

Town of North Attleborough Other Postemployment Benefits Plan

GASB 74 & GASB 75 Actuarial Valuation

With a Valuation Date of July 1, 2019

As of the Measurement Date:
June 30, 2020

For the Reporting Date:
June 30, 2020

Delivered November 20, 2020



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November 20, 2020

Personal and Confidential

Ms. Linda Catanzariti
Town Accountant
Town of North Attleborough
43 S. Washington Street
North Attleboro, MA 02760

Dear Ms. Catanzariti:

We have performed an actuarial valuation of the Town of North Attleborough Other Postemployment Benefits Plan for the Reporting Date & fiscal year ending June 30, 2020 with a Measurement Date of June 30, 2020 and a Valuation Date of July 1, 2019. The figures presented in this report reflect the adoption, by the Town of North Attleborough, of Statement Nos. 74 and 75 of the Governmental Accounting Standards Board ("GASB 74/75") effective for the fiscal years ending June 30, 2017 and June 30, 2018 respectively.

The financial results of the actuarial valuation are summarized in the report. The Executive Summaries highlight the results of the valuation. Additional information summarizing census data, actuarial assumptions, claim rates and the methodology for developing them, as well as a glossary of selected terms used in this study, is also included in the report.

All costs, liabilities and other factors under the plan were determined in accordance with generally accepted actuarial principles and procedures. In our opinion, the actuarial assumptions used are reasonable, reflecting the experience of the plan and reasonable expectations and, in combination, represent our best estimate of the anticipated experience under the plan.

We will be pleased to answer any questions that you may have regarding this actuarial valuation report.

Very truly yours,

A handwritten signature in black ink, appearing to read 'P. Elmore', written over a light blue horizontal line.

Parker E. Elmore, ASA, EA, FCA, MAAA
President, CEO & Actuary

November 20, 2020

ACTUARIAL CERTIFICATION

This is to certify that Odyssey Advisors has conducted an actuarial valuation of certain benefit obligations of the Town of North Attleborough other postemployment benefit programs with a Valuation Date of July 1, 2019 with a Measurement Date of June 30, 2020 for the Reporting Date & fiscal year ending June 30, 2020 in accordance with Government Account Standards Board Statement No. 74 & 75 and Actuarial Standards of Practice as issued by the American Academy of Actuaries. The actuarial calculations presented in this report have been made on a basis consistent with our understanding of GASB Statements Numbers 74 & 75 for the determination of the liability for postemployment benefits other than pensions.

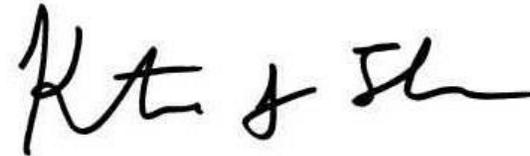
The actuarial data is based on the plan of benefits verified by the Town and on participant claims or premium data provided by the Town and/or vendors employed by the Town.

The actuarial computations made are for purposes of fulfilling plan accounting requirements. Determinations for purposes other than meeting financial accounting requirements may yield results significantly different than those reported here. As such, additional determinations may be needed for other purposes including determining the benefit security at termination and/or adequacy of the funding of an ongoing plan.

To the best of our knowledge, this report is complete and accurate and in our opinion represents the information necessary to comply with GASB Statements Number 74 and 75 with respect to the benefit obligations addressed. The signing actuaries are members of the Society of Actuaries, the American Academy of Actuaries and other professional actuarial organizations and meet their "General Qualification Standards for Statements of Actuarial Opinion" to render the actuarial opinion contained herein. Further, in our opinion, the assumptions as approved by the Town are reasonably related to the experience and expectations of the postemployment benefits programs.



Parker E. Elmore, ASA, EA, FCA, MAAA
President, CEO & Actuary



Kurtis J. Thompson, ASA, MAAA
Consulting Actuary

EXECUTIVE SUMMARY

How did plan liabilities change from FY 19 to FY 20?

Plan Experience

For the year ending on the Measurement Date of June 30, 2020, experience was largely in line with expectation, with an experience gain of \$540,236 or 0.41% of the beginning Total OPEB Liability ("TOL").

Assumption Changes

Some key assumptions have changed since the prior valuation - their impact is detailed below.

- ✓ Due to the GASB 75 standards the discount rate has been changed from 5.00% to 5.50% decreasing the disclosed liability by \$9.6 million.
- ✓ Based on recommendations by PERAC, the mortality table has been updated from the RP-2000 Employees Mortality Table projected generationally with scale BB and a base year 2009 to the RP-2014 Mortality Table projected generationally with scale MP-2016 for males and females increasing the disclosed liability by \$8.4 million.
- ✓ The expected long-term medical trend has been updated to 4.50% decreasing the disclosed liability by \$12.0 million.
- ✓ Based on recent research by the Society of Actuaries, we have updated the assumption for morbidity or age-related costs of medical care increasing the disclosed liability by \$21.0 million.
- ✓ Assumption changes caused Service Cost to decrease by \$390 thousand.

It is important to remember that actuarial assumptions or changes in such do not impact the actual cost of the Plan. Rather, they impact the timing of the recognition of such costs.

Investment Experience

- ✓ During the period there was an investment loss of \$153,959 due to asset performance below the expected rate of return.

Changes in Benefits Terms

- ✓ To the best of our knowledge there have been no material changes in benefit terms that would impact the figures shown in this report.

EXECUTIVE SUMMARY

Recognition Period

- ✓ Changes in assumptions & plan experience are amortized into the net OPEB expense over 5.83 years.
- ✓ Differences between projected & actual earnings on OPEB plan investments are amortized into the net OPEB expense over 5.00 years
- ✓ Changes in benefit terms are to be recognized in full immediately

Events Subsequent to the Measurement Date

To the best of our knowledge there were no material events subsequent to the Measurement Date that would impact the figures shown in this report.

Discount Rate Determinants

- ✓ Employer Current and Future Benefit Payments
- ✓ Municipal Bond Rate – The municipal bond rate was 2.66% as of June 30, 2020.
- ✓ Current Asset Level – The Town had \$3,542,041 of OPEB assets as of June 30, 2020.
- ✓ Funding Policy - The Town contributed \$754,249 in Fiscal 2020, this amount will increase according to the Town's funding policy statement until their pension system is fully funded at which point \$3,000,000 of pension amortization payments are expected to be reallocated towards OPEB. For the purposes of this valuation, we expect these amortization payments to be reallocated towards OPEB beginning in Fiscal 2035.
- ✓ Investment Policy - The Town is expected to earn 7.00% on assets based on its investment policy.

EXECUTIVE SUMMARY

Key Drivers of Plan Liabilities

Several key drivers of plan costs and liabilities are:

- ✓ Premiums for Post 65 (Medicare supplement) plans - represent 71.71% of the total plan liabilities
- ✓ Age at which plan participants retire
- ✓ Percentage of plan participants who elect coverage for themselves and/or a spouse
- ✓ Medical care cost inflation rate - We currently assume medical costs increase at 4.50% per year for Active plans and 4.50% per year for Medicare supplement plans.
- ✓ Discount Rate (5.50%) – Higher discount rates yield lower liabilities and vice versa
- ✓ Cost Sharing - Under Massachusetts law you may charge retirees up to 50% of premiums for health insurance

Medicare Buy-In

Recently, some of our clients have seen substantial cost savings by “buying into” Medicare for retirees who would otherwise be ineligible. To buy into Medicare the Town would need to pay the Medicare Part A premium and the Medicare Part A and B penalties. While the cost to buy into Medicare is significant, it is likely still far less than the cost of the claims that the associated retirees are expected to incur. Under Actuarial Standards of Practice for OPEB, we are required to reflect the projected higher healthcare costs that occur as retirees age. The Town currently has 37 retirees or covered spouses who are over the age of 65 and are enrolled in Active medical plans rather than Medicare Supplement (Senior) plans. You may wish to review their Medicare eligibility to see if they are already eligible for Medicare or if a “buy-in” is appropriate as this could yield a reduction in your OPEB annual costs and disclosed liabilities. If you are in this situation, we encourage you to talk to your healthcare consultant to see if this might be viable.

EXECUTIVE SUMMARY

Key Plan Metrics

While an actuarial valuation under GASB 74/75 can be very complex with many variables, we find it helpful to look at several key metrics (shown below) to better allow you to manage your plan.

Representative Plan Statistics		
Valuation Date	July 1, 2019	July 1, 2017
Measurement Date & Period Ending	June 30, 2020	June 30, 2019
Reporting Date/Fiscal Year End	June 30, 2020	June 30, 2019
Total OPEB Liability	145,096,220	132,776,940
Per Eligible Active Plan Participant	79,321	83,486
Per Retiree/Spouse Plan Participant	99,558	87,504
Total Annual Service Cost (Annual Benefit Accrual)	3,297,628	3,566,214
Per Eligible Active Plan Participant	3,592	4,240
Expected Employer Share of Retiree Costs	5,214,055	4,192,259
Per Retiree/Spouse Plan Participant	7,182	5,863
Net OPEB Liability as a % of Covered Payroll	N/A	215.00%

EXECUTIVE SUMMARY

Liabilities & Benefit Payments in Today's Dollars

With the growth of medical care costs over time, the nominal accrued liabilities ("TOL") and benefit payments can appear daunting. However, it is important to remember that a dollar paid in the future is worth less than a dollar paid today.

For the Period Ending on the Measurement Date of:	Number of Retirees, Spouses, & Surviving Spouses	Total OPEB Liability	Present Value at 3.00% of Total OPEB Liability	Employer Share of Premiums/Claims Including "Implicit Cost"	Present Value at 3.00% of Employer Share of Premiums / Claims Including "Implicit Cost"
June 30, 2020	726	145,096,220	145,096,220	5,214,055	5,214,055
June 30, 2025	915	173,227,535	149,427,593	7,224,698	6,232,088
June 30, 2030	989	202,345,281	150,563,892	9,420,646	7,009,845
June 30, 2035	1,018	232,305,006	149,107,744	11,369,681	7,297,766
June 30, 2040	998	267,270,345	147,981,110	12,795,126	7,084,351
June 30, 2045	970	310,339,210	148,219,735	14,619,769	6,982,483
June 30, 2050	942	367,200,617	151,281,792	16,526,509	6,808,703

PRINCIPAL RESULTS OF THE VALUATION
Town of North Attleborough
Assuming Funding - 5.50% discount rate
Comparison of Plan Liabilities to Prior Valuation

Valuation Date	July 1, 2019	July 1, 2017
For the Measurement Period ending on the Measurement Date of:	June 30, 2020	June 30, 2019
For the Reporting Period & Fiscal Year ending on:	June 30, 2020	June 30, 2019
I. Total OPEB Liability		
A. Actives	72,816,961	70,211,898
B. Retirees/Disabled	<u>72,279,259</u>	<u>62,565,042</u>
C. Total	145,096,220	132,776,940
II. Fiduciary Net Position [Plan Assets]	3,542,041	2,725,046
III. Net OPEB Liability (Asset) [I. - II.]	141,554,179	130,051,894
IV. Funded Ratio [II. / I.]	2.44%	2.05%
V. Number of Eligible Participants		
A. Actives	918	841
B. Retirees/Disabled & Dependents	<u>726</u>	<u>715</u>
C. Total	1,644	1,556
VI. Service Cost	3,297,628	3,566,214
VII. Financial Statement Expense	15,226,805	14,247,076
VIII. Employer Contribution to the OPEB Trust	(754,249)	(598,674)
IX. Deferred Inflow of Resources	(543,053)	(138,921)
X. Deferred Outflow of Resources	19,165,521	16,517,605
XI. Money Weighted Rate of Return	1.91%	5.94%
XII. 20-year Municipal Bond Rate (SAPIHG)	2.66%	2.79%
XIII. Expected Long Term Rate of Return (Net of Expense)	7.00%	7.05%
XIV. Crossover Year	N/A	Immediate
XV. Discount Rate	5.50%	5.00%

PRINCIPAL RESULTS OF THE VALUATION

Town of North Attleborough Plan Liabilities as of the June 30, 2020 Measurement Date

