

City of Newburyport Other Postemployment Benefits Plan

GASB 74 & GASB 75 Actuarial Valuation

With a Valuation Date of July 1, 2020

As of the Measurement Date:
June 30, 2022

For the Reporting Date:
June 30, 2022

Delivered September 28, 2022



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September 28, 2022

Personal and Confidential

Mr. Ethan Manning
Finance Director/City Auditor
City of Newburyport
60 Pleasant Street
Newburyport, MA 01950

Dear Mr. Manning:

We have performed an actuarial valuation of the City of Newburyport Other Postemployment Benefits Plan for the Reporting Date & Fiscal Year Ending June 30, 2022 with a Measurement Date of June 30, 2022 and a Valuation Date of July 1, 2020. The figures presented in this report reflect the adoption, by the City of Newburyport, of Statement Nos. 74 and 75 of the Governmental Accounting Standards Board ("GASB 74/75").

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



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ACTUARIAL CERTIFICATION

This is to certify that Odyssey Advisors has conducted an actuarial valuation of certain benefit obligations of the City of Newburyport other postemployment benefit programs with a Valuation Date of July 1, 2020 with a Measurement Date of June 30, 2022 for the Reporting Date & Fiscal Year Ending June 30, 2022 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 City and on participant claims or premium data provided by the City and/or vendors employed by the City.

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 City are reasonably related to the experience and expectations of the postemployment benefits programs.

A handwritten signature in black ink, appearing to be 'P. Elmore', written over a light blue background.

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

A handwritten signature in black ink, appearing to be 'K. Thompson', written over a light blue background.

Kurtis J. Thompson, ASA, MAAA
Consulting Actuary

EXECUTIVE SUMMARY

How did plan liabilities change from FY 21 to FY 22?

Plan Experience

For the year ending on the Measurement Date of June 30, 2022, there was no plan experience because this was an interim valuation.

Assumption Changes

One or more key assumptions have changed since the prior valuation. The total impact of these assumption changes decreased disclosed liabilities by approximately \$9.7 million, as detailed below.

- ✓ Due to the GASB 75 standards the discount rate has been changed from 4.25% to 5.12% decreasing the disclosed liability by approximately \$9.7 million.

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 investments earned approximately \$15 thousand less than expected.

Changes in Benefit 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 5.00 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.

Key Drivers of Plan Liabilities

Several key drivers of plan costs and liabilities are:

- ✓ Premiums for Post 65 (Medicare supplement) plans – represent 73.23% 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 according to the Getzen Model of Long-Run Medical Cost Trends for Active and Medicare supplement plans, which includes an assumed 4.50% increase in fiscal year 2022 and an ultimate trend rate of 3.60% in fiscal year 2061.
- ✓ Discount Rate (5.12%) – 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

EXECUTIVE SUMMARY

Discount Rate Determinants

- ✓ Employer Current and Future Benefit Payments
- ✓ Municipal Bond Rate – The S&P 20-year high grade municipal bond index was 4.09% as of June 30, 2022.
- ✓ Current Asset Level – The City had \$1,178,780 of OPEB assets as of June 30, 2022.
- ✓ Future Funding Policy – The City is expected to contribute 1% of annual health insurance spending until their pension system is fully funded, at which point the City will reallocate the funds used to pay its pension amortization towards OPEB.
- ✓ Investment Policy – The City is expected to earn 6.41% per year on assets based on its investment policy.

Low Default Risk Obligation Measure (LDRM)

For purposes of this LDRM, we have used a discount rate of 4.09% which represents the 20-year municipal bond index while keeping all other assumptions unchanged from the GASB 74/75 disclosures. Based on this, the LDRM Total OPEB Liability is \$100 million vs. the \$91 million under the GASB 74/75 measure - the reflection of the City's funding and OPEB Trust Investment policy reduced disclosed liabilities by approximately \$10 million. Please note that the ultimate cost of the plan is the actual benefits paid plus expenses and any changes in assumptions, including discount rate, do not impact the actual cost of the plan.

Medicare Buy-In

The City currently has 5 retirees or covered spouses who are over the age of 65 and are enrolled in Active medical plans rather than Medicare Supplement (Senior) plans. Under Actuarial Standards of Practice for OPEB, we are required to reflect the projected higher healthcare costs that occur as retirees age.

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 City 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. 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, 2020	July 1, 2020
Measurement Date & Period Ending	June 30, 2022	June 30, 2021
Reporting Date/Fiscal Year End	June 30, 2022	June 30, 2021
Total OPEB Liability	90,558,732	96,642,165
Per Eligible Active Plan Participant	78,757	82,450
Per Retiree/Spouse Plan Participant	84,618	92,106
Total Annual Service Cost (Annual Benefit Accrual)	2,821,835	3,141,029
Per Eligible Active Plan Participant	4,791	5,333
Expected Employer Share of Retiree Costs	3,355,909	3,163,792
Per Retiree/Spouse Plan Participant	6,429	6,061
Net OPEB Liability as a % of Covered Payroll	216.04%	238.06%

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, 2022	522	90,558,732	90,558,732	3,355,909	3,355,909
June 30, 2027	622	107,580,390	92,799,789	4,382,983	3,780,800
June 30, 2032	652	124,860,800	92,908,161	5,586,239	4,156,686
June 30, 2037	643	142,687,962	91,585,973	6,684,283	4,290,387
June 30, 2042	606	162,686,186	90,075,397	7,534,028	4,171,409
June 30, 2047	563	187,986,493	89,783,396	8,242,447	3,936,639
June 30, 2052	529	219,078,829	90,257,577	9,093,094	3,746,234

EXECUTIVE SUMMARY

Continuing OPEB Disclosures

In addition to pension benefits, municipal entities may provide retired employees with healthcare and life insurance benefits. The portion of the cost of such benefit paid by these entities is generally provided on a pay-as-you-go basis.

The pay-as-you-go costs to the City for such benefits for the most recent years is as follows:

<u>Fiscal Year Ending</u>	<u>Cost</u>
June 30, 2023 (Projected)	3,466,575
June 30, 2022	3,355,909
June 30, 2021	3,163,792
June 30, 2020	2,876,909
June 30, 2019	2,782,475
June 30, 2018	2,656,780

The City performs actuarial valuations of its non-pension post-employment benefits liability in accordance with GASB reporting requirements. As of the June 30, 2022 Measurement Date the Net OPEB Liability ("NOL") was determined to be \$89,379,952 assuming a discount rate of 5.12%. The City has established an OPEB Trust and plans to fund this liability. The City is expected to contribute 1% of annual health insurance spending until their pension system is fully funded, at which point the City will reallocate the funds used to pay its pension amortization towards OPEB. The balance of this fund as of June 30, 2022 was \$1,178,780. See the City's audit reports for additional information.

PRINCIPAL RESULTS OF THE VALUATION

City of Newburyport
Assuming Funding - 5.12% discount rate
Comparison of Plan Liabilities to Prior Valuation

Valuation Date	July 1, 2020	July 1, 2020
For the Measurement Period ending on the Measurement Date of:	June 30, 2022	June 30, 2021
For the Reporting Period & Fiscal Year ending on:	June 30, 2022	June 30, 2021
I. Total OPEB Liability		
A. Actives	46,388,106	48,562,990
B. Retirees/Disabled	<u>44,170,626</u>	<u>48,079,175</u>
C. Total	90,558,732	96,642,165
II. Fiduciary Net Position [Plan Assets]	1,178,780	1,020,910
III. Net OPEB Liability (Asset) [I. - II.]	89,379,952	95,621,255
IV. Funded Ratio [II. / I.]	1.30%	1.06%
V. Number of Eligible Participants		
A. Actives	589	589
B. Retirees/Disabled & Dependents	<u>522</u>	<u>522</u>
C. Total	1,111	1,111
VI. Service Cost	2,821,835	3,141,029
VII. Financial Statement Expense/(Income)	7,135,784	8,662,949
VIII. Employer OPEB Trust (Contribution)/Withdrawal	(100,000)	(100,000)
IX. Deferred Inflow of Resources	(10,050,407)	(4,216,932)
X. Deferred Outflow of Resources	7,825,351	11,913,054
XI. Money Weighted Rate of Return	5.67%	16.73%
XII. 20-year Municipal Bond Rate (SAPIHG)	4.09%	2.18%
XIII. Expected Long Term Rate of Return (Net of Expense)	6.41%	6.77%
XIV. Crossover Year	Immediate	Immediate
XV. Discount Rate	5.12%	4.25%

PRINCIPAL RESULTS OF THE VALUATION

**City of Newburyport
Plan Liabilities as of the June 30, 2022 Measurement Date**

	General Government Employees and Retirees	School Employees and Retirees	Water Enterprise Employees and Retirees	Sewer Enterprise Employees and Retirees	Total
I. Total OPEB Liability					
A. Actives	15,083,983	28,883,635	1,129,818	1,290,670	46,388,106
B. Retirees/Disabled	<u>17,945,437</u>	<u>25,108,021</u>	<u>748,734</u>	<u>368,434</u>	<u>44,170,626</u>
C. Total	33,029,420	53,991,656	1,878,552	1,659,104	90,558,732
II. Fiduciary Net Position [Plan Assets]	429,935	702,796	24,453	21,596	1,178,780
III. Net OPEB Liability (Asset) [I. - II.]	32,599,485	53,288,860	1,854,099	1,637,508	89,379,952
For the Reporting Date and Fiscal Year Ending June 30, 2022					
IV. Service Cost	831,063	1,833,993	90,202	66,577	2,821,835
V. Financial Statement Expense/(Income)	2,290,516	4,511,485	184,343	149,440	7,135,784
VI. Employer Share of Costs	(1,358,591)	(1,880,966)	(66,825)	(49,527)	(3,355,909)
VII. Employer OPEB Trust (Contribution)/Withdrawal	(36,473)	(59,621)	(2,074)	(1,832)	(100,000)
VIII. Total Employer Contribution [VI. + VII.]	(1,395,064)	(1,940,587)	(68,899)	(51,359)	(3,455,909)

