



Town of Lincoln

GASB 45 Actuarial Valuation

Fiscal Year Ending June 30, 2015

Prepared by:

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Table of Contents

	Page
Certification	1
Actuary's Notes	3
Executive Summary	4
GASB Disclosures	
Development of Annual Required Contribution (ARC)	7
Development of Annual OPEB Cost and Net OPEB Obligation	8
Schedule of Funding Progress	9
Schedule of Employer Contributions	9
Historical Annual OPEB Cost	9
Reconciliation of Actuarial Accrued Liability (AAL)	10
Employer Contribution Cash Flow Projections	11
Substantive Plan Provisions	12
Actuarial Methods and Assumptions	17
Summary of Plan Participants	22
Appendix	25
GASB Results by Location	26
Comparison of Participant Demographic Information	27
Glossary	28
Decrements Exhibit	29
Retirement Rates Exhibit	30
Illustrations of GASB Calculations	31
Definitions	33

November 12, 2015

John Ward
Town of Lincoln
100 Old River Road
Lincoln, RI 02865

This report summarizes the GASB actuarial valuation for the Town of Lincoln 2014/15 fiscal year. To the best of our knowledge, the report presents a fair position of the funded status of the plan in accordance with GASB Statement No. 45 (Accounting and Financial Reporting by Employers for Post-Employment Benefits Other Than Pensions).

The information presented herein is based on the actuarial assumptions and substantive plan provisions summarized in this report and participant information furnished to us by the Plan Sponsor. We have reviewed the employee census provided by the Plan Sponsor for reasonableness when compared to the prior information provided but have not audited the information at the source, and therefore do not accept responsibility for the accuracy or the completeness of the data on which the information is based. When relevant data may be missing, we may have made assumptions we feel are neutral or conservative to the purpose of the measurement. We are not aware of any significant issues with and have relied on the data provided.

The discount rate and other economic assumptions have been selected by the Plan Sponsor. Demographic assumptions have been selected by the Plan Sponsor with the concurrence of Nyhart. In our opinion, the actuarial assumptions are individually reasonable and in combination represent our estimate of anticipated experience of the Plan. All calculations have been made in accordance with generally accepted actuarial principles and practice.

Future actuarial measurements may differ significantly from the current measurements presented in this report due to such factors as the following:

- plan experience differing from that anticipated by the economic or demographic assumptions;
- changes in economic or demographic assumptions;
- increases or decreases expected as part of the natural operation of the methodology used for these measurements (such as the end of an amortization period); and
- changes in plan provisions or applicable law.

We did not perform an analysis of the potential range of future measurements due to the limited scope of our engagement.

To our knowledge, there have been no significant events prior to the current year's measurement date or as of the date of this report that could materially affect the results contained herein.

Neither Nyhart nor any of its employees has any relationship with the plan or its sponsor that could impair or appear to impair the objectivity of this report. Our professional work is in full compliance with the American Academy of Actuaries “Code of Professional Conduct” Precept 7 regarding conflict of interest. The undersigned meet the Qualification Standards of the American Academy of Actuaries to render the actuarial opinion contained herein.

Should you have any questions please do not hesitate to contact us.

Randy Gomez, FSA, MAAA
Consulting Actuary

Evi Laksana, ASA, MAAA
Valuation Actuary

DRAFT

There has been one change to the plan provisions since the last full valuation, which was for the fiscal year ending June 30, 2013. Police officers who were hired on/after July 1, 2013 are only eligible for free individual coverage. They are responsible for the incremental cost difference for additional spousal or dependent coverage. This change caused a slight decrease to the Town's liabilities.

Several actuarial assumptions have been updated since the last valuation:

1. Mortality table for healthy retirees has been updated from (a) RP-2000 Combined Mortality table fully generational using scale AA to (b) RPH-2014 Total Dataset Mortality Table fully generational using Scale MP-2014. Mortality table for disabled retirees has been updated from (a) RP-2000 Combined Mortality Table projected to 2020 using scale AA set forward seven years to (b) RPH-2014 Disabled Retiree Mortality Table fully generational using scale MP-2014. These changes caused a slight decrease in both the Town and School liabilities.
2. Termination and retirement rates for School Certified and Non-Certified employees have been updated to be consistent with those used in the most recent Rhode Island Employees' Retirement System (RI ERS) and Rhode Island Municipal Employees' Retirement System (RI MERS) actuarial valuations as of June 30, 2014. These changes caused a decrease to the School's liabilities.
3. Health Care Trend Rates have been reset as shown in the table below. This change caused an increase in the Town and School liabilities.

FYE	Current Valuation	Prior Valuation
2016	9.0%	8.0%
2017	8.5%	7.5%
2018	8.0%	7.0%
2019	7.5%	6.5%
2020	7.0%	6.0%
2021	6.5%	5.5%
2022	6.0%	5.0%
2023	5.5%	5.0%
2024+	5.0%	5.0%

Summary of Results

Presented below is the summary of GASB 45 results for the fiscal year ending June 30, 2015 compared to the prior fiscal years as shown in the Town's Notes to Financial Statement.

	<i>As of July 1, 2013</i>		<i>As of July 1, 2014</i>	
Actuarial Accrued Liability	\$	15,654,064	\$	15,812,229
Actuarial Value of Assets	\$	(878,343)	\$	(879,051)
Unfunded Actuarial Accrued Liability	\$	14,775,721	\$	14,933,178
Funded Ratio		5.6%		5.6%

	<i>FY 2013/14</i>		<i>FY 2014/15</i>	
Annual Required Contribution	\$	1,384,923	\$	1,343,607
Annual OPEB Cost	\$	1,458,428	\$	1,417,935
Annual Employer Contribution	\$	1,407,376	\$	1,349,652

	<i>As of June 30, 2014</i>		<i>As of June 30, 2015</i>	
Net OPEB Obligation	\$	4,609,491	\$	4,677,774

	<i>As of July 1, 2015</i>	
Total Active Participants		361
Total Retiree Participants		72

The active participants' number above may include active employees who currently have no health care coverage. Refer to Summary of Participants section for an accurate breakdown of active employees with and without coverage.

Below is a breakdown of total GASB 45 liabilities allocated to past, current, and future service as of July 1, 2014 compared to the prior year.

	<i>As of July 1, 2013</i>		<i>As of July 1, 2014</i>	
Present Value of Future Benefits	\$	20,867,373	\$	19,769,619
Active Employees		12,853,576		10,040,202
Retired Employees		8,013,797		9,729,417
Actuarial Accrued Liability	\$	15,654,064	\$	15,812,229
Active Employees		7,640,267		6,082,812
Retired Employees		8,013,797		9,729,417
Normal Cost	\$	479,071	\$	432,015
Future Normal Cost	\$	4,734,238	\$	3,525,375

Present Value of Future Benefits (PVFB) is the amount needed as of July 1, 2013 and 2014 to fully fund the Town’s retiree health care subsidies for existing and future retirees and their dependents assuming all actuarial assumptions are met.