	General Government Employees and Retirees	Teacher Employees and Retirees	School Non-Teacher Employees and Retirees	Police Employees and Retirees	Fire Employees and Retirees	Solid Waste Enterprise Employees and Retirees	Sewer Enterprise Employees and Retirees	Water Enterprise Employees and Retirees	Total
I. Total OPEB Liability									
A. Actives	6,438,296	34,017,017	16,576,507	6,783,636	6,358,046	341,693	722,391	1,579,375	72,816,961
B. Retirees/Disabled	11,802,788	41,247,584	10,656,000	1,977,419	5,409,858	204,445	981,165	0	72,279,259
C. Total	18,241,084	75,264,601	27,232,507	8,761,055	11,767,904	546,138	1,703,556	1,579,375	145,096,220
II. Fiduciary Net Position [Plan Assets]	160,928	664,006	240,253	77,293	103,820	298,711	1,042,853	954,177	3,542,041
III. Net OPEB Liability (Asset) [I. - II.]	18,080,156	74,600,595	26,992,254	8,683,762	11,664,084	247,427	660,703	625,198	141,554,179
IV. Number of Eligible Participants									
A. Actives	115	325	315	66	58	8	14	17	918
B. Retirees/Disabled	167	332	162	27	36	1	1	0	726
C. Total	282	657	477	93	94	9	15	17	1,644
For the Reporting Date and Fiscal Year Ending June 30, 2020									
V. Service Cost	296,536	1,379,491	890,132	323,196	285,976	24,960	50,798	46,539	3,297,628
VI. Financial Statement Expense	1,801,816	7,610,576	3,167,804	1,060,509	1,267,930	54,338	136,626	127,206	15,226,805
VII. Employer Share of Costs	(840,506)	(2,949,839)	(890,275)	(172,370)	(284,251)	(31,977)	(32,203)	(12,634)	(5,214,055)
VIII. Employer (Payments)/Withdrawals to/from OPEB Trust	(60,231)	(205,788)	(76,134)	(24,940)	(32,907)	(45,510)	(162,150)	(146,589)	(754,249)
IX. Total Employer Contribution [VII. + VIII.]	(900,737)	(3,155,627)	(966,409)	(197,310)	(317,158)	(77,487)	(194,353)	(159,223)	(5,968,304)

PRINCIPAL RESULTS OF THE VALUATION

Town of North Attleborough
Assuming Funding - 5.50% discount rate
For the Period Ending on the June 30, 2020 Measurement Date

	Actives			Retirees/Disabled			Grand Total
	Under Age 65	Age 65+	Actives Total	Under Age 65	Age 65 +	Retirees Total	
Present Value of Future Benefits							
A. Participants	26,804,577	36,170,631	62,975,208	6,620,142	48,788,734	55,408,876	118,384,084
B. Spouses	<u>16,914,959</u>	<u>24,914,993</u>	<u>41,829,952</u>	<u>3,998,522</u>	<u>12,871,861</u>	<u>16,870,383</u>	<u>58,700,335</u>
C. Total	43,719,536	61,085,624	104,805,160	10,618,664	61,660,595	72,279,259	177,084,419
Total OPEB Liability							
A. Participants	18,604,774	25,079,712	43,684,486	6,620,142	48,788,734	55,408,876	99,093,362
B. Spouses	<u>11,828,268</u>	<u>17,304,207</u>	<u>29,132,475</u>	<u>3,998,522</u>	<u>12,871,861</u>	<u>16,870,383</u>	<u>46,002,858</u>
C. Total	30,433,042	42,383,919	72,816,961	10,618,664	61,660,595	72,279,259	145,096,220
Service Cost							
A. Participants	784,324	1,206,976	1,991,300	0	0	0	1,991,300
B. Spouses	<u>482,736</u>	<u>823,592</u>	<u>1,306,328</u>	<u>0</u>	<u>0</u>	<u>0</u>	<u>1,306,328</u>
C. Total	1,267,060	2,030,568	3,297,628	0	0	0	3,297,628

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
(As of the June 30, 2020 Measurement Date)

The GASB Standards for accounting and financial reporting for postemployment benefits other than pensions require the following disclosures in the financial statements:

1. OPEB Expense Development

Components of the Town's OPEB Expenses for the Fiscal Year Ending June 30, 2020	
Description	Amount
I. Service Cost	3,297,628
II. Interest on Total OPEB Liability (Asset), Service Cost, and Benefit Payments	6,674,967
III. Deferred (Inflows)/Outflows from Plan Experience*	(135,673)
IV. Deferred (Inflows)/Outflows from Changes of Assumptions*	5,569,915
V. Projected Earnings on OPEB Plan Investments	(216,705)
VI. Deferred (Inflows)/Outflows from Earnings on Plan Investments**	36,673
VII. Financial Statement Expense Prior to Plan Design Changes [I. + II.+ III. + IV. + V. + VI.]	15,226,805
VIII. Expense Related to Change in Benefit Terms***	0
IX. Financial Statement Expense [VII. + VIII.]	15,226,805

* Amortized over 5.83 years

** Amortized over 5.00 years

*** Recognized Immediately

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
(As of the June 30, 2020 Measurement Date)

2. Changes in Net OPEB Liability

Changes in Net OPEB Liability				
		Increase (Decrease)		
		Total OPEB	Plan Fiduciary	Net OPEB
		Liability	Net Position	Liability
I.	Balances for June 30, 2019	132,776,940	2,725,046	130,051,894
II.	Prior Period Adjustment	0	0	0
III.	Balances for June 30, 2019 with Adjustment [I. + II.]	132,776,940	2,725,046	130,051,894
Changes for the year:				
IV.	Service Cost	3,297,628	0	3,297,628
V.	Interest on Total OPEB Liability, Service Cost, and Benefit Payments	6,674,967	0	6,674,967
VI.	Changes in Benefit Terms *	0	0	0
VII.	Change in Assumptions **	8,100,976	0	8,100,976
VIII.	Differences Between Actual and Expected Experience **	(540,236)	0	(540,236)
IX.	Net Investment Income	0	62,746	(62,746)
X.	Employer Contributions to Trust	0	5,968,304	(5,968,304)
XI.	Benefit Payments Withdrawn from Trust	0	(5,214,055)	5,214,055
XII.	Benefit Payments Excluding Implicit Cost	(4,032,184)	0	(4,032,184)
XIII.	Implicit Cost Amount	(1,181,871)	0	(1,181,871)
XIV.	Total Benefit Payments Including Implicit Cost [XII. + XIII.]	(5,214,055)	0	(5,214,055)
XV.	Administrative Expense	0	0	0
XVI.	Other Charges	0	0	0
XVII.	Net Changes [IV.+V.+VI.+VII.+VIII.+IX.+X.+XI.+XIV.+XV.+XVI.]	12,319,280	816,995	11,502,285
XVIII.	Balances at June 30, 2020 [III.+XVII.]	145,096,220	3,542,041	141,554,179

* Recognized Immediately

** Amortized over 5.83 years

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
(As of the June 30, 2020 Measurement Date)

3. Changes in Net OPEB Expense

Deferred (Inflows)/Outflows in OPEB Expense Arising from the Recognition of the Effects of Differences Between Expected & Actual Experience									
Fiscal	Differences Between			2020	2021	2022	2023	2024	2025
	Actual & Expected Experience	Recognition Period (Years)	Remaining Balance						
2017									
2018	(223,646)	5.20	(94,619)	(43,009)	(43,009)	(43,009)	(8,601)		
2019	0	5.20	0	0	0	0	0	0	
2020	(540,236)	5.83	(447,572)	(92,664)	(92,664)	(92,664)	(92,664)	(92,664)	(76,916)
2021									
2022									
2023									
2024									
2025									
2026									
Total Remaining Balance			(542,191)						
Net increase (decrease) in OPEB Expense				(135,673)	(135,673)	(135,673)	(101,265)	(92,664)	(76,916)

Deferred (Inflows)/Outflows in OPEB Expense Arising from the Recognition of the Effects of Changes in Assumptions									
Fiscal	Differences from			2020	2021	2022	2023	2024	2025
	Changes in Actuarial Assumptions	Recognition Period (years)	Remaining Balance						
2017									
2018	5,539,349	5.20	2,343,572	1,065,259	1,065,259	1,065,259	213,054		
2019	16,198,648	5.20	9,968,400	3,115,124	3,115,124	3,115,124	3,115,124	623,028	
2020	8,100,976	5.83	6,711,444	1,389,532	1,389,532	1,389,532	1,389,532	1,389,532	1,153,316
2021									
2022									
2023									
2024									
2025									
2026									
Total Remaining Balance			19,023,416						
Net increase (decrease) in OPEB Expense				5,569,915	5,569,915	5,569,915	4,717,710	2,012,560	1,153,316

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
 (As of the June 30, 2020 Measurement Date)

3. Changes in Net OPEB Expense (Continued)

Deferred (Inflows)/Outflows in OPEB Expense Arising from the Recognition of Differences Between Projected & Actual Earnings on OPEB Plan Investments									
Fiscal	Differences Between			2020	2021	2022	2023	2024	2025
	Actual & Expected Earnings	Recognition Period (years)	Remaining Balance						
2017									
2018	(2,155)	5.00	(862)	(431)	(431)	(431)			
2019	31,562	5.00	18,938	6,312	6,312	6,312	6,314		
2020	153,959	5.00	123,167	30,792	30,792	30,792	30,792	30,791	
2021									
2022									
2023									
2024									
2025									
2026									
Total Remaining Balance			141,243						
Net increase (decrease) in OPEB Expense				36,673	36,673	36,673	37,106	30,791	0

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
 (As of the June 30, 2020 Measurement Date)

3. Changes in Net OPEB Expense (Continued)

Statement of Outflows & Inflows Arising from Current & Prior Reporting Periods for the Measurement Period Ending on June 30, 2020 to be Reported for the Fiscal Year Ending June 30, 2020			
	Deferred Outflows of Resources	Deferred Inflows of Resources	Total
I. Contributions made subsequent to the Measurement Date	0	0	0
II. Differences Between Actual & Expected Experience	0	(542,191)	(542,191)
III. Changes of Assumptions	19,023,416	0	19,023,416
IV. Net Difference Between Projected & Actual Earnings on OPEB Plan Investments	<u>142,105</u>	<u>(862)</u>	<u>141,243</u>
V. Total [I.+II.+III.+IV.]	19,165,521	(543,053)	18,622,468

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
(As of the June 30, 2020 Measurement Date)

3. Changes in Net OPEB Expense (Continued)

Annual Amortization of Deferred (Inflows)/Outflows

The balance of deferred (inflows)/outflows as of June 30, 2020 will be recognized in future years as shown below.

Year ending June 30:	
2021	5,470,915
2022	5,470,915
2023	4,653,551
2024	1,950,687
2025	1,076,400
Thereafter	0

4. Discount Rate

The discount rate used to measure the Total OPEB liability was 5.50% as of June 30, 2020 and 5.00% as of June 30, 2019. The projection of cash flows used to determine the discount rate assumed that contributions will be made in accordance with the Town's funding policy. Based on these assumptions, the OPEB Plan's Fiduciary Net Position is projected to be sufficient to make all projected benefit payments to current plan members. Therefore, the long-term expected rate of return on the OPEB Plan assets was applied to all projected future benefits payments.

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES

(As of the June 30, 2020 Measurement Date)

5. Funding Policy

The contribution requirements of plan members and the Town are established and may be amended through Town ordinances. For the period ending on the June 30, 2020 Measurement Date, total Town premiums plus implicit costs for the retiree medical program were \$5,214,055. The Town also contributed \$754,249 to an OPEB Trust for a total contribution during the measurement period of \$5,968,304 to be reported on the financial statement for the fiscal year ending June 30, 2020.

6. Investment Policy

The chart below shows how the long-term rate of return on assets is developed based on the Town's Investment Policy.