PRINCIPAL RESULTS OF THE VALUATION
CURRENT FUNDING POLICY (OPEN GROUP)

Funding - 5.12% 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 6.41% return		III. Net OPEB Liability (Asset) [I. - II.]	IV. Funded Ratio [III. / 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.]
			Measurement Date	with an expected 6.41% return									
2022	June 30, 2022	90,558,732	1,178,780	89,379,952	1.30%	2,821,835	3,355,909	100,000	3,455,909	3,355,909	0	100,000	
2023	June 30, 2023	93,924,621	1,357,495	92,567,126	1.45%	2,382,209	3,466,575	100,000	3,566,575	3,466,575	0	100,000	
2024	June 30, 2024	97,256,452	1,547,666	95,708,786	1.59%	2,453,947	3,754,527	100,000	3,854,527	3,754,527	0	100,000	
2025	June 30, 2025	100,677,295	1,750,027	98,927,268	1.74%	2,534,161	3,913,239	100,000	4,013,239	3,913,239	0	100,000	
2026	June 30, 2026	104,128,331	1,965,359	102,162,972	1.89%	2,612,591	4,136,620	100,000	4,236,620	4,136,620	0	100,000	
2027	June 30, 2027	107,580,390	2,194,494	105,385,896	2.04%	2,686,353	4,382,983	100,000	4,482,983	4,382,983	0	100,000	
2028	June 30, 2028	111,037,758	2,438,316	108,599,442	2.20%	2,753,928	4,649,188	100,000	4,749,188	4,649,188	0	100,000	
2029	June 30, 2029	114,524,555	2,697,767	111,826,788	2.36%	2,824,973	4,863,455	100,000	4,963,455	4,863,455	0	100,000	
2030	June 30, 2030	117,986,230	2,973,849	115,012,381	2.52%	2,907,097	5,104,349	100,000	5,204,349	5,104,349	0	100,000	
2031	June 30, 2031	121,390,621	3,267,628	118,122,993	2.69%	2,980,010	5,405,575	100,000	5,505,575	5,405,575	0	100,000	
2032	June 30, 2032	124,860,800	3,580,238	121,280,562	2.87%	3,056,108	5,586,239	100,000	5,686,239	5,586,239	0	100,000	
2033	June 30, 2033	128,340,121	3,912,886	124,427,235	3.05%	3,137,734	5,829,388	100,000	5,929,388	5,829,388	0	100,000	
2034	June 30, 2034	131,842,202	4,266,857	127,575,345	3.24%	3,223,317	6,067,374	100,000	6,167,374	6,067,374	0	100,000	
2035	June 30, 2035	135,424,068	4,643,518	130,780,550	3.43%	3,318,933	6,271,141	100,000	6,371,141	6,271,141	0	100,000	
2036	June 30, 2036	138,985,531	5,044,323	133,941,208	3.63%	3,414,930	6,452,117	100,000	6,552,117	6,452,117	0	100,000	
2037	June 30, 2037	142,687,962	5,470,819	137,217,143	3.83%	3,516,030	6,684,283	100,000	6,784,283	6,684,283	0	100,000	
2038	June 30, 2038	146,397,558	10,627,266	135,770,292	7.26%	3,621,153	6,969,129	4,658,773	11,627,902	6,969,129	0	4,658,773	
2039	June 30, 2039	150,164,432	19,270,336	130,894,096	12.83%	3,732,385	7,129,181	7,718,332	14,847,513	7,129,181	0	7,718,332	
2040	June 30, 2040	154,259,131	28,467,427	125,791,704	18.45%	3,846,648	7,271,436	7,718,332	14,989,768	7,271,436	0	7,718,332	
2041	June 30, 2041	158,289,875	38,254,052	120,035,823	24.17%	3,967,885	7,429,291	7,718,332	15,147,623	7,429,291	0	7,718,332	
2042	June 30, 2042	162,686,186	48,667,999	114,018,187	29.92%	4,092,330	7,534,028	7,718,332	15,252,360	7,534,028	0	7,718,332	
2043	June 30, 2043	167,325,122	59,749,480	107,575,642	35.71%	4,227,684	7,545,778	7,718,332	15,264,110	7,545,778	0	7,718,332	
2044	June 30, 2044	172,205,985	71,541,284	100,664,701	41.54%	4,371,687	7,678,395	7,718,332	15,396,727	7,678,395	0	7,718,332	
2045	June 30, 2045	177,309,450	84,088,943	93,220,507	47.42%	4,523,630	7,896,359	7,718,332	15,614,691	7,896,359	0	7,718,332	
2046	June 30, 2046	182,345,241	97,440,907	84,904,334	53.44%	4,683,734	8,102,414	7,718,332	15,820,746	8,102,414	0	7,718,332	
2047	June 30, 2047	187,986,493	111,648,732	76,337,761	59.39%	4,852,397	8,242,447	7,718,332	15,960,779	8,242,447	0	7,718,332	
2048	June 30, 2048	193,840,450	126,767,278	67,073,172	65.40%	5,033,815	8,419,551	7,718,332	16,137,883	8,419,551	0	7,718,332	
2049	June 30, 2049	199,803,494	142,854,923	56,948,571	71.50%	5,220,878	8,689,521	7,718,332	16,407,853	8,689,521	0	7,718,332	
2050	June 30, 2050	206,194,426	159,973,786	46,220,640	77.58%	5,415,698	8,770,242	7,718,332	16,488,574	8,770,242	0	7,718,332	
2051	June 30, 2051	212,621,810	178,189,968	34,431,842	83.81%	5,623,199	8,854,960	7,718,332	16,573,292	8,854,960	0	7,718,332	
2052	June 30, 2052	219,078,829	197,573,808	21,505,021	90.18%	5,836,109	9,093,094	7,718,332	16,811,426	9,093,094	0	7,718,332	

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES

(As of the June 30, 2022 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 City's OPEB Expenses for the Fiscal Year Ending June 30, 2022	
Description	Amount
I. Service Cost	2,821,835
II. Interest on Total OPEB Liability (Asset), Service Cost, and Benefit Payments	4,156,649
III. Deferred (Inflows)/Outflows from Plan Experience*	(1,908,283)
IV. Deferred (Inflows)/Outflows from Changes of Assumptions*	2,146,502
V. Projected Earnings on OPEB Plan Investments	(72,494)
VI. Deferred (Inflows)/Outflows from Earnings on Plan Investments**	(8,425)
VII. OPEB Plan Administrative Expense	0
VIII. Other Changes in Fiduciary Net Position	0
IX. Financial Statement Expense/(Income) Prior to Plan Design Changes [I. + II.+ ... + VII. + VIII.]	7,135,784
X. Expense Related to Change in Benefit Terms***	0
XI. Financial Statement Expense/(Income) [IX. + X.]	7,135,784

* Amortized over 5.00 years

** Amortized over 5.00 years

*** Recognized Immediately

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
(As of the June 30, 2022 Measurement Date)

2. Changes in Net OPEB Liability

Changes in Net OPEB Liability				
		Increase (Decrease)		
		Total OPEB Liability	Plan Fiduciary Net Position	Net OPEB Liability
I.	Balances for the June 30, 2021 Reporting Date	96,642,165	1,020,910	95,621,255
II.	Prior Period Adjustment	0	0	0
III.	Balances for the June 30, 2021 Reporting Date with Adjustment [I. + II.]	96,642,165	1,020,910	95,621,255
Changes for the year:				
IV.	Service Cost	2,821,835	0	2,821,835
V.	Interest on Total OPEB Liability, Service Cost, and Benefit Payments	4,156,649	0	4,156,649
VI.	Changes in Benefit Terms *	0	0	0
VII.	Change in Assumptions **	(9,706,008)	0	(9,706,008)
VIII.	Differences Between Actual and Expected Experience **	0	0	0
IX.	Net Investment Income	0	57,870	(57,870)
X.	Employer Contributions to Trust	0	3,455,909	(3,455,909)
XI.	Benefit Payments Withdrawn from Trust	0	(3,355,909)	3,355,909
XII.	Benefit Payments Excluding Implicit Cost	(2,737,986)	0	(2,737,986)
XIII.	Implicit Cost Amount	(617,923)	0	(617,923)
XIV.	Total Benefit Payments Including Implicit Cost [XII. + XIII.]	(3,355,909)	0	(3,355,909)
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.]	(6,083,433)	157,870	(6,241,303)
XVIII.	Balances for the June 30, 2022 Reporting Date [III.+XVII.]	90,558,732	1,178,780	89,379,952

* Recognized Immediately

** Amortized over 5.00 years

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES

(As of the June 30, 2022 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 Year	Differences			2022	2023	2024	2025	2026	2027
	Between Actual & Expected Experience	Recognition Period (Years)	Remaining Balance						
2017									
2018	0	5.13	0	0	0				
2019	(9,654,268)	5.16	(2,170,340)	(1,870,982)	(1,870,982)	(299,358)			
2020	(75,075)	5.16	(31,428)	(14,549)	(14,549)	(14,549)	(2,330)		
2021	(113,761)	5.00	(68,257)	(22,752)	(22,752)	(22,752)	(22,753)		
2022	0	5.00	0	0	0	0	0	0	
2023									
2024									
2025									
2026									
Total Remaining Balance			(2,270,025)						
Net increase (decrease) in OPEB Expense				(1,908,283)	(1,908,283)	(336,659)	(25,083)	0	0

