

**City of Everett**  
**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, 2021

For the Reporting Date:  
June 30, 2021

Delivered March 2, 2020



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March 2, 2020

*Personal and Confidential*

Mr. Ryan J. Smith, CPA  
Assistant City Auditor  
City of Everett  
484 Broadway  
Everett, MA 02149

Dear Mr. Smith:

We have performed an actuarial valuation of the City of Everett Other Postemployment Benefits Plan for the Reporting Date & fiscal year ending June 30, 2021 with a Measurement Date of June 30, 2021 and a Valuation Date of July 1, 2020. The figures presented in this report reflect the adoption, by the City of Everett, 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, 2017 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



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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 Everett other postemployment benefit programs with a Valuation Date of July 1, 2020 with a Measurement Date of June 30, 2021 for the Reporting Date & fiscal year ending June 30, 2021 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 read 'P. Elmore', written over a horizontal line.

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

## EXECUTIVE SUMMARY

### How did plan liabilities change from FY 20 to FY 21?

#### Plan Experience

For the year ending on the Measurement Date of June 30, 2021, the Plan saw an experience gain of \$11,770,244 or 4.06% of the beginning Total OPEB Liability ("TOL"). This was mainly due to a reduction in retirees and spouses with medical coverage on the census vs. the expected increase and the City's average Medicare Supplement plan premium increasing by 3% vs. the expected 9% increase over the two year period.

#### Assumption Changes

One or more key assumptions have changed since the prior valuation. The total impact of these assumption changes increased disclosed liabilities by \$61.0 million, as detailed below.

- ✓ Due to the GASB 75 standards the discount rate has been changed from 3.75% to 3.25% increasing the disclosed liability by \$28.0 million.
- ✓ Due to updated guidance related to the implementation of ASOP 6, we have updated our methodology for calculating expected claims increasing the disclosed liability by \$32.0 million.
- ✓ Based on recent actuarial research we have adopted the Getzen model for future projected healthcare costs. This change had no material impact on plan liabilities.

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 \$170,374 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 7.00 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.

### Discount Rate Determinants

- ✓ Employer Current and Future Benefit Payments
- ✓ Municipal Bond Rate – The S&P 20-year high grade municipal bond index was 2.18% as of June 30, 2021.
- ✓ Current Asset Level – The City had \$8,789,970 of OPEB assets as of June 30, 2021.
- ✓ Funding Policy - The City is expected to contribute \$1,000,000 annually beyond pay-as-you-go costs.
- ✓ Investment Policy - The City is expected to earn 6.07% 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 75.18% 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.
- ✓ Discount Rate (3.25%) – 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 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. Under Actuarial Standards of Practice for OPEB, we are required to reflect the projected higher healthcare costs that occur as retirees age. The City currently has various 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.

<b>Representative Plan Statistics</b>		
<b>Valuation Date</b>	<b>July 1, 2020</b>	<b>July 1, 2018</b>
<b>Measurement Date &amp; Period Ending</b>	<b>June 30, 2021</b>	<b>June 30, 2020</b>
<b>Reporting Date/Fiscal Year End</b>	<b>June 30, 2021</b>	<b>June 30, 2020</b>
Total OPEB Liability	355,113,853	289,938,132
Per Eligible Active Plan Participant	115,653	96,514
Per Retiree/Spouse Plan Participant	168,862	145,175
Total Annual Service Cost (Annual Benefit Accrual)	13,319,286	10,142,202
Per Eligible Active Plan Participant	8,009	6,629
Expected Employer Share of Retiree Costs	8,364,989	8,490,326
Per Retiree/Spouse Plan Participant	8,677	8,664
Net OPEB Liability as a % of Covered Payroll	390.40%	291.10%

## 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, 2021	964	355,113,853	355,113,853	8,364,989	8,364,989
June 30, 2026	1,102	446,651,054	385,285,123	11,164,344	9,630,461
June 30, 2031	1,172	550,073,086	409,306,036	15,294,580	11,380,604
June 30, 2036	1,214	665,867,281	427,394,870	18,777,554	12,052,597
June 30, 2041	1,243	804,581,994	445,477,542	21,957,619	12,157,401
June 30, 2046	1,296	967,588,457	462,125,636	27,775,378	13,265,675
June 30, 2051	1,349	1,165,919,345	480,343,333	32,355,304	13,329,957

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, 2022	(budgeted)	8,780,853
June 30, 2021	Actual	8,364,989
June 30, 2020	Actual	8,490,326
June 30, 2019	Actual	7,977,564
June 30, 2018	Actual	7,401,157
June 30, 2017	Actual	7,065,440

The City performs actuarial valuations of its non-pension post-employment benefits liability in accordance with GASB reporting requirements. As of the June 30, 2021 Measurement Date, the Net OPEB Liability ("NOL") was determined to be \$346,323,883 assuming a discount rate of 3.25%. The City has established an OPEB Trust and plans to fund this liability. The City is expected to contribute \$1,000,000 annually beyond pay-as-you-go costs. The balance of this fund as of June 30, 2021 was \$8,789,970. See the City's audit reports for additional information.

PRINCIPAL RESULTS OF THE VALUATION

**City of Everett**

**Assuming Funding - 3.25% discount rate**

**Comparison of Plan Liabilities to Prior Valuation**

Valuation Date	July 1, 2020	July 1, 2018
For the Measurement Period ending on the Measurement Date of:	June 30, 2021	June 30, 2020
For the Reporting Period & Fiscal Year ending on:	June 30, 2021	June 30, 2020
<b>I. Total OPEB Liability</b>		
A. Actives	192,330,978	147,666,912
B. Retirees/Disabled	<u>162,782,875</u>	<u>142,271,220</u>
C. Total	355,113,853	289,938,132
<b>II. Fiduciary Net Position [Plan Assets]</b>	8,789,970	7,382,520
<b>III. Net OPEB Liability (Asset) [I. - II.]</b>	346,323,883	282,555,612
<b>IV. Funded Ratio [II. / I.]</b>	2.48%	2.55%
<b>V. Number of Eligible Participants</b>		
A. Actives	1,663	1,530
B. Retirees/Disabled & Dependents	<u>964</u>	<u>980</u>
C. Total	2,627	2,510
<b>VI. Service Cost</b>	13,319,286	10,142,202
<b>VII. Financial Statement Expense</b>	31,970,682	21,255,772
<b>VIII. Employer Contribution to the OPEB Trust</b>	(1,096,904)	(1,096,904)
<b>IX. Deferred Inflow of Resources</b>	(22,146,102)	(15,445,691)
<b>X. Deferred Outflow of Resources</b>	67,377,126	19,417,233
<b>XI. Money Weighted Rate of Return</b>	3.79%	4.32%
<b>XII. 20-year Municipal Bond Rate (SAPIHG)</b>	2.18%	2.66%
<b>XIII. Expected Long Term Rate of Return (Net of Expense)</b>	6.07%	6.21%
<b>XIV. Crossover Year</b>	Immediate	Immediate
<b>XV. Discount Rate</b>	3.25%	3.75%