Investment Target Allocation & Expected Long-Term Real Rate of Return			
Asset Class	Target Allocation	Asset Class	Long-Term Expected Real Rate of Return*
Domestic Equity - Large Cap	23.33%	Domestic Equity - Large Cap	4.80%
Domestic Equity - Small/Mid Cap	11.67%	Domestic Equity - Small/Mid Cap	5.29%
International Equity - Developed Market	13.33%	International Equity - Developed Market	5.45%
International Equity-Emerging Market	6.67%	International Equity-Emerging Market	6.42%
Domestic Fixed Income	20.00%	Domestic Fixed Income	2.05%
International Fixed Income	5.00%	International Fixed Income	3.00%
Alternatives	20.00%	Alternatives	6.50%
Real Estate	0.00%	Real Estate	6.25%
Cash & Cash Equivalents	0.00%	Cash & Cash Equivalents	0.00%
Total	<u>100.00%</u>		
		I. Real Rate of Return**	<u>4.75%</u>
		II. Inflation Assumption	2.50%
		III. Total Nominal Return [I. + II.]	7.25%
		IV. Investment Expense	0.25%
		V. Net Investment Return [III.-IV.]	<u>7.00%</u>

* Based on 2019 Horizon Survey of Capital Market Assumptions

** Geometric Mean

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
(As of the June 30, 2020 Measurement Date)

7. Schedule of The Town's Contributions

For the Fiscal Year Ending	Actuarial Determined Contribution	Contributions in Relation to the Actuarially Determined Contribution	Contribution Deficiency (Excess)	Covered Employee Payroll	Contributions as a Percentage of Covered Employee Payroll
June 30, 2020	12,529,562	(5,968,304)	6,561,258	N/A	N/A
June 30, 2019	11,623,416	(4,790,933)	6,832,483	60,500,650	7.92%
June 30, 2018	10,051,332	(4,394,179)	5,657,153	58,738,497	7.48%
June 30, 2017	9,832,225	(4,381,467)	5,450,758	53,773,100	8.15%

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES

(As of the June 30, 2020 Measurement Date)

8. Effect of 1% Change in Healthcare Trend

<u>Impact of a 1% Change in the Healthcare Trend Rate as of the June 30, 2020 Measurement Date</u>			
	<u>1% Decrease</u>	<u>Current Trend Rate</u>	<u>1% Increase</u>
I. Total OPEB Liability	125,893,255	145,096,220	169,215,713
II. Fiduciary Net Position	<u>3,542,041</u>	<u>3,542,041</u>	<u>3,542,041</u>
III. Net OPEB Liability (Asset) [I.-II.]	122,351,214	141,554,179	165,673,672
IV. Service Cost	2,571,829	3,297,628	4,302,186

9. Effect of 1% Change in Discount Rates

<u>Impact of a 1% Change in the Discount Rate as of the June 30, 2020 Measurement Date</u>			
	<u>1% Decrease</u>	<u>Current Discount Rate</u>	<u>1% Increase</u>
I. Total OPEB Liability	166,513,104	145,096,220	127,757,508
II. Fiduciary Net Position	<u>3,542,041</u>	<u>3,542,041</u>	<u>3,542,041</u>
III. Net OPEB Liability (Asset) [I.-II.]	162,971,063	141,554,179	124,215,467
IV. Service Cost	4,309,578	3,297,628	2,550,631

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
(As of the June 30, 2020 Measurement Date)

10. Money Weighted Rate of Return

	Plan	Periods	Period
	Investments /	Invested	Weight
	Net External		
	Cash Flows		
I. Beginning value - June 30, 2019	2,725,046	12	1.0000
Monthly net external cash flows:			
July	354,249	11	0.9167
August	0	10	0.8333
September	0	9	0.7500
October	0	8	0.6667
November	400,000	7	0.5833
December	0	6	0.5000
January	0	5	0.4167
February	0	4	0.3333
March	0	3	0.2500
April	0	2	0.1667
May	0	1	0.0833
<u>June</u>	<u>0</u>	0	0.0000
II. Total net external cash flow	754,249		
III. Earnings and increase in fair value	62,746		
IV. Ending value - June 30, 2020 [I.+II.+III.]	3,542,041		
Money Weighted Rate of Return	1.91%		
Asset Value - June 30, 2020	3,542,041		

EXHIBIT A
FINANCIAL STATEMENT DISCLOSURES
(As of the June 30, 2020 Measurement Date)

11. OPEB Liability, OPEB Expense

	Fiscal Year Ending June 30, 2020									Total
	General Government Employees and Retirees	Teacher Employees and Retirees	School Non- Teacher Employees and Retirees	Police Employees and Retirees	Fire Employees and Retirees	Solid Waste Enterprise Employees and Retirees	Sewer Enterprise Employees and Retirees	Water Enterprise Employees and Retirees	Total	
I. Total OPEB Liability as of June 30, 2020	18,241,084	75,264,601	27,232,507	8,761,055	11,767,904	546,138	1,703,556	1,579,375	145,096,220	
II. Fiduciary Net Position as of June 30, 2020	160,928	664,006	240,253	77,293	103,820	298,711	1,042,853	954,177	3,542,041	
III. Net OPEB Liability (Asset) as of June 30, 2020 [I. - II.]	18,080,156	74,600,595	26,992,254	8,683,762	11,664,084	247,427	660,703	625,198	141,554,179	
IV. Service Cost	296,536	1,379,491	890,132	323,196	285,976	24,960	50,798	46,539	3,297,628	
V. Interest on Total OPEB Liability (Asset), Service Cost, and Benefit Payments	828,921	3,440,464	1,268,045	412,525	545,667	25,426	79,665	74,254	6,674,967	
VI. Projected Earnings on OPEB Plan Investments	(11,430)	(47,263)	(17,186)	(5,551)	(7,427)	(16,640)	(58,070)	(53,138)	(216,705)	
VII. Net Recognition of Deferred (Inflows)/Outflows	687,789	2,837,884	1,026,813	330,339	443,714	20,592	64,233	59,551	5,470,915	
VIII. Expense Related to Change in Benefit Terms	0	0	0	0	0	0	0	0	0	
IX. Financial Statement Expense [IV. + V. + VII. + VIII.]	1,801,816	7,610,576	3,167,804	1,060,509	1,267,930	54,338	136,626	127,206	15,226,805	
X. Employer Share of Costs	(840,506)	(2,949,839)	(890,275)	(172,370)	(284,251)	(31,977)	(32,203)	(12,634)	(5,214,055)	
XI. Employer (Payments) Withdrawals to/from OPEB Trust	(60,231)	(205,788)	(76,134)	(24,940)	(32,907)	(45,510)	(162,150)	(146,589)	(754,249)	
XII. Total Employer Contribution [X. + XI.]	(900,737)	(3,155,627)	(966,409)	(197,310)	(317,158)	(77,487)	(194,353)	(159,223)	(5,968,304)	
XIII. Net OPEB Expense [IX. + XII.]	901,079	4,454,949	2,201,395	863,199	950,772	(23,149)	(57,727)	(32,017)	9,258,501	

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES

(As of the June 30, 2020 Measurement Date)

12. OPEB Liability, OPEB Expense and Deferred Inflow/Outflow

Valuation Date	July 1, 2019
For the Measurement Period ending on the Measurement Date of:	June 30, 2020
For the Reporting Period & Fiscal Year ending on:	June 30, 2020
Source of Deferred Inflow/Outflow	
I. Deferred (Inflow)/Outflow from Actual vs. Expected Experience	(542,191)
II. Deferred (Inflow)/Outflow from Investment Experience	141,243
III. Deferred (Inflow)/Outflow from Changes in Assumptions	19,023,416
Change in Deferred Inflow/Outflow	
I. Deferred Outflow at the beginning of the period	16,517,605
II. Deferred Outflow created during the period	8,254,935
III. Deferred Outflow recognized during the period	5,607,019
IV. Change in Deferred Outflow (II. - III.)	2,647,916
V. Deferred Outflow at end of the period (I. + IV.)	19,165,521
VI. Deferred Inflow at the beginning of the period	(138,921)
VII. Deferred Inflow created during the period	(540,236)
VIII. Deferred Inflow recognized during the period	(136,104)
IX. Change in Deferred Inflow (VII. - VIII.)	(404,132)
X. Deferred Inflow at end of the period (VI. + IX.)	(543,053)
Net OPEB Liability	
I. Net OPEB Liability at beginning of period	130,051,894
II. Service Cost	3,297,628
III. Interest on Total OPEB Liability, Service Cost, and Payments	6,674,967
IV. Projected Investment Income	(216,705)
V. Total Employer Contributions	(5,968,304)
VI. Expense Related to Change in Benefit Terms	0
VII. Net OPEB Expense - Before Recognition of Deferred (Inflow)/Outflow (II. + III. + IV. + V. + VI.)	3,787,586
VIII. Deferred Outflow created during the period	8,254,935
IX. Deferred Inflow created during the period	(540,236)
X. Net OPEB Liability at end of period (I. + VII. + VIII. + IX.)	141,554,179
Net OPEB Expense	
I. Service Cost	3,297,628
II. Interest on Total OPEB Liability, Service Cost, and Payments	6,674,967
III. Projected Investment Income	(216,705)
IV. Recognition of Deferred (Inflow)/Outflow	5,470,915
V. Expense Related to Change in Benefit Terms	0
VI. Financial Statement Expense (I. + II. + III. + IV. + V.)	15,226,805
VII. Benefit Payments	(5,214,055)
VIII. Contributions to Trust	(754,249)
IX. Total Employer Payments (VII. + VIII.)	(5,968,304)
X. Total Net OPEB Expense under GASB 75 (VI. + IX.)	9,258,501

EXHIBIT B

REQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2020 Measurement Date)

The Town's Actuarially Determined Contribution (ADC) is an amount actuarially determined in accordance with the parameters of GASB Statement No. 74/75 which is composed of the service cost and an amortization of the unfunded liability. We have used a 30 year flat dollar amortization of the Town's unfunded liability for the purpose of calculating ADC. The following table shows the components of the Town's annual ADC and the amount actually contributed to the plan:

	Actuarially Determined Contribution - Deficiency / (Excess)			
	<u>June 30, 2020</u>	<u>June 30, 2019</u>	For the Fiscal Year Ending:	
			<u>June 30, 2018</u>	<u>June 30, 2017</u>
I. Service Cost	3,297,628	3,566,214	2,614,496	2,886,392
II. 30 Year Level Dollar Amortization of NOL	<u>9,231,934</u>	<u>8,057,202</u>	<u>7,436,836</u>	<u>6,945,833</u>
III. Actuarial Determined Contribution [I. + II.]	12,529,562	11,623,416	10,051,332	9,832,225
IV. Contributions in Relation to the Actuarially Determined Contribution	<u>(5,968,304)</u>	<u>(4,790,933)</u>	<u>(4,394,179)</u>	<u>(4,381,467)</u>
V. Contribution Deficiency / (Excess) [III. + IV.]	<u>6,561,258</u>	<u>6,832,483</u>	5,657,153	5,450,758
Covered Employee Payroll	N/A	60,500,650	58,738,497	53,773,100
Contributions as a % of Covered Employee Payroll	N/A	7.92%	7.48%	8.15%
Discount Rate	5.50%	5.00%	6.00%	6.50%
Money Weighted Rate of Return	1.91%	5.94%	7.19%	8.45%

EXHIBIT B

REQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2020 Measurement Date)

Schedule of Changes in the Town's Net OPEB Liability and Related Ratios				
Valuation Date	July 1, 2019	July 1, 2017	July 1, 2017	July 1, 2017
GASB 75 Measurement Date	June 30, 2020	June 30, 2019	June 30, 2018	June 30, 2017
For the Reporting Period & Fiscal Year Ending on:	June 30, 2020	June 30, 2019	June 30, 2018	June 30, 2017
Total OPEB Liability	145,096,220	132,776,940	110,485,189	102,734,329
I. Service Cost	3,297,628	3,566,214	2,614,496	2,886,392
II. Interest on Total OPEB Liability, Service Cost, and Benefit Payments	6,674,967	6,719,148	6,206,574	6,392,540
III. Changes in Benefit Terms	0	0	(2,517,704)	0
IV. Difference Between Expected & Actual Plan Experience	(540,236)	0	5,539,349	0
V. Changes of Assumptions	8,100,976	16,198,648	(223,646)	0
VI. Benefit Payments Excluding Implicit Cost	(4,032,184)	(4,025,843)	(3,729,487)	N/A
VII. Implicit Cost Amount	(1,181,871)	(166,416)	(138,722)	N/A
VIII. Total Benefit Payments Including Implicit Cost [VI.+VII.]	(5,214,055)	(4,192,259)	(3,868,209)	(3,947,826)
IX. Net Change in OPEB Liability [I.+II.+III.+IV.+V.+VIII.]	12,319,280	22,291,751	7,750,860	5,331,106
X. Total OPEB Liability - Beginning of Period	132,776,940	110,485,189	102,734,329	97,403,223
XI. Prior Period Adjustment	0	0	0	0
XII. Total OPEB Liability - Beginning of Period with Adjustment	132,776,940	110,485,189	102,734,329	97,403,223
XIII. Total OPEB Liability - End of Period [IX.+XII.]	145,096,220	132,776,940	110,485,189	102,734,329
Plan Fiduciary Net Position	3,542,041	2,725,046	1,976,392	1,335,864
XIV. Earning from Plan Investments	62,746	149,980	114,558	98,101
XV. Employer Contribution to Trust	5,968,304	4,790,933	4,394,179	4,381,467
XVI. Benefit Payments from Trust, Including Refunds of Member Contributions	(5,214,055)	(4,192,259)	(3,868,209)	(3,947,826)
XVII. Administrative Expense	0	0	0	0
XVIII. Other	0	0	0	0
XIX. Net Change in Plan Fiduciary Net Position [XIV.+XV.+XVI.+XVII.+XVIII.]	816,995	748,654	640,528	531,742
XX. Plan Fiduciary Net Position - Beginning of Period	2,725,046	1,976,392	1,335,864	804,122
XXI. Prior Period Adjustment	0	0	0	0
XXII. Plan Fiduciary Net Position - Beginning of Period with Adjustment	2,725,046	1,976,392	1,335,864	804,122
XXIII. Plan Fiduciary Net Position - End of Period [XIX.+XXII.]	3,542,041	2,725,046	1,976,392	1,335,864
XXIV. Net OPEB Liability [XIII.-XXIII.]	141,554,179	130,051,894	108,508,797	101,398,465
XXV. Plan Fiduciary Net Position as % of Total OPEB Liability [XXIII. / XIII.]	2.44%	2.05%	1.79%	1.30%
XXVI. Covered Employee Payroll	N/A	60,500,650	58,738,497	53,773,100
XXVII. Plan NOL as % of Covered Employee Payroll [XXIV. / XXVI.]	N/A	214.96%	184.73%	188.57%
Single Discount Rate to calculate Plan Liabilities	5.50%	5.00%	6.00%	6.50%

EXHIBIT BREQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2020 Measurement Date)

Notes to Required Supplementary Information:

Valuation Date:	Actuarially Determined Contribution was calculated as of July 1, 2019.
Actuarial Cost Method:	Individual Entry Age Normal
Asset-Valuation Method:	Market Value of Assets as of the Measurement Date, June 30, 2020.

