0% coinsurance	20% coinsurance	0% coinsurance	30% coinsurance			
SNF	0% coinsurance (240 days)	20% coinsurance (up to 240 days)	0% coinsurance (240 days)	30% coinsurance (up to 240 days)			
Home Health	0% coinsurance	20% coinsurance	0% coinsurance	30% coinsurance			
Chiropractic Care	\$15 co-pay for first visit only	20% coinsurance	\$15 co-pay for first visit only	30% coinsurance			
MH and Substance Abuse	Provided by UBH	Provided by UBH	Provided by UBH	Provided by UBH			

The summaries of the plan provisions described below are those of the Consumer Driven Option.

Table 7.4 Consumer Driven Option						
Retiree Cost Sharing						
	Retired	Retired on or after 7/1/2004				
Benefit	Prior to 7/1/2004	In Network	Out-of-Network			
Deductible (Applies to all benefits unless otherwise noted)		\$1,500 individual; \$3,000 family. The REHP contributes \$1,000 per individual & \$2,000 per family per year into a Health Reimbursement Account (HRA). Therefore, the OOP max (In network) is \$500 per individual or \$1,000 per family per year.				
OOP Max		\$500 Individual (after HRA); \$1,000 family (after HRA)	\$3,500 Individual (after HRA); \$7,000 family (after HRA)			
Physician Visits						
PCP		0% coinsurance	30% coinsurance			
Specialist		0% coinsurance	30% coinsurance			
Preventive Care						
Adult						
Routine Physical						
Annual Routine						
Gynecological exams	PLAN NOT	Covered up to \$500 a	Not Covered			
Annual Routine Mammograms	AVAILABLE	year (\$1,000 for family)	That Governous			
Pediatric						
Routine Physical						
Immunizations						
Emergency Room		0% coinsurance	30% coinsurance			
Hospital Expenses		0% coinsurance	30% coinsurance			
Medical/Surgical						
Expenses		0% coinsurance	30% coinsurance			
SNF		0% coinsurance (240 day max)	30% coinsurance (240 day max			
Home Health		0% coinsurance	30% coinsurance			
Chiropractic Care		0% coinsurance 30% coinsurance				
MH and Substance Abuse		Provided by UBH	Provided by UBH			

The summary of the plan provisions described below is that of the Basic Option.

	Table 7.5					
	Basic Option					
	Retiree Cost Sharing					
Benefit	Retired Prior to 7/1/2004	Retired on or after 7/1/2004				
Deductible (Applies to all benefits unless otherwise noted)	PEBTF Major Medical \$100 per person, max 3 per family; 20% of next \$1,900 and 0% thereafter					
OOP Max	PEBTF Major Medical \$380 per person plus deductible and any charges in excess of the UCR					
Physician Visits						
Primary Care Physician	Responsible for charges; must submit to PEBTF Major Medical					
Specialist	Responsible for charges; must submit to PEBTF Major Medical					
Preventive Care						
Adult						
Routine Physical	Not covered; pay 100% of cost					
Annual Routine Gynecological exams	0% coinsurance	PLAN NOT AVAILABLE				
Annual Routine Mammograms	0% coinsurance					
Pediatric						
Routine Physical	0% coinsurance					
Immunizations	0% coinsurance					
Emergency Room	0% coinsurance if medical emergency and treated within 72 hours					
Hospital Expenses	0% coinsurance semi-private room (private if medically necessary)					
Medical/Surgical Expenses	0% coinsurance					
SNF	0% coinsurance (120 day max)					
Home Health	0% coinsurance (120 visits in 90 days)					
Chiropractic Care	0% coinsurance					
MH and Substance Abuse	Provided by UBH					

#### **Retiree Contributions (REHP only)**

For employees who retired before July 1, 2005 the Commonwealth pays 100% of the cost. Commonwealth employees who retire on or after July 1, 2005 are required to pay retiree contributions as a condition of receiving retiree medical coverage. For employees who retired after June 30, 2005 and before July 1, 2007 the retiree contribution is set at 1 percent of the employee's final annual salary. Commonwealth employees who retire on or after July 1, 2007 are required to pay retiree contributions at the same rate as active employees. Thus, the retiree contributions are 2 percent of final salary for FY 2009/10 and 3 percent of final annual salary thereafter. Upon enrollment in Medicare, Commonwealth employees who retire on or after July 1, 2011 will pay retiree contributions of 1.5 percent of final salary.