## PRINCIPAL RESULTS OF THE VALUATION

### City of Everett Plan Liabilities as of the June 30, 2021 Measurement Date

	City Employees and Retirees	Teacher Employees and Retirees	Non-Teacher School Employees and Retirees	Police Employees and Retirees	Fire Employees and Retirees	Water & Sewer Enterprise Employees and Retirees	Total
I. Total OPEB Liability							
A. Actives	27,896,516	86,084,848	26,475,948	27,678,014	23,159,855	1,035,797	192,330,978
B. Retirees/Disabled	<u>38,789,702</u>	<u>70,516,621</u>	<u>1,121,904</u>	<u>21,921,700</u>	<u>27,305,319</u>	<u>3,127,629</u>	<u>162,782,875</u>
C. Total	66,686,218	156,601,469	27,597,852	49,599,714	50,465,174	4,163,426	355,113,853
II. Fiduciary Net Position [Plan Assets]	1,650,654	3,876,284	683,117	1,227,719	1,249,141	103,055	8,789,970
III. Net OPEB Liability (Asset) [I. - II.]	65,035,564	152,725,185	26,914,735	48,371,995	49,216,033	4,060,371	346,323,883
IV. Number of Eligible Participants							
A. Actives	302	689	418	138	105	11	1,663
B. Retirees/Disabled	<u>243</u>	<u>408</u>	<u>11</u>	<u>127</u>	<u>146</u>	<u>29</u>	<u>964</u>
C. Total	545	1,097	429	265	251	40	2,627
<b>For the Reporting Date and Fiscal Year Ending June 30, 2021</b>							
V. Service Cost	2,173,828	5,665,174	2,938,002	1,384,896	1,070,344	87,042	13,319,286
VI. Financial Statement Expense	5,658,169	13,888,754	4,456,567	3,974,289	3,690,805	302,098	31,970,682
VII. Employer Share of Costs	(2,047,434)	(3,359,682)	(174,317)	(1,189,514)	(1,409,146)	(184,896)	(8,364,989)
VIII. Employer (Payments)/Withdrawals to/from OPEB Trust	(203,439)	(484,090)	(92,840)	(151,617)	(152,553)	(12,365)	(1,096,904)
IX. Total Employer Contribution [VII. + VIII.]	(2,250,873)	(3,843,772)	(267,157)	(1,341,131)	(1,561,699)	(197,261)	(9,461,893)

PRINCIPAL RESULTS OF THE VALUATION

City of Everett

Assuming Funding - 3.25% discount rate

For the Period Ending on the June 30, 2021 Measurement Date

	Actives			Retirees/Disabled			Grand Total
	Under Age 65	Age 65+	Actives Total	Under Age 65	Age 65 +	Retirees Total	
<b>Present Value of Future Benefits</b>							
A. Participants	75,959,193	131,224,032	207,183,225	8,249,052	103,140,311	111,389,363	318,572,588
B. Spouses	<u>54,975,432</u>	<u>96,483,435</u>	<u>151,458,867</u>	<u>7,567,086</u>	<u>43,826,426</u>	<u>51,393,512</u>	<u>202,852,379</u>
C. Total	130,934,625	227,707,467	358,642,092	15,816,138	146,966,737	162,782,875	521,424,967
<b>Total OPEB Liability</b>							
A. Participants	41,747,346	69,016,387	110,763,733	8,249,052	103,140,311	111,389,363	222,153,096
B. Spouses	<u>30,585,389</u>	<u>50,981,856</u>	<u>81,567,245</u>	<u>7,567,086</u>	<u>43,826,426</u>	<u>51,393,512</u>	<u>132,960,757</u>
C. Total	72,332,735	119,998,243	192,330,978	15,816,138	146,966,737	162,782,875	355,113,853
<b>Service Cost</b>							
A. Participants	2,525,630	5,182,440	7,708,070	0	0	0	7,708,070
B. Spouses	<u>1,815,592</u>	<u>3,795,624</u>	<u>5,611,216</u>	<u>0</u>	<u>0</u>	<u>0</u>	<u>5,611,216</u>
C. Total	4,341,222	8,978,064	13,319,286	0	0	0	13,319,286

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

**Funding - 3.25% 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		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.]
			with an expected 6.07% return	with an expected 6.07% return									
2021	June 30, 2021	355,113,853	8,789,970	346,323,883	2.48%	13,319,286	8,364,989	1,096,904	9,461,893	8,364,989	0	1,096,904	
2022	June 30, 2022	372,215,733	10,353,424	361,862,309	2.78%	14,027,197	8,780,853	1,000,000	9,780,853	8,780,853	0	1,000,000	
2023	June 30, 2023	389,983,316	12,011,780	377,971,536	3.08%	14,611,636	9,256,329	1,000,000	10,256,329	9,256,329	0	1,000,000	
2024	June 30, 2024	408,319,938	13,770,798	394,549,140	3.37%	15,192,950	9,838,147	1,000,000	10,838,147	9,838,147	0	1,000,000	
2025	June 30, 2025	427,300,166	15,636,588	411,663,578	3.66%	15,802,988	10,402,433	1,000,000	11,402,433	10,402,433	0	1,000,000	
2026	June 30, 2026	446,651,054	17,615,632	429,035,422	3.94%	16,371,552	11,164,344	1,000,000	12,164,344	11,164,344	0	1,000,000	
2027	June 30, 2027	466,443,920	19,714,804	446,729,116	4.23%	17,025,072	11,931,604	1,000,000	12,931,604	11,931,604	0	1,000,000	
2028	June 30, 2028	486,745,694	21,941,396	464,804,298	4.51%	17,655,274	12,645,385	1,000,000	13,645,385	12,645,385	0	1,000,000	
2029	June 30, 2029	507,505,684	24,303,142	483,202,542	4.79%	18,356,486	13,466,840	1,000,000	14,466,840	13,466,840	0	1,000,000	
2030	June 30, 2030	528,630,036	26,808,246	501,821,790	5.07%	19,040,956	14,374,256	1,000,000	15,374,256	14,374,256	0	1,000,000	
2031	June 30, 2031	550,073,086	29,465,409	520,607,677	5.36%	19,742,111	15,294,580	1,000,000	16,294,580	15,294,580	0	1,000,000	
2032	June 30, 2032	571,831,680	32,283,862	539,547,818	5.65%	20,428,197	16,110,208	1,000,000	17,110,208	16,110,208	0	1,000,000	
2033	June 30, 2033	594,210,137	35,273,395	558,936,742	5.94%	21,182,563	16,898,142	1,000,000	17,898,142	16,898,142	0	1,000,000	
2034	June 30, 2034	617,617,888	38,444,393	579,173,495	6.22%	21,947,329	17,556,210	1,000,000	18,556,210	17,556,210	0	1,000,000	
2035	June 30, 2035	641,122,683	41,807,871	599,314,812	6.52%	22,754,123	18,168,354	1,000,000	19,168,354	18,168,354	0	1,000,000	
2036	June 30, 2036	665,867,281	45,375,512	620,491,769	6.81%	23,557,380	18,777,554	1,000,000	19,777,554	18,777,554	0	1,000,000	
2037	June 30, 2037	691,608,397	49,159,708	642,448,689	7.11%	24,405,459	19,291,465	1,000,000	20,291,465	19,291,465	0	1,000,000	
2038	June 30, 2038	718,099,861	53,173,605	664,926,256	7.40%	25,286,883	19,738,608	1,000,000	20,738,608	19,738,608	0	1,000,000	
2039	June 30, 2039	745,793,571	57,431,146	688,362,425	7.70%	26,152,988	20,451,631	1,000,000	21,451,631	20,451,631	0	1,000,000	
2040	June 30, 2040	774,392,062	61,947,119	712,444,943	8.00%	27,100,536	21,232,555	1,000,000	22,232,555	21,232,555	0	1,000,000	
2041	June 30, 2041	804,581,994	66,737,212	737,844,782	8.29%	28,085,161	21,957,619	1,000,000	22,957,619	21,957,619	0	1,000,000	
2042	June 30, 2042	834,919,143	71,818,064	763,101,079	8.60%	29,070,884	23,015,783	1,000,000	24,015,783	23,015,783	0	1,000,000	
2043	June 30, 2043	866,752,226	77,207,323	789,544,903	8.91%	30,098,517	24,303,577	1,000,000	25,303,577	24,303,577	0	1,000,000	
2044	June 30, 2044	899,002,705	82,923,710	816,078,995	9.22%	31,223,743	25,433,774	1,000,000	26,433,774	25,433,774	0	1,000,000	
2045	June 30, 2045	932,844,532	88,987,082	843,857,450	9.54%	32,384,723	26,478,798	1,000,000	27,478,798	26,478,798	0	1,000,000	
2046	June 30, 2046	967,588,457	95,418,501	872,169,956	9.86%	33,587,137	27,775,378	1,000,000	28,775,378	27,775,378	0	1,000,000	
2047	June 30, 2047	1,004,015,295	102,240,307	901,774,988	10.18%	34,842,373	28,812,353	1,000,000	29,812,353	28,812,353	0	1,000,000	
2048	June 30, 2048	1,041,553,796	109,476,197	932,077,599	10.51%	36,163,828	29,526,166	1,000,000	30,526,166	29,526,166	0	1,000,000	
2049	June 30, 2049	1,080,947,984	117,151,305	963,796,679	10.84%	37,520,056	30,574,997	1,000,000	31,574,997	30,574,997	0	1,000,000	
2050	June 30, 2050	1,122,392,705	125,292,292	997,100,413	11.16%	38,949,100	31,509,370	1,000,000	32,509,370	31,509,370	0	1,000,000	
2051	June 30, 2051	1,165,919,345	133,927,437	1,031,991,908	11.49%	40,487,727	32,355,304	1,000,000	33,355,304	32,355,304	0	1,000,000	
2052	June 30, 2052	1,210,714,193	143,086,735	1,067,627,458	11.82%	42,038,544	33,648,081	1,000,000	34,648,081	33,648,081	0	1,000,000	