Deferred (Inflows)/Outflows in OPEB Expense Arising from the Recognition of the Effects of Changes in Assumptions									
Fiscal Year	Differences from Changes in			2022	2023	2024	2025	2026	2027
	Actuarial Assumptions	Recognition Period (years)	Remaining Balance						
2017									
2018	0	5.13	0	0	0				
2019	8,642,414	5.16	1,942,870	1,674,886	1,674,886	267,984			
2020	8,329,553	5.16	3,486,791	1,614,254	1,614,254	1,614,254	258,283		
2021	3,992,816	5.00	2,395,690	798,563	798,563	798,563	798,564		
2022	(9,706,008)	5.00	(7,764,807)	(1,941,201)	(1,941,201)	(1,941,201)	(1,941,201)	(1,941,204)	
2023									
2024									
2025									
2026									
Total Remaining Balance			60,544						
Net increase (decrease) in OPEB Expense				2,146,502	2,146,502	739,600	(884,354)	(1,941,204)	0

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
(As of the June 30, 2022 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 Year	Differences			2022	2023	2024	2025	2026	2027
	Between Actual & Expected Earnings	Recognition Period (years)	Remaining Balance						
2017									
2018	(31,885)	5.00	0	(6,377)					
2019	11,405	5.00	2,281	2,281	2,281				
2020	39,007	5.00	15,604	7,801	7,801	7,803			
2021	(75,268)	5.00	(45,160)	(15,054)	(15,054)	(15,054)	(15,052)		
2022	14,624	5.00	11,700	2,924	2,924	2,924	2,924	2,928	
2023									
2024									
2025									
2026									
Total Remaining Balance			(15,575)						
Net increase (decrease) in OPEB Expense				(8,425)	(2,048)	(4,327)	(12,128)	2,928	0

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES

(As of the June 30, 2022 Measurement Date)

3. Changes in Net OPEB Expense (Continued)

Statement of (Inflows) & Outflows Arising from Current & Prior Reporting Periods for the Measurement Period Ending on June 30, 2022 to be Reported for the Fiscal Year Ending June 30, 2022			
	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	(2,270,025)	(2,270,025)
III. Changes of Assumptions	7,825,351	(7,764,807)	60,544
IV. Net Difference Between Projected & Actual Earnings on OPEB Plan Investments	0	(15,575)	(15,575)
VI. Total [I. + II. + III. + IV.]	7,825,351	(10,050,407)	(2,225,056)

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
 (As of the June 30, 2022 Measurement Date)

3. Changes in Net OPEB Expense (Continued)

Annual Amortization of Deferred (Inflows) & Outflows		
The balance of deferred (inflows) & outflows as of the Reporting Date of June 30, 2022 will be recognized in future years as shown below.		
	Year ending June 30:	
	2023	236,171
	2024	398,614
	2025	(921,565)
	2026	(1,938,276)
	2027	0
	Thereafter	0

4. Discount Rate

The discount rate used to measure the Total OPEB liability was 5.12% as of June 30, 2022 and 4.25% as of June 30, 2021. The projection of cash flows used to determine the discount rate assumed that contributions will be made in accordance with the City's funding policy. Based on these assumptions, the OPEB Plan's Fiduciary Net Position is projected to be insufficient to make all projected benefit payments to current plan members. Therefore, the long-term expected rate of return on the OPEB Plan assets is applied to the projected benefits payments which the Fiduciary Net Position is expected to be sufficient to cover and the Municipal Bond Rate is applied thereafter. The Municipal Bond Rate is based on the S&P Municipal Bond 20 – Year High Grade Index ("SAPIHG"), which was 4.09% as of June 30, 2022. The S&P Municipal Bond 20 - Year High Grade Index is the index rate for 20 – Year, tax exempt general obligation municipal bonds with an average rate of AA/Aa or higher.

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES (As of the June 30, 2022 Measurement Date)

5. Funding Policy

The contribution requirements of plan members and the City are established and may be amended through City ordinances. For the period ending on the June 30, 2022 Measurement Date, total City premiums plus implicit costs for the retiree medical program were \$3,355,909. The City also contributed \$100,000 to an OPEB Trust for a total contribution during the measurement period of \$3,455,909 to be reported on the financial statement for the fiscal year ending June 30, 2022.

6. Investment Policy

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

Investment Target Allocation & Expected Long-Term Real Rate of Return			
<u>Asset Class</u>	<u>Target Allocation</u>	<u>Asset Class</u>	<u>Long-Term Expected Real Rate of Return*</u>
Domestic Equity - Large Cap	14.50%	Domestic Equity - Large Cap	4.42%
Domestic Equity - Small/Mid Cap	3.50%	Domestic Equity - Small/Mid Cap	4.81%
International Equity - Developed Market	16.00%	International Equity - Developed Market	4.91%
International Equity - Emerging Market	6.00%	International Equity - Emerging Market	5.58%
Domestic Fixed Income	20.00%	Domestic Fixed Income	1.00%
International Fixed Income	3.00%	International Fixed Income	1.04%
Alternatives	23.00%	Alternatives	5.98%
Real Estate	14.00%	Real Estate	6.25%
Cash	0.00%	Cash	0.00%
Total	<u>100.00%</u>		
		I. Real Rate of Return	<u>4.41%</u>
		II. Inflation Assumption	2.50%
		III. Total Nominal Return [I. + II.]	6.91%
		IV. Investment Expense	0.50%
		V. Net Investment Return* [III.-IV.]	<u>6.41%</u>

* Mean Geometric Returns based on 2021 Horizon Survey of Capital Market Assumptions

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
(As of the June 30, 2022 Measurement Date)

7. Schedule of The City'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, 2022	6,763,549	(3,455,909)	3,307,640	41,372,226	8.35%
June 30, 2021	6,917,027	(3,263,792)	3,653,235	40,167,210	8.13%
June 30, 2020	7,819,663	(2,876,909)	4,942,754	39,836,189	7.22%
June 30, 2019	6,919,837	(2,842,475)	4,077,362	38,675,912	7.35%
June 30, 2018	7,329,686	(2,706,780)	4,622,906	41,172,059	6.57%
June 30, 2017	7,217,226	(2,482,447)	4,734,779	39,972,872	6.21%

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES

(As of the June 30, 2022 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, 2022 Measurement Date</u>			
	<u>1% Decrease</u>	<u>Current Trend Rate</u>	<u>1% Increase</u>
Net OPEB Liability (Asset)	77,007,450	89,379,952	104,926,864

9. Effect of 1% Change in Discount Rates

<u>Impact of a 1% Change in the Discount Rate as of the June 30, 2022 Measurement Date</u>			
	<u>1% Decrease</u>	<u>Current Discount Rate</u>	<u>1% Increase</u>
Net OPEB Liability (Asset)	103,328,531	5.12% 89,379,952	78,219,171

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES
(As of the June 30, 2022 Measurement Date)

10. Money Weighted Rate of Return

	Plan Investments / Net External Cash Flows	Periods Invested	Period Weight
I. Beginning value - June 30, 2021	1,020,910	12	1.0000
Monthly net external cash flows:			
July	0	11	0.9167
August	0	10	0.8333
September	0	9	0.7500
October	0	8	0.6667
November	0	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>100,000</u>	0	0.0000
II. Total net external cash flow	100,000		
III. Earnings and increase in fair value	57,870		
IV. Ending value - June 30, 2022 [I.+II.+III.]	1,178,780		
Money Weighted Rate of Return	5.67%		
Asset Value - June 30, 2022	1,178,780		

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES

(As of the June 30, 2022 Measurement Date)

11. OPEB Liability, OPEB Expense

	Fiscal Year Ending June 30, 2022				Total
	General Government Employees and Retirees	School Employees and Retirees	Water Enterprise Employees and Retirees	Sewer Enterprise Employees and Retirees	
I. Total OPEB Liability as of June 30, 2022	33,029,420	53,991,656	1,878,552	1,659,104	90,558,732
II. Fiduciary Net Position as of June 30, 2022	429,935	702,796	24,453	21,596	1,178,780
III. Net OPEB Liability (Asset) as of June 30, 2022 [I. - II.]	32,599,485	53,288,860	1,854,099	1,637,508	89,379,952
IV. Service Cost	831,063	1,833,993	90,202	66,577	2,821,835
V. Interest on Total OPEB Liability (Asset), Service Cost, and Benefit Payments	1,401,998	2,583,785	90,882	79,984	4,156,649
VI. Projected Earnings on OPEB Plan Investments	(26,357)	(43,298)	(1,508)	(1,331)	(72,494)
VII. Net Recognition of Deferred (Inflows)/Outflows	83,812	137,005	4,767	4,210	229,794
VIII. OPEB Plan Administrative Expense	0	0	0	0	0
IX. Expense Related to Change in Benefit Terms	0	0	0	0	0
X. Financial Statement Expense/(Income) [IV. + V. + ... + VIII. + IX.]	2,290,516	4,511,485	184,343	149,440	7,135,784
XI. Employer Share of Costs	(1,358,591)	(1,880,966)	(66,825)	(49,527)	(3,355,909)
XII. Employer (Payments) Withdrawals to/from OPEB Trust	(36,473)	(59,621)	(2,074)	(1,832)	(100,000)
XIII. Total Employer Contribution [XI. + XII.]	(1,395,064)	(1,940,587)	(68,899)	(51,359)	(3,455,909)
XIV. Net OPEB Expense/(Income) [X. + XIII.]	895,452	2,570,898	115,444	98,081	3,679,875

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES (As of the June 30, 2022 Measurement Date)