Surviving spouses and dependents of deceased retirees may continue to participate in the plan if they pay contributions at a rate designed to fund the full cost of the coverage.

#### Retired Pennsylvania State Police Program

Table 7.6 shows a summary of the plan provisions of the RPSPP. The Commonwealth pays 100 percent of the cost for RPSPP retirees as well as the spouses and dependents of RPSPP retirees while the retiree is alive.

Table 7.6 RPSPP Plan Option					
	Retiree Cost Sharing				
	PPO	Option			
Benefit	In Network	Out Network			
Deductible		\$250 Individual;			
Per Benefit Period	None	\$750 Family Aggregate			
OOP Max		\$1,500 Individual;			
Includes Coinsurance	Not Applicable	\$3,000 Family Aggregate			
Office Visits					
PCP	100% PRC after \$15 co-pay	80% PRC after deductible			
Specialist	100% PRC after \$25 co-pay	80% PRC after deductible			
Preventive Care					
Adult					
Routine Physical	100% PRC after \$15 co-pay	80% PRC after deductible			
Routine Gynecological					
exams & Pap Test		80% PRC no deductible /			
Screening	100% PRC	lifetime maximum			
Mammograms					
	100% PRC	80% PRC after deductible			
Pediatric					

Table 7.6 RPSPP Plan Option					
Retiree Cost Sharing					
	PPO	Option			
Benefit	In Network	Out Network			
Routine Physical Exam					
	100% PRC after \$15 co-pay	80% PRC after deductible			
Immunizations	100% PRC	80% PRC no deductible / lifetime maximum			
Emergency Room Services Facility Services	100% PRC after \$50 co-pay (waived if admitted)	100% PRC after \$50 co-pay (waived if admitted)			
Hospital Expenses Inpatient & Outpatient	100% PRC	80% PRC after deductible			
Consider Formation		pint blood deductible per benefit			
Surgical Expenses Includes Assistant Surgery, Anesthesia, Sterilization & Reversal Procedures, &					
Neonatal Circumcision	100% PRC	80% PRC after deductible			
SNF Care	100% PRC 80% PRC after deductible				
	Unlimited days	per benefit period			
Home Health	100% PRC	80% PRC after deductible			
Excludes Respite Care	Unlimited visits	per benefit period			
Spinal Manipulations	100% PRC after \$15 co-pay	80% PRC after deductible			
	Unlimited visits	per benefit period			
Mental Health – Inpatient Includes Partial					
Hospitalization (2 for 1	100% PRC	80% PRC after deductible			
trade)		calendar year (up to 30 days for			
Mental Health – Outpatient	100% PRC after \$25 co-pay	ental illness) 50% PRC after deductible			
Wertai Freatti – Outpatrent		r calendar year (up to 60 visits			
		mental illness)			
Substance Abuse –	100% PRC	80% PRC after deductible			
Detoxification	7 days per admission; 4	4 admissions per lifetime			
Substance Abuse – Inpatient Rehabilitation Includes Partial					
Hospitalization (2 for 1	100% PRC	80% PRC after deductible			
trade)	Combined Limit: 30 days per calendar year; 90 days per lifetime				
Substance Abuse –	100% PRC after \$25 co-pay	80% PRC after deductible			
Outpatient		per calendar year; 120 visits time			