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES  
(As of the June 30, 2021 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

<b>Components of the City's OPEB Expenses for the Fiscal Year Ending June 30, 2021</b>	
<b>Description</b>	<b>Amount</b>
I. Service Cost	13,319,286
II. Interest on Total OPEB Liability (Asset), Service Cost, and Benefit Payments	11,216,753
III. Deferred (Inflows)/Outflows from Plan Experience*	(5,050,563)
IV. Deferred (Inflows)/Outflows from Changes of Assumptions*	12,908,639
V. Projected Earnings on OPEB Plan Investments	(480,920)
VI. Deferred (Inflows)/Outflows from Earnings on Plan Investments**	57,487
VII. Financial Statement Expense Prior to Plan Design Changes [I. + II.+ III. + IV. + V. + VI.]	31,970,682
VIII. Expense Related to Change in Benefit Terms***	0
IX. Financial Statement Expense [VII. + VIII.]	31,970,682

\* Amortized over 7.00 years

\*\* Amortized over 5.00 years

\*\*\* Recognized Immediately

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES  
(As of the June 30, 2021 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
<b>I.</b>	<b>Balances for the June 30, 2020 Reporting Date</b>	289,938,132	7,382,520	282,555,612
<b>II.</b>	<b>Prior Period Adjustment</b>	0	0	0
<b>III.</b>	<b>Balances for the June 30, 2020 Reporting Date with Adjustment [I. + II.]</b>	289,938,132	7,382,520	282,555,612
<b>Changes for the year:</b>				
IV.	Service Cost	13,319,286	0	13,319,286
V.	Interest on Total OPEB Liability, Service Cost, and Benefit Payments	11,216,753	0	11,216,753
VI.	Changes in Benefit Terms *	0	0	0
VII.	Change in Assumptions **	60,774,915	0	60,774,915
VIII.	Differences Between Actual and Expected Experience **	(11,770,244)	0	(11,770,244)
IX.	Net Investment Income	0	310,546	(310,546)
X.	Employer Contributions to Trust	0	9,461,893	(9,461,893)
XI.	Benefit Payments Withdrawn from Trust	0	(8,364,989)	8,364,989
XII.	Benefit Payments Excluding Implicit Cost	(6,228,872)	0	(6,228,872)
XIII.	Implicit Cost Amount	(2,136,117)	0	(2,136,117)
XIV.	Total Benefit Payments Including Implicit Cost [XII. + XIII.]	(8,364,989)	0	(8,364,989)
XV.	Administrative Expense	0	0	0
XVI.	Other Charges	0	0	0
<b>XVII.</b>	<b>Net Changes [IV.+V.+VI.+VII.+VIII.+IX.+X.+XI.+XIV.+XV.+XVI.]</b>	65,175,721	1,407,450	63,768,271
<b>XVIII.</b>	<b>Balances for the June 30, 2021 Reporting Date [III.+XVII.]</b>	355,113,853	8,789,970	346,323,883

\* Recognized Immediately

\*\* Amortized over 7.00 years

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES

(As of the June 30, 2021 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 Between			2021	2022	2023	2024	2025	2026
	Actual & Expected Experience	Recognition Period (Years)	Remaining Balance						
2017									
2018	(1,651)	6.67	(660)	(248)	(248)	(248)	(164)		
2019	(21,935,653)	6.56	(11,904,106)	(3,343,849)	(3,343,849)	(3,343,849)	(3,343,849)	(1,872,559)	
2020	(164,021)	6.56	(114,015)	(25,003)	(25,003)	(25,003)	(25,003)	(25,003)	(14,003)
2021	(11,770,244)	7.00	(10,088,781)	(1,681,463)	(1,681,463)	(1,681,463)	(1,681,463)	(1,681,463)	(1,681,463)
2022									
2023									
2024									
2025									
2026									
Total Remaining Balance			(22,107,562)						
Net increase (decrease) in OPEB Expense				(5,050,563)	(5,050,563)	(5,050,563)	(5,050,479)	(3,579,025)	(1,695,466)

Deferred (Inflows)/Outflows in OPEB Expense Arising from the Recognition of the Effects of Changes in Assumptions									
Fiscal Year	Differences from			2021	2022	2023	2024	2025	2026
	Changes in Actuarial Assumptions	Recognition Period (years)	Remaining Balance						
2017									
2018	0	6.67	0	0	0	0	0		
2019	27,725,897	6.56	15,046,373	4,226,508	4,226,508	4,226,508	4,226,508	2,366,849	
2020	0	6.56	0	0	0	0	0	0	0
2021	60,774,915	7.00	52,092,784	8,682,131	8,682,131	8,682,131	8,682,131	8,682,131	8,682,131
2022									
2023									
2024									
2025									
2026									
Total Remaining Balance			67,139,157						
Net increase (decrease) in OPEB Expense				12,908,639	12,908,639	12,908,639	12,908,639	11,048,980	8,682,131

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES  
(As of the June 30, 2021 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 Between			2021	2022	2023	2024	2025	2026
	Actual & Expected Earnings	Recognition Period (years)	Remaining Balance						
2017									
2018	65,928	5.00	13,184	13,186	13,184				
2019	(96,350)	5.00	(38,540)	(19,270)	(19,270)	(19,270)			
2020	147,478	5.00	88,486	29,496	29,496	29,496	29,494		
2021	170,374	5.00	136,299	34,075	34,075	34,075	34,075	34,074	
2022									
2023									
2024									
2025									
2026									
Total Remaining Balance			199,429						
Net increase (decrease) in OPEB Expense				57,487	57,485	44,301	63,569	34,074	0

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES  
(As of the June 30, 2021 Measurement Date)

3. Changes in Net OPEB Expense (Continued)

<b>Statement of Outflows &amp; Inflows Arising from Current &amp; Prior Reporting Periods for the Measurement Period Ending on June 30, 2021 to be Reported for the Fiscal Year Ending June 30, 2021</b>			
	<b>Deferred Outflows of Resources</b>	<b>Deferred Inflows of Resources</b>	<b>Total</b>
I. Contributions made subsequent to the Measurement Date	0	0	0
II. Differences Between Actual & Expected Experience	0	(22,107,562)	(22,107,562)
III. Changes of Assumptions	67,139,157	0	67,139,157
IV. Net Difference Between Projected & Actual Earnings on OPEB Plan Investments	<u>237,969</u>	<u>(38,540)</u>	<u>199,429</u>
V. Total [I.+II.+III.+IV.]	67,377,126	(22,146,102)	45,231,024

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES  
 (As of the June 30, 2021 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, 2021 will be recognized in future years as shown below.