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

Valuation Date	July 1, 2020
For the Measurement Period ending on the Measurement Date of:	June 30, 2022
For the Reporting Period & Fiscal Year ending on:	June 30, 2022

Source of Deferred Inflow/Outflow	
I. Deferred (Inflow)/Outflow from Actual vs. Expected Experience	(2,270,025)
II. Deferred (Inflow)/Outflow from Investment Experience	(15,575)
III. Deferred (Inflow)/Outflow from Changes in Assumptions	60,544

Change in Deferred Inflow/Outflow	
I. Deferred Outflow at the beginning of the period	11,941,021
II. Deferred Outflow created during the period	14,624
III. Deferred Outflow recognized during the period	4,100,709
IV. Change in Deferred Outflow (II. - III.)	(4,086,085)
V. Deferred Outflow at end of the period (I. + IV.)	7,854,936
VI. Deferred Inflow at the beginning of the period	(4,244,899)
VII. Deferred Inflow created during the period	(9,706,008)
VIII. Deferred Inflow recognized during the period	(3,870,915)
IX. Change in Deferred Inflow (VII. - VIII.)	(5,835,093)
X. Deferred inflow at end of the period (VI. + IX.)	(10,079,992)

Net OPEB Liability	
I. Net OPEB Liability at beginning of period	95,621,255
II. Service Cost	2,821,835
III. Interest on Total OPEB Liability, Service Cost, and Payments	4,156,649
IV. Projected Investment Income	(72,494)
V. OPEB Plan Administrative Expense	0
VI. Total Employer Contributions	(3,455,909)
VII. Expense Related to Change in Benefit Terms	0
VIII. Net OPEB Expense/(Income) - Before Recognition of Deferred (Inflow)/Outflow (II. + III. + ... + VI. + VII.)	3,450,081
IX. Deferred Outflow created during the period	14,624
X. Deferred Inflow created during the period	(9,706,008)
XI. Net OPEB Liability at end of period (I. + VIII. + IX. + X.)	89,379,952

Net OPEB Expense	
I. Service Cost	2,821,835
II. Interest on Total OPEB Liability, Service Cost, and Payments	4,156,649
III. Projected Investment Income	(72,494)
IV. Recognition of Deferred (Inflow)/Outflow	229,794
V. OPEB Plan Administrative Expense	0
VI. Expense Related to Change in Benefit Terms	0
VII. Financial Statement Expense/(Income) (I. + II. + III. + IV. + V. + VI.)	7,135,784
VIII. Benefit Payments	(3,355,909)
IX. Contributions to Trust	(100,000)
X. Total Employer Payments (VIII. + IX.)	(3,455,909)
XI. Total Net OPEB Expense/(Income) under GASB 75 (IX. + X.)	3,679,875

EXHIBIT A
REQUIRED SUPPLEMENTARY INFORMATION
(As of the June 30, 2022 Measurement Date)

Schedule of Changes in the City's Net OPEB Liability and Related Ratios						
Valuation Date	July 1, 2020	July 1, 2020	July 1, 2018	July 1, 2018	July 1, 2016	July 1, 2016
Measurement Date	June 30, 2022	June 30, 2021	June 30, 2020	June 30, 2019	June 30, 2018	June 30, 2017
For the Reporting Period & Fiscal Year Ending on:	June 30, 2022	June 30, 2021	June 30, 2020	June 30, 2019	June 30, 2018	June 30, 2017
Total OPEB Liability	90,558,732	96,642,165	89,375,286	77,411,201	75,350,348	84,082,487
I. Service Cost	2,821,835	3,141,029	3,030,651	2,417,544	2,423,566	3,005,942
II. Interest on Total OPEB Liability, Service Cost, and Benefit Payments	4,156,649	3,410,587	3,555,865	3,437,638	3,430,587	2,885,278
III. Changes in Benefit Terms	0	0	0	0	0	0
IV. Difference Between Expected & Actual Plan Experience	0	(113,761)	(75,075)	(9,654,268)	(11,929,512)	0
V. Changes of Assumptions	(9,706,008)	3,992,816	8,329,553	8,642,414	0	0
VI. Benefit Payments Excluding Implicit Cost	(2,737,986)	(2,581,429)	(2,331,339)	(2,223,258)	(2,318,266)	(2,168,509)
VII. Implicit Cost Amount	(617,923)	(582,363)	(545,570)	(559,217)	(338,514)	(288,938)
VIII. Total Benefit Payments	(3,355,909)	(3,163,792)	(2,876,909)	(2,782,475)	(2,656,780)	(2,457,447)
IX. Other	0	0	0	0	0	0
X. Net Change in OPEB Liability [I.+II.+III.+IV.+V.+VIII.+IX.]	(6,083,433)	7,266,879	11,964,085	2,060,853	(8,732,139)	3,433,773
XI. Total OPEB Liability - Beginning of Period	96,642,165	89,375,286	77,411,201	75,350,348	84,082,487	80,648,714
XII. Change Due to Proportional Share	0	0	0	0	0	0
XIII. Total OPEB Liability - Beginning of Period with Adjustment [XI.+XII.]	96,642,165	89,375,286	77,411,201	75,350,348	84,082,487	80,648,714
XIV. Total OPEB Liability - End of Period [XII.+XIII.]	90,558,732	96,642,165	89,375,286	77,411,201	75,350,348	84,082,487
Plan Fiduciary Net Position	1,178,780	1,020,910	788,904	773,676	675,453	571,053
XV. Earnings from Plan Investments	57,870	132,006	15,228	38,223	54,400	66,510
XVI. Employer Contribution to Trust	3,455,909	3,263,792	2,876,909	2,842,475	2,706,780	2,482,447
XVII. Benefit Payments from Trust, Including Refunds of Member Contributions	(3,355,909)	(3,163,792)	(2,876,909)	(2,782,475)	(2,656,780)	(2,457,447)
XVIII. Administrative Expense	0	0	0	0	0	0
XIX. Other	0	0	0	0	0	0
XX. Net Change in Plan Fiduciary Net Position [XV.+XVI.+XVII.+XVIII.+XIX.]	157,870	232,006	15,228	98,223	104,400	91,510
XXI. Plan Fiduciary Net Position - Beginning of Period	1,020,910	788,904	773,676	675,453	571,053	479,543
XXII. Prior Period Adjustment	0	0	0	0	0	0
XXIII. Plan Fiduciary Net Position - Beginning of Period with Adjustment [XXI.+XXII.]	1,020,910	788,904	773,676	675,453	571,053	479,543
XXIV. Plan Fiduciary Net Position - End of Period [XXII.+XXIII.]	1,178,780	1,020,910	788,904	773,676	675,453	571,053
XXV. Net OPEB Liability [XIV.-XXIV.]	89,379,952	95,621,255	88,586,382	76,637,525	74,674,895	83,511,434
XXVI. Plan Fiduciary Net Position as % of Total OPEB Liability [XXIV./XIV.]	1.30%	1.06%	0.88%	1.00%	0.90%	0.68%
XXVII. Covered Employee Payroll	41,372,226	40,167,210	39,836,189	38,675,912	41,172,059	39,972,872
XXVIII. Plan NOL as % of Covered Employee Payroll [XXV./XXVII.]	216.04%	238.06%	222.38%	1981.53%	181.37%	208.92%
Single Discount Rate to Calculate Plan Liabilities	5.12%	4.25%	3.75%	4.50%	4.50%	3.50%

EXHIBIT B

REQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2022 Measurement Date)

The City'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. For FY 2022 and future years we have used a 30-year amortization increasing by 3.00% per year of the City's unfunded liability for the purpose of calculating ADC. The following table shows the components of the City's annual ADC and the amount actually contributed to the plan:

<u>Actuarially Determined Contribution - Deficiency / (Excess)</u>						
For the Fiscal Year Ending:	<u>June 30, 2022</u>	<u>June 30, 2021</u>	<u>June 30, 2020</u>	<u>June 30, 2019</u>	<u>June 30, 2018</u>	<u>June 30, 2017</u>
I. Service Cost	2,821,835	3,141,029	3,030,651	2,417,544	2,423,566	3,005,942
II. 30 Year Level Dollar Amortization of NOL	<u>3,941,714</u>	<u>3,775,998</u>	<u>4,789,012</u>	<u>4,502,293</u>	<u>4,906,120</u>	<u>4,211,284</u>
III. Actuarial Determined Contribution [I. + II.]	6,763,549	6,917,027	7,819,663	6,919,837	7,329,686	7,217,226
IV. Contributions in Relation to the Actuarially Determined Contribution	<u>(3,455,909)</u>	<u>(3,263,792)</u>	<u>(2,876,909)</u>	<u>(2,842,475)</u>	<u>(2,706,780)</u>	<u>(2,482,447)</u>
V. Contribution Deficiency / (Excess) [III. + IV.]	<u>3,307,640</u>	<u>3,653,235</u>	<u>4,942,754</u>	<u>4,077,362</u>	<u>4,622,906</u>	<u>4,734,779</u>
Covered Employee Payroll	41,372,226	40,167,210	39,836,189	38,675,912	41,172,059	39,972,872
Contributions as a % of Covered Employee Payroll	8.35%	8.13%	7.22%	7.35%	6.57%	6.21%
Discount Rate	5.12%	4.25%	3.75%	4.50%	4.50%	3.50%
Money Weighted Rate of Return	5.67%	16.73%	1.97%	5.66%	9.53%	7.04%

EXHIBIT BREQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2022 Measurement Date)

Notes to Required Supplementary Information:

Valuation Date:	Actuarially Determined Contribution was calculated as of July 1, 2020.
Actuarial Cost Method:	Individual Entry Age Normal
Asset-Valuation Method:	Market Value of Assets as of the Measurement Date, June 30, 2022.