Table 7.7 RPSPP Rx Drug Benefit Program						
	Retired 7/1/73 through 6/30/95	Retired 7/1/95 through 4/20/05	Retired 4/21/05 through 6/30/07 (2-Tier Plan)	Retired on or after 7/1/2007 (3-Tier Plan)		
Generic	\$7.00 <b>Retail</b> (up to 30-day supply) \$5.00 <b>Mail Order</b> (31 days up to a 100-day maintenance	\$1.00 <b>Retail</b> (34-day supply or 100 unit dose) \$1.00 <b>Mail Order</b> (Up to	\$5.00 Retail (30-day supply) \$10.00 Mail Order	\$5.00 <b>Retail</b> (30-day supply) \$10.00 <b>Mail Order</b>		
Preferred brand	supply)  Same as above	6-month supply)  Same as above	(6-month supply) \$10.00 Retail (30-day supply) \$20.00 Mail Order (6-month supply)	(180-day supply) \$10.00 Retail (30- day supply) \$20.00 Mail Order (180-day supply)		
Non-Preferred brand	Same as above	Same as above	N/A	\$15.00 <b>Retail</b> (30- day supply) \$30.00 <b>Mail Order</b> (180-day supply)		

Those that retired prior to 7/1/13 have prescription benefits identical to other state employees.

Table 7.8 RPSPP Indemnity Plan (Major Medical)							
	Re	etiree Cost Sharing					
Retired 7/1/73 Retired 7/1/95 through 6/30/95 through 4/20/05 Retired 4/21/05 Retired on or a 7/1/2007 (2-Tier Plan) (3-Tier Plan)							
<b>Deductible</b> Per Benefit Period	\$100 Individual \$300 Family Fourth Quarter Deductible Carryover Applies	\$100 Individual \$300 Family	\$100 Individual \$300 Family	\$250 Individual \$750 Family			
OOP Max	\$380 Individual after	\$380 Individual after	\$380 Individual after	\$380 Individual after			
Includes Coinsurance	deductible	deductible	deductible	deductible			
Office Visits							
PCP	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible			
Specialist  80% PRC after 80% PRC after 80% PRC after deductible deductible deductible deductible							
Preventive Care							
Adult							
Routine Physical	Not Covered	Not covered	Not covered	Not covered			

Table 7.8 RPSPP Indemnity Plan (Major Medical)						
Routine Gynecological exams & Pap Test Screening	100% PRC for facility 80% PRC no deductible	80% PRC no deductible	80% PRC no deductible	80% PRC no deductible		
Mammograms	80% PRC no deductible	80% PRC no deductible	80% PRC no deductible	80% PRC no deductible		
Pediatric						
Routine Physical Exam	Not Covered	Not covered	Not covered	Not covered		
Immunizations	100% PRC	80% PRC no deductible	80% PRC no deductible	80% PRC no deductible		
Emergency Room Services Facility Services	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible		
Hospital Expenses Inpatient & Outpatient	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible		
Surgical Expenses Includes Assistant Surgery, Anesthesia, Sterilization & Reversal Procedures, & Neonatal Circumcision	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible		
SNF Care	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible		
Home Health Excludes Respite Care	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible		
Spinal Manipulations	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible		
Mental Health – Inpatient Includes Partial Hospitalization (2 for 1 trade)	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible		
Mental Health – Outpatient	80% after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible		
Substance Abuse – Detoxification	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible		
Substance Abuse – Inpatient Rehabilitation Includes Partial Hospitalization (2 for 1 trade)	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible		
Substance Abuse – Outpatient	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible	80% PRC after deductible		

Table 7.8a RPSPP Indemnity Plan (Facility Program)							
Retiree Cost Sharing							
Retired 7/1/73 through 6/30/95 Retired 7/1/95 through 6/30/95 Retired 4/21/05 through 6/30/07 (2-Tier Plan) Retired on after 7/1/20 (3-Tier Plan)							
Preventive Care							
Adult							
Routine Physical	Not Covered	Not Covered	Not covered	Not covered			
Routine Gynecological exams & Pap Test Screening	100% PRC	100% PRC	100% PRC	100% PRC			
Mammograms	100% PRC	100% PRC	100% PRC	100% PRC			
Pediatric							
Routine Physical Exam	Not Covered	Not Covered	Not covered	Not covered			
Immunizations	100% PRC	100% PRC	100% PRC	100% PRC			
Emergency Room Services Facility Services	100% PRC	100% PRC	100% PRC	100% PRC			
Hospital Expenses Inpatient & Outpatient	100% PRC	100% PRC	100% PRC	100% PRC			
Surgical Expenses Includes Assistant Surgery, Anesthesia, Sterilization & Reversal Procedures, & Neonatal Circumcision	100% PRC	100% PRC	100% PRC	80% PRC after deductible			
SNF Care				80% PRC after deductible			
Home Health Excludes Respite Care	100% PRC 60 Home health visits in a 90 day period	100% PRC 60 Home health visits in a 90 day period	100% PRC 60 Home health visits in a 90 day period	100% PRC 60 Home health visits in a 90 day period			
Spinal Manipulations	Not Covered	Not Covered	Not Covered	Not Covered			
Mental Health – Inpatient Includes Partial Hospitalization (2 for 1 trade)	100% PRC	100% PRC	100% PRC	100% PRC			