<b>Year ending June 30:</b>	
2022	7,915,561
2023	7,902,377
2024	7,921,729
2025	7,504,029
2026	6,986,665
Thereafter	7,000,663

4. Discount Rate

The discount rate used to measure the Total OPEB liability was 3.25% as of June 30, 2021 and 3.75% as of June 30, 2020. 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 2.18% as of June 30, 2021. 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, 2021 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, 2021 Measurement Date, total City premiums plus implicit costs for the retiree medical program were \$8,364,989. The City also contributed \$1,096,904 to an OPEB Trust for a total contribution during the measurement period of \$9,461,893 to be reported on the financial statement for the fiscal year ending June 30, 2021.

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			
Asset Class	Target Allocation	Asset Class	Long-Term Expected Real Rate of Return*
Domestic Equity - Large Cap	30.00%	Domestic Equity - Large Cap	4.90%
Domestic Equity - Small/Mid Cap	5.00%	Domestic Equity - Small/Mid Cap	5.40%
International Equity - Developed Market	5.00%	International Equity - Developed Market	5.32%
International Equity-Emerging Market	5.00%	International Equity-Emerging Market	6.26%
Domestic Fixed Income	35.00%	Domestic Fixed Income	1.40%
International Fixed Income	5.00%	International Fixed Income	1.30%
Alternatives	10.00%	Alternatives	6.32%
Real Estate	5.00%	Real Estate	6.25%
Cash & Cash Equivalents	0.00%	Cash & Cash Equivalents	0.00%
Total	<u>100.00%</u>		
		I. Real Rate of Return**	3.82%
		II. Inflation Assumption	2.50%
		III. Total Nominal Return [I. + II.]	6.32%
		IV. Investment Expense	0.25%
		V. Net Investment Return [III. - IV.]	<u>6.07%</u>

\* Mean Geometric Returns based on 2020 Horizon Survey of Capital Market Assumptions

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES  
(As of the June 30, 2021 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, 2021	25,273,794	(9,461,893)	15,811,901	88,712,664	10.67%
June 30, 2020	25,417,260	(9,587,230)	15,830,030	97,075,106	9.88%
June 30, 2019	24,186,543	(8,876,859)	15,309,684	106,547,105	8.33%
June 30, 2018	24,225,398	(8,387,641)	15,837,757	104,457,946	8.03%
June 30, 2017	22,422,832	(8,071,224)	14,351,608	101,415,481	7.96%

**FINANCIAL STATEMENT DISCLOSURES**

(As of the June 30, 2021 Measurement Date)

8. Effect of 1% Change in Healthcare Trend

<b><u>Impact of a 1% Change in the Healthcare Trend Rate as of the June 30, 2021 Measurement Date</u></b>			
	<b><u>1% Decrease</u></b>	<b><u>Current Trend Rate</u></b>	<b><u>1% Increase</u></b>
<b>I. Total OPEB Liability</b>	294,039,777	355,113,853	436,829,354
<b>II. Fiduciary Net Position</b>	<u>8,789,970</u>	<u>8,789,970</u>	<u>8,789,970</u>
<b>III. Net OPEB Liability (Asset) [I.-II.]</b>	285,249,807	346,323,883	428,039,384
<b>IV. Service Cost</b>	9,720,993	13,319,286	18,649,009

9. Effect of 1% Change in Discount Rates

<b><u>Impact of a 1% Change in the Discount Rate as of the June 30, 2021 Measurement Date</u></b>			
	<b><u>1% Decrease</u></b>	<b><u>Current Discount Rate</u></b>	<b><u>1% Increase</u></b>
<b>I. Total OPEB Liability</b>	427,424,576	355,113,853	301,147,783
<b>II. Fiduciary Net Position</b>	<u>8,789,970</u>	<u>8,789,970</u>	<u>8,789,970</u>
<b>III. Net OPEB Liability (Asset) [I.-II.]</b>	418,634,606	346,323,883	292,357,813
<b>IV. Service Cost</b>	18,315,990	13,319,286	9,948,005

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES  
(As of the June 30, 2021 Measurement Date)

10. Money Weighted Rate of Return

	Plan	Periods	Period
	Investments /	Invested	Weight
	Net External		
	Cash Flows		
I. Beginning value - June 30, 2020	7,382,520	12	1.0000
Monthly net external cash flows:			
July	0	11	0.9167
August	0	10	0.8333
September	1,096,904	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>0</u>	0	0.0000
II. Total net external cash flow	1,096,904		
III. Earnings and increase in fair value	310,546		
IV. Ending value - June 30, 2021 [I. + II. + III.]	8,789,970		
Money Weighted Rate of Return	3.79%		
Asset Value - June 30, 2021	8,789,970		

EXHIBIT A  
FINANCIAL STATEMENT DISCLOSURES  
(As of the June 30, 2021 Measurement Date)

11. OPEB Liability, OPEB Expense

	Fiscal Year Ending June 30, 2021						Total
		Teacher	Non-Teacher			Water & Sewer	
	City Employees and Retirees	Employees and Retirees	School Employees and Retirees	Police Employees and Retirees	Fire Employees and Retirees	Enterprise Employees and Retirees	
I. Total OPEB Liability as of June 30, 2021	66,686,218	156,601,469	27,597,852	49,599,714	50,465,174	4,163,426	355,113,853
II. Fiduciary Net Position as of June 30, 2021	1,650,654	3,876,284	683,117	1,227,719	1,249,141	103,055	8,789,970
III. Net OPEB Liability (Asset) as of June 30, 2021 [I. - II.]	65,035,564	152,725,185	26,914,735	48,371,995	49,216,033	4,060,371	346,323,883
IV. Service Cost	2,173,828	5,665,174	2,938,002	1,384,896	1,070,344	87,042	13,319,286
V. Interest on Total OPEB Liability (Asset), Service Cost, and Benefit Payments	2,088,142	4,944,989	940,955	1,550,940	1,563,848	127,879	11,216,753
VI. Projected Earnings on OPEB Plan Investments	(90,251)	(212,089)	(37,552)	(67,135)	(68,266)	(5,627)	(480,920)
VII. Net Recognition of Deferred (Inflows)/Outflows	1,486,450	3,490,680	615,162	1,105,588	1,124,879	92,804	7,915,563
VIII. Expense Related to Change in Benefit Terms	0	0	0	0	0	0	0
IX. Financial Statement Expense [IV. + V. + VII. + VIII.]	5,658,169	13,888,754	4,456,567	3,974,289	3,690,805	302,098	31,970,682
X. Employer Share of Costs	(2,047,434)	(3,359,682)	(174,317)	(1,189,514)	(1,409,146)	(184,896)	(8,364,989)
XI. Employer (Payments) Withdrawals to/from OPEB Trust	(203,439)	(484,090)	(92,840)	(151,617)	(152,553)	(12,365)	(1,096,904)
XII. Total Employer Contribution [X. + XI.]	(2,250,873)	(3,843,772)	(267,157)	(1,341,131)	(1,561,699)	(197,261)	(9,461,893)
XIII. Net OPEB Expense [IX. + XII.]	3,407,296	10,044,982	4,189,410	2,633,158	2,129,106	104,837	22,508,789