Actuarial Assumptions:

Investment Rate of Return:	7.00%, net of OPEB plan investment expense, including inflation.
Municipal Bond Rate	2.66% as of June 30, 2020 (source: S&P Municipal Bond 20-Year High Grade Index – SAPIHG)
Single Equivalent Discount Rate:	5.50%, net of OPEB plan investment expense, including inflation.
Inflation:	2.50% as of June 30, 2020 and for future periods
Salary Increases:	3.00% annually as of June 30, 2020 and for future periods
Cost of Living Adjustment:	Not Applicable

EXHIBIT B

REQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2020 Measurement Date)

Pre-Retirement Mortality:

General: RP-2014 Mortality Table for Blue Collar Employees projected generationally with scale MP-2016 for males and females, set forward 1 year for females
Teachers: RP-2014 Mortality Table for White Collar Employees projected generationally with scale MP-2016 for males and females

Post-Retirement Mortality:

General: RP-2014 Mortality Table for Blue Collar Healthy Annuitants projected generationally with scale MP-2016 for males and females, set forward 1 year for females
Teachers: RP-2014 Mortality Table for White Collar Healthy Annuitants projected generationally with scale MP-2016 for males and females

Disabled Mortality:

General: RP-2014 Mortality Table for Blue Collar Healthy Annuitants projected generationally with scale MP-2016 for males and females, set forward 1 year
Teachers: RP-2014 Mortality Table for White Collar Healthy Annuitants projected generationally with scale MP-2016 for males and females

EXHIBIT BREQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2020 Measurement Date)

Plan Membership

At July 1, 2019, OPEB plan membership consisted of the following:

Inactive employees or beneficiaries currently receiving benefits:	726
Active Employees:	<u>918</u>
Total:	1,644

Events Subsequent to the Measurement Date

To the best of our knowledge there were no material events subsequent to the Measurement Date that would impact the figures shown in this report.

Changes in Assumptions: From June 30, 2019 to June 30, 2020

- ✓ Due to the GASB 75 standards the discount rate has been changed from 5.00% to 5.50%
- ✓ Based on recommendations by PERAC, the mortality table has been updated from the RP-2000 Employees Mortality Table projected generationally with scale BB and a base year 2009 to the RP-2014 Mortality Table projected generationally with scale MP-2016 for males and females
- ✓ The expected long-term medical trend has been updated to 4.50%
- ✓ Based on recent research by the Society of Actuaries, we have updated the assumption for morbidity or age-related costs of medical care

Contributions/Withdrawals:

The contribution requirements of plan members and the Town are established and may be amended through Town ordinances. The Town contributed beyond the pay-as-you-go cost \$754,249 for the period ending on the June 30, 2020 Measurement Date. For the year ending on the June 30, 2020 Measurement Date total Town premiums plus implicit costs for the retiree medical program were \$5,214,055. \$1,181,871 of the \$5,214,055 represents implicit cost.

EXHIBIT BREQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2020 Measurement Date)

Census Data Manipulation:

In the absence of data, the following was assumed:

Spouse Sex:	Male participants had female spouses and vice versa.
Spouse Age:	Male spouses were three years older than female spouses and same sex spouses were the same age.
Hire Age:	Participants who were not on the previous valuation were hired halfway between last valuation and the current valuation. If we did not have census data related to the last valuation, the participants were assumed to have been hired at age forty.
Retiree Age:	Retirees had the same birth date as they had the prior valuation. If we did not have census data related to the last valuation, retirees who were enrolled in Active plans were assumed to be age sixty-two and retirees who were enrolled in Medicare Supplement plans were assumed to be age seventy-two. Those not enrolled in a medical plan were assumed to be sixty-seven.
School Demographics:	Two thirds of school participants were teachers.
Other Material Changes:	No other data changes were deemed to be material.

APPENDIX I – LIABILITIES, ASSETS, & CASH FLOWS

CURRENT FUNDING POLICY (OPEN GROUP)

Funding - 5.50% discount rate

For the Fiscal Year	Period Ending on the Measurement Date of:	I. Total OPEB Liability ("TOL") as of Measurement Date	II. Fiduciary Net Position as of Measurement Date with an expected 7.00% return	III. Net OPEB Liability (Asset) [I. - II.]	IV. Funded Ratio [II. / I.]	V. Service Cost	VI. Employer Share of Benefit Payments (With Implicit Cost)	VII. Trust Contributions Beyond Pay-as-you-go	VIII. Gross Trust Contributions [VI. + VII.]	IX. Benefit Payments Reimbursed from the Trust	X. Administrative & Investment Expenses Reimbursed from the Trust	XI. Total Employer Payments Less Reimbursements [VIII. - IX. - X.]
2020	June 30, 2020	145,096,220	3,542,041	141,554,179	2.44%	3,297,628	5,214,055	754,249	5,968,304	5,214,055	0	754,249
2021	June 30, 2021	150,914,775	4,560,465	146,354,310	3.02%	3,472,561	5,671,413	744,852	6,416,265	5,671,413	0	744,852
2022	June 30, 2022	156,160,467	5,726,194	150,434,273	3.67%	3,603,763	6,103,903	818,339	6,922,242	6,103,903	0	818,339
2023	June 30, 2023	161,777,686	7,049,823	154,727,863	4.36%	3,727,464	6,436,401	892,100	7,328,501	6,436,401	0	892,100
2024	June 30, 2024	167,493,019	8,542,698	158,950,321	5.10%	3,875,949	6,787,631	966,144	7,753,775	6,787,631	0	966,144
2025	June 30, 2025	173,227,535	10,216,968	163,010,567	5.90%	4,022,138	7,224,698	1,040,480	8,265,178	7,224,698	0	1,040,480
2026	June 30, 2026	178,974,354	12,085,639	166,888,715	6.75%	4,168,203	7,666,678	1,115,114	8,781,792	7,666,678	0	1,115,114
2027	June 30, 2027	184,824,591	14,162,636	170,661,955	7.66%	4,331,295	8,025,712	1,190,055	9,215,767	8,025,712	0	1,190,055
2028	June 30, 2028	190,692,567	16,404,383	174,288,184	8.60%	4,497,632	8,502,416	1,208,771	9,711,187	8,502,416	0	1,208,771
2029	June 30, 2029	196,461,279	18,879,625	177,581,654	9.61%	4,662,449	8,991,352	1,282,797	10,274,149	8,991,352	0	1,282,797
2030	June 30, 2030	202,345,281	21,605,006	180,740,275	10.68%	4,836,641	9,420,646	1,357,112	10,777,758	9,420,646	0	1,357,112
2031	June 30, 2031	208,051,711	24,598,344	183,453,367	11.82%	5,001,979	10,009,815	1,431,725	11,441,540	10,009,815	0	1,431,725
2032	June 30, 2032	213,842,120	27,878,713	185,963,407	13.04%	5,194,369	10,313,690	1,506,644	11,820,334	10,313,690	0	1,506,644
2033	June 30, 2033	219,884,486	31,466,531	188,417,955	14.31%	5,392,256	10,700,655	1,581,879	12,282,534	10,700,655	0	1,581,879
2034	June 30, 2034	225,990,634	35,383,653	190,606,981	15.66%	5,599,959	11,125,758	1,657,436	12,783,194	11,125,758	0	1,657,436
2035	June 30, 2035	232,305,006	42,756,699	189,548,307	18.41%	5,805,846	11,369,681	4,733,326	16,103,007	11,369,681	0	4,733,326
2036	June 30, 2036	238,607,702	50,724,711	187,882,991	21.26%	6,025,995	11,717,581	4,809,556	16,527,137	11,717,581	0	4,809,556
2037	June 30, 2037	245,102,666	59,063,692	186,038,974	24.10%	6,246,121	12,030,555	4,628,977	16,659,532	12,030,555	0	4,628,977
2038	June 30, 2038	252,124,918	68,058,676	184,066,242	26.99%	6,494,175	12,339,729	4,698,847	17,038,576	12,339,729	0	4,698,847
2039	June 30, 2039	259,429,195	77,755,765	181,673,430	29.97%	6,749,347	12,473,563	4,768,893	17,242,456	12,473,563	0	4,768,893
2040	June 30, 2040	267,270,345	87,943,421	179,326,924	32.90%	7,005,234	12,795,126	4,586,925	17,382,051	12,795,126	0	4,586,925
2041	June 30, 2041	275,194,647	98,909,874	176,284,773	35.94%	7,278,518	13,158,132	4,650,402	17,808,534	13,158,132	0	4,650,402
2042	June 30, 2042	283,464,352	110,709,640	172,754,712	39.06%	7,556,654	13,364,782	4,713,879	18,078,661	13,364,782	0	4,713,879
2043	June 30, 2043	291,649,571	123,401,050	168,248,521	42.31%	7,862,149	13,862,193	4,777,356	18,639,549	13,862,193	0	4,777,356
2044	June 30, 2044	300,768,057	137,030,277	163,737,780	45.56%	8,172,925	14,285,454	4,825,130	19,110,584	14,285,454	0	4,825,130
2045	June 30, 2045	310,339,210	151,663,461	158,675,749	48.87%	8,525,038	14,619,769	4,873,381	19,493,150	14,619,769	0	4,873,381
2046	June 30, 2046	320,611,890	167,371,379	153,240,511	52.20%	8,880,493	15,004,303	4,922,115	19,926,418	15,004,303	0	4,922,115
2047	June 30, 2047	331,456,380	184,229,765	147,226,615	55.58%	9,253,799	15,467,587	4,971,336	20,438,923	15,467,587	0	4,971,336
2048	June 30, 2048	342,337,934	202,319,662	140,018,272	59.10%	9,653,420	15,880,446	5,021,049	20,901,495	15,880,446	0	5,021,049
2049	June 30, 2049	354,304,549	221,727,789	132,576,760	62.58%	10,062,764	16,080,983	5,071,259	21,152,242	16,080,983	0	5,071,259
2050	June 30, 2050	367,200,617	242,546,943	124,653,674	66.05%	10,494,828	16,526,509	5,121,972	21,648,481	16,526,509	0	5,121,972
2051	June 30, 2051	380,834,776	264,876,420	115,958,356	69.55%	10,947,460	16,992,587	5,173,192	22,165,779	16,992,587	0	5,173,192