Table 7.8a RPSPP Indemnity Plan (Facility Program)						
	Retire	e Cost Sharing				
Mental Health – Outpatient	Not Covered	Not Covered	Not Covered	Not Covered		
Substance Abuse – Detoxification	100% PRC	100% PRC	100% PRC	100% PRC		
Substance Abuse – Inpatient Rehabilitation Includes Partial Hospitalization (2 for 1 trade)	100% PRC	100% PRC	100% PRC	100% PRC		
Substance Abuse – Outpatient	100% PRC	100% PRC	100% PRC	100% PRC		

Table 7.8b RPSPP Indemnity Plan (Professional Program)					
	Retiree C	ost Sharing			
	Retired 7/1/73 Retired 7/1/95 through		Retired 4/21/05 through 6/30/07	Retired on or after 7/1/2007	
	6/30/95	4/20/05	(2-Tier Plan)	(3-Tier Plan)	
Preventive Care					
Adult					
Routine Physical	Not Covered	Not Covered	Not Covered	Not Covered	
Routine Gynecological exams & Pap Test Screening	100% PRC	100% PRC	100% PRC	100% PRC	
Mammograms	100% PRC	100% PRC	100% PRC	100% PRC	
Pediatric					
Routine Physical Exam	Not Covered	Not covered	Not covered	Not covered	
Immunizations	100% PRC	100% PRC	100% PRC	100% PRC	
Hospital Expenses			Not Covered	Not Covered	

Table 7.8b RPSPP Indemnity Plan (Professional Program)					
	Retiree (	Cost Sharing			
Inpatient & Outpatient					
Surgical Expenses	100% PRC	100% PRC	100% PRC	100% PRC	
SNF Care	100% PRC	100% PRC	100% PRC	100% PRC	
Home Health Excludes Respite Care			Not Covered	Not Covered	
Spinal Manipulations			Not Covered	Not Covered	
Mental Health – Inpatient		100% PRC	100% PRC	100% PRC	
Mental Health – Outpatient			Not Covered	Not Covered	
Substance Abuse – Detoxification	100% PRC	100% PRC	Not Covered	100% PRC	
Substance Abuse – Inpatient Rehabilitation	100% PRC	100% PRC	100% PRC	100% PRC	
Substance Abuse – Outpatient			100% PRC		

# **Section 8 - Participant Data**

The following tables show the current retired participants, and the potential participants who are currently active.

	Table 8.1 Current Retired Participants					
Age Group	Medicare	Medicare Eligible		edicare ible	То	tal
	REHP	RPSPP	REHP	RPSPP	REHP	RPSPP
<50	369	3	540	311	909	314
50-54	513	1	1,482	440	1,995	441
55-59	1,191	1	5,584	274	6,775	275
60-64	2,054	11	12,278	848	14,332	859
65-69	10,645	746	142	301	10,787	1,047
70-74	7,734	395	6	135	7,740	530
75-79	6,090	126	11	68	6,101	194
79+	10,753	205	22	70	10,775	275
Total	39,349	1,488	20,065	2,447	59,414	3,935