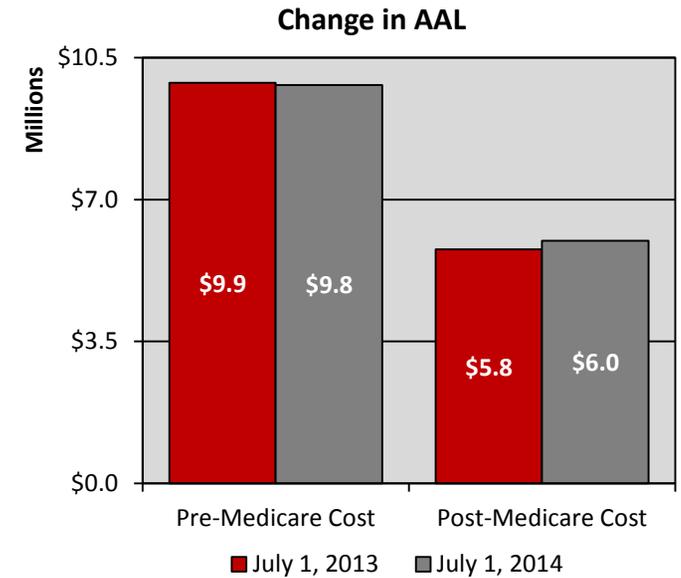
Actuarial Accrued Liability is the portion of PVFB considered to be accrued or earned as of July 1, 2013 and 2014. This amount is a required disclosure in the Required Supplementary Information section.

Normal Cost is the portion of the total liability amount that is attributed and accrued for current year’s active employee service by the actuarial cost method.

Future Normal Cost is the portion of the total liability amount that is attributed to the future employee by the actuarial cost method.

Below is a breakdown of total GASB 45 Actuarial Accrued Liability (AAL) allocated to pre and post Medicare eligibility. The liability shown below includes explicit (if any) and implicit subsidies. Refer to the Substantive Plan Provisions section for complete information on the Plan Sponsor’s GASB subsidies.

Actuarial Accrued Liability (AAL)	As of July 1, 2013		As of July 1, 2014	
Active Pre-Medicare	\$	5,928,160	\$	4,643,055
Active Post-Medicare		1,712,107		1,439,757
Total Active AAL	\$	7,640,267	\$	6,082,812
Retirees Pre-Medicare	\$	3,953,349	\$	5,183,172
Retirees Post-Medicare		4,060,448		4,546,245
Total Retirees AAL	\$	8,013,797	\$	9,729,417
Total AAL	\$	15,654,064	\$	15,812,229

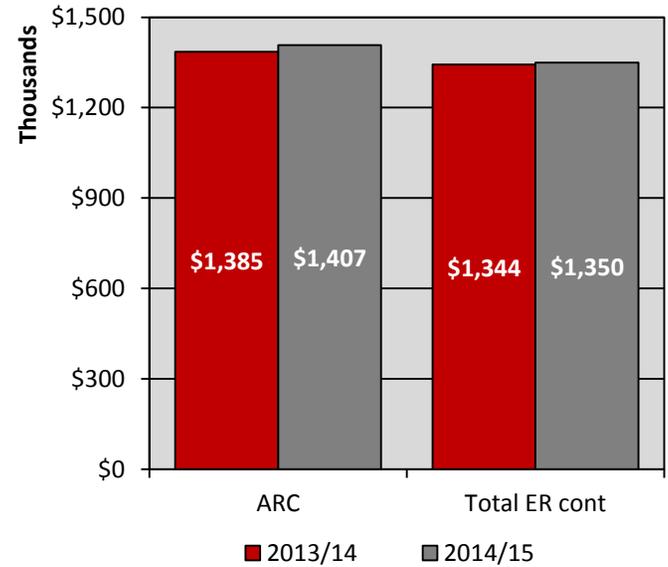


Development of Annual Required Contribution (ARC)

Required Supplementary Information	FY 2013/14	FY 2014/15
Actuarial Accrued Liability as of beginning of year	\$ 15,654,064	\$ 15,812,229
Actuarial Value of Assets as of beginning of year	(878,343)	(879,051)
Unfunded Actuarial Accrued Liability (UAAL)	\$ 14,775,721	\$ 14,933,178
Funded Ratio	5.6%	5.6%
Covered payroll ¹	\$ 30,793,333	\$ 30,610,535
UAAL as a % of covered payroll	48.0%	48.8%

Annual Required Contribution	FY 2013/14	FY 2014/15
Normal cost as of beginning of year	\$ 479,071	\$ 432,015
Amortization of the UAAL	809,229	817,852
Total normal cost and amortization payment	\$ 1,288,300	\$ 1,249,867
Interest to end of year	96,623	93,740
Total Annual Required Contribution (ARC)	\$ 1,384,923	\$ 1,343,607

Cash vs Accrual Accounting



Annual Required Contribution (ARC) is the annual expense recorded in the income statement under GASB 45 accrual accounting. It replaces the cash basis method of accounting recognition with an accrual method. The GASB 45 ARC is higher than the pay-as-you-go cost because it includes recognition of employer costs expected to be paid in future accounting periods.

¹ 2013/14 covered payroll is based on 2012/13 covered payroll increased by the payroll growth assumption (3.5%).

Development of Annual OPEB Cost and Net OPEB Obligation

Net OPEB Obligation		FY 2013/14		FY 2014/15
ARC as of end of year	\$	1,384,923	\$	1,343,607
Interest on Net OPEB Obligation (NOO) to end of year		341,883		345,712
NOO amortization adjustment to the ARC		(268,378)		(271,384)
Annual OPEB cost	\$	1,458,428	\$	1,417,935
Annual employer contribution for pay-go cost		(557,376)		(899,652)
Annual employer contribution for pre-funding		(850,000) ²		(450,000) ³
Change in NOO	\$	51,052	\$	68,283
NOO as of beginning of year		4,558,439		4,609,491
NOO as of end of year	\$	4,609,491	\$	4,677,774

Asset Reconciliation		FY 2013/14		FY 2014/15
Asset as of beginning of year	\$	878,343	\$	879,051
Annual employer contributions for pay-go costs ⁴		0		0
Annual employer trust contributions for pre-funding		0		850,000 ⁵
Benefit Payments		0		0
Investment income net of expenses		708		1,828
Asset as of end of year	\$	879,051	\$	1,730,879

Pay-as-you-go Cost is the expected total employer cash cost for the coming period based on all explicit and implicit subsidies. It is also the amount recognized as expense on the Income Statement under pay-as-you-go accounting.

Net OPEB Obligation is the cumulative difference between the annual OPEB cost and employer contributions. This obligation will be created if cash contributions are less than the current year expense under GASB 45 accrual rules.

The net obligation is recorded as a liability on the employer's balance sheet which will reduce the net fund balance.

The value of implicit subsidies is considered as part of cash contributions for the current period. Other cash expenditures that meet certain conditions are also considered as contributions for GASB 45 purposes.

² The \$850,000 pre-funding contribution has been designated for FY 2013/14 although it will be deposited into the OPEB Trust after the fiscal year ends (June 30, 2014).

³ The \$450,000 pre-funding contribution has been designated for FY 2014/15 although it will be deposited into the OPEB Trust after the fiscal year ends (June 30, 2015).

⁴ Employer contributions for pay-go costs are being paid from the General Fund, not from the OPEB Trust. For FY 2014/15, this amount is estimated.