APPENDIX I – LIABILITIES, ASSETS, & CASH FLOWS

CONTRIBUTION PROJECTION DISCLOSURES

Table 1: Projection of Contributions using a July 1, 2019 Valuation Date

For the Period Ending on the Measurement Date	I. Payroll for current employees	II. Payroll for future employees	III. Total Payroll [I.+II.]	IV. Contributions from current employees	V. Employer Payments for current plan members	VI. Employer Payments for future employees	VII. Total Payments [IV.+V.+VI.]
June 30, 2020	10,000	0	10,000	0	5,214,055	0	5,214,055
June 30, 2021	9,379	921	10,300	0	5,671,413	0	5,671,413
June 30, 2022	8,883	1,726	10,609	0	6,103,903	0	6,103,903
June 30, 2023	8,416	2,511	10,927	0	6,436,401	0	6,436,401
June 30, 2024	8,005	3,250	11,255	0	6,787,631	0	6,787,631
June 30, 2025	7,631	3,962	11,593	0	7,224,698	0	7,224,698
June 30, 2026	7,255	4,686	11,941	0	7,666,678	0	7,666,678
June 30, 2027	6,911	5,388	12,299	0	8,025,712	0	8,025,712
June 30, 2028	6,586	6,082	12,668	0	8,502,416	0	8,502,416
June 30, 2029	6,272	6,776	13,048	0	8,991,352	0	8,991,352
June 30, 2030	5,970	7,469	13,439	0	9,420,646	0	9,420,646
June 30, 2031	5,665	8,177	13,842	0	9,971,486	38,329	10,009,815
June 30, 2032	5,384	8,873	14,257	0	10,219,814	93,876	10,313,690
June 30, 2033	5,125	9,560	14,685	0	10,531,743	168,912	10,700,655
June 30, 2034	4,894	10,232	15,126	0	10,851,839	273,919	11,125,758
June 30, 2035	4,651	10,929	15,580	0	10,965,448	404,233	11,369,681
June 30, 2036	4,415	11,632	16,047	0	11,217,868	499,713	11,717,581
June 30, 2037	4,161	12,367	16,528	0	11,411,407	619,148	12,030,555
June 30, 2038	3,938	13,086	17,024	0	11,583,293	756,436	12,339,729
June 30, 2039	3,737	13,798	17,535	0	11,605,903	867,660	12,473,563
June 30, 2040	3,524	14,537	18,061	0	11,799,711	995,415	12,795,126
June 30, 2041	3,343	15,260	18,603	0	11,975,616	1,182,516	13,158,132
June 30, 2042	3,147	16,014	19,161	0	11,947,963	1,416,819	13,364,782
June 30, 2043	2,965	16,771	19,736	0	12,163,494	1,698,699	13,862,193
June 30, 2044	2,773	17,555	20,328	0	12,236,192	2,049,262	14,285,454
June 30, 2045	2,625	18,313	20,938	0	12,161,711	2,458,058	14,619,769
June 30, 2046	2,482	19,084	21,566	0	12,204,523	2,799,780	15,004,303
June 30, 2047	2,328	19,885	22,213	0	12,271,154	3,196,433	15,467,587
June 30, 2048	2,188	20,691	22,879	0	12,242,435	3,638,011	15,880,446
June 30, 2049	2,046	21,519	23,565	0	12,051,226	4,029,757	16,080,983
June 30, 2050	1,893	22,379	24,272	0	12,065,051	4,461,458	16,526,509
June 30, 2051	1,758	23,242	25,000	0	12,018,804	4,973,783	16,992,587
June 30, 2052	1,623	24,127	25,750	0	11,845,898	5,535,861	17,381,759
June 30, 2053	1,470	25,053	26,523	0	11,876,072	6,148,951	18,025,023
June 30, 2054	1,308	26,011	27,319	0	11,732,949	6,833,229	18,566,178
June 30, 2055	1,160	26,979	28,139	0	11,405,278	7,581,314	18,986,592
June 30, 2056	1,021	27,962	28,983	0	11,160,450	8,296,617	19,457,067
June 30, 2057	874	28,978	29,852	0	10,990,178	9,073,846	20,064,024
June 30, 2058	749	29,999	30,748	0	10,732,153	9,906,382	20,638,535
June 30, 2059	625	31,045	31,670	0	10,552,517	10,747,757	21,300,274

APPENDIX I – LIABILITIES, ASSETS, & CASH FLOWS

CONTRIBUTION PROJECTION DISCLOSURES (CONTINUED)

Table 1: Projection of Contributions using a July 1, 2019 Valuation Date

For the Period Ending on the Measurement Date	I. Payroll for current employees	II. Payroll for future employees	III. Total Payroll [I.+II.]	IV. Contributions from current employees	V. Employer Payments for current plan members	VI. Employer Payments for future employees	VII. Total Payments [IV.+V.+VI.]
June 30, 2060	491	32,129	32,620	0	10,247,016	11,639,263	21,886,279
June 30, 2061	365	33,234	33,599	0	9,921,427	12,620,117	22,541,544
June 30, 2062	281	34,326	34,607	0	9,642,051	13,671,214	23,313,265
June 30, 2063	205	35,440	35,645	0	9,327,689	14,794,384	24,122,073
June 30, 2064	150	36,564	36,714	0	9,038,876	16,012,935	25,051,811
June 30, 2065	94	37,721	37,815	0	8,830,794	17,319,756	26,150,550
June 30, 2066	53	38,896	38,949	0	8,645,828	18,629,555	27,275,383
June 30, 2067	25	40,092	40,117	0	8,466,826	20,026,193	28,493,019
June 30, 2068	5	41,316	41,321	0	8,274,750	21,504,245	29,778,995
June 30, 2069	4	42,557	42,561	0	8,064,554	22,990,332	31,054,886
June 30, 2070	1	43,837	43,838	0	7,846,378	24,550,748	32,397,126
June 30, 2071	0	45,153	45,153	0	7,618,201	26,202,018	33,820,219
June 30, 2072	0	46,508	46,508	0	7,381,780	27,923,478	35,305,258
June 30, 2073	0	47,903	47,903	0	7,137,685	29,716,051	36,853,736
June 30, 2074	0	49,340	49,340	0	6,886,425	31,598,089	38,484,514
June 30, 2075	0	50,820	50,820	0	6,628,607	33,565,260	40,193,867
June 30, 2076	0	52,345	52,345	0	6,364,520	35,616,461	41,980,981
June 30, 2077	0	53,915	53,915	0	6,094,486	37,754,039	43,848,525
June 30, 2078	0	55,532	55,532	0	5,818,853	39,987,329	45,806,182
June 30, 2079	0	57,198	57,198	0	5,538,036	42,313,079	47,851,115
June 30, 2080	0	58,914	58,914	0	5,252,482	44,727,445	49,979,927
June 30, 2081	0	60,681	60,681	0	4,962,771	47,246,022	52,208,793
June 30, 2082	0	62,501	62,501	0	4,669,750	49,872,531	54,542,281
June 30, 2083	0	64,376	64,376	0	4,374,058	52,604,644	56,978,702
June 30, 2084	0	66,307	66,307	0	4,076,867	55,459,373	59,536,240
June 30, 2085	0	68,296	68,296	0	3,779,467	58,441,686	62,221,153
June 30, 2086	0	70,345	70,345	0	3,483,238	61,547,137	65,030,375
June 30, 2087	0	72,455	72,455	0	3,189,733	64,782,733	67,972,466
June 30, 2088	0	74,629	74,629	0	2,900,873	68,166,143	71,067,016
June 30, 2089	0	76,868	76,868	0	2,618,468	71,692,010	74,310,478
June 30, 2090	0	79,174	79,174	0	2,344,518	75,363,628	77,708,146
June 30, 2091	0	81,549	81,549	0	2,081,170	79,199,073	81,280,243
June 30, 2092	0	83,995	83,995	0	1,830,198	83,205,636	85,035,834
June 30, 2093	0	86,515	86,515	0	1,593,387	87,386,616	88,980,003
June 30, 2094	0	89,110	89,110	0	1,372,201	91,758,267	93,130,468

APPENDIX I – LIABILITIES, ASSETS, & CASH FLOWS

FIDUCIARY NET POSITION PROJECTION DISCLOSURES

Table 2: Projection of OPEB Plan's Fiduciary Net Position using a July 1, 2019 Valuation Date

For the Period Ending on the Measurement Date	I. Beginning Fiduciary Net Position for Current Plan Members	II. Employer Share of Benefit Payments for Current Plan Members	III. Contributions to Trust for Current Plan Members beyond Pay-as-you-go	IV. Gross Contributions to Trust for Current Plan Members [II. + III.]	V. Administrative Expenses Withdrawn from the Trust for Current Plan Members	VI. Benefit Payments Withdrawn from the Trust for Current Plan Members	VII. Trust Current Plan Members [V. + VI.]	VIII. Investment Earnings	IX. Ending Fiduciary Net Position for Current Plan Members
June 30, 2020	2,725,046	5,214,055	754,249	5,968,304	0	5,214,055	5,214,055	62,746	3,542,041
June 30, 2021	3,542,041	5,671,413	678,249	6,349,662	0	5,671,413	5,671,413	249,110	4,469,400
June 30, 2022	4,469,400	6,103,903	685,202	6,789,105	0	6,103,903	6,103,903	336,434	5,491,036
June 30, 2023	5,491,036	6,436,401	687,097	7,123,498	0	6,436,401	6,436,401	408,014	6,586,147
June 30, 2024	6,586,147	6,787,631	687,160	7,474,791	0	6,787,631	6,787,631	484,674	7,757,981
June 30, 2025	7,757,981	7,224,698	684,888	7,909,586	0	7,224,698	7,224,698	566,624	9,009,493
June 30, 2026	9,009,493	7,666,678	677,510	8,344,188	0	7,666,678	7,666,678	653,976	10,340,979
June 30, 2027	10,340,979	8,025,712	668,710	8,694,422	0	8,025,712	8,025,712	746,878	11,756,567
June 30, 2028	11,756,567	8,502,416	628,431	9,130,847	0	8,502,416	8,502,416	844,583	13,229,581
June 30, 2029	13,229,581	8,991,352	616,623	9,607,975	0	8,991,352	8,991,352	947,287	14,793,491
June 30, 2030	14,793,491	9,420,646	602,869	10,023,515	0	9,420,646	9,420,646	1,056,288	16,452,648
June 30, 2031	16,452,648	9,971,486	585,950	10,557,436	0	9,971,486	9,971,486	1,171,847	18,172,116
June 30, 2032	18,172,116	10,219,814	568,968	10,788,782	0	10,219,814	10,219,814	1,291,625	19,938,833
June 30, 2033	19,938,833	10,531,743	552,069	11,083,812	0	10,531,743	10,531,743	1,414,714	21,736,704
June 30, 2034	21,736,704	10,851,839	536,262	11,388,101	0	10,851,839	10,851,839	1,540,021	23,539,068
June 30, 2035	23,539,068	10,965,448	1,413,010	12,378,458	0	10,965,448	10,965,448	1,696,354	26,244,199
June 30, 2036	26,244,199	11,217,868	1,323,250	12,541,118	0	11,217,868	11,217,868	1,882,624	28,950,360
June 30, 2037	28,950,360	11,411,407	1,165,366	12,576,773	0	11,411,407	11,411,407	2,066,623	31,563,201
June 30, 2038	31,563,201	11,583,293	1,086,940	12,670,233	0	11,583,293	11,583,293	2,246,824	34,140,529
June 30, 2039	34,140,529	11,605,903	1,016,330	12,622,233	0	11,605,903	11,605,903	2,424,807	36,714,006
June 30, 2040	36,714,006	11,799,711	894,985	12,694,696	0	11,799,711	11,799,711	2,600,775	39,214,351
June 30, 2041	39,214,351	11,975,616	835,687	12,811,303	0	11,975,616	11,975,616	2,773,759	41,641,281
June 30, 2042	41,641,281	11,947,963	774,207	12,722,170	0	11,947,963	11,947,963	2,941,529	43,940,198
June 30, 2043	43,940,198	12,163,494	717,717	12,881,211	0	12,163,494	12,163,494	3,100,509	46,059,725
June 30, 2044	46,059,725	12,236,192	658,210	12,894,402	0	12,236,192	12,236,192	3,246,828	47,915,501
June 30, 2045	47,915,501	12,161,711	610,976	12,772,687	0	12,161,711	12,161,711	3,375,108	49,443,527
June 30, 2046	49,443,527	12,204,523	566,479	12,771,002	0	12,204,523	12,204,523	3,480,538	50,690,764
June 30, 2047	50,690,764	12,271,154	521,013	12,792,167	0	12,271,154	12,271,154	3,566,281	51,581,625
June 30, 2048	51,581,625	12,242,435	480,181	12,722,616	0	12,242,435	12,242,435	3,627,236	52,051,031
June 30, 2049	52,051,031	12,051,226	440,305	12,491,531	0	12,051,226	12,051,226	3,658,722	52,120,301
June 30, 2050	52,120,301	12,065,051	399,468	12,464,519	0	12,065,051	12,065,051	3,662,166	51,720,477
June 30, 2051	51,720,477	12,018,804	363,779	12,382,583	0	12,018,804	12,018,804	3,632,950	50,743,423
June 30, 2052	50,743,423	11,845,898	329,322	12,175,220	0	11,845,898	11,845,898	3,563,371	49,100,255
June 30, 2053	49,100,255	11,876,072	292,480	12,168,552	0	11,876,072	11,876,072	3,447,082	46,690,866
June 30, 2054	46,690,866	11,732,949	255,191	11,988,140	0	11,732,949	11,732,949	3,277,141	43,389,969
June 30, 2055	43,389,969	11,405,278	221,918	11,627,196	0	11,405,278	11,405,278	3,044,934	39,075,507
June 30, 2056	39,075,507	11,160,450	191,535	11,351,985	0	11,160,450	11,160,450	2,741,876	33,712,301
June 30, 2057	33,712,301	10,990,178	160,777	11,150,955	0	10,990,178	10,990,178	2,365,393	27,164,625
June 30, 2058	27,164,625	10,732,153	135,106	10,867,259	0	10,732,153	10,732,153	1,929,172	19,299,521
June 30, 2059	19,299,521	10,552,517	110,551	10,663,068	0	10,552,517	10,552,517	1,354,770	10,017,085