	Table 8.2 Active Participants					
Age Group	Fem	ales	Ma	les	То	tal
	REHP	RPSPP	REHP	RPSPP	REHP	RPSPP
<20	18	-	5	-	23	-
20-24	780	3	689	19	1,469	22
25-29	2,523	43	3,023	365	5,546	408
30-34	3,220	39	3,958	461	7,178	500
35-39	3,530	34	4,674	674	8,204	708
40-44	4,605	50	6,422	1,536	11,027	1,586
45-49	5,824	27	7,008	873	12,832	900
50-54	7,001	9	7,611	188	14,612	197
55-59	6,481	1	6,997	34	13,478	35
60-64	2,683	-	3,673	-	6,356	-
65+	558	-	1,014	-	1,572	-
Total	37,223	206	45,074	4,150	82,297	4,356

Data on employees and retirees who are currently not participating were not included in this analysis.

Table 8.3 shows the count of the number of REHP active employees as of July 1, 2007 who were eligible for the grandfathered retirement eligibility permitting them to be covered upon attainment of age 60 and completion of 15 years of service.

Table 8.3 Grandfathered REHP Participants				
Age Group	Males	Females	Total	
<59	-	-	-	
60-64	272	147	419	
65-69	48	31	79	
70+	24	20	44	
Total	344	198	542	
Total Prior				
Valuation	1,246	788	2,034	

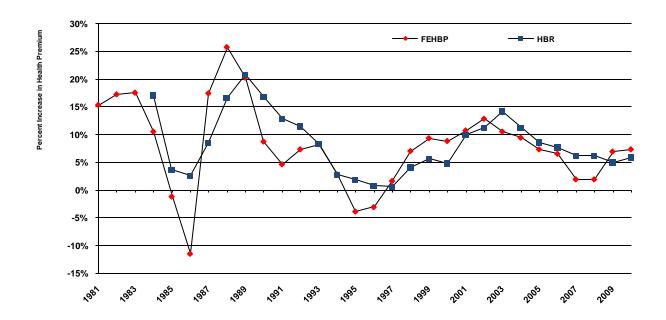
Table 8.4 shows the comparison of the retired participants used to develop the results in the current valuation to the retired participants in the prior valuation. Table 8.5 shows the same comparison for active participants. These tables show that the composition of the plan participants is stable, with a slightly lower active participant count and small increase in the retired participant count.

Table 8.4 Retired Participants Comparison						
Age Group	Medicare Eligible		Non Medicare Eligible		Total	
	REHP	RPSPP	REHP	RPSPP	REHP	RPSPP
Current Valuation	39,349	1,488	20,065	2,447	59,414	3,935
Prior Valuation	38,197	1,224	19,844	2,542	58,041	3,766

Table 8.5 Active Participants Comparison						
Age Group	Fem	ales	Males		Total	
	REHP	RPSPP	REHP	RPSPP	REHP	RPSPP
Current Valuation	37,223	206	45,074	4,150	82,297	4,356
Prior Valuation	39,478	214	48,042	4,244	87,520	4,458

## Appendix A - Hay Benefits Report Survey and Federal Employees Health Benefits Program Medical Premium Increases

CHART 1
HBR & FEHBPMEDICAL PREMIUM INCREASES
SELECTED CALENDAR YEARS FROM 1981 TO 2010



The above chart shows the annual percentage change in the premiums for the Federal Employees Health Benefit Program (FEHBP) as well as the annual change in the average premiums among the Hay Benefits Report (HBR) participants.

The chart shows the cyclical nature of annual premium rate increases (and decreases).

From 2003 to 2009 there was a gradual decline in premium rate increases. The FEHBP appears to be a leading indicator of price changes. In 2007 and 2008 the FEHBP average was 2.0 percent. The rate increase of 7 percent in 2009 was the first increase above CPI for 2 years. The rate increase in 2010 was 7.4 percent.