⁵ There is an employer pre-funding contribution receivable of \$450,000 that will be deposited into the OPEB Trust after the fiscal year ends.

Summary of GASB 45 Financial Results

Presented below is the summary of GASB 45 results for the fiscal year ending June 30, 2015 and prior fiscal years as shown in the Town’s Notes to Financial Statements.

Schedule of Funding Progress

<i>As of</i>	<i>Actuarial Accrued Liability (AAL)</i>	<i>Actuarial Value of Assets (AVA)</i>	<i>Unfunded Actuarial Accrued Liability (UAAL)</i>	<i>Funded Ratio</i>	<i>Covered Payroll</i>	<i>UAAL as % of Covered Payroll</i>
	<i>A</i>	<i>B</i>	<i>C = A - B</i>	<i>D = B / A</i>	<i>E</i>	<i>F = C / E</i>
July 1, 2014	\$ 15,812,229	\$ 879,051	\$ 14,933,178	5.6%	\$ 30,610,535	48.8%
July 1, 2013	\$ 15,654,064	\$ 878,343	\$ 14,775,721	5.6%	\$ 30,793,333	48.0%
July 1, 2012	\$ 15,778,660	\$ 280,005	\$ 15,498,655	1.8%	\$ 29,752,013	52.1%

Schedule of Employer Contributions

<i>FYE</i>	<i>Employer Contributions</i>	<i>Annual Required Contribution (ARC)</i>	<i>% of ARC Contributed</i>
	<i>A</i>	<i>B</i>	<i>C = A / B</i>
June 30, 2015	\$ 1,349,652	\$ 1,343,607	100.4%
June 30, 2014	\$ 1,407,376	\$ 1,384,923	101.6%
June 30, 2013	\$ 1,647,621	\$ 1,430,251	115.2%

Historical Annual OPEB Cost

<i>As of</i>	<i>Annual OPEB Cost</i>	<i>% of Annual OPEB Cost Contributed</i>	<i>Net OPEB Obligation</i>
June 30, 2015	\$ 1,417,935	95.2%	\$ 4,677,774
June 30, 2014	\$ 1,458,428	96.5%	\$ 4,609,491
June 30, 2013	\$ 1,506,039	109.4%	\$ 4,558,439

The Actuarial Accrued Liability (AAL) is expected to change on an annual basis as a result of expected and unexpected events. Under normal circumstances, it is generally expected to have a net increase each year. Below is a list of the most common events affecting the AAL and whether they increase or decrease the liability.

Expected Events

- Increases in AAL due to additional benefit accruals as employees continue to earn service each year
- Increases in AAL due to interest as the employees and retirees age
- Decreases in AAL due to benefit payments

Unexpected Events

- Increases in AAL when actual premium rates increase more than expected. A liability decrease occurs when premium rates increase less than expected.
- Increases in AAL when more new retirements occur than expected or fewer terminations occur than anticipated. Liability decreases occur when the opposite outcomes happen.
- Increases or decreases in AAL depending on whether benefit provisions are improved or reduced.

	FY 2013/14		FY 2014/15 ⁶	
Actuarial Accrued Liability as of beginning of year	\$	15,654,064	\$	15,812,229
Normal cost as of beginning of year		479,071		432,015
Expected benefit payments during the year		(1,046,759)		(899,652)
Interest adjustment to end of year		1,171,441		1,185,190
Expected Actuarial Accrued Liability as of end of year	\$	16,257,817	\$	16,529,782
Actuarial (gain) / loss due to experience		(156,847)		0
Actuarial (gain) / loss due to provisions / assumptions changes		(288,741)		0
Actual Actuarial Accrued Liability as of end of year	\$	15,812,229	\$	16,529,782

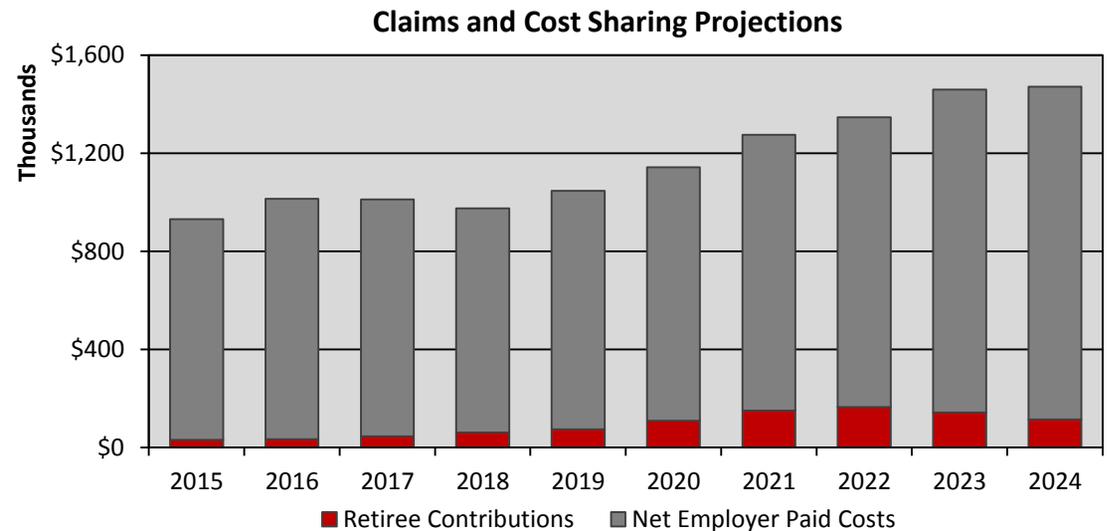
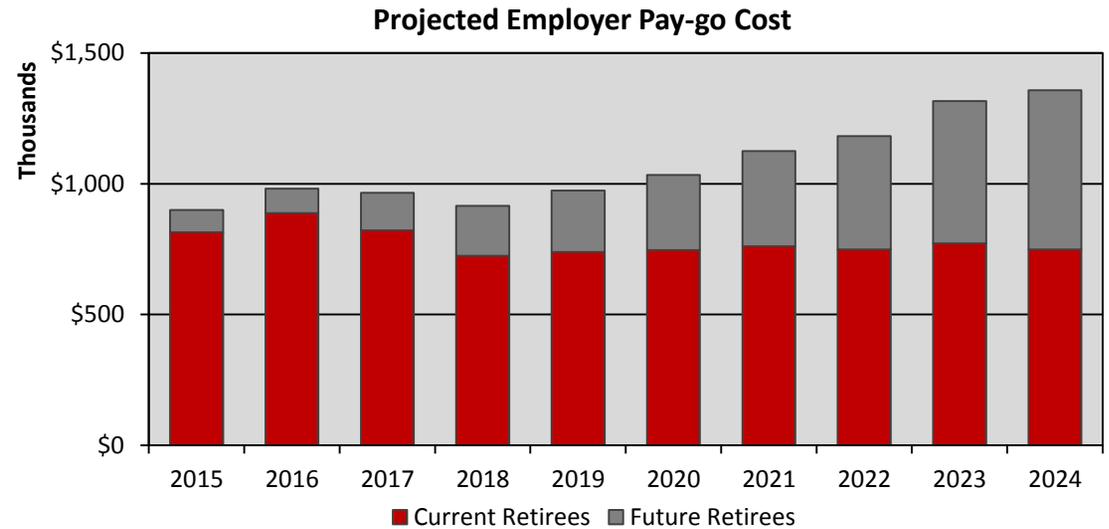
Reconciliation of AAL shows what the actuary expects the actuarial accrued liability to be at the beginning of the following fiscal year based on current assumptions and plan provisions. The expected end of year AAL will change as actual plan experience varies from assumptions. Generally, the AAL is expected to have a net increase each year.