APPENDIX I – LIABILITIES, ASSETS, & CASH FLOWS

FIDUCIARY POSITION PROJECTION DISCLOSURES (CONTINUED)

Table 2: Projection of OPEB Plan's Fiduciary Net Position using a July 1, 2019 Valuation Date

For the Period Ending on the Measurement Date	I. Beginning Fiduciary Net Position for Current Plan Members	II. Employer Share of Benefit Payments for Current Plan Members	III. Contributions to Trust for Current Plan Members beyond Pay-as-you-go	IV. Gross Contributions to Trust for Current Plan Members [III. + III.]	V. Administrative Expenses Withdrawn from the Trust for Current Plan Members	VI. Benefit Payments Withdrawn from the Trust for Current Plan Members	VII. Trust Withdrawals for Current Plan Members [V. +VI.]	VIII. Investment Earnings	IX. Ending Fiduciary Net Position for Current Plan Members
June 30, 2060	10,017,085	10,247,016	85,163	10,332,179	0	10,247,016	10,247,016	704,126	789,289
June 30, 2061	789,289	9,921,427	62,078	9,983,505	0	9,921,427	9,921,427	57,386	119,464
June 30, 2062	119,464	9,642,051	46,864	9,688,915	0	9,642,051	9,642,051	9,975	56,839
June 30, 2063	56,839	9,327,689	33,525	9,361,214	0	9,327,689	9,327,689	5,132	38,657
June 30, 2064	38,657	9,038,876	24,054	9,062,930	0	9,038,876	9,038,876	3,534	27,588
June 30, 2065	27,588	8,830,794	14,782	8,845,576	0	8,830,794	8,830,794	2,440	17,222
June 30, 2066	17,222	8,645,828	8,173	8,654,001	0	8,645,828	8,645,828	1,487	9,660
June 30, 2067	9,660	8,466,826	3,780	8,470,606	0	8,466,826	8,466,826	806	4,586
June 30, 2068	4,586	8,274,750	741	8,275,491	0	8,274,750	8,274,750	347	1,088
June 30, 2069	1,088	8,064,554	582	8,065,136	0	8,064,554	8,064,554	96	678
June 30, 2070	678	7,846,378	143	7,846,521	0	7,846,378	7,846,378	52	195
June 30, 2071	195	7,618,201	0	7,618,201	0	7,618,201	7,618,201	14	14
June 30, 2072	14	7,381,780	0	7,381,780	0	7,381,780	7,381,780	1	1
June 30, 2073	1	7,137,685	0	7,137,685	0	7,137,685	7,137,685	0	0
June 30, 2074	0	6,886,425	0	6,886,425	0	6,886,425	6,886,425	0	0
June 30, 2075	0	6,628,607	0	6,628,607	0	6,628,607	6,628,607	0	0
June 30, 2076	0	6,364,520	0	6,364,520	0	6,364,520	6,364,520	0	0
June 30, 2077	0	6,094,486	0	6,094,486	0	6,094,486	6,094,486	0	0
June 30, 2078	0	5,818,853	0	5,818,853	0	5,818,853	5,818,853	0	0
June 30, 2079	0	5,538,036	0	5,538,036	0	5,538,036	5,538,036	0	0
June 30, 2080	0	5,252,482	0	5,252,482	0	5,252,482	5,252,482	0	0
June 30, 2081	0	4,962,771	0	4,962,771	0	4,962,771	4,962,771	0	0
June 30, 2082	0	4,669,750	0	4,669,750	0	4,669,750	4,669,750	0	0
June 30, 2083	0	4,374,058	0	4,374,058	0	4,374,058	4,374,058	0	0
June 30, 2084	0	4,076,867	0	4,076,867	0	4,076,867	4,076,867	0	0
June 30, 2085	0	3,779,467	0	3,779,467	0	3,779,467	3,779,467	0	0
June 30, 2086	0	3,483,238	0	3,483,238	0	3,483,238	3,483,238	0	0
June 30, 2087	0	3,189,733	0	3,189,733	0	3,189,733	3,189,733	0	0
June 30, 2088	0	2,900,873	0	2,900,873	0	2,900,873	2,900,873	0	0
June 30, 2089	0	2,618,468	0	2,618,468	0	2,618,468	2,618,468	0	0
June 30, 2090	0	2,344,518	0	2,344,518	0	2,344,518	2,344,518	0	0
June 30, 2091	0	2,081,170	0	2,081,170	0	2,081,170	2,081,170	0	0
June 30, 2092	0	1,830,198	0	1,830,198	0	1,830,198	1,830,198	0	0
June 30, 2093	0	1,593,387	0	1,593,387	0	1,593,387	1,593,387	0	0
June 30, 2094	0	1,372,201	0	1,372,201	0	1,372,201	1,372,201	0	0

APPENDIX I – LIABILITIES, ASSETS, & CASH FLOWS

BENEFIT PAYMENT PROJECTION DISCLOSURES

Table 3: Actuarial Present Values of Projected Benefit Payments using a July 1, 2019 Valuation Date

For the Period Ending on the Measurement Date	I. Beginning Fiduciary Net Position for Current Plan Members	II. Benefit Payments for Current Plan Members	III. Funded Portion of Benefit Payments	IV. Unfunded Portion of Benefit Payments [II. - III.]	V. Present Value of Funded Benefit Payments using the Long-Term Rate of Return [7.00%]	VI. Present Value of Unfunded Benefit Payments using the Municipal Bond Rate [2.66%]	VII. Present Value of Benefit Payments using the Single Equivalent Discount Rate [5.50%]	
June 30, 2020	2,725,046	5,214,055	2,725,046	2,489,009	2,725,046	2,489,009	5,214,055	Sum of Column V.
June 30, 2021	3,542,041	5,671,413	3,542,041	2,129,372	3,310,319	2,074,194	5,375,731	122,061,446
June 30, 2022	4,469,400	6,103,903	4,469,400	1,634,503	3,903,747	1,550,891	5,484,034	
June 30, 2023	5,491,036	6,436,401	5,491,036	945,365	4,482,321	873,761	5,481,279	Sum of Column VI.
June 30, 2024	6,586,147	6,787,631	6,586,147	201,484	5,024,540	181,398	5,479,025	47,527,270
June 30, 2025	7,757,981	7,224,698	7,224,698	0	5,151,110	0	5,527,784	
June 30, 2026	9,009,493	7,666,678	7,666,678	0	5,108,631	0	5,560,128	Sum of Column VII.
June 30, 2027	10,340,979	8,025,712	8,025,712	0	4,998,010	0	5,517,056	[V. + VI.]
June 30, 2028	11,756,567	8,502,416	8,502,416	0	4,948,484	0	5,540,035	169,588,716
June 30, 2029	13,229,581	8,991,352	8,991,352	0	4,890,700	0	5,553,175	
June 30, 2030	14,793,491	9,420,646	9,420,646	0	4,788,979	0	5,514,972	
June 30, 2031	16,452,648	9,971,486	9,971,486	0	4,737,381	0	5,533,104	
June 30, 2032	18,172,116	10,219,814	10,219,814	0	4,537,720	0	5,375,244	
June 30, 2033	19,938,833	10,531,743	10,531,743	0	4,370,299	0	5,250,513	
June 30, 2034	21,736,704	10,851,839	10,851,839	0	4,208,530	0	5,128,036	
June 30, 2035	23,539,068	10,965,448	10,965,448	0	3,974,383	0	4,911,570	
June 30, 2036	26,244,199	11,217,868	11,217,868	0	3,799,880	0	4,762,671	
June 30, 2037	28,950,360	11,411,407	11,411,407	0	3,612,559	0	4,592,252	
June 30, 2038	31,563,201	11,583,293	11,583,293	0	3,427,078	0	4,418,398	
June 30, 2039	34,140,529	11,605,903	11,605,903	0	3,209,129	0	4,196,217	
June 30, 2040	36,714,006	11,799,711	11,799,711	0	3,049,270	0	4,043,865	
June 30, 2041	39,214,351	11,975,616	11,975,616	0	2,892,268	0	3,890,178	
June 30, 2042	41,641,281	11,947,963	11,947,963	0	2,696,813	0	3,678,847	
June 30, 2043	43,940,198	12,163,494	12,163,494	0	2,565,851	0	3,549,952	
June 30, 2044	46,059,725	12,236,192	12,236,192	0	2,412,324	0	3,384,984	
June 30, 2045	47,915,501	12,161,711	12,161,711	0	2,240,785	0	3,188,977	
June 30, 2046	49,443,527	12,204,523	12,204,523	0	2,101,564	0	3,033,358	
June 30, 2047	50,690,764	12,271,154	12,271,154	0	1,974,801	0	2,890,910	
June 30, 2048	51,581,625	12,242,435	12,242,435	0	1,841,289	0	2,733,778	
June 30, 2049	52,051,031	12,051,226	12,051,226	0	1,693,954	0	2,550,780	
June 30, 2050	52,120,301	12,065,051	12,065,051	0	1,584,951	0	2,420,567	
June 30, 2051	51,720,477	12,018,804	12,018,804	0	1,475,585	0	2,285,575	
June 30, 2052	50,743,423	11,845,898	11,845,898	0	1,359,212	0	2,135,249	
June 30, 2053	49,100,255	11,876,072	11,876,072	0	1,273,527	0	2,029,082	
June 30, 2054	46,690,866	11,732,949	11,732,949	0	1,175,868	0	1,900,116	
June 30, 2055	43,389,969	11,405,278	11,405,278	0	1,068,252	0	1,750,754	
June 30, 2056	39,075,507	11,160,450	11,160,450	0	976,935	0	1,623,855	
June 30, 2057	33,712,301	10,990,178	10,990,178	0	899,094	0	1,515,712	
June 30, 2058	27,164,625	10,732,153	10,732,153	0	820,547	0	1,402,959	
June 30, 2059	19,299,521	10,552,517	10,552,517	0	754,030	0	1,307,556	

APPENDIX I – LIABILITIES, ASSETS, & CASH FLOWS

BENEFIT PAYMENT PROJECTION DISCLOSURES (CONTINUED)

Table 3: Actuarial Present Values of Projected Benefit Payments using a July 1, 2019 Valuation Date