Appendix A-1 www.haygroup.com

### **Appendix B - Actuarial Assumptions**

The assumptions shown here apply to the actuarial valuation performed as of July 1, 2011. For the results as of July 1, 2010 see the prior actuarial valuation on the Commonwealths website at for the actuarial assumptions:

http://www.portal.state.pa.us/portal/server.pt/document/1089176/commonwealth\_of\_pa\_2009\_g asb45\_val\_report\_final\_pdf

The complete set of actuarial assumptions for the post-retirement medical plan comprises three types of assumptions:

- Demographic assumptions
- Economic assumptions
- Healthcare assumptions

The demographic assumptions used are the same ones as are used in the State Employees Retirement System (SERS) actuarial valuation. As the timing of an employee's decision as to when to retire is driven primarily on their financial security, the use of consistent assumptions ensures any changes made in the retirement system assumptions are reflected in both the annuitant costs and cost of their retiree medical coverage.

The demographic assumptions used were based on a review of experience under SERS from 2001 through 2005. This section contains an extract of the full set of rates used in the valuation. The full set of rates is in the Sixteenth Investigation of Actuarial Experience of the State Employees' Retirement System of the Commonwealth of Pennsylvania; March 15, 2006; which can be obtained from SERS. The rates are the probabilities that an event will occur in the year after the valuation and are all assumed to occur at the beginning of the year. For instance, the male retirement rate of 25.0 percent at age 60 means that 250 of every 1,000 employees age 60 and who are eligible for full benefits are expected to retire at the date of the valuation.

Appendix B-1 www.haygroup.com

## Demographic Assumptions

## **Pre Retirement Mortality and Disability:**

Represen	Representative Rates of Separation Due to Death and Disability				
	Dea	ath	Disa	bility	
Age	Male	Female	Male	Female	
20	0.04%	0.02%	N/A	N/A	
25	0.04	0.02	0.02%	0.04%	
30	0.05	0.02	0.07	0.09	
35	0.06	0.03	0.12	0.16	
40	0.08	0.04	0.19	0.21	
45	0.12	0.06	0.33	0.33	
50	0.22	0.09	0.46	0.50	
55	0.27	0.14	0.60	0.63	
60	0.32	0.24	N/A	N/A	

## Withdrawal Rate:

For General Employees

	Representative Rates of Separation Due to Withdrawal							
		Ma	ale			Female		
		Years of	Service			Years	of Service	
Age	0	5	9	14	0	5	9	14
20	20.7%	N/A	N/A	N/A	22.4%	N/A	N/A	N/A
25	16.2	0.8%	0.8%	N/A	20.5	2.7%	1.9%	N/A
30	13.9	0.8	0.6	0.6%	17.9	2.4	1.7	1.8%
35	13.6	0.7	0.4	0.4	12.8	1.9	1.2	1.3
40	13.0	0.5	0.4	0.4	10.0	1.9	0.7	0.5
45	12.1	0.5	0.2	0.2	9.8	1.8	0.7	0.5
50	11.3	0.5	0.2	0.2	9.8	1.8	0.4	0.5
55	11.3	0.6	0.6	0.6	9.8	1.5	1.2	1.2

## For Special Employees

Rates of Separation Due to Withdrawal For Special Benefit Classes if Different from General Employee Rates				
Years of Service	State Police/ Hazardous Duty			
0	15.0%			
1	5.0			
2	3.0			
3	2.5			
4	1.5			
5	0.9			
6	0.7			
7	0.6			
8	0.4			
9	0.3			
10+	0.2			

## **Retirement Rate:**

Early Retirement Rates

Represent	Representative Rates of Separation for Eligibility for Reduced Benefits					
	5 – 14 Years Serv			ears of Credited rvice		
Age	Male	Female	Male	Female		
25	1.0%	1.0%	N/A	N/A		
30	1.5	1.5	N/A	N/A		
35	1.5	1.5	1.5%	1.5%		
40	1.0	1.0	1.5	1.5		
45	1.0	1.0	1.5	1.5		
50	1.0	1.0	2.0	2.0		
55	1.0	1.0	5.5	5.5		

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## Assumptions for General Employees while Active Members

Normal Retirement Rate

(25 years of service under age 60; 3 years of service over age 60)

On June 30, 2008, the minimum service for eligibility for subsidized health benefits increased from 15 to 20 years.