⁶ Actuarial Accrued Liability (AAL) as of beginning of year was actuarially rolled-back from end of year AAL on a “no gain/loss” basis.

The below projections show the actuarially estimated employer-paid contributions for retiree health benefits for the next ten years. Results are shown separately for current /future retirees and gross claim costs/retiree contributions. These projections include explicit and implicit subsidies.

FYE	Current Retirees	Future Retirees ⁷	Total
2015	\$ 813,968	\$ 85,684	\$ 899,652
2016	\$ 887,225	\$ 93,396	\$ 980,621
2017	\$ 822,271	\$ 143,173	\$ 965,444
2018	\$ 724,650	\$ 190,239	\$ 914,889
2019	\$ 738,877	\$ 234,684	\$ 973,561
2020	\$ 746,313	\$ 287,081	\$ 1,033,394
2021	\$ 760,617	\$ 364,539	\$ 1,125,156
2022	\$ 748,429	\$ 433,450	\$ 1,181,879
2023	\$ 772,215	\$ 543,645	\$ 1,315,860
2024	\$ 748,664	\$ 609,137	\$ 1,357,801

FYE	Estimated Claims Costs	Retiree Contributions	Net Employer-Paid Costs
2015	\$ 930,947	\$ 31,294	\$ 899,652
2016	\$ 1,014,732	\$ 34,111	\$ 980,621
2017	\$ 1,011,265	\$ 45,821	\$ 965,444
2018	\$ 975,469	\$ 60,580	\$ 914,889
2019	\$ 1,046,964	\$ 73,403	\$ 973,561
2020	\$ 1,142,222	\$ 108,828	\$ 1,033,394
2021	\$ 1,275,245	\$ 150,089	\$ 1,125,156
2022	\$ 1,346,305	\$ 164,426	\$ 1,181,879
2023	\$ 1,459,221	\$ 143,361	\$ 1,315,860
2024	\$ 1,471,555	\$ 113,754	\$ 1,357,801



⁷ Projections for future retirees do not take into account future new hires.

Eligibility

Town Police Officers	Town police officers are eligible for lifetime retiree health benefits at 20 years of service with mandatory retirement at 25 years of service. There is no age requirement to get retiree health benefits.
Town Employees	Town general employees do not have access to the retiree health benefits other than for temporary COBRA coverage.
School Teachers/Administrators	Certified Teachers and certain Administrators positions are eligible for retiree health benefits until Medicare eligibility once they meet the retirement eligibility requirements of Rhode Island Employees Retirement System (RI ERS).
School Support Staff	Support staff employees are eligible for retiree health benefits temporary to Medicare eligibility once they meet the retirement eligibility requirements of Rhode Island Municipal Employees Retirement System (RI MERS).

RI MERS Eligibility Requirements

Employees eligible to retire as of 7/1/2012 are not impacted by the new eligibility requirements described below. Prior to 7/1/2012, employees were eligible to retire at the earlier of: (i) age 58 with 10 years of service credit or (ii) 30 years of service (no age requirement).

For employees who are not eligible to retire as of 7/1/2012:

- a) Members with less than five years of contributing service credit on 6/30/2012 may retire at their Social Security normal retirement age.
- b) Members with at least five years of contributing service credit on 6/30/2012 may retire at an individually determined age, which is the result of interpolating the member's prior Retirement Date (described in previous paragraph) and the retirement age applicable to members hired after 6/30/2012 (described in item (a) above).
- c) Members with at least ten years of contributing service credit on 6/30/2012 may retire at their prior Retirement Date (described in previous paragraph) if they continue to work and contribute until that date.

All members who are within five years of reaching their retirement eligibility date (described in the paragraphs above) may retire at any time if they have at least 20 years of service.

Effective on 7/1/2015, employees are also eligible to retire upon attainment of age 65 with 30 years of service, age 64 with 31 years of service, age 63 with 32 years of service, or age 62 with at least 33 years of service. These are additional eligibility requirements, which means that if employees are eligible to retire under the current eligibility requirements, they may do so.

RI ERS Eligibility Requirements

RI ERS eligibility requirements is the earlier of each employee’s (a) Article 7 or (b) RIRSA eligibility dates which vary by Schedules summarized below:

Schedules	Vested with 10 years of contributing service credit as of 7/1/2005	Eligible to retire as of 9/30/2009
A	Y	Y*
B	N	Y**
AB	Y	N
B1	N	N
B2	Employees that became a member of RI ERS after 9/30/2009	

* Schedule A members were eligible to retire as of 9/30/2009 if they had (i) 28 years of service as of 9/30/2009 or (ii) had 10 years of contributing service and were age 60 as of 9/30/2009.

** Schedule B members were eligible to retire as of 9/30/2009 if they had 10 years of contributing service and were age 65 as of 9/30/2009.

Article 7 Eligibility Date

There are no changes to Schedule A and Schedule B members retirement eligibility dates. These employees may retire at any time once they met the prior RI ERS eligibility rules. The prior RI ERS eligibility rules are:

- Schedule A – earlier of (i) 28 years of service or (ii) age 60 with 10 years of contributing service.
- Schedule B – earlier of (i) age 65 with 10 years of contributing service or (ii) age 59 with 29 years of contributing service.

Minimum retirement age under Article 7 for Schedule AB and B1 members is 62 with “proportional downward adjustment” toward an earlier retirement age based on years of service as of 9/30/2009 (referred to as “frozen service credit”).

Schedule B2 members minimum retirement age under Article 7 is age 62 without “proportional downward adjustment” toward an earlier retirement age.

RI ERS Eligibility Requirements
(Continued)

RIRSA Eligibility Date

Employees with less than five years of contributing service credit on 6/30/2012 may retire at the Social Security normal retirement age (not higher than 67).

For employees with at least five years of contributing service credit on 6/30/2012, minimum retirement age is 62 with “proportional downward adjustment” toward an earlier retirement date based on years of service prior to 7/1/2012, but not earlier than 59.

Employees with at least 10 years of contributing service credit on 6/30/2012 may retire at their Article 7 eligibility date if they continue to work and contribute until that date. If they are within five years of reaching RIRSA retirement eligibility date and have at least 20 years of service, they may retire at any time.

Effective on 7/1/2015, employees are also eligible to retire upon attainment of age 65 with 30 years of service, age 64 with 31 years of service, age 63 with 32 years of service, or age 62 with at least 33 years of service. These are additional eligibility requirements, which means that if employees are eligible to retire under the current eligibility requirements, they may do so.

Spouse Benefit

Town Police Officers

Upon death of the retiree or active employee (regardless of whether he is eligible to retire or not) the spousal coverage will revert to COBRA.

School Spouses

Upon death of the retiree or active employee (regardless of whether he is eligible to retire or not) the spousal coverage will revert to COBRA.