EXHIBIT A

FINANCIAL STATEMENT DISCLOSURES  
(As of the June 30, 2021 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, 2021
For the Reporting Period & Fiscal Year ending on:	June 30, 2021
<b>Source of Deferred Inflow/Outflow</b>	
I. Deferred (Inflow)/Outflow from Actual vs. Expected Experience	(22,107,562)
II. Deferred (Inflow)/Outflow from Investment Experience	199,429
III. Deferred (Inflow)/Outflow from Changes in Assumptions	67,139,157
<b>Change in Deferred Inflow/Outflow</b>	
I. Deferred Outflow at the beginning of the period	19,417,233
II. Deferred Outflow created during the period	60,945,289
III. Deferred Outflow recognized during the period	12,985,396
IV. Change in Deferred Outflow (II. - III. )	47,959,893
V. Deferred Outflow at end of the period (I. + IV. )	67,377,126
VI. Deferred Inflow at the beginning of the period	(15,445,691)
VII. Deferred Inflow created during the period	(11,770,244)
VIII. Deferred Inflow recognized during the period	(5,069,833)
IX. Change in Deferred Inflow (VII. - VIII. )	(6,700,411)
X. Deferred Inflow at end of the period (VI. + IX. )	(22,146,102)
<b>Net OPEB Liability</b>	
I. Net OPEB Liability at beginning of period	282,555,612
II. Service Cost	13,319,286
III. Interest on Total OPEB Liability, Service Cost, and Payments	11,216,753
IV. Projected Investment Income	(480,920)
V. Total Employer Contributions	(9,461,893)
VI. Expense Related to Change in Benefit Terms	0
VII. Net OPEB Expense - Before Recognition of Deferred (Inflow)/Outflow (II. + III. + IV. + V. + VI. )	14,593,226
VIII. Deferred Outflow created during the period	60,945,289
IX. Deferred Inflow created during the period	(11,770,244)
X. Net OPEB Liability at end of period (I. + VII. + VIII. + IX. )	346,323,883
<b>Net OPEB Expense</b>	
I. Service Cost	13,319,286
II. Interest on Total OPEB Liability, Service Cost, and Payments	11,216,753
III. Projected Investment Income	(480,920)
IV. Recognition of Deferred (Inflow)/Outflow	7,915,563
V. Expense Related to Change in Benefit Terms	0
VI. Financial Statement Expense (I. + II. + III. + IV. + V. )	31,970,682
VII. Benefit Payments	(8,364,989)
VIII. Contributions to Trust	(1,096,904)
IX. Total Employer Payments (VII. + VIII. )	(9,461,893)
X. Total Net OPEB Expense under GASB 75 (VI. + IX. )	22,508,789

EXHIBIT B

REQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2021 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 2021 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:

	Actuarially Determined Contribution - Deficiency / (Excess)				
	<u>June 30, 2021</u>	<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	13,319,286	10,142,202	9,493,779	11,048,063	9,824,677
II. Amortization of NOL	<u>11,954,508</u>	<u>15,275,058</u>	<u>14,692,764</u>	<u>13,177,335</u>	<u>12,598,155</u>
III. Actuarial Determined Contribution [I. + II.]	25,273,794	25,417,260	24,186,543	24,225,398	22,422,832
IV. Contributions in Relation to the Actuarially Determined Contribution	<u>(9,461,893)</u>	<u>(9,587,230)</u>	<u>(8,876,859)</u>	<u>(8,387,641)</u>	<u>(8,071,224)</u>
V. Contribution Deficiency / (Excess) [III. + IV.]	<u>15,811,901</u>	<u>15,830,030</u>	<u>15,309,684</u>	<u>15,837,757</u>	<u>14,351,608</u>
Covered Employee Payroll	88,712,664	97,075,106	106,547,105	104,457,946	101,415,481
Contributions as a % of Covered Employee Payroll	10.67%	9.88%	8.33%	8.03%	7.96%
Discount Rate	3.25%	3.75%	3.75%	3.75%	3.75%
Money Weighted Rate of Return	3.79%	4.32%	8.05%	4.21%	3.77%

EXHIBIT B

REQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2021 Measurement Date)

Schedule of Changes in the City's Net OPEB Liability and Related Ratios					
Valuation Date	July 1, 2020	July 1, 2018	July 1, 2018	July 1, 2016	July 1, 2016
GASB 75 Measurement Date	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, 2021	June 30, 2020	June 30, 2019	June 30, 2018	June 30, 2017
<b>Total OPEB Liability</b>	355,113,853	289,938,132	277,809,805	260,525,814	247,327,326
I. Service Cost	13,319,286	10,142,202	9,493,779	11,048,063	9,824,677
II. Interest on Total OPEB Liability, Service Cost, and Benefit Payments	11,216,753	10,640,472	9,977,532	9,551,582	9,068,465
III. Changes in Benefit Terms	0	0	0	0	0
IV. Difference Between Expected & Actual Plan Experience	(11,770,244)	(164,021)	(21,935,653)	0	(1,651)
V. Changes of Assumptions	60,774,915	0	27,725,897	0	0
VI. Benefit Payments Excluding Implicit Cost	(6,228,872)	(6,545,297)	(6,174,356)	(6,922,692)	N/A
VII. Implicit Cost Amount	(2,136,117)	(1,945,029)	(1,803,208)	(478,465)	N/A
VIII. Total Benefit Payments Including Implicit Cost [VI.+VII.]	(8,364,989)	(8,490,326)	(7,977,564)	(7,401,157)	(7,065,440)
IX. Net Change in OPEB Liability [I.+II.+III.+IV.+V.+VIII.]	65,175,721	12,128,327	17,283,991	13,198,488	11,826,051
X. Total OPEB Liability - Beginning of Period	289,938,132	277,809,805	260,525,814	247,327,326	235,501,275
XI. Prior Period Adjustment	0	0	0	0	0
XII. Total OPEB Liability - Beginning of Period with Adjustment	289,938,132	277,809,805	260,525,814	247,327,326	235,501,275
XIII. Total OPEB Liability - End of Period [IX.+XII.]	355,113,853	289,938,132	277,809,805	260,525,814	247,327,326
<b>Plan Fiduciary Net Position</b>	8,789,970	7,382,520	6,025,372	4,722,378	3,575,072
XIV. Earning from Plan Investments	310,546	260,244	403,699	160,822	108,337
XV. Employer Contribution to Trust	9,461,893	9,587,230	8,876,859	8,387,641	8,071,224
XVI. Benefit Payments from Trust, Including Refunds of Member Contributions	(8,364,989)	(8,490,326)	(7,977,564)	(7,401,157)	(7,065,440)
XVII. Administrative Expense	0	0	0	0	0
XVIII. Other	0	0	0	0	0
XIX. Net Change in Plan Fiduciary Net Position [XIV.+XV.+XVI.+XVII.+XVIII.]	1,407,450	1,357,148	1,302,994	1,147,306	1,114,121
XX. Plan Fiduciary Net Position - Beginning of Period	7,382,520	6,025,372	4,722,378	3,575,072	2,460,951
XXI. Prior Period Adjustment	0	0	0	0	0
XXII. Plan Fiduciary Net Position - Beginning of Period with Adjustment	7,382,520	6,025,372	4,722,378	3,575,072	2,460,951
XXIII. Plan Fiduciary Net Position - End of Period [XIX.+XXII.]	8,789,970	7,382,520	6,025,372	4,722,378	3,575,072
XXIV. Net OPEB Liability [XIII.-XXIII.]	346,323,883	282,555,612	271,784,433	255,803,436	243,752,254
XXV. Plan Fiduciary Net Position as % of Total OPEB Liability [XXIII. / XIII.]	2.48%	2.55%	2.17%	1.81%	1.45%
XXVI. Covered Employee Payroll	88,712,664	97,075,106	106,547,105	104,457,946	101,415,481
XXVII. Plan NOL as % of Covered Employee Payroll [XXIV. / XXVI.]	390.39%	291.07%	255.08%	244.89%	240.35%
Single Discount Rate to calculate Plan Liabilities	3.25%	3.75%	3.75%	3.75%	3.75%

EXHIBIT BREQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2021 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, 2021.