<u> </u>	Representative Rates of Separation for Eligibility for Full Unreduced Benefits				
Age	Male	Female			
53	25.0	23.0			
54	26.0	23.0			
55	27.0	23.0			
56	28.0	23.0			
57 - 59	30.0	23.0			
60	25.0	25.0			
61	20.0	20.0			
62	25.0	25.0			
63 – 64	20.0	20.0			
65	25.0	25.0			
66 – 79	20.0	20.0			
80	100.0%	100.0%			

Special benefit Class other than General Employees

#### Normal Retirement Rates

_	Representative Rates of Separation Due to Retirement other than State Police with 19 or More Years of Service			
Age State Police/ Hazardous Duty				
50	7.0%			
55	7.0			
60	12.0			
65	25.0			
70	25.0			
75	25.0			
80	100.0			

Normal Retirement Rate for police with more than 19 years of service

Rates of Separation due to Retirement for State Police with 19* or More Years of Service				
Years of	_	Years of	_	
Service	Rate	Service	Rate	
19*-23	5.0%	31	20.0%	
24*	15.0	32 – 34	40.0	
25	50.0	35 – 39	50.0	
26-29	20.0	40+	100.0	
30	30.0			

<sup>\*</sup> State Police with 19 and 24 years of service at the beginning of the year are assumed to retire at the point they reach 20 and 25 years respectively during the year and to receive the Fraternal Order of Police (FOP) award.

#### **Post Retirement Mortality:**

Non-disabled Retirees, Beneficiaries and Survivors: The RP-2000 Healthy Annuitant Mortality Table projected to 2008 and updated to reflect actual SERS experience through 2010. The table includes a margin for future improvement in life expectancy.

<u>Disability Retirees</u>: The RP-2000 Disabled Retiree Mortality Table projected to 2008 and updated to reflect actual SERS experience through 2010. The table includes a margin for future improvement in life expectancy.

**Spouse Age Difference**: Females are assumed to be 2 years younger than males.

#### Years of Service Purchased by Eligible Members

	Number of Years	
Service	Purchased	
0	0.4	
1	0.3	
2	0.2	
3	0.1	
4+	0.0	

#### **Economic Assumptions**

**Interest Rate**: 5.0 percent compounded annually for valuation as of July 1, 2010, and 4.75 percent compounded annually for valuation as of July 1, 2011. The assumed interest rate is the investment return less investment and administrative expenses.

#### **Career Salary Increases**

The career salary scale shown on the following table includes average increases in the employee salary due to promotions and longevity growth. The average career salary growth is 3.8 percent per year. In addition, it is assumed that the salary schedules will increase by 3.3 percent a year. The scale on the following table does not include the assumed 3.3 percent general salary increase.

Assumed future salary increases were modified with respect to Class AA and Class A employees (other than members of the judiciary, legislators and select others) who are subject to the age 60/35 years of service superannuation requirements, to reflect negotiated increases applicable to such employees through June 30, 2007, as summarized below:

Career Salary Scale for Members					
Completed Years of Service	Annual Increase	Completed Years of Service	Annual Increase		
1	8.00%	16	2.50%		
2	6.00%	17	2.40%		
3	4.50%	18	2.30%		
4	4.00%	19	2.20%		
5	3.75%	20	2.10%		
6	3.50%	21	2.00%		
7	3.25%	22	1.90%		
8	3.20%	23	1.80%		
9	3.15%	24	1.70%		
10	3.10%	25	1.60%		
11	3.00%	26	1.50%		
12	2.90%	27	1.40%		
13	2.80%	28	1.30%		
14	2.70%	29	1.25%		
15	2.60%	30+	1.25%		

## **Healthcare Assumptions**

Health Care Cost Trend Rate Assumptions for REHP					
Year	Medicare-Retiree Medical Benefits	Non-Medicare-Retiree Medical Benefits	Pharmacy Benefits		
2011	10.00%	7.50%	6.00%		
2012	13.00%	7.00%	5.00%		
2013	12.00%	6.50%	5.00%		
2014	11.00%	6.00%	5.00%		
2015	10.00%	5.50%	5.00%		
2016	9.10%	5.00%	5.00%		
2017	8.40%	5.00%	5.00%		
2018	7.70%	5.00%	5.00%		
2019	7.10%	5.00%	5.00%		
2020	6.60%	5.00%	5.00%		
2021	6.10%	5.00%	5.00%		
2022	5.60%	5.00%	5.00%		
2023	5.20%	5.00%	5.00%		
2024	4.80%	4.75%	4.75%		
2025+	4.75%	4.75%	4.75%		