Retiree Cost Sharing

Retirees are required to contribute the portion of premiums not covered by the Town and School explicit subsidies.

Explicit Subsidy

Town Police Officers

Retired police officers hired prior to July 1, 2013 receive 100% of their premiums, individual or family, paid for by the Town for life. Those hired on/after July 1, 2013 receive 100% of their premiums paid by the Town for life for individual coverage only. Retiree is responsible for the full incremental cost of spouse and dependent coverage. Officers who become disabled in the line of duty are also eligible for the same benefit.

School Teachers/Administrators

The school will pay a percentage of premium for retired teachers and administrators based on years of service at retirement as shown below.

Years of Service at Retirement	% of Premium Paid by the School
0 – 9	Not eligible
10 – 14	0%
15	50%
16	60%
17	70%
18	80%
19	90%
20+	100%

The subsidy percentage applies to individual coverage only. Spouses are allowed on the plan but retiree pays the full incremental cost of spouse and dependent coverage.

Support Staff

None

Life Insurance

Town Police

None

School

Retirees pay the full cost of life insurance coverage

Medical Benefit

Same benefit options are available to retirees as active employees. The health plans are self-insured except for Plan 65 which is fully insured and community-rated. As of July 1, 2008 retired teachers may only choose the Healthmate plan. Some current retired teachers can remain in the Classic plan at retirement.

The 2014/15 monthly premiums by plan effective July 1, 2015 are as shown below.

Town Police	Individual	Family
Healthmate C2C	\$ 617.24	\$ 1,486.93
Classic	\$ 677.54	\$ 1,632.20
Plan 65 with Rx	\$ 495.50	N/A
School	Individual	Family
Teachers – Healthmate C2C	\$ 714.51	\$ 1,763.43
Teachers – Healthmate C2C \$250/\$500	\$ 666.14	\$ 1,644.05
Teachers - Classic	\$ 769.92	\$ 1,900.18
Support – Healthmate C2C	\$ 721.19	\$ 1,779.90
Support – Classic	\$ 777.86	\$ 1,919.75
United	\$ 823.55	\$ 2,031.60

The actuarial assumptions used in this report represent a reasonable long-term expectation of future OPEB outcomes. As national economic and Town and School experience change over time, the assumptions will be tested for ongoing reasonableness and, if necessary, updated.

There are changes to the actuarial methods and assumptions since the last GASB valuation, which was for the fiscal year ending June 30, 2013. Refer to Actuary's Notes section for complete information on these changes. For the current year GASB valuation, we have also updated the per capita costs. We expect to update health care trend rates and per capita costs again in the next full GASB valuation, which will be for the fiscal year ending June 30, 2017.

Measurement Date	June 30, 2015 with results actuarially rolled-back to July 1, 2014 on a "no loss/no gain" basis.
Discount Rate	7.5% fully-funded
Payroll Growth	3.5% per year (used for amortization purposes only)
Inflation Rate	3.0% per year
Cost Method	Projected Unit Credit with linear proration to decrement
Amortization	Level % of pay over thirty years based on an open group
Census Data	Census information was provided by the Town and School as of September 2015. We have reviewed it for reasonableness and no material modifications were made to the census data.
Health Care Coverage Election Rate	<p>Active Town Police Officers: 100%</p> <p>Active School Employees with 10 to 14 years of service and current coverage: 20%</p> <p>Active School Employees with 15 to 16 years of service and current coverage: 80%</p> <p>Active School Employees with 17 to 18 years of service and current coverage: 90%</p> <p>Active School Employees with 19 or more years of service and current coverage: 100%</p> <p>Active School Support Staff with current coverage: 5%</p> <p>Active School Employees with no coverage: 0%</p> <p>Inactive employees with current coverage: 100%</p> <p>Inactive employees with no coverage: 0%</p>
Spousal Coverage	Spousal coverage for current retirees is based on actual data. Town Police Officers are assumed to maintain current coverage levels. Husbands are assumed to be three years older than wives. Actual spousal age is used for current retirees.

Mortality

Healthy Retirees: RPH-2014 Total Dataset Mortality Table fully generational using scale MP-2014
Disabled Retirees: RPH-2014 Disabled Retiree Mortality Table fully generational using scale MP-2014

Disability

Town Police Officers

Sample annual disability rates are as shown below. These rates are consistent with the disability assumption used in the State Police Retirement actuarial valuation for the fiscal year ending June 30, 2014. 75% of disabilities are assumed to be line-of-duty.

Age	Rate
25	0.17%
35	0.29%
45	0.72%
55	1.21%

School Employees

None

Turnover Rate

Assumption used to project terminations (voluntary and involuntary) prior to meeting minimum retirement eligibility under their respective pension plan.

Town Police Officers

None; consistent with the assumption used in the State Police Retirement actuarial valuation for the fiscal year ending June 30, 2014.

School Employees

Sample annual withdrawal rates are as shown below. These rates are consistent with the termination assumption used in the RI ERS and RI MERS actuarial valuations for the fiscal year ending June 30, 2014.

Service	Teachers / Administrators	Support Staff
0	18.0%	17.5%
5	3.8%	6.1%
10	1.9%	2.7%
15	1.2%	1.7%
20	0.9%	1.5%
24	0.8%	0.6%

Retirement Rate

Town Police Officers

Annual rates of retirement are as shown below. These rates are consistent with the retirement assumption used in the State Police Retirement actuarial valuation for the fiscal year ending June 30, 2014.

Service	Rate
20	25.0%
21	15.0%
22	10.0%
23	20.0%
24	30.0%
25	100.0%

School Support Staff

Retirement rates are based on the assumptions used in the RI MERS actuarial valuation report as of June 30, 2014, which is a flat 25% per year retirement probability for members eligible for unreduced retirement. A 50% retirement probability at first eligibility will be applied if they have reached age 65 or with at least 25 years of service.

School Teachers and Administration

Retirement rates are based on the assumptions used in the RI ERS actuarial valuation report as of June 30, 2014, which is a flat 25% per year retirement probability for members eligible for unreduced retirement. A 60% retirement probability at first eligibility will be applied if they have reached age 65 or with at least 25 years of service.

Employer Funding Policy

The Town and School will contribute annually the difference between the Annual Required Contribution and pay-go costs into a qualified trust.

Health Care Trend Rates

FYE	Medical	FYE	Medical
2016	9.0%	2021	6.5%
2017	8.5%	2022	6.0%
2018	8.0%	2023	5.5%
2019	7.5%	2024+	5.0%
2020	7.0%		

The initial trend rate was based on a combination of employer history, national trend surveys, and professional judgment.

The ultimate trend rate was selected based on historical medical CPI information.

Retiree Contributions

Retiree contributions are assumed to increase according to health care trend rates.

Per Capita Costs

The per capita costs represent the cost of coverage for a retiree-only population.

Actuarial standards require the recognition of higher inherent costs for a retired population versus an active population.