Actuarial Assumptions:

Investment Rate of Return:	6.41%, net of OPEB plan investment expense, including inflation.
Municipal Bond Rate	4.09% as of June 30, 2022 (source: S&P Municipal Bond 20-Year High Grade Index – SAPIHG)
Single Equivalent Discount Rate:	5.12%, net of OPEB plan investment expense, including inflation
Inflation:	2.50% as of June 30, 2022 and for future periods
Salary Increases:	3.00% annually as of June 30, 2022 and for future periods
Cost of Living Adjustment:	Not Applicable

EXHIBIT B

REQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2022 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 B

REQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2022 Measurement Date)

Plan Membership

At July 1, 2020, OPEB plan membership consisted of the following:

Retirees & Beneficiaries:	522
Actives:	<u>589</u>
Total:	1,111

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, 2021 to June 30, 2022

- ✓ Due to the GASB 75 standards the discount rate has been changed from 4.25% to 5.12%.

Contributions/Withdrawals:

The contribution requirements of plan members and the City are established and may be amended through City ordinances. The City contributed \$100,000 beyond the pay-as-you-go cost for the period ending on the June 30, 2022 Measurement Date. For the year ending on the June 30, 2022 Measurement Date total City premiums plus implicit costs for the retiree medical program were \$3,355,909. \$617,923 of the \$3,355,909 represents implicit cost.

EXHIBIT BREQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2022 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

CONTRIBUTION PROJECTION DISCLOSURES

Table 1: Projection of Contributions using a July 1, 2020 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, 2022	41,372,226	0	41,372,226	0	3,355,909	0	3,355,909
June 30, 2023	38,292,308	4,321,085	42,613,393	0	3,466,575	0	3,466,575
June 30, 2024	35,779,564	8,112,231	43,891,795	0	3,754,527	0	3,754,527
June 30, 2025	33,418,214	11,790,335	45,208,549	0	3,913,239	0	3,913,239
June 30, 2026	31,194,425	15,370,380	46,564,805	0	4,136,620	0	4,136,620
June 30, 2027	29,320,504	18,641,245	47,961,749	0	4,382,983	0	4,382,983
June 30, 2028	27,445,861	21,954,740	49,400,601	0	4,649,188	0	4,649,188
June 30, 2029	25,732,944	25,149,675	50,882,619	0	4,863,455	0	4,863,455
June 30, 2030	24,013,614	28,395,484	52,409,098	0	5,104,349	0	5,104,349
June 30, 2031	22,515,699	31,465,672	53,981,371	0	5,405,575	0	5,405,575
June 30, 2032	20,905,647	34,695,165	55,600,812	0	5,564,420	21,819	5,586,239
June 30, 2033	19,534,784	37,734,052	57,268,836	0	5,774,233	55,155	5,829,388
June 30, 2034	18,320,760	40,666,141	58,986,901	0	5,966,214	101,160	6,067,374
June 30, 2035	17,112,613	43,643,895	60,756,508	0	6,104,754	166,387	6,271,141
June 30, 2036	16,130,281	46,448,922	62,579,203	0	6,204,401	247,716	6,452,117
June 30, 2037	15,120,325	49,336,254	64,456,579	0	6,385,706	298,577	6,684,283
June 30, 2038	14,236,586	52,153,690	66,390,276	0	6,608,184	360,945	6,969,129
June 30, 2039	13,457,890	54,924,094	68,381,984	0	6,695,147	434,034	7,129,181
June 30, 2040	12,641,138	57,792,306	70,433,444	0	6,788,162	483,274	7,271,436
June 30, 2041	11,930,116	60,616,331	72,546,447	0	6,890,053	539,238	7,429,291
June 30, 2042	11,238,273	63,484,567	74,722,840	0	6,900,209	633,819	7,534,028
June 30, 2043	10,612,909	66,351,616	76,964,525	0	6,785,689	760,089	7,545,778
June 30, 2044	10,003,917	69,269,544	79,273,461	0	6,762,534	915,861	7,678,395
June 30, 2045	9,413,454	72,238,211	81,651,665	0	6,781,226	1,115,133	7,896,359
June 30, 2046	8,879,554	75,221,661	84,101,215	0	6,751,376	1,351,038	8,102,414
June 30, 2047	8,379,148	78,245,103	86,624,251	0	6,716,783	1,525,664	8,242,447
June 30, 2048	7,753,905	81,469,074	89,222,979	0	6,693,908	1,725,643	8,419,551
June 30, 2049	7,199,184	84,700,484	91,899,668	0	6,739,894	1,949,627	8,689,521
June 30, 2050	6,718,786	87,937,872	94,656,658	0	6,646,180	2,124,062	8,770,242
June 30, 2051	6,171,067	91,325,291	97,496,358	0	6,542,246	2,312,714	8,854,960
June 30, 2052	5,519,479	94,901,770	100,421,249	0	6,542,363	2,550,731	9,093,094
June 30, 2053	4,874,157	98,559,729	103,433,886	0	6,516,044	2,817,494	9,333,538
June 30, 2054	4,331,021	102,205,882	106,536,903	0	6,306,452	3,109,859	9,416,311
June 30, 2055	3,705,367	106,027,643	109,733,010	0	6,304,765	3,441,913	9,746,678
June 30, 2056	3,107,896	109,917,104	113,025,000	0	6,177,749	3,804,990	9,982,739
June 30, 2057	2,588,862	113,826,888	116,415,750	0	5,991,421	4,139,340	10,130,761
June 30, 2058	2,163,209	117,745,014	119,908,223	0	5,913,354	4,491,550	10,404,904
June 30, 2059	1,695,893	121,809,577	123,505,470	0	5,764,272	4,864,058	10,628,330
June 30, 2060	1,257,383	125,953,251	127,210,634	0	5,663,438	5,226,331	10,889,769
June 30, 2061	945,882	130,081,071	131,026,953	0	5,545,424	5,596,288	11,141,712

APPENDIX I – LIABILITIES, ASSETS, & CASH FLOWS

CONTRIBUTION PROJECTION DISCLOSURES (CONTINUED)

Table 1: Projection of Contributions using a July 1, 2020 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, 2062	690,117	134,267,645	134,957,762	0	5,331,995	6,015,138	11,347,133
June 30, 2063	461,254	138,545,241	139,006,495	0	5,202,702	6,462,586	11,665,288
June 30, 2064	275,596	142,901,094	143,176,690	0	5,069,929	6,947,663	12,017,592
June 30, 2065	172,349	147,299,642	147,471,991	0	4,889,755	7,477,859	12,367,614
June 30, 2066	117,101	151,779,050	151,896,151	0	4,768,081	8,041,009	12,809,090
June 30, 2067	69,795	156,383,241	156,453,036	0	4,639,496	8,604,651	13,244,147
June 30, 2068	22,440	161,124,187	161,146,627	0	4,495,541	9,192,553	13,688,094
June 30, 2069	9,406	165,971,620	165,981,026	0	4,360,935	9,805,304	14,166,239
June 30, 2070	3,550	170,956,907	170,960,457	0	4,210,636	10,403,066	14,613,702
June 30, 2071	0	176,089,271	176,089,271	0	4,065,139	11,017,141	15,082,280
June 30, 2072	0	181,371,949	181,371,949	0	3,912,479	11,659,761	15,572,240
June 30, 2073	0	186,813,107	186,813,107	0	3,742,783	12,316,272	16,059,055
June 30, 2074	0	192,417,500	192,417,500	0	3,592,209	13,001,404	16,593,613
June 30, 2075	0	198,190,025	198,190,025	0	3,411,936	13,709,029	17,120,965
June 30, 2076	0	204,135,726	204,135,726	0	3,236,923	14,435,644	17,672,567
June 30, 2077	0	210,259,798	210,259,798	0	3,072,267	15,207,663	18,279,930
June 30, 2078	0	216,567,592	216,567,592	0	2,888,288	15,997,619	18,885,907
June 30, 2079	0	223,064,620	223,064,620	0	2,712,658	16,807,183	19,519,841
June 30, 2080	0	229,756,559	229,756,559	0	2,531,379	17,646,239	20,177,618
June 30, 2081	0	236,649,256	236,649,256	0	2,350,108	18,505,329	20,855,437
June 30, 2082	0	243,748,734	243,748,734	0	2,181,604	19,387,470	21,569,074
June 30, 2083	0	251,061,196	251,061,196	0	2,006,415	20,289,964	22,296,379
June 30, 2084	0	258,593,032	258,593,032	0	1,835,946	21,224,726	23,060,672
June 30, 2085	0	266,350,823	266,350,823	0	1,673,056	22,192,002	23,865,058
June 30, 2086	0	274,341,348	274,341,348	0	1,512,197	23,188,999	24,701,196
June 30, 2087	0	282,571,588	282,571,588	0	1,358,809	24,232,888	25,591,697
June 30, 2088	0	291,048,736	291,048,736	0	1,211,992	25,310,344	26,522,336
June 30, 2089	0	299,780,198	299,780,198	0	1,073,314	26,424,159	27,497,473
June 30, 2090	0	308,773,604	308,773,604	0	943,299	27,582,165	28,525,464
June 30, 2091	0	318,036,812	318,036,812	0	822,239	28,776,437	29,598,676
June 30, 2092	0	327,577,916	327,577,916	0	710,515	30,006,139	30,716,654
June 30, 2093	0	337,405,253	337,405,253	0	608,293	31,274,129	31,882,422
June 30, 2094	0	347,527,411	347,527,411	0	515,665	32,587,938	33,103,603
June 30, 2095	0	357,953,233	357,953,233	0	432,599	33,945,338	34,377,937
June 30, 2096	0	368,691,830	368,691,830	0	358,844	35,348,487	35,707,331