Actuarial Assumptions:

Investment Rate of Return:	6.07%, net of OPEB plan investment expense, including inflation.
Municipal Bond Rate	2.18% as of June 30, 2021 (source: S&P Municipal Bond 20-Year High Grade Index – SAPIHG)
Single Equivalent Discount Rate:	3.25%, net of OPEB plan investment expense, including inflation.
Inflation:	2.50% as of June 30, 2021 and for future periods
Salary Increases:	3.00% annually as of June 30, 2021 and for future periods
Cost of Living Adjustment:	Not Applicable

EXHIBIT B

REQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2021 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, 2021 Measurement Date)

Plan Membership

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

Inactive employees or beneficiaries currently receiving benefits:	964
Active Employees:	<u>1,663</u>
Total:	<u>2,627</u>

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, 2020 to June 30, 2021

- ✓ Due to the GASB 75 standards the discount rate has been changed from 3.75% to 3.25%
- ✓ Due to updated guidance related to the implementation of ASOP 6, we have updated our methodology for calculating expected claims
- ✓ Based on recent actuarial research we have adopted the Getzen model for future healthcare cost increases

Contributions/Withdrawals:

The contribution requirements of plan members and the City are established and may be amended through City ordinances. The City contributed \$1,096,904 beyond the pay-as-you-go cost for the period ending on the June 30, 2021 Measurement Date. For the year ending on the June 30, 2021 Measurement Date total City premiums plus implicit costs for the retiree medical program were \$8,364,989. \$2,136,117 of the \$8,364,989 represents implicit cost.

EXHIBIT BREQUIRED SUPPLEMENTARY INFORMATION

(As of the June 30, 2021 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, 2021	88,712,664	0	88,712,664	0	8,364,989	0	8,364,989
June 30, 2022	83,372,713	8,001,331	91,374,044	0	8,780,853	0	8,780,853
June 30, 2023	79,027,895	15,087,370	94,115,265	0	9,256,329	0	9,256,329
June 30, 2024	75,274,166	21,664,557	96,938,723	0	9,838,147	0	9,838,147
June 30, 2025	72,027,045	27,819,840	99,846,885	0	10,402,433	0	10,402,433
June 30, 2026	68,984,417	33,857,875	102,842,292	0	11,164,344	0	11,164,344
June 30, 2027	66,302,618	39,624,943	105,927,561	0	11,931,604	0	11,931,604
June 30, 2028	63,726,459	45,378,929	109,105,388	0	12,645,385	0	12,645,385
June 30, 2029	61,452,101	50,926,449	112,378,550	0	13,466,840	0	13,466,840
June 30, 2030	59,293,616	56,456,291	115,749,907	0	14,374,256	0	14,374,256
June 30, 2031	57,187,314	62,035,090	119,222,404	0	15,294,580	0	15,294,580
June 30, 2032	55,252,713	67,546,363	122,799,076	0	16,037,746	72,462	16,110,208
June 30, 2033	53,422,464	73,060,584	126,483,048	0	16,726,350	171,792	16,898,142
June 30, 2034	51,655,963	78,621,576	130,277,539	0	17,248,354	307,856	17,556,210
June 30, 2035	49,988,884	84,196,981	134,185,865	0	17,673,106	495,248	18,168,354
June 30, 2036	48,324,356	89,887,085	138,211,441	0	18,050,807	726,747	18,777,554
June 30, 2037	46,708,386	95,649,398	142,357,784	0	18,383,637	907,828	19,291,465
June 30, 2038	45,209,066	101,419,452	146,628,518	0	18,613,865	1,124,743	19,738,608
June 30, 2039	43,531,478	107,495,896	151,027,374	0	19,072,664	1,378,967	20,451,631
June 30, 2040	41,981,969	113,576,226	155,558,195	0	19,636,975	1,595,580	21,232,555
June 30, 2041	40,492,947	119,731,994	160,224,941	0	20,118,979	1,838,640	21,957,619
June 30, 2042	39,062,473	125,969,216	165,031,689	0	20,811,205	2,204,578	23,015,783
June 30, 2043	37,419,229	132,563,411	169,982,640	0	21,645,668	2,657,909	24,303,577
June 30, 2044	35,935,192	139,146,927	175,082,119	0	22,229,926	3,203,848	25,433,774
June 30, 2045	34,482,002	145,852,581	180,334,583	0	22,601,015	3,877,783	26,478,798
June 30, 2046	33,004,933	152,739,687	185,744,620	0	23,117,037	4,658,341	27,775,378
June 30, 2047	31,524,778	159,792,181	191,316,959	0	23,455,625	5,356,728	28,812,353
June 30, 2048	30,051,256	167,005,212	197,056,468	0	23,383,270	6,142,896	29,526,166
June 30, 2049	28,406,006	174,562,156	202,968,162	0	23,552,151	7,022,846	30,574,997
June 30, 2050	26,652,415	182,404,792	209,057,207	0	23,669,406	7,839,964	31,509,370
June 30, 2051	24,971,826	190,357,097	215,328,923	0	23,632,141	8,723,163	32,355,304
June 30, 2052	23,279,706	198,509,085	221,788,791	0	23,848,487	9,799,594	33,648,081
June 30, 2053	21,481,634	206,960,821	228,442,455	0	24,032,356	10,967,470	34,999,826
June 30, 2054	19,733,540	215,562,189	235,295,729	0	24,175,990	12,243,105	36,419,095
June 30, 2055	17,905,319	224,449,282	242,354,601	0	24,302,956	13,654,833	37,957,789
June 30, 2056	16,002,246	233,622,993	249,625,239	0	24,204,374	15,171,571	39,375,945
June 30, 2057	14,291,481	242,822,515	257,113,996	0	23,825,395	16,705,505	40,530,900
June 30, 2058	12,599,101	252,228,315	264,827,416	0	23,649,428	18,317,964	41,967,392
June 30, 2059	10,915,020	261,857,218	272,772,238	0	23,269,579	20,031,638	43,301,217
June 30, 2060	9,436,844	271,518,561	280,955,405	0	22,895,866	21,778,258	44,674,124