Annual per capita costs were calculated based on the Town and School monthly premium rates effective on July 1, 2015 actuarially increased using health index factors and current enrollment. The costs are assumed to increase with health care trend rates. Annual per capita costs by plan are as shown below:

Age	Police Healthmate		Teachers/Admin Healthmate		Support Staff Healthmate	
	Male	Female	Male	Female	Male	Female
50 – 54	\$ 8,000	\$ 9,400	\$ 8,600	\$ 9,100	\$ 8,700	\$ 9,200
55 – 59	\$ 10,800	\$ 10,500	\$ 10,500	\$ 10,200	\$ 10,600	\$ 10,300
60 – 64	\$ 13,800	\$ 12,400	\$ 13,400	\$ 12,100	\$ 13,500	\$ 12,200
65+	\$ 5,946	\$ 5,946	N/A	N/A	N/A	N/A

Employees are assumed to elect at retirement the same plan as their current active health plan. All School retirees are assumed to elect Healthmate plan at retirement.

Explicit Subsidy

The difference between (a) the premium rate and (b) the retiree contribution. Below is an example of the monthly explicit subsidies for a retired police officer under 65 hired on/after July 1, 2013 who is enrolled in the Healthmate C2C plan.

	Premium Rate	Retiree Contribution	Explicit Subsidy
	A	B	C = A – B
Retiree	\$ 617.24	\$ 0.00	\$ 617.24
Spouse	\$ 869.69	\$ 869.69	\$ 0.00

Implicit Subsidy

The difference between (a) the per capita cost and (b) the premium rate. Below is an example of the monthly implicit subsidies for a 60 – 64 male retired police officer with spouse of the same age enrolled in the Healthmate C2C plan.

	Per Capita Cost	Premium Rate	Implicit Subsidy
	A	B	C = A – B
Retiree	\$ 1,150.00	\$ 617.24	\$ 532.76
Spouse	\$ 1,033.33	\$ 869.69	\$ 163.64

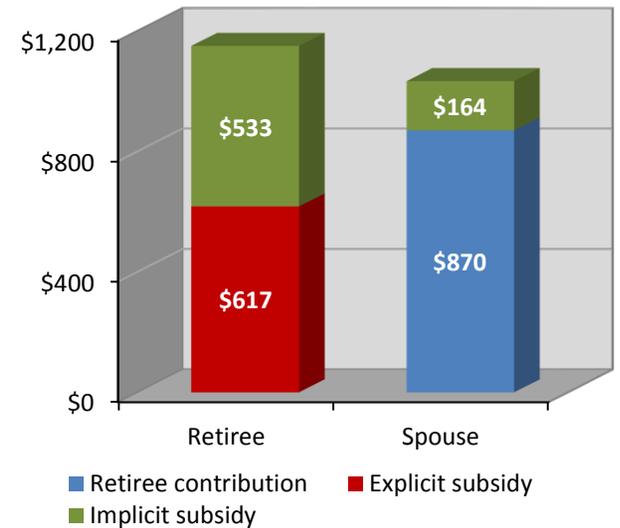
All employers that utilize premium rates based on blended active/retiree claims experience will have an implicit subsidy. There is an exception for Medicare plans using a true community-rated premium rate.

GASB Subsidy Breakdown

Below is a breakdown of the GASB 45 monthly total cost for a male 60 – 64 retired police officer hired on/after July 1, 2013 and his spouse of the same age enrolled in the Healthmate C2C plan.

	Retiree	Spouse
Retiree contribution	\$ 0.00	\$ 869.69
Explicit subsidy	\$ 617.24	\$ 0.00
Implicit subsidy	\$ 532.76	\$ 163.64
Total monthly cost	\$ 1,150.00	\$ 1,033.33

GASB Subsidy Breakdown



Town Police Officers

<i>Actives with coverage</i>	<i>Single</i>	<i>Family</i>	<i>Total</i>	<i>Avg. Age</i>	<i>Avg. Svc</i>	<i>Salary</i>
Healthmate C2C	9	25	34	38.8	10.8	\$ 1,986,101
Total actives with coverage	9	25	34	38.8	10.8	\$ 1,986,101
<hr/>						
Total actives without coverage⁸			1	23.8	0.5	\$ 39,987

<i>Retirees with coverage</i>	<i>Single</i>	<i>Family</i>	<i>Total</i>	<i>Avg. Age</i>
Healthmate C2C	3	30	33	63.1
Total retirees with coverage	3	30	33	63.1

School Employees

<i>Actives with coverage</i>	<i>Single</i>	<i>Family</i>	<i>Total</i>	<i>Avg. Age</i>	<i>Avg. Svc</i>	<i>Salary</i>
Healthmate C2C	62	254	316	48.9	14.6	\$ 22,816,628
Classic	2	1	3	53.9	24.2	\$ 222,407
United		8	8	50.7	13.2	\$ 492,425
Total actives with coverage	64	263	327	49.0	14.7	\$ 23,531,460
<hr/>						
Total actives without coverage			72	46.7	12.9	\$ 5,052,987

<i>Retirees with coverage</i>	<i>Single</i>	<i>Family</i>	<i>Total</i>	<i>Avg. Age</i>
Healthmate C2C	9		9	64.2
Classic	30		30	62.6
Total retirees with coverage	39		39	63.0

⁸ Actives without coverage are assumed not to elect coverage with the Town/School at retirement. They have been excluded from the GASB valuation.

Active Age-Service Distribution

Town Police Officers (including active employees without coverage)

Age	Years of Service										Total	
	< 1	1 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 to 39	40 & up		
Under 25	1	1										2
25 to 29	1	3	1									5
30 to 34	1	2	2	1								6
35 to 39			1	4								5
40 to 44	1			4	3							8
45 to 49		1	1		3	3						8
50 to 54												0
55 to 59							1					1
60 to 64												0
65 to 69												0
70 & up												0
Total	4	7	5	9	6	3	1	0	0	0	0	35

Active Age-Service Distribution

School Employees (including active employees without coverage)

Age	Years of Service										Total
	< 1	1 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 to 39	40 & up	
Under 25	2										2
25 to 29	7	9									16
30 to 34		4	3	9							16
35 to 39	2	1	7	40	5						55
40 to 44	3	6	5	13	25	3					55
45 to 49		10	10	14	12	13	4				63
50 to 54	1	4	10	22	21	9	5	2			74
55 to 59		5	6	13	24	8	8	2	1		67
60 to 64		4	1	7	10	8	6	1			37
65 to 69	1			3	2	4	1				11
70 & up				1	1				1		3
Total	16	43	42	122	100	45	24	5	2	0	399

APPENDIX

Appendix A – GASB Results by Location

Below is the summary of the results for the fiscal year ending June 30, 2015 based on the Projected Unit Credit cost method with a funded discount rate of 7.5%.

Required Supplementary Information	Total		Town		School	
Actuarial Accrued Liability as of beginning of year	\$	15,812,229	\$	13,188,486	\$	2,623,743
Actuarial Value of Assets as of beginning of year		(879,051)		(678,783)		(200,268)
Unfunded Actuarial Accrued Liability (UAAL)	\$	14,933,178	\$	12,509,703	\$	2,423,475
Covered payroll	\$	30,610,535	\$	2,026,088	\$	28,584,447
UAAL as a % of covered payroll		48.8%		617.4%		8.5%
Funded Ratio		5.6%		5.1%		7.6%

Annual Required Contribution	Total		Town		School	
Normal cost as of beginning of year	\$	432,015	\$	369,010	\$	63,005
Amortization of the UAAL		817,852		685,124		132,728
Total normal cost and amortization payment	\$	1,249,867	\$	1,054,134	\$	195,733
Interest to end of year		93,740		79,060		14,680
Total Annual Required Contribution (ARC)	\$	1,343,607	\$	1,133,194	\$	210,413

Appendix B – Comparison of Participant Demographic Information

The active participants' number below may include active employees who currently have no health care coverage. Refer to Summary of Participants section for an accurate breakdown of active employees with and without coverage.