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 2020 Valuation Date

For the Period Ending on the Measurement	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	VII. Trust Withdrawals [V. + VI.]	VIII. Investment Earnings	IX. Ending Fiduciary Net Position for Current Plan Members
Date	Current Plan Members	Members	go		Members	Trust			Members
June 30, 2022	1,020,910	3,355,909	100,000	3,455,909	0	3,355,909	3,355,909	57,870	1,178,780
June 30, 2023	1,178,780	3,466,575	89,860	3,556,435	0	3,466,575	3,466,575	70,733	1,339,373
June 30, 2024	1,339,373	3,754,527	81,518	3,836,045	0	3,754,527	3,754,527	88,426	1,509,317
June 30, 2025	1,509,317	3,913,239	73,920	3,987,159	0	3,913,239	3,913,239	99,080	1,682,317
June 30, 2026	1,682,317	4,136,620	66,991	4,203,611	0	4,136,620	4,136,620	109,950	1,859,258
June 30, 2027	1,859,258	4,382,983	61,133	4,444,116	0	4,382,983	4,382,983	121,107	2,041,498
June 30, 2028	2,041,498	4,649,188	55,558	4,704,746	0	4,649,188	4,649,188	132,613	2,229,669
June 30, 2029	2,229,669	4,863,455	50,573	4,914,028	0	4,863,455	4,863,455	144,517	2,424,759
June 30, 2030	2,424,759	5,104,349	45,820	5,150,169	0	5,104,349	5,104,349	156,873	2,627,452
June 30, 2031	2,627,452	5,405,575	41,710	5,447,285	0	5,405,575	5,405,575	169,736	2,838,898
June 30, 2032	2,838,898	5,564,420	37,600	5,602,020	0	5,586,239	5,586,239	183,160	3,037,839
June 30, 2033	3,037,839	5,774,233	34,111	5,808,344	0	5,829,388	5,829,388	195,802	3,212,597
June 30, 2034	3,212,597	5,966,214	31,059	5,997,273	0	6,067,374	6,067,374	206,907	3,349,403
June 30, 2035	3,349,403	6,104,754	28,166	6,132,920	0	6,271,141	6,271,141	215,585	3,426,767
June 30, 2036	3,426,767	6,204,401	25,776	6,230,177	0	6,452,117	6,452,117	220,469	3,425,296
June 30, 2037	3,425,296	6,385,706	23,458	6,409,164	0	6,684,283	6,684,283	220,302	3,370,479
June 30, 2038	3,370,479	6,608,184	999,017	7,607,201	0	6,969,129	6,969,129	247,569	4,256,120
June 30, 2039	4,256,120	6,695,147	1,519,003	8,214,150	0	7,129,181	7,129,181	320,745	5,661,834
June 30, 2040	5,661,834	6,788,162	1,385,258	8,173,420	0	7,271,436	7,271,436	406,632	6,970,450
June 30, 2041	6,970,450	6,890,053	1,269,264	8,159,317	0	7,429,291	7,429,291	486,854	8,187,330
June 30, 2042	8,187,330	6,900,209	1,160,833	8,061,042	0	7,534,028	7,534,028	561,435	9,275,779
June 30, 2043	9,275,779	6,785,689	1,064,308	7,849,997	0	7,545,778	7,545,778	628,159	10,208,157
June 30, 2044	10,208,157	6,762,534	974,015	7,736,549	0	7,678,395	7,678,395	685,075	10,951,386
June 30, 2045	10,951,386	6,781,226	889,831	7,671,057	0	7,896,359	7,896,359	730,060	11,456,144
June 30, 2046	11,456,144	6,751,376	814,915	7,566,291	0	8,102,414	8,102,414	760,051	11,680,072
June 30, 2047	11,680,072	6,716,783	746,593	7,463,376	0	8,242,447	8,242,447	772,249	11,673,250
June 30, 2048	11,673,250	6,693,908	670,760	7,364,668	0	8,419,551	8,419,551	769,419	11,387,786
June 30, 2049	11,387,786	6,739,894	604,634	7,344,528	0	8,689,521	8,689,521	749,035	10,791,828
June 30, 2050	10,791,828	6,646,180	547,852	7,194,032	0	8,770,242	8,770,242	709,042	9,924,660
June 30, 2051	9,924,660	6,542,246	488,535	7,030,781	0	8,854,960	8,854,960	651,585	8,752,066
June 30, 2052	8,752,066	6,542,363	424,225	6,966,588	0	9,093,094	9,093,094	574,393	7,199,953
June 30, 2053	7,199,953	6,516,044	363,714	6,879,758	0	9,333,538	9,333,538	472,993	5,219,166
June 30, 2054	5,219,166	6,306,452	313,772	6,620,224	0	9,416,311	9,416,311	344,449	2,767,528
June 30, 2055	2,767,528	6,304,765	260,626	6,565,391	0	9,746,678	9,746,678	185,622	0
June 30, 2056	0	6,177,749	212,234	6,389,983	0	9,982,739	9,982,739	6,696	0
June 30, 2057	0	5,991,421	171,641	6,163,062	0	10,130,761	10,130,761	5,416	0
June 30, 2058	0	5,913,354	139,243	6,052,597	0	10,404,904	10,404,904	4,393	0
June 30, 2059	0	5,764,272	105,983	5,870,255	0	10,628,330	10,628,330	3,344	0
June 30, 2060	0	5,663,438	76,290	5,739,728	0	10,889,769	10,889,769	2,407	0
June 30, 2061	0	5,545,424	55,719	5,601,143	0	11,141,712	11,141,712	1,758	0