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, 2061	7,949,141	281,434,926	289,384,067	0	22,765,929	23,585,962	46,351,891
June 30, 2062	6,629,858	291,435,731	298,065,589	0	22,679,954	25,608,734	48,288,688
June 30, 2063	5,434,329	301,573,228	307,007,557	0	22,675,750	27,743,458	50,419,208
June 30, 2064	4,399,716	311,818,068	316,217,784	0	22,687,492	30,031,817	52,719,309
June 30, 2065	3,443,246	322,261,072	325,704,318	0	22,731,506	32,483,972	55,215,478
June 30, 2066	2,698,692	332,776,756	335,475,448	0	22,682,856	35,067,229	57,750,085
June 30, 2067	2,060,453	343,479,258	345,539,711	0	22,414,721	37,750,826	60,165,547
June 30, 2068	1,533,129	354,372,773	355,905,902	0	22,168,238	40,540,849	62,709,087
June 30, 2069	1,083,019	365,500,060	366,583,079	0	22,030,819	43,462,803	65,493,622
June 30, 2070	728,876	376,851,695	377,580,571	0	21,758,913	46,437,407	68,196,320
June 30, 2071	450,169	388,457,819	388,907,988	0	21,463,742	49,515,835	70,979,577
June 30, 2072	128,814	400,446,414	400,575,228	0	21,214,945	52,772,867	73,987,812
June 30, 2073	0	412,592,485	412,592,485	0	20,862,843	56,138,852	77,001,695
June 30, 2074	0	424,970,260	424,970,260	0	20,475,137	59,643,736	80,118,873
June 30, 2075	0	437,719,368	437,719,368	0	20,013,497	63,277,596	83,291,093
June 30, 2076	0	450,850,949	450,850,949	0	19,509,361	67,031,728	86,541,089
June 30, 2077	0	464,376,477	464,376,477	0	19,006,658	70,981,449	89,988,107
June 30, 2078	0	478,307,771	478,307,771	0	18,411,692	75,037,754	93,449,446
June 30, 2079	0	492,657,004	492,657,004	0	17,777,891	79,223,822	97,001,713
June 30, 2080	0	507,436,714	507,436,714	0	17,099,236	83,572,155	100,671,391
June 30, 2081	0	522,659,815	522,659,815	0	16,348,647	88,042,885	104,391,532
June 30, 2082	0	538,339,609	538,339,609	0	15,589,073	92,675,790	108,264,863
June 30, 2083	0	554,489,797	554,489,797	0	14,788,169	97,464,410	112,252,579
June 30, 2084	0	571,124,491	571,124,491	0	13,945,767	102,416,341	116,362,108
June 30, 2085	0	588,258,226	588,258,226	0	13,082,529	107,536,381	120,618,910
June 30, 2086	0	605,905,973	605,905,973	0	12,208,456	112,827,771	125,036,227
June 30, 2087	0	624,083,152	624,083,152	0	11,363,067	118,330,596	129,693,663
June 30, 2088	0	642,805,647	642,805,647	0	10,499,126	123,995,813	134,494,939
June 30, 2089	0	662,089,816	662,089,816	0	9,612,713	129,847,569	139,460,282
June 30, 2090	0	681,952,510	681,952,510	0	8,758,918	135,920,523	144,679,441
June 30, 2091	0	702,411,085	702,411,085	0	7,928,730	142,183,402	150,112,132
June 30, 2092	0	723,483,418	723,483,418	0	7,117,571	148,654,740	155,772,311
June 30, 2093	0	745,187,921	745,187,921	0	6,343,968	155,358,743	161,702,711
June 30, 2094	0	767,543,559	767,543,559	0	5,612,394	162,293,383	167,905,777
June 30, 2095	0	790,569,866	790,569,866	0	4,926,867	169,465,320	174,392,187

## 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 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 Withdrawals for Current Plan Members [V. + VI.]	VIII. Investment Earnings	IX. Ending Fiduciary Net Position for Current Plan Members
June 30, 2021	7,382,520	8,364,989	1,096,904	9,461,893	0	8,364,989	8,364,989	310,546	8,789,970
June 30, 2022	8,789,970	8,780,853	912,433	9,693,286	0	8,780,853	8,780,853	514,114	10,216,517
June 30, 2023	10,216,517	9,256,329	839,693	10,096,022	0	9,256,329	9,256,329	645,252	11,701,462
June 30, 2024	11,701,462	9,838,147	776,513	10,614,660	0	9,838,147	9,838,147	733,499	13,211,474
June 30, 2025	13,211,474	10,402,433	721,375	11,123,808	0	10,402,433	10,402,433	823,508	14,756,357
June 30, 2026	14,756,357	11,164,344	670,779	11,835,123	0	11,164,344	11,164,344	915,769	16,342,905
June 30, 2027	16,342,905	11,931,604	625,924	12,557,528	0	11,931,604	11,931,604	1,010,731	17,979,560
June 30, 2028	17,979,560	12,645,385	584,082	13,229,467	0	12,645,385	12,645,385	1,108,825	19,672,467
June 30, 2029	19,672,467	13,466,840	546,831	14,013,671	0	13,466,840	13,466,840	1,210,471	21,429,769
June 30, 2030	21,429,769	14,374,256	512,256	14,886,512	0	14,374,256	14,374,256	1,316,105	23,258,130
June 30, 2031	23,258,130	15,294,580	479,669	15,774,249	0	15,294,580	15,294,580	1,426,112	25,163,911
June 30, 2032	25,163,911	16,037,746	449,944	16,487,690	0	16,037,746	16,037,746	1,540,904	27,082,297
June 30, 2033	27,082,297	16,726,350	422,369	17,148,719	0	16,726,350	16,726,350	1,656,525	28,989,399
June 30, 2034	28,989,399	17,248,354	396,507	17,644,861	0	17,248,354	17,248,354	1,771,513	30,849,563
June 30, 2035	30,849,563	17,673,106	372,535	18,045,641	0	17,673,106	17,673,106	1,883,708	32,610,558
June 30, 2036	32,610,558	18,050,807	349,641	18,400,448	0	18,050,807	18,050,807	1,989,916	34,223,368
June 30, 2037	34,223,368	18,383,637	328,106	18,711,743	0	18,383,637	18,383,637	2,087,170	35,730,816
June 30, 2038	35,730,816	18,613,865	308,324	18,922,189	0	18,613,865	18,613,865	2,176,080	37,092,477
June 30, 2039	37,092,477	19,072,664	288,236	19,360,900	0	19,072,664	19,072,664	2,260,132	38,261,878
June 30, 2040	38,261,878	19,636,975	269,880	19,906,855	0	19,636,975	19,636,975	2,330,566	39,266,744
June 30, 2041	39,266,744	20,118,979	252,726	20,371,705	0	20,118,979	20,118,979	2,391,049	40,071,879
June 30, 2042	40,071,879	20,811,205	236,697	21,047,902	0	20,811,205	20,811,205	2,439,441	40,543,439
June 30, 2043	40,543,439	21,645,668	220,136	21,865,804	0	21,645,668	21,645,668	2,467,569	40,573,235
June 30, 2044	40,573,235	22,229,926	205,248	22,435,174	0	22,229,926	22,229,926	2,468,933	40,043,568
June 30, 2045	40,043,568	22,601,015	191,211	22,792,226	0	22,601,015	22,601,015	2,436,362	38,793,358
June 30, 2046	38,793,358	23,117,037	177,690	23,294,727	0	23,117,037	23,117,037	2,360,070	36,672,777
June 30, 2047	36,672,777	23,455,625	164,778	23,620,403	0	23,455,625	23,455,625	2,230,965	33,711,792
June 30, 2048	33,711,792	23,383,270	152,501	23,535,771	0	23,383,270	23,383,270	2,050,866	29,772,263
June 30, 2049	29,772,263	23,552,151	139,953	23,692,104	0	23,552,151	23,552,151	1,811,361	24,700,731
June 30, 2050	24,700,731	23,669,406	127,489	23,796,895	0	23,669,406	23,669,406	1,503,147	18,491,403
June 30, 2051	18,491,403	23,632,141	115,971	23,748,112	0	23,632,141	23,632,141	1,125,896	11,010,107
June 30, 2052	11,010,107	23,848,487	104,963	23,953,450	0	23,848,487	23,848,487	671,452	1,986,928
June 30, 2053	1,986,928	24,032,356	94,035	24,126,391	0	24,032,356	24,032,356	123,418	217,453
June 30, 2054	217,453	24,175,990	83,867	24,259,857	0	24,175,990	24,175,990	15,707	99,574
June 30, 2055	99,574	24,302,956	73,881	24,376,837	0	24,302,956	24,302,956	8,253	82,134
June 30, 2056	82,134	24,204,374	64,105	24,268,479	0	24,204,374	24,204,374	6,902	71,007
June 30, 2057	71,007	23,825,395	55,584	23,880,979	0	23,825,395	23,825,395	5,972	61,556
June 30, 2058	61,556	23,649,428	47,575	23,697,003	0	23,649,428	23,649,428	5,159	52,734
June 30, 2059	52,734	23,269,579	40,015	23,309,594	0	23,269,579	23,269,579	4,398	44,413
June 30, 2060	44,413	22,895,866	33,588	22,929,454	0	22,895,866	22,895,866	3,700	37,288