	<i>As of July 1, 2013</i>	<i>As of July 1, 2015</i>
Active Participants	376	361
Town Police	35	34
School Employees	341	327
Inactive Participants	93	72
Town Police	35	33
School Employees	58	39
Average Age for Actives	46.9	48.0
Town Police	38.7	38.8
School Employees	47.7	49.0
Average Service for Actives	12.8	14.3
Town Police	11.4	10.8
School Employees	12.9	14.7
Average Age for Inactives	63.7	63.1
Town Police	66.3	63.1
School Employees	62.1	63.0

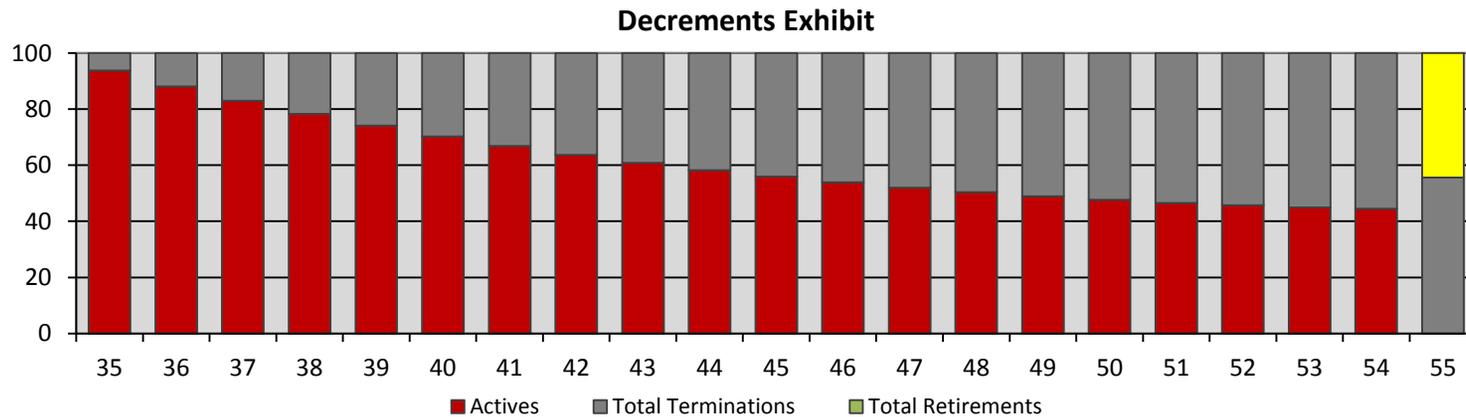
Glossary

Decrements Exhibit

The table below illustrates how actuarial assumptions can affect a long-term projection of future liabilities. Starting with 100 employees at age 35, the illustrated actuarial assumptions show that 44.430 employees out of the original 100 are expected to retire and could elect retiree health benefits at age 55.

Age	# Remaining Employees	# of Terminations per Year*	# of Retirements per Year*	Total Decrements
35	100.000	6.276	0.000	6.276
36	93.724	5.677	0.000	5.677
37	88.047	5.136	0.000	5.136
38	82.911	4.648	0.000	4.648
39	78.262	4.209	0.000	4.209
40	74.053	3.814	0.000	3.814
41	70.239	3.456	0.000	3.456
42	66.783	3.131	0.000	3.131
43	63.652	2.835	0.000	2.835
44	60.817	2.564	0.000	2.564
45	58.253	2.316	0.000	2.316

Age	# Remaining Employees	# of Terminations per Year*	# of Retirements per Year*	Total Decrements
46	55.938	2.085	0.000	2.085
47	53.853	1.866	0.000	1.866
48	51.987	1.656	0.000	1.656
49	50.331	1.452	0.000	1.452
50	48.880	1.253	0.000	1.253
51	47.627	1.060	0.000	1.060
52	46.567	0.877	0.000	0.877
53	45.690	0.707	0.000	0.707
54	44.983	0.553	0.000	0.553
55	44.430	0.000	44.430	44.430

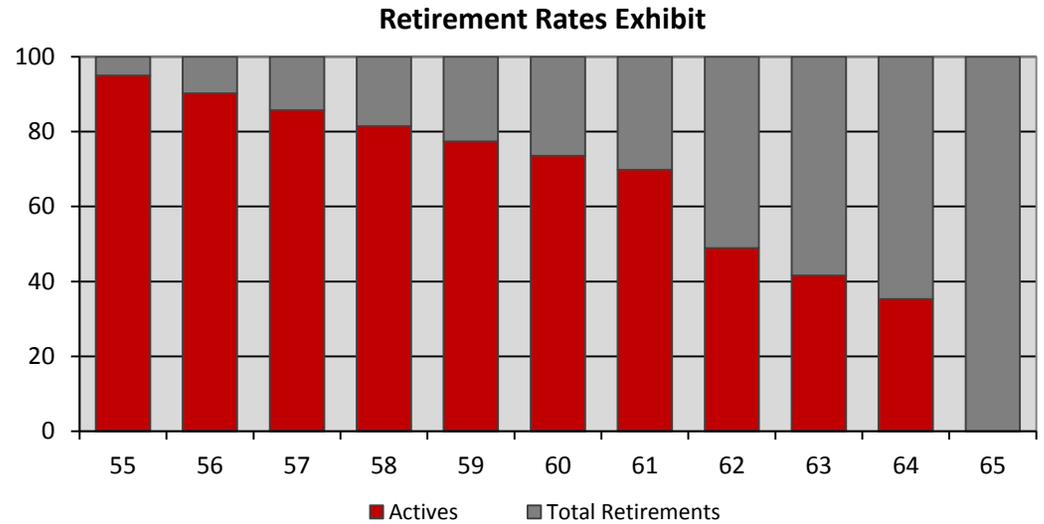


* The above rates are illustrative rates and are not used in our GASB calculations.

Retirement Rates Exhibit

The table below illustrates how actuarial assumptions can affect a long-term projection of future liabilities. The illustrated retirement rates show the number of employees who are assumed to retire annually based on 100 employees age 55 who are eligible for retiree health care coverage. The average age at retirement is 62.0.

Age	Active Employees BOY	Annual Retirement Rates*	# Retirements per Year	Active Employees EOY
55	100.000	5.0%	5.000	95.000
56	95.000	5.0%	4.750	90.250
57	90.250	5.0%	4.513	85.738
58	85.738	5.0%	4.287	81.451
59	81.451	5.0%	4.073	77.378
60	77.378	5.0%	3.869	73.509
61	73.509	5.0%	3.675	69.834
62	69.834	30.0%	20.950	48.884
63	48.884	15.0%	7.333	41.551
64	41.551	15.0%	6.233	35.318
65	35.318	100.0%	35.318	0.000



* The above rates are illustrative rates and are not used in our GASB calculations.