For the Period Ending on the Measurement Date	I. Beginning Fiduciary Net Position for Current Plan Members	II. Benefit Payments for Current Plan Members	III. Funded Portion of Benefit Payments	IV. Unfunded Portion of Benefit Payments [II. - III.]	V. Present Value of Funded Benefit Payments using the Long-Term Rate of Return [7.00%]	VI. Present Value of Unfunded Benefit Payments using the Municipal Bond Rate [2.66%]	VII. Present Value of Benefit Payments using the Single Equivalent Discount Rate [5.50%]
June 30, 2060	10,017,085	10,247,016	10,017,085	229,931	668,945	80,446	1,203,505
June 30, 2061	789,289	9,921,427	3,130,191	6,791,236	195,360	2,314,492	1,104,514
June 30, 2062	119,464	9,642,051	2,294,078	7,347,973	133,810	2,439,339	1,017,449
June 30, 2063	56,839	9,327,689	2,073,452	7,254,237	113,029	2,345,817	932,961
June 30, 2064	38,657	9,038,876	1,931,761	7,107,115	98,416	2,238,688	856,939
June 30, 2065	27,588	8,830,794	1,856,892	6,973,902	88,413	2,139,803	793,564
June 30, 2066	17,222	8,645,828	1,779,473	6,866,355	79,184	2,052,210	736,436
June 30, 2067	9,660	8,466,826	1,717,888	6,748,938	71,443	1,964,847	683,589
June 30, 2068	4,586	8,274,750	1,660,646	6,614,104	64,544	1,875,694	633,251
June 30, 2069	1,088	8,064,554	1,586,834	6,477,720	57,640	1,789,415	584,989
June 30, 2070	678	7,846,378	1,520,926	6,325,452	51,632	1,702,073	539,489
June 30, 2071	195	7,618,201	1,458,617	6,159,584	46,277	1,614,491	496,492
June 30, 2072	14	7,381,780	1,393,168	5,988,612	41,309	1,529,002	456,002
June 30, 2073	1	7,137,685	1,327,615	5,810,070	36,790	1,444,977	417,936
June 30, 2074	0	6,886,425	1,264,260	5,622,165	32,743	1,362,012	382,201
June 30, 2075	0	6,628,607	1,201,663	5,426,944	29,085	1,280,650	348,712
June 30, 2076	0	6,364,520	1,139,235	5,225,285	25,770	1,201,110	317,363
June 30, 2077	0	6,094,486	1,077,051	5,017,435	22,770	1,123,446	288,054
June 30, 2078	0	5,818,853	1,015,765	4,803,088	20,069	1,047,584	260,688
June 30, 2079	0	5,538,036	954,545	4,583,491	17,626	973,784	235,172
June 30, 2080	0	5,252,482	893,102	4,359,380	15,413	902,170	211,417
June 30, 2081	0	4,962,771	832,752	4,130,019	13,431	832,556	189,342
June 30, 2082	0	4,669,750	773,578	3,896,172	11,660	765,063	168,874
June 30, 2083	0	4,374,058	714,912	3,659,146	10,071	699,901	149,934
June 30, 2084	0	4,076,867	658,007	3,418,860	8,663	636,995	132,461
June 30, 2085	0	3,779,467	602,885	3,176,582	7,418	576,518	116,396
June 30, 2086	0	3,483,238	549,171	2,934,067	6,315	518,705	101,680
June 30, 2087	0	3,189,733	497,212	2,692,521	5,344	463,668	88,258
June 30, 2088	0	2,900,873	447,670	2,453,203	4,496	411,509	76,081
June 30, 2089	0	2,618,468	400,199	2,218,269	3,757	362,458	65,094
June 30, 2090	0	2,344,518	355,015	1,989,503	3,114	316,655	55,245
June 30, 2091	0	2,081,170	312,628	1,768,542	2,563	274,192	46,483
June 30, 2092	0	1,830,198	273,083	1,557,115	2,092	235,157	38,746
June 30, 2093	0	1,593,387	236,330	1,357,057	1,692	199,633	31,974
June 30, 2094	0	1,372,201	202,605	1,169,596	1,356	167,598	26,100

APPENDIX II – PLAN PROVISIONS

<u>Effective Date</u>	GASB 74 was adopted for the fiscal year ending June 30, 2017 GASB 75 was adopted for the fiscal year ending June 30, 2018
<u>Plan Year</u>	July 1 through June 30.
<u>Premium Effective Date</u>	Medicare Supplement Plans: Non-GIC plans are effective January 1, 2020 GIC plans are effective July 1, 2020 Non-Medicare Plans: All plans are effective July 1, 2020 Dental Plans: N/A
<u>Creditable Service</u>	Elapsed time from date of hire to termination of service date.
<u>Benefits Offered</u>	Comprehensive Medical and \$5,000 of Group Term Life Insurance.
<u>Medicare Part B</u>	Medicare Part B Premium reimbursements by the Town were not reflected in this valuation. Medicare Part B Penalty reimbursements have been reflected.
<u>Surviving Spouse Coverage</u>	Spousal benefits do not change after the death of a plan participant.

APPENDIX II – PLAN PROVISIONS

Eligibility

Hire Date	Eligibility
Before April 2, 2012	<ul style="list-style-type: none"> • Age 55 with 10 years of creditable service • 20 years of service regardless of age
On or after April 2, 2012	<ul style="list-style-type: none"> • Age 60 with 10 years of creditable service

Participant Contributions

Group	Individual	Two-Person / Family
Medical	<ul style="list-style-type: none"> • Several grandfathered retirees pay 17%-18% • All other Town retirees pay 25% of premiums • Retired Teachers pay 10%-15% of premiums based on retirement date 	<ul style="list-style-type: none"> • Several grandfathered retirees pay 17%-18% • All other Town retirees pay 25% of premiums • Retired Teachers pay 10%-15% of premiums based on retirement date
Dental	N/A	N/A
Life	<ul style="list-style-type: none"> • Town retirees pay 25% for of premiums • Retired Teachers pay 35% of premiums 	N/A

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

Pre-Retirement Mortality

General: RP-2014 Mortality Table for Blue Collar Employees projected generationally with scale MP-2016 for males and females, set forward 1 year for females
Teachers: RP-2014 Mortality Table for White Collar Employees projected generationally with scale MP-2016 for males and females

Post-Retirement Mortality

General: RP-2014 Mortality Table for Blue Collar Healthy Annuitants projected generationally with scale MP-2016 for males and females, set forward 1 year for females
Teachers: RP-2014 Mortality Table for White Collar Healthy Annuitants projected generationally with scale MP-2016 for males and females

Disabled Mortality

General: RP-2014 Mortality Table for Blue Collar Healthy Annuitants projected generationally with scale MP-2016 for males and females, set forward 1 year
Teachers: RP-2014 Mortality Table for White Collar Healthy Annuitants projected generationally with scale MP-2016 for males and females

Assumption Experience Study

The actuarial assumptions used to calculate the actuarial accrued liability and the service cost primarily reflect the latest experience studies of the Massachusetts PERAC issued in 2014 and their most recent analysis of retiree mortality during 2015 and 2016.

Discount Rate

5.50% per annum (previously 5.00%, used in the calculation of the Interest Cost)

Net Long Term Rate of Return

7.00% (based on investment policy)

Municipal Bond Rate

2.66% as of June 30, 2020 (source: S&P Municipal Bond 20-Year High Grade Index – SAPIHG)

Actuarial Cost Method

Individual Entry Age Normal

Asset-Valuation Method

Market Value of Assets as of the Measurement Date, June 30, 2020

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

Employee Termination

It was assumed that employees would terminate employment in accordance with the sample rates shown in the following table:

Non-Public Safety Employees

Service	Male	Female
0	15.00%	15.00%
5	7.60%	7.60%
10	5.40%	5.40%
15	3.30%	3.30%
20	2.00%	2.00%

Public Safety Employees

Service	Male	Female
0	9.00%	9.00%
5	6.00%	6.00%
10	3.50%	3.50%
15	2.00%	2.00%
20	1.50%	1.50%
25	1.50%	1.50%
30	1.50%	1.50%

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

Retirement Rates for Eligible Employees

Age	Standard Male	Standard Female	Male Teachers	Female Teachers	Public Safety
45 - 49	0.00%	0.00%	0.00%	0.00%	6.00%
50 - 51	3.00%	3.00%	2.00%	1.50%	6.00%
52	3.00%	3.00%	2.00%	1.50%	6.00%
53	3.00%	3.00%	2.00%	1.50%	7.50%
54	3.00%	3.50%	2.00%	2.00%	15.00%
55	3.50%	5.00%	6.00%	5.00%	25.00%
56	3.50%	5.00%	20.00%	15.00%	15.00%
57	4.00%	5.50%	40.00%	35.00%	15.00%
58	5.00%	6.00%	50.00%	35.00%	15.00%
59	6.00%	6.50%	50.00%	35.00%	15.00%
60	9.00%	7.50%	40.00%	35.00%	20.00%
61	11.00%	10.00%	40.00%	35.00%	20.00%
62	15.00%	15.00%	35.00%	35.00%	20.00%
63	15.00%	15.00%	35.00%	35.00%	20.00%
64	16.00%	15.00%	35.00%	35.00%	30.00%
65	20.00%	20.00%	35.00%	35.00%	50.00%
66	20.00%	20.00%	40.00%	35.00%	25.00%
67	20.00%	20.00%	40.00%	30.00%	25.00%
68	20.00%	20.00%	40.00%	30.00%	25.00%
69	20.00%	20.00%	40.00%	30.00%	25.00%
70	100.00%	100.00%	100.00%	100.00%	100.00%
71	100.00%	100.00%	100.00%	100.00%	100.00%
72	100.00%	100.00%	100.00%	100.00%	100.00%

Permanent Disability Rates

Age	Standard	Teachers	Public
20	0.01%	0.05%	0.20%
30	0.01%	0.07%	0.21%
40	0.07%	0.21%	0.71%
50	0.13%	0.42%	1.10%
60	0.12%	0.50%	0.80%

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

<u>Trend Rate</u>	<p>Medicare Supplement Plans: Initial Trend of 4.50% for 2020 grading down 0.00% per year for an ultimate trend rate of 4.50%.</p> <p>Active Plans: Initial Trend of 4.50% for 2020 grading down 0.00% per year for an ultimate trend rate of 4.50%.</p> <p>Dental Plans: N/A</p>
<u>Participation Rate</u>	<p>It was assumed that 90% of employees eligible to receive retirement benefits would enroll in the retiree medical plans upon retirement. For life insurance plans, it was assumed that 85% of eligible employees would elect coverage upon retirement.</p>
<u>Spouse Participation Rate</u>	<p>It was assumed that 80% of male employees and 70% of female employees who elect retiree healthcare coverage for themselves would also elect coverage for a spouse upon retirement.</p>
<u>Spouse Demographics</u>	<p>It was assumed that a male spouse is three years older than a female spouse and same sex spouses were assumed to be the same age. For current retirees, the actual census information was used, if available.</p>
<u>Medicare Eligibility</u>	<p>It was assumed that retirees who were over age 66 on the valuation date and were enrolled in an Active plan were ineligible for Medicare and all other participants would be eligible for Medicare at age 65, absent any information to the contrary.</p>
<u>School Demographics</u>	<p>In the absence of census data specifying which participants were teachers it was assumed that two thirds of school participants were teachers. If available, actual census data was used.</p>
<u>Compensation Increases</u>	<p>3.00% per year.</p>
<u>Inflation Rate</u>	<p>2.50% per year.</p>

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

Implicit Subsidy

The implicit subsidy arises because retirees who are not eligible for Medicare are charged the same premium as active employees, even though their actual medical costs are higher on average. Consequently, a portion of the premiums being paid for active employees are being used to “subsidize” the premiums of retirees. Actuarial Standards of Practice and GASB standards require the liability associated with this implicit subsidy to be valued. The chart below shows a breakdown of how implicit cost impacts reported cash flows and liabilities. Actuarial Standard of Practice No. 6 (“ASOP 6”) requires us to recognize this implicit subsidy while the plan sponsor may only pay the premiums billed by an insurance provider.

Impact of Implicit Subsidy		
	As of the Measurement Date	
Impact on Liability	<u>June 30, 2020</u>	<u>June 30, 2019</u>
I. Total OPEB Liability	145,096,220	132,776,940
II. Total OPEB Liability (Excluding Implicit Subsidy)	<u>120,368,504</u>	<u>127,624,232</u>
III. Liability from Implicit Subsidy [I. - II.]	24,727,716	5,152,708

	For the Measurement Period Ending	
Impact on Payments	<u>June 30, 2020</u>	<u>June 30, 2019</u>
IV. Employer Payments (Including Implicit Subsidy)	5,214,055	4,192,259
V. Actual Employer Payments	<u>4,032,184</u>	<u>4,025,843</u>
VI. Implicit Subsidy [IV. - V.]	1,181,871	166,416

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

Pre-65 and post-65 per capita costs were developed using fully insured premium rates for Non-GIC plans.