Health Care Cost Trend Rate Assumptions for RPSPP					
Year	Medical Benefits	Pharmacy Benefits	Dental Benefits	Part B Premiums	
2011	7.00%	6.00%	6.00%	3.70%	
2012	6.00%	5.75%	6.00%	-0.70%	
2013	5.00%	5.50%	6.00%	2.70%	
2014	5.00%	5.25%	5.00%	3.00%	
2015	5.00%	5.00%	5.00%	2.30%	
2016	5.00%	5.00%	5.00%	3.30%	
2017	5.00%	5.00%	5.00%	3.50%	
2018	5.00%	5.00%	5.00%	3.80%	
2019	5.00%	5.00%	5.00%	3.90%	
2020	5.00%	5.00%	5.00%	4.90%	
2021	5.00%	5.00%	5.00%	4.85%	
2022	5.00%	5.00%	5.00%	4.80%	
2023	5.00%	5.00%	5.00%	4.75%	
2024	4.80%	4.75%	4.75%	4.75%	
2025+	4.75%	4.75%	4.75%	4.75%	

Appendix B-7 www.haygroup.com

## **Ancillary Demographic Assumptions**

## Participation Rates

The active plan participants valued are those employees currently enrolled in the PEBTF health plan. We have therefore assumed the post-retirement participation rate is 100 percent.

#### Coverage Level Election Rates

The table below shows the percentage of retirees by coverage level.

## Plan Coverage Levels

Plan	Percent Electing Single Coverage	Percent Electing Retiree & Spouse or Other Dependent Coverage
REHP	45%	55%
RPSPP	15%	85%

Appendix B-8 www.haygroup.com

## **Per Capita Claims Cost Assumption:**

RPSPP Per Capita Claims Costs in 2010						
Age	Age Medical Pharmacy			macy	Dental	Part B
	Employer Primary	Medicare Primary	Pre July 1995 Retirees	Post July 1995 Retirees		
<50	\$3,438	\$7,612	\$1,705	\$1,431	\$558	\$
50 - 54	\$4,491	\$6,914	\$2,389	\$2,006	\$558	-
55 - 59	\$5,325	\$6,214	\$2,797	\$2,349	\$558	-
60 - 64	\$6,601	\$5,515	\$2,983	\$2,505	\$558	-
65 - 69	\$7,243	\$4,817	\$3,293	\$3,169	\$558	\$1,157
70 - 74	\$8,633	\$4,652	\$3,538	\$3,407	\$558	\$1,157
75 - 79	\$10,382	\$5,244	\$3,691	\$3,554	\$558	\$1,157
80 - 84	\$12,142	\$5,576	\$3,643	\$3,507	\$558	\$1,157
85 - 89	\$13,839	\$5,648	\$3,444	\$3,316	\$558	\$1,157
90+	\$15,536	\$5,973	\$2,901	\$2,794	\$558	\$1,157

REHP Per Capita Claims Costs in 2010				
	Med	lical		
Age	Employer Primary	Medicare Primary	Pharmacy	
<50	\$3,341	\$2,951	\$1,813	
50 - 54	\$4,356	\$2,951	\$1,813	
55 - 59	\$5,157	\$2,951	\$2,123	
60 - 64	\$6,382	\$2,951	\$2,264	
65 - 69	\$8,147	\$1,184	\$3,083	
70 - 74	\$10,152	\$1,184	\$3,312	
75 - 79	\$12,352	\$1,184	\$3,456	
80 - 84	\$14,669	\$1,184	\$3,411	
85 - 89	\$17,006	\$1,184	\$3,225	
90+	\$19,241	\$1,184	\$2,717	

Appendix B-9 www.haygroup.com