Illustration of GASB Calculations

The purpose of the illustration is to familiarize non-actuaries with the GASB 45 actuarial calculation process.

I. Facts

1. The employer provides subsidized retiree health coverage worth \$100,000 to employees retiring at age 55 with 25 years of service. The employer funds for retiree health coverage on a pay-as-you-go basis.
2. Employee X is age 50 and has worked 20 years with the employer.
3. Retiree health subsidies are paid from the general fund assets which are expected to earn 4.5% per year on a long-term basis.
4. Based on Employee X's age and sex he has a 98.0% probability of living to age 55 and a 95.0% probability of continuing to work to age 55.

II. Calculation of Present Value of Future Benefits

Present Value of Future Benefits represents the cost to finance benefits payable in the future to current and future retirees and beneficiaries, discounted to reflect the expected effects of the time value (present value) of money and the probabilities of payment.

	Value	Description
A.	\$100,000	Projected benefit at retirement
B.	80.2%	Interest discount for five years = $(1 / 1.045)^5$
C.	98.0%	Probability of living to retirement age
D.	95.0%	Probability of continuing to work to retirement age
E.	\$74,666	Present value of projected retirement benefit measured at employee's current age = A x B x C x D

Illustration of GASB Calculations (continued)

III. Calculation of Actuarial Accrued Liability

Actuarial Accrued Liability represents the portion of the Present Value of Future Benefits which has been accrued recognizing the employee's past service with the employer. The Actuarial Accrued Liability is a required disclosure in the Required Supplementary Information section of the employer's financial statement.

	Value	Description
A.	\$74,666	Present value of projected retirement benefit measured at employee's current age
B.	20	Current years of service with employer
C.	25	Projected years of service with employer at retirement
D.	\$59,733	Actuarial accrued liability measured at employee's current age = $A \times B / C$

IV. Calculation of Normal Cost

Normal Cost represents the portion of the Present Value of Future Benefits allocated to the current year.

	Value	Description
A.	\$74,666	Present value of projected retirement benefit measured at employee's current age
B.	25	Projected years of service with employer at retirement
C.	\$2,987	Normal cost measured at employee's current age = A / B

V. Calculation of Annual Required Contribution

Annual Required Contribution is the total expense for the current year to be shown in the employer's income statement.

	Value	Description
A.	\$2,987	Normal Cost for the current year
B.	\$3,509	30-year amortization (level dollar method) of Unfunded Actuarial Accrued Liability using a 4.5% interest rate discount factor
C.	\$292	Interest adjustment = $4.5\% \times (A + B)$
D.	\$6,788	Annual Required Contribution = $A + B + C$

Definitions

GASB 45 defines several unique terms not commonly employed in the funding of pension and retiree health plans. The definitions of the terms used in the GASB actuarial valuations are noted below.

1. **Actuarial Accrued Liability** – That portion, as determined by a particular Actuarial Cost Method, of the Actuarial Present Value of plan benefits and expenses which is not provided for by the future Normal Costs.
2. **Actuarial Assumptions** – Assumptions as to the occurrence of future events affecting health care costs, such as: mortality, withdrawal, disablement and retirement; changes in compensation and Government provided health care benefits; rates of investment earnings and asset appreciation or depreciation; procedures used to determine the Actuarial Value of Assets; characteristics of future entrants for Open Group Actuarial Cost Methods; and other relevant items.
3. **Actuarial Cost Method** – A procedure for determining the Actuarial Present Value of future benefits and expenses and for developing an actuarially equivalent allocation of such value to time periods, usually in the form of a Normal Cost and an Actuarial Accrued Liability.
4. **Actuarial Present Value** – The value of an amount or series of amounts payable or receivable at various times, determined as of a given date by the application of a particular set of Actuarial Assumptions. For purposes of this standard, each such amount or series of amounts is:
 - a) adjusted for the probable financial effect of certain intervening events (such as changes in compensation levels, Social Security, marital status, etc.);
 - b) multiplied by the probability of the occurrence of an event (such as survival, death, disability, termination of employment, etc.) on which the payment is conditioned; and
 - c) discounted according to an assumed rate (or rates) of return to reflect the time value of money.
5. **Annual OPEB Cost** – An accrual-basis measure of the periodic cost of an employer’s participation in a defined benefit OPEB plan.
6. **Annual Required Contribution (ARC)** – The employer’s periodic required contributions to a defined benefit OPEB plan, calculated in accordance with the parameters.
7. **Explicit Subsidy** – The difference between (a) the amounts required to be contributed by the retirees based on the premium rates and (b) actual cash contribution made by the employer.
8. **Funded Ratio** – The actuarial value of assets expressed as a percentage of the actuarial accrued liability.
9. **Healthcare Cost Trend Rate** – The rate of change in the per capita health claims costs over time as a result of factors such as medical inflation, utilization of healthcare services, plan design, and technological developments.

Definitions (continued)

10. **Implicit Subsidy** – In an experience-rated healthcare plan that includes both active employees and retirees with blended premium rates for all plan members, the difference between (a) the age-adjusted premiums approximating claim costs for retirees in the group (which, because of the effect of age on claim costs, generally will be higher than the blended premium rates for all group members) and (b) the amounts required to be contributed by the retirees.
11. **Net OPEB Obligation** – The cumulative difference since the effective date of this Statement between annual OPEB cost and the employer’s contributions to the plan, including the OPEB liability (asset) at transition, if any, and excluding (a) short-term differences and (b) unpaid contributions that have been converted to OPEB-related debt.
12. **Normal Cost** – The portion of the Actuarial Present Value of plan benefits and expenses which is allocated to a valuation year by the Actuarial Cost Method.
13. **Pay-as-you-go** – A method of financing a benefit plan under which the contributions to the plan are generally made at about the same time and in about the same amount as benefit payments and expenses becoming due.
14. **Per Capita Costs** – The current cost of providing postretirement health care benefits for one year at each age from the youngest age to the oldest age at which plan participants are expected to receive benefits under the plan.
15. **Present Value of Future Benefits** – Total projected benefits include all benefits estimated to be payable to plan members (retirees and beneficiaries, terminated employees entitled to benefits but not yet receiving them, and current active members) as a result of their service through the valuation date and their expected future service. The actuarial present value of total projected benefits as of the valuation date is the present value of the cost to finance benefits payable in the future, discounted to reflect the expected effects of the time value (present value) of money and the probabilities of payment. Expressed another way, it is the amount that would have to be invested on the valuation date so that the amount invested plus investment earnings will provide sufficient assets to pay total projected benefits when due.
16. **Select and Ultimate Rates** – Actuarial assumptions that contemplate different rates for successive years. Instead of a single assumed rate with respect to, for example, the investment return assumption, the actuary may apply different rates for the early years of a projection and a single rate for all subsequent years. For example, if an actuary applies an assumed investment return of 8% for year 20W0, then 7.5% for 20W1, and 7% for 20W2 and thereafter, then 8% and 7.5% select rates, and 7% is the ultimate rate.
17. **Substantive Plan** – The terms of an OPEB plan as understood by the employer(s) and plan members.