ANNUAL PER CAPITA CLAIMS*

ACTIVE EMPLOYEES			RETIREE - NOT MEDICARE ELIGIBLE			RETIREE - MEDICARE ELIGIBLE		
Age Bracket	Female	Male	Age Bracket	Female	Male	Age Bracket	Female	Male
24 & Under	4,355	2,745	44 & Under	8,946	5,862	65 to 69	4,404	4,404
25 to 29	6,426	2,857	45 to 49	9,826	7,401	70 to 74	4,404	4,404
30 to 34	8,120	3,586	50 to 54	11,559	9,748	75 to 79	4,404	4,404
35 to 39	8,365	4,502	55 to 59	13,363	12,673	80 to 84	4,404	4,404
40 to 44	8,561	5,610	60 to 64	15,902	16,262	85 to 89	4,404	4,404
45 to 49	9,403	7,082	65 to 69	19,062	20,285	90 & Over	4,404	4,404
50 to 54	11,061	9,328	70 to 74	22,479	24,309			
55 to 59	12,788	12,127	75 to 79	26,106	28,710			
60 to 64	15,217	15,562	80 to 84	29,932	33,001			
65 to 69	18,241	19,411	85 to 89	34,167	37,774			
70 & Over	21,511	23,262	90 & Over	34,167	37,774			

*Based on SOA 'Health Care Costs--From Birth to Death' study published in 2013

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

Pre-65 and post-65 per capita costs were developed using fully insured premium rates for GIC plans.

ANNUAL PER CAPITA CLAIMS*

ACTIVE EMPLOYEES			RETIREE - NOT MEDICARE ELIGIBLE			RETIREE - MEDICARE ELIGIBLE		
Age Bracket	Female	Male	Age Bracket	Female	Male	Age Bracket	Female	Male
24 & Under	5,255	3,313	44 & Under	10,794	7,073	65 to 69	4,564	4,564
25 to 29	7,753	3,447	45 to 49	11,856	8,930	70 to 74	4,564	4,564
30 to 34	9,796	4,326	50 to 54	13,947	11,761	75 to 79	4,564	4,564
35 to 39	10,092	5,433	55 to 59	16,123	15,290	80 to 84	4,564	4,564
40 to 44	10,329	6,768	60 to 64	19,186	19,621	85 to 89	4,564	4,564
45 to 49	11,345	8,545	65 to 69	22,999	24,474	90 & Over	4,564	4,564
50 to 54	13,346	11,255	70 to 74	27,122	29,329			
55 to 59	15,429	14,632	75 to 79	31,497	34,640			
60 to 64	18,360	18,776	80 to 84	36,114	39,816			
65 to 69	22,009	23,420	85 to 89	41,223	45,575			
70 & Over	25,954	28,066	90 & Over	41,223	45,575			

*Based on SOA 'Health Care Costs--From Birth to Death' study published in 2013

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

Open Group Forecast

For the projection of plan liabilities in future years, it was assumed that the number of active employees will remain constant and those who terminate employment or retire will be replaced with new employees with the demographics below:

Open Group Forecast Population Demographics		
Age	Male	Female
20	8.0%	5.0%
30	7.0%	14.0%
40	20.0%	19.0%
50	10.0%	10.0%
60	<u>3.0%</u>	<u>4.0%</u>
Total	48.0%	52.0%

Additional Comments

The liabilities being reported as of the Measurement Date of June 30, 2020 reflect a closed group and do not reflect any new entrants after the valuation date.

To the best of our knowledge all employees who are eligible on the valuation date are included in the actuarial valuation.

APPENDIX IV – PLAN DEMOGRAPHICS

Active Employees

Valuation Date	July 1, 2019	July 1, 2017
A. Average Age at Hire	34.60	34.40
B. Average Service	<u>11.53</u>	<u>12.04</u>
C. Average Current Age	46.13	46.44

Retired Employees & Spouses

Valuation Date	July 1, 2019	July 1, 2017
A. Under Age 65	136	133
B. Age 65 & Over	<u>590</u>	<u>582</u>
C. Total	726	715

Average Service Age

Age	Years of Service									Total
	0-4	5-9	10-14	15-19	20-24	25-29	30-34	35-39	40+	
0-24	46	5	1							52
25-29	65	10	13							88
30-34	37	29	12	2						80
35-39	27	23	18	18	1					87
40-44	35	9	20	17	9					90
45-49	30	17	24	23	35	8	1			138
50-54	26	15	30	30	11	11	6			129
55-59	19	13	17	24	17	9	11			110
60-64	13	8	13	28	21	7	4	1		95
65-69	3	2	3	13	4	3	4			32
70+		2	5	4	2	1	2		1	17
Total	301	133	156	159	100	39	28	1	1	918

APPENDIX IV – PLAN DEMOGRAPHICS (Non-GIC)

Plan Offerings

Number of Contracts

	<u>Single</u>	<u>Two-Person</u>	<u>Family</u>	<u>Total</u>
HMO	268	0	377	645
PPO	23	0	28	51
Managed Blue for Seniors	29	0	0	29
Medex	211	0	0	<u>211</u>
Total	531	0	405	936

Per Contract Costs (monthly)

	<u>Single</u>	<u>Two-Person</u>	<u>Family</u>
HMO	805.29	0.00	2,110.51
PPO	1,444.14	0.00	3,593.87
Managed Blue for Seniors	343.20	686.40	
Medex	379.63	759.26	
Dental Plan	N/A		N/A

APPENDIX IV – PLAN DEMOGRAPHICS (GIC)

<u>Plan Offerings</u>	<u>Number of Contracts</u>			
	<u>Single</u>	<u>Two-Person</u>	<u>Family</u>	<u>Total</u>
Fallon Select	0	0	1	1
Allways Health Partners	0	0	1	1
Tufts Navigator	1	0	0	1
Unicare Basic w/ CIC	29	0	13	42
Unicare Basic w/o CIC	0	0	0	0
Unicare Comm Choice	1	0	1	2
Unicare Plus	1	0	2	3
Unicare OME w/ CIC	98	101	0	199
Unicare OME w/o CIC	0	0	0	0
Tufts Medicare Complement	3	3	0	6
Harvard Senior	2	2	0	4
Total	135	106	18	259

	<u>Per Contract Costs (monthly)</u>		
	<u>Single</u>	<u>Two-Person</u>	<u>Family</u>
Fallon Select	836.19	0.00	2,033.04
Allways Health Partners	687.87	0.00	1,789.45
Tufts Navigator	799.04	0.00	1,951.46
Unicare Basic w/ CIC	1,163.76		2,582.71
Unicare Basic w/o CIC	1,107.42		2,454.41
Unicare Comm Choice	552.57		1,368.05
Unicare Plus	723.74		1,722.50
Unicare OME w/ CIC	399.86	799.72	
Unicare OME w/o CIC	388.80	777.60	
Tufts Medicare Complement	383.88	767.76	
Harvard Senior	404.04	808.08	
Dental Plan	N/A		N/A

APPENDIX V – OVERVIEW OF GASB 74 & 75

Before Statements 74 and 75, GASB statement 45 established the reporting standards for Other Postemployment Benefit (“OPEB”) plans. It was designed to recognize the Other Postemployment Benefits earned by employees throughout their working career vs. when they are paid in retirement – accrual accounting vs. “pay-as-you-go” accounting. Additionally, each eligible active employee earns benefits each year representing benefits to be paid in retirement or a “Service Cost”. These amounts are reflected in your financial statement each year so that OPEB benefits for an eligible employee shall be fully charged to the financial statement when that eligible employee terminates employment.

In 2012 GASB issued GASB Statements 67 and 68 to update and standardize the financial reporting of pension liabilities. This increased the transparency of pension liabilities by moving them to the balance sheet and made financial statement disclosures of pension liabilities more comparable between municipal entities. GASB Statements 74 and 75 are designed to have the same effect on OPEB plans.

GASB 74 and 75 require retiree medical plans to disclose information about asset and liability levels and show historical contribution information. GASB 74 only applies in situations where a separate trust is established to prefund these benefits. GASB 75 requires employers to perform periodic actuarial valuations to determine annual accounting costs and to keep a running tally of the extent to which these amounts are over or under funded.

GASB 74 and 75 apply to those benefits provided after retirement, except for pension benefits, such as medical, dental and life insurance. The philosophy behind the accounting standard is that these postemployment benefits are part of the compensation earned by employees in return for their services, and the cost of these benefits should be recognized while employees are providing those services, rather than after they have retired. This philosophy has already been applied for years to defined benefit pensions; GASB 74 and 75 extend this practice to all other postemployment benefits.

APPENDIX V – OVERVIEW OF GASB 74 & 75

The process of determining the liability for OPEB benefits is based on many assumptions about future events. The key actuarial assumptions are:

Turnover and retirement rates – How likely is it that an employee will qualify for postemployment benefits and when will they start?

Medical inflation and claims cost assumptions – When an employee starts receiving postemployment benefits many years from now, how much will be paid each year for the benefits and how rapidly will the costs grow?

Mortality assumption – How long is a retiree likely to receive benefits?

Discount rate assumption – What is the present value of those future benefit payments in terms of today's dollars?

Since the liability is being recognized over the employee's whole career with the Town, the present value is divided into three pieces: the part that is attributed to past years (the "Total OPEB Liability" or "Past Service Liability"), the part that is being earned this year (the "Service Cost"), and the part that will be earned in future years (the "Future Service Liability").

Once the Accrued Liability and the Service Cost have been calculated, the next step is to determine an actuarially determined contribution. This is an amount that if paid annually would fully prefund the benefits for current active and retired employees. This consists of two pieces:

- ✓ Service Cost – because the benefits earned by active employees each year should be paid for each year
- ✓ Past Service Cost – a catch-up payment to fund the Accrued Liability over a period of time determined by an actuary

The final step is to keep track going forward of how much of the contribution is actually paid. There is no requirement to actually fund these benefits, but the cumulative deficiency must be disclosed on the Town's financial statements as the Net OPEB Liability (NOL). If you decide to fully fund the NOL this will appear in the financial statement as a Net OPEB Asset. In addition, the Discount Rate used to calculate the liabilities must reflect the expected investment income of whatever funds are set aside to prefund the benefits; if there is no prefunding then the Discount Rate will be much lower and the liabilities significantly higher than if the benefits are prefunded.

GLOSSARY

Accrual Accounting – A system of accounting in which revenues are recorded when earned and outlays are recorded when goods are received or services performed, even though the actual receipt of revenues and payment for goods or services may occur, in whole or in part, at a different time.

Actuarially Determined Contribution – Amount of funding required annually to fully fund plan benefits. Determined by the actuary using a consistent methodology.

Amortization – Allows the recognition of liability over a fixed period of time.

Cash Basis Accounting – A system of accounting in which revenues are recorded when received and outlays are recorded when payment is made.

Deferred Inflows/Outflows of Resources – Amounts arising from experience gains and losses that have not been recognized into the OPEB Expense but will be recognized in the future.

Discount Rate – The interest rate used to calculate the present value of future cash flows. Under GASB 75, the rate should be the expected long-term rate of return on investments for a plan that is being fully funded, the 20-year municipal bond index for a pay-as-you-go plan, and a blend of the two rates for a plan that is being partially funded.

Entry Age Normal – Under this method, the annual service cost for each individual active member, payable from the date of employment to the date of retirement, is sufficient to accumulate the value of the member's benefit at the time of retirement. The annual service cost for each active member is a level percent of payroll. The total OPEB liability is the actuarial present value of the projected benefit times the ratio of past service to expected total service at retirement/termination.

Fiduciary Net Position – The value of cash, investments, other assets and property belonging to an OPEB trust.

GLOSSARY

Government Accounting Standards Board (GASB) – “The Governmental Accounting Standards Board (GASB) was organized in 1984 by the Financial Accounting Foundation (FAF) to establish standards of financial accounting and reporting for state and local governmental entities. Its standards guide the preparation of external financial reports of those entities.”

Implicit Subsidy – The liability that arises because retirees who are not eligible for Medicare are charged the same premium as active employees even though their actual medical costs are higher on average.

Irrevocable Contribution – The transfer of assets to a qualified trust in which assets may only be withdrawn for the purpose of providing retiree other postemployment benefits.

Net OPEB Liability (NOL) – Total OPEB Liability less the Fiduciary Net Position.

Other Postemployment Benefits (OPEB) – Benefits that an employee will begin to receive at the start of retirement. This does not include pension benefits paid to the retired employee.

OPEB Trust – An entity which holds assets for the sole purpose of funding OPEB. All contributions and earnings within this entity must be irrevocable and protected from creditors.

Pay-as-you-go funding – Paying benefits (such as pensions or OPEB) on a cash basis, with no money set aside for future liabilities which are already incurred.

Service Cost – The actuarially determined present value contribution needed to fund benefits which are earned for employee service rendered during the current year. Service cost depends on many factors, including the interest rate used to discount future cashflows, and expected inflation.

Total OPEB Liability (TOL) – That portion, as determined by the Individual Entry Age Normal Actuarial Cost Method, of the Actuarial Present Value of benefits and expenses which are not provided for by future Service Costs.