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 2020 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	VII. Trust Withdrawals [V. + VI.]	VIII. Investment Earnings	IX. Ending Fiduciary Net Position for Current Plan Members
June 30, 2062	0	5,331,995	39,468	5,371,463	0	11,347,133	11,347,133	1,245	0
June 30, 2063	0	5,202,702	25,611	5,228,313	0	11,665,288	11,665,288	808	0
June 30, 2064	0	5,069,929	14,857	5,084,786	0	12,017,592	12,017,592	469	0
June 30, 2065	0	4,889,755	9,020	4,898,775	0	12,367,614	12,367,614	285	0
June 30, 2066	0	4,768,081	5,950	4,774,031	0	12,809,090	12,809,090	188	0
June 30, 2067	0	4,639,496	3,443	4,642,939	0	13,244,147	13,244,147	109	0
June 30, 2068	0	4,495,541	1,075	4,496,616	0	13,688,094	13,688,094	34	0
June 30, 2069	0	4,360,935	437	4,361,372	0	14,166,239	14,166,239	14	0
June 30, 2070	0	4,210,636	160	4,210,796	0	14,613,702	14,613,702	5	0
June 30, 2071	0	4,065,139	0	4,065,139	0	15,082,280	15,082,280	0	0
June 30, 2072	0	3,912,479	0	3,912,479	0	15,572,240	15,572,240	0	0
June 30, 2073	0	3,742,783	0	3,742,783	0	16,059,055	16,059,055	0	0
June 30, 2074	0	3,592,209	0	3,592,209	0	16,593,613	16,593,613	0	0
June 30, 2075	0	3,411,936	0	3,411,936	0	17,120,965	17,120,965	0	0
June 30, 2076	0	3,236,923	0	3,236,923	0	17,672,567	17,672,567	0	0
June 30, 2077	0	3,072,267	0	3,072,267	0	18,279,930	18,279,930	0	0
June 30, 2078	0	2,888,288	0	2,888,288	0	18,885,907	18,885,907	0	0
June 30, 2079	0	2,712,658	0	2,712,658	0	19,519,841	19,519,841	0	0
June 30, 2080	0	2,531,379	0	2,531,379	0	20,177,618	20,177,618	0	0
June 30, 2081	0	2,350,108	0	2,350,108	0	20,855,437	20,855,437	0	0
June 30, 2082	0	2,181,604	0	2,181,604	0	21,569,074	21,569,074	0	0
June 30, 2083	0	2,006,415	0	2,006,415	0	22,296,379	22,296,379	0	0
June 30, 2084	0	1,835,946	0	1,835,946	0	23,060,672	23,060,672	0	0
June 30, 2085	0	1,673,056	0	1,673,056	0	23,865,058	23,865,058	0	0
June 30, 2086	0	1,512,197	0	1,512,197	0	24,701,196	24,701,196	0	0
June 30, 2087	0	1,358,809	0	1,358,809	0	25,591,697	25,591,697	0	0
June 30, 2088	0	1,211,992	0	1,211,992	0	26,522,336	26,522,336	0	0
June 30, 2089	0	1,073,314	0	1,073,314	0	27,497,473	27,497,473	0	0
June 30, 2090	0	943,299	0	943,299	0	28,525,464	28,525,464	0	0
June 30, 2091	0	822,239	0	822,239	0	29,598,676	29,598,676	0	0
June 30, 2092	0	710,515	0	710,515	0	30,716,654	30,716,654	0	0
June 30, 2093	0	608,293	0	608,293	0	31,882,422	31,882,422	0	0
June 30, 2094	0	515,665	0	515,665	0	33,103,603	33,103,603	0	0
June 30, 2095	0	432,599	0	432,599	0	34,377,937	34,377,937	0	0
June 30, 2096	0	358,844	0	358,844	0	35,707,331	35,707,331	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, 2020 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 [III. - III.]	V. Present Value of Funded Benefit Payments using the Long-Term Rate of Return [6.41%]	VI. Present Value of Unfunded Benefit Payments using the Municipal Bond Rate [4.09%]	VII. Present Value of Benefit Payments using the Single Equivalent Discount Rate [5.12%]	
June 30, 2022	1,020,910	3,355,909	1,020,910	2,334,999	1,020,910	2,334,999	3,355,909	Sum of Column V.
June 30, 2023	1,178,780	3,466,575	1,178,780	2,287,795	1,107,772	2,197,912	3,297,617	46,614,601
June 30, 2024	1,339,373	3,754,527	1,339,373	2,415,154	1,182,869	2,229,108	3,397,461	
June 30, 2025	1,509,317	3,913,239	1,509,317	2,403,922	1,252,660	2,131,570	3,368,490	Sum of Column VI.
June 30, 2026	1,682,317	4,136,620	1,682,317	2,454,303	1,312,134	2,090,743	3,387,225	56,989,221
June 30, 2027	1,859,258	4,382,983	1,859,258	2,523,725	1,362,785	2,065,416	3,414,034	
June 30, 2028	2,041,498	4,649,188	2,041,498	2,607,690	1,406,223	2,050,286	3,444,885	Sum of Column VII.
June 30, 2029	2,229,669	4,863,455	2,229,669	2,633,786	1,443,322	1,989,446	3,428,011	[V. + VI.]
June 30, 2030	2,424,759	5,104,349	2,424,759	2,679,590	1,475,058	1,944,523	3,422,451	103,603,822
June 30, 2031	2,627,452	5,405,575	2,627,452	2,778,123	1,502,079	1,936,820	3,447,771	
June 30, 2032	2,838,898	5,564,420	2,838,898	2,725,522	1,525,195	1,825,495	3,376,105	
June 30, 2033	3,037,839	5,774,233	3,037,839	2,736,394	1,533,762	1,760,770	3,332,652	
June 30, 2034	3,212,597	5,966,214	3,212,597	2,753,617	1,524,288	1,702,240	3,275,625	
June 30, 2035	3,349,403	6,104,754	3,349,403	2,755,351	1,493,467	1,636,391	3,188,329	
June 30, 2036	3,426,767	6,204,401	3,426,767	2,777,634	1,435,920	1,584,814	3,082,438	
June 30, 2037	3,425,296	6,385,706	3,425,296	2,960,410	1,348,843	1,622,738	3,017,888	
June 30, 2038	3,370,479	6,608,184	3,370,479	3,237,705	1,247,305	1,705,010	2,970,817	
June 30, 2039	4,256,120	6,695,147	4,256,120	2,439,027	1,480,172	1,233,955	2,863,212	
June 30, 2040	5,661,834	6,788,162	5,661,834	1,126,328	1,850,432	547,445	2,761,501	
June 30, 2041	6,970,450	6,890,053	6,890,053	0	2,116,197	0	2,666,338	
June 30, 2042	8,187,330	6,900,209	6,900,209	0	1,991,652	0	2,540,121	
June 30, 2043	9,275,779	6,785,689	6,785,689	0	1,840,614	0	2,376,215	
June 30, 2044	10,208,157	6,762,534	6,762,534	0	1,723,835	0	2,252,687	
June 30, 2045	10,951,386	6,781,226	6,781,226	0	1,624,471	0	2,148,816	
June 30, 2046	11,456,144	6,751,376	6,751,376	0	1,519,895	0	2,035,087	
June 30, 2047	11,680,072	6,716,783	6,716,783	0	1,421,020	0	1,925,979	
June 30, 2048	11,673,250	6,693,908	6,693,908	0	1,330,872	0	1,825,869	
June 30, 2049	11,387,786	6,739,894	6,739,894	0	1,259,294	0	1,748,810	
June 30, 2050	10,791,828	6,646,180	6,646,180	0	1,166,981	0	1,640,443	
June 30, 2051	9,924,660	6,542,246	6,542,246	0	1,079,533	0	1,536,086	
June 30, 2052	8,752,066	6,542,363	6,542,363	0	1,014,522	0	1,461,245	
June 30, 2053	7,199,953	6,516,044	6,516,044	0	949,573	0	1,384,433	
June 30, 2054	5,219,166	6,306,452	5,219,166	1,087,286	714,764	301,525	1,274,596	
June 30, 2055	2,767,528	6,304,765	2,767,528	3,537,237	356,182	942,402	1,212,149	
June 30, 2056	0	6,177,749	0	6,177,749	0	1,581,232	1,129,840	
June 30, 2057	0	5,991,421	0	5,991,421	0	1,473,290	1,042,356	
June 30, 2058	0	5,913,354	0	5,913,354	0	1,396,965	978,633	
June 30, 2059	0	5,764,272	0	5,764,272	0	1,308,245	907,465	
June 30, 2060	0	5,663,438	0	5,663,438	0	1,234,860	848,136	
June 30, 2061	0	5,545,424	0	5,545,424	0	1,161,624	789,986	

APPENDIX I – LIABILITIES, ASSETS, & CASH FLOWS

BENEFIT PAYMENT PROJECTION DISCLOSURES (CONTINUED)

Table 3: Actuarial Present Values of Projected Benefit Payments using a July 1, 2020 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 [6.41%]	VI. Present Value of Unfunded Benefit Payments using the Municipal Bond Rate [4.09%]	VII. Present Value of Benefit Payments using the Single Equivalent Discount Rate [5.12%]
June 30, 2062	0	5,331,995	0	5,331,995	0	1,073,034	722,560
June 30, 2063	0	5,202,702	0	5,202,702	0	1,005,880	670,676
June 30, 2064	0	5,069,929	0	5,069,929	0	941,699	621,707
June 30, 2065	0	4,889,755	0	4,889,755	0	872,550	570,388
June 30, 2066	0	4,768,081	0	4,768,081	0	817,410	529,086
June 30, 2067	0	4,639,496	0	4,639,496	0	764,118	489,726
June 30, 2068	0	4,495,541	0	4,495,541	0	711,319	451,403
June 30, 2069	0	4,360,935	0	4,360,935	0	662,911	416,544
June 30, 2070	0	4,210,636	0	4,210,636	0	614,917	382,586
June 30, 2071	0	4,065,139	0	4,065,139	0	570,344	351,363
June 30, 2072	0	3,912,479	0	3,912,479	0	527,360	321,686
June 30, 2073	0	3,742,783	0	3,742,783	0	484,666	292,735
June 30, 2074	0	3,592,209	0	3,592,209	0	446,892	267,265
June 30, 2075	0	3,411,936	0	3,411,936	0	407,789	241,479
June 30, 2076	0	3,236,923	0	3,236,923	0	371,672	217,927
June 30, 2077	0	3,072,267	0	3,072,267	0	338,906	196,760
June 30, 2078	0	2,888,288	0	2,888,288	0	306,093	175,962
June 30, 2079	0	2,712,658	0	2,712,658	0	276,186	157,207
June 30, 2080	0	2,531,379	0	2,531,379	0	247,604	139,552
June 30, 2081	0	2,350,108	0	2,350,108	0	220,841	123,244
June 30, 2082	0	2,181,604	0	2,181,604	0	196,953	108,831
June 30, 2083	0	2,006,415	0	2,006,415	0	174,020	95,213
June 30, 2084	0	1,835,946	0	1,835,946	0	152,979	82,877
June 30, 2085	0	1,673,056	0	1,673,056	0	133,929	71,843
June 30, 2086	0	1,512,197	0	1,512,197	0	116,296	61,771
June 30, 2087	0	1,358,809	0	1,358,809	0	100,394	52,800
June 30, 2088	0	1,211,992	0	1,211,992	0	86,029	44,800
June 30, 2089	0	1,073,314	0	1,073,314	0	73,192	37,740
June 30, 2090	0	943,299	0	943,299	0	61,799	31,552
June 30, 2091	0	822,239	0	822,239	0	51,751	26,162
June 30, 2092	0	710,515	0	710,515	0	42,963	21,505
June 30, 2093	0	608,293	0	608,293	0	35,336	17,514
June 30, 2094	0	515,665	0	515,665	0	28,779	14,123
June 30, 2095	0	432,599	0	432,599	0	23,194	11,271
June 30, 2096	0	358,844	0	358,844	0	18,484	8,894

APPENDIX II – PLAN PROVISIONS

<u>Plan Year</u>	July 1 through June 30.
<u>Premium Effective Date</u>	Medicare Supplement Plans: effective January 1, 2021 Active Plans: effective July 1, 2021 Dental Plans: effective July 1, 2021
<u>Creditable Service</u>	Elapsed time from date of hire to termination of service date.
<u>Benefits Offered</u>	Medical, Dental and \$5,000 of Group Term Life Insurance.
<u>Medicare Part A</u>	The City pays Medicare Part A premiums and penalties for a select group of retirees who would have otherwise been ineligible for Medicare. These payments were reflected in the valuation.
<u>Medicare Part B</u>	Medicare Part B Premium reimbursements by the City 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	25%	25%
Dental	100%	100%
Life	10%	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

5.12% per annum (previously 4.25%)

Net Long Term Rate of Return

6.41% (based on investment policy)

Municipal Bond Rate

4.09% as of June 30, 2022 (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, 2022

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:

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%

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

Retirement Rates for Eligible Employees

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

Permanent Disability Rates

Age	Standard	Teachers
20	0.01%	0.05%
30	0.01%	0.07%
40	0.07%	0.21%
50	0.13%	0.42%
60	0.12%	0.50%

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

Trend Rate

Medicare Part A & B Premiums & Penalties: Assumed to rise at the same rates as our Medical Plan trend assumption.

Medical & Dental Plans: Rates were developed using the SOA Getzen Model of Long-Run Medical Cost Trends with the following model input variables:

Inflation (CPI):	2.50%
Real GDP (per capita):	1.10%
Excess Medical Cost Growth:	1.10%
Expected Health Share of GDP in 2029:	20%
Health Share of GDP Resistance Point:	22.5%
Year for Limiting Cost Growth to GDP Growth:	2060

See below for a table of trend rates for select years:

Year	Rate
2020 - 2023	4.50%
2024	4.54%
2025	4.59%
2026	4.63%
2027	4.68%
2028	4.72%
2029 - 2040	4.77%
2045	4.53%
2050	4.43%
2055	4.00%
2060	3.63%
2061+	3.60%

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

Participation Rate

It was assumed that 80% of employees eligible to receive retirement benefits would enroll in the retiree medical plans upon retirement. For life insurance plans, it was assumed that 80% of eligible employees would elect coverage upon retirement.

Spouse Participation Rate

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.

Medicare Eligibility

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.

Compensation Increases

3.00% per year.

Inflation Rate

2.50% per year.

COVID-19

We recognize that COVID-19 may impact plan experience. We have reviewed the assumptions used in this report. Based on the data that is currently available, we have not made any adjustments to these assumptions to reflect the impact of COVID-19. We will continue to monitor the impact of COVID-19 to determine if adjustments to valuation assumptions are warranted.

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, 2022</u>	<u>June 30, 2021</u>
I. Total OPEB Liability	90,558,732	96,642,165
II. Total OPEB Liability (Excluding Implicit Subsidy)	<u>70,519,328</u>	<u>75,761,817</u>
III. Liability from Implicit Subsidy [I. - II.]	20,039,404	20,880,348

	For the Measurement Period Ending	
Impact on Payments	<u>June 30, 2022</u>	<u>June 30, 2021</u>
IV. Employer Payments (Including Implicit Subsidy)	3,355,909	3,163,792
V. Actual Employer Payments	<u>2,737,986</u>	<u>2,581,429</u>
VI. Implicit Subsidy [IV. - V.]	617,923	582,363

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

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

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	4,875	3,073	44 & Under	10,012	6,561	65 to 69	2,914	2,992
25 to 29	7,191	3,198	45 to 49	10,998	8,284	70 to 74	3,438	3,585
30 to 34	9,087	4,013	50 to 54	12,937	10,910	75 to 79	3,988	4,234
35 to 39	9,361	5,039	55 to 59	14,956	14,183	80 to 84	4,574	4,867
40 to 44	9,581	6,278	60 to 64	17,797	18,201	85 to 89	5,113	5,422
45 to 49	10,524	7,927	65 to 69	21,334	22,703	90 & Over	5,113	5,422
50 to 54	12,380	10,440	70 to 74	25,158	27,206			
55 to 59	14,312	13,572	75 to 79	29,217	32,132			
60 to 64	17,031	17,417	80 to 84	33,499	36,934			
65 to 69	20,415	21,725	85 to 89	38,239	42,276			
70 & Over	24,075	26,034	90 & Over	38,239	42,276			

*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, 2022 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, 2020
A. Average Age at Hire	36.73
B. Average Service	<u>10.43</u>
C. Average Current Age	47.16

Retired Employees & Spouses

Valuation Date	July 1, 2020
A. Under Age 65	90
B. Age 65 & Over	<u>432</u>
C. Total	522

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	16	1								17
25-29	29	4								33
30-34	41	16	3							60
35-39	29	19	17	1						66
40-44	21	15	21	13	1					71
45-49	22	19	10	13	11	2				77
50-54	17	17	9	10	16	6	4			79
55-59	23	11	20	18	10	6	6	2		96
60-64	11	11	13	19	6	5	2	1	1	69
65-69	4	2		3	5	2				16
70+		1	1	1		1			1	5
Total	213	116	94	78	49	22	12	3	2	589

APPENDIX IV – PLAN DEMOGRAPHICS

<u>Plan Offerings</u>	<u>Number of Contracts</u>			
	<u>Single</u>	<u>Two-Person</u>	<u>Family</u>	<u>Total</u>
HMO Blue NE	127		253	380
PPO Blue	18		78	96
HMO Limited Network	7		4	11
Medex 2 LIS	1			1
Medex 2	167	134		301
Total	320	134	335	789

	<u>Per Contract Costs (monthly)</u>		
	<u>Single</u>	<u>Two-Person</u>	<u>Family</u>
HMO Blue NE	886.05		2,321.58
PPO Blue	1,028.89		2,696.01
HMO Limited Network	824.02		2,159.06
Medex 2 LIS	302.50	605.00	
Medex 2	335.60	671.20	
Dental Plan	50.94	101.86	178.26

APPENDIX IV – PLAN DEMOGRAPHICS

	Active Plan Average Premium Calculation					
	Single	Two-Person	Family	Number of Participants	Total Premiums Paid	Claims Without Children
HMO Blue NE	127		253	633	8,398,657.08	6,730,435.80
PPO Blue	18		78	174	2,745,705.60	2,148,322.32
HMO Limited Network	7		4	15	172,852.56	148,323.60
Total	152	0	335	822	11,317,215.24	9,027,081.72
Blended Average Monthly Rate:						\$ 915.15

	Medicare Supplement Plan Average Premium Calculation					
	Single	Two-Person	Family	Number of Participants	Total Premiums Paid	Claims Without Children
Medex 2 LIS	1			1	3,630.00	3,630.00
Medex 2	167	134		435	1,751,832.00	1,751,832.00
Total	168	134	0	436	1,755,462.00	1,755,462.00
Blended Average Monthly Rate:						\$ 335.52

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 City, 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 City'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.

APPENDIX VI – ASOP 41 DISCLOSURES

The Actuarial Standards Board (the “ASB”), vested by the U.S.-based actuarial organizations¹, promulgates actuarial standards of practice (“ASOPs”) for use by actuaries when providing professional services in the United States. Each of these organizations requires its members, through its Code of Professional Conduct², to observe the ASOPs of the ASB when practicing in the United States.

The ASOPs are not narrowly prescriptive and neither dictate a single approach nor mandate a particular outcome. ASOPs are intended to provide actuaries with a framework for performing professional assignments and to offer guidance on relevant issues, recommended practices, documentation, and disclosure. Each ASOP articulates a process of analysis, documentation, and disclosure that, in the ASB’s judgment, constitutes appropriate practice within the scope and purpose of the ASOP.

ASOP 41 provides guidance to actuaries with respect to actuarial communications and requires certain disclosures which are contained in this Appendix.

Identification of the Responsible Actuary

The responsible actuary is Parker Elmore, ASA, EA, FCA, MAAA of Odyssey Advisors. This actuary is available to provide supplementary information and explanation.

Identification of Actuarial Documents

The date of this document is September 28, 2022 and its subject is the City of Newburyport's GASB 75 OPEB liabilities.

¹ The American Academy of Actuaries (the “Academy”), the American Society of Pension Professionals and Actuaries, the Casualty Actuarial Society, the Conference of Consulting Actuaries, and the Society of Actuaries.

² These organizations adopted identical *Codes of Professional Conduct* effective January 1, 2001

APPENDIX VI – ASOP 41 DISCLOSURES

Disclosures in Actuarial Reports

- ✓ The contents of this report are intended for the use of the officers, employees, and elected officials of the City and the City's appointed auditor. The City may distribute this report to those parties that have a legal right to require the City to provide it, in which case it will be provided in its entirety including all assumptions, caveats, and limitations. In addition, we request that the City notify Odyssey Advisors to whom it was distributed.
- ✓ The purpose of this engagement was to provide the City with analysis of the GASB 75 OPEB liabilities.
- ✓ The responsible actuary identified above is qualified as specified in the *Qualification Standards* of the American Academy of Actuaries.
- ✓ Actuarial valuations involve estimates of the value of reported amounts and assumptions about the probability of events far into the future. Actuarially determined amounts are subject to continual revision as actual results are compared to past expectations and new estimates are made about the future.
- ✓ Actuarial computations under GASB 75 are for purposes of fulfilling financial accounting requirements of the City. Determinations for purposes other than meeting these financial accounting requirements may be significantly different from the results contained in this report. These communications should not be relied upon for any other purpose.
- ✓ The City of Newburyport has agreed to pay Odyssey Advisors a fee for preparing this report. Other than with regard to that contract, we are financially and organizationally independent from the City and any entity or individual related to the City. There is nothing in our relationship with the City that would impair or seem to impair the objectivity of our work.
- ✓ The City provided the employee/retiree data, premium rates and other information used to prepare our report. We have reviewed the data for reasonableness but have not audited it. To the extent that there are material inaccuracies in the data, our results may be accordingly affected.
- ✓ The date through which data or other information has been considered in developing the findings included in this report is June 30, 2022.
- ✓ The various documents comprising the actuarial report are contained within the document to which these disclosures are attached.

APPENDIX VI – ASOP 41 DISCLOSURES

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.

Actuarial Findings

The actuarial findings of the report can be found in the report to which these disclosures are attached.

Methods, Procedures, Assumptions, and Data

The methods, procedures, assumptions and data used by the actuary can be found in the report to which these disclosures are attached.

Assumptions or Methods Prescribed by Law

While not legally binding, our determinations were made in accordance with our understanding of Statement No. 75 of the Governmental Accounting Standards Board. Actuarial computations under GASB 75 are for purposes of fulfilling employer accounting requirements. Determinations for purposes other than meeting such requirements may be significantly different from these results. Accordingly, additional determinations may be needed for other purposes.

Responsibility for Assumptions and Methods

The actuary does not disclaim responsibility for any material assumption(s) or method(s).

Deviation from the Guidance of an ASOP

The actuary has not deviated materially from the guidance set forth in an applicable ASOP.

Rounding

Results in this report are shown to the nearest dollar. Due to the predictive nature of these results, no implication is made as to the degree of precision in these unrounded figures. Clients should work with their auditors to decide if it would be prudent to round these results when applying them to the financial statements.

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.