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 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, 2061	37,288	22,765,929	27,469	22,793,398	0	22,765,929	22,765,929	3,085	30,554
June 30, 2062	30,554	22,679,954	22,243	22,702,197	0	22,679,954	22,679,954	2,520	24,763
June 30, 2063	24,763	22,675,750	17,701	22,693,451	0	22,675,750	22,675,750	2,032	19,733
June 30, 2064	19,733	22,687,492	13,914	22,701,406	0	22,687,492	22,687,492	1,614	15,528
June 30, 2065	15,528	22,731,506	10,572	22,742,078	0	22,731,506	22,731,506	1,259	11,831
June 30, 2066	11,831	22,682,856	8,044	22,690,900	0	22,682,856	22,682,856	959	9,003
June 30, 2067	9,003	22,414,721	5,963	22,420,684	0	22,414,721	22,414,721	725	6,688
June 30, 2068	6,688	22,168,238	4,308	22,172,546	0	22,168,238	22,168,238	535	4,843
June 30, 2069	4,843	22,030,819	2,954	22,033,773	0	22,030,819	22,030,819	382	3,336
June 30, 2070	3,336	21,758,913	1,930	21,760,843	0	21,758,913	21,758,913	260	2,190
June 30, 2071	2,190	21,463,742	1,158	21,464,900	0	21,463,742	21,463,742	168	1,326
June 30, 2072	1,326	21,214,945	322	21,215,267	0	21,214,945	21,214,945	90	412
June 30, 2073	412	20,862,843	0	20,862,843	0	20,862,843	20,862,843	25	25
June 30, 2074	25	20,475,137	0	20,475,137	0	20,475,137	20,475,137	2	2
June 30, 2075	2	20,013,497	0	20,013,497	0	20,013,497	20,013,497	0	0
June 30, 2076	0	19,509,361	0	19,509,361	0	19,509,361	19,509,361	0	0
June 30, 2077	0	19,006,658	0	19,006,658	0	19,006,658	19,006,658	0	0
June 30, 2078	0	18,411,692	0	18,411,692	0	18,411,692	18,411,692	0	0
June 30, 2079	0	17,777,891	0	17,777,891	0	17,777,891	17,777,891	0	0
June 30, 2080	0	17,099,236	0	17,099,236	0	17,099,236	17,099,236	0	0
June 30, 2081	0	16,348,647	0	16,348,647	0	16,348,647	16,348,647	0	0
June 30, 2082	0	15,589,073	0	15,589,073	0	15,589,073	15,589,073	0	0
June 30, 2083	0	14,788,169	0	14,788,169	0	14,788,169	14,788,169	0	0
June 30, 2084	0	13,945,767	0	13,945,767	0	13,945,767	13,945,767	0	0
June 30, 2085	0	13,082,529	0	13,082,529	0	13,082,529	13,082,529	0	0
June 30, 2086	0	12,208,456	0	12,208,456	0	12,208,456	12,208,456	0	0
June 30, 2087	0	11,363,067	0	11,363,067	0	11,363,067	11,363,067	0	0
June 30, 2088	0	10,499,126	0	10,499,126	0	10,499,126	10,499,126	0	0
June 30, 2089	0	9,612,713	0	9,612,713	0	9,612,713	9,612,713	0	0
June 30, 2090	0	8,758,918	0	8,758,918	0	8,758,918	8,758,918	0	0
June 30, 2091	0	7,928,730	0	7,928,730	0	7,928,730	7,928,730	0	0
June 30, 2092	0	7,117,571	0	7,117,571	0	7,117,571	7,117,571	0	0
June 30, 2093	0	6,343,968	0	6,343,968	0	6,343,968	6,343,968	0	0
June 30, 2094	0	5,612,394	0	5,612,394	0	5,612,394	5,612,394	0	0
June 30, 2095	0	4,926,867	0	4,926,867	0	4,926,867	4,926,867	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 [II. - III.]	V. Present Value of Funded Benefit Payments using the Long-Term Rate of Return [6.07%]	VI. Present Value of Unfunded Benefit Payments using the Municipal Bond Rate [2.18%]	VII. Present Value of Benefit Payments using the Single Equivalent Discount Rate [3.20%]	
June 30, 2021	7,382,520	8,364,989	7,382,520	982,469	7,382,520	982,469	8,364,989	<b>Sum of Column V.</b>
June 30, 2022	8,789,970	8,780,853	8,780,853	0	8,278,357	0	8,508,269	216,260,635
June 30, 2023	10,216,517	9,256,329	9,256,329	0	8,227,230	0	8,690,561	
June 30, 2024	11,701,462	9,838,147	9,838,147	0	8,243,955	0	8,950,079	<b>Sum of Column VI.</b>
June 30, 2025	13,211,474	10,402,433	10,402,433	0	8,217,972	0	9,169,655	286,657,690
June 30, 2026	14,756,357	11,164,344	11,164,344	0	8,315,155	0	9,535,771	
June 30, 2027	16,342,905	11,931,604	11,931,604	0	8,378,059	0	9,874,747	<b>Sum of Column VII.</b>
June 30, 2028	17,979,560	12,645,385	12,645,385	0	8,371,130	0	10,140,601	[V. + VI.]
June 30, 2029	19,672,467	13,466,840	13,466,840	0	8,404,757	0	10,464,100	502,918,325
June 30, 2030	21,429,769	14,374,256	14,374,256	0	8,457,700	0	10,822,462	
June 30, 2031	23,258,130	15,294,580	15,294,580	0	8,484,219	0	11,157,908	
June 30, 2032	25,163,911	16,037,746	16,037,746	0	8,387,356	0	11,336,867	
June 30, 2033	27,082,297	16,726,350	16,726,350	0	8,246,893	0	11,456,592	
June 30, 2034	28,989,399	17,248,354	17,248,354	0	8,017,598	0	11,447,389	
June 30, 2035	30,849,563	17,673,106	17,673,106	0	7,744,920	0	11,365,176	
June 30, 2036	32,610,558	18,050,807	18,050,807	0	7,457,755	0	11,247,719	
June 30, 2037	34,223,368	18,383,637	18,383,637	0	7,160,615	0	11,099,509	
June 30, 2038	35,730,816	18,613,865	18,613,865	0	6,835,384	0	10,889,637	
June 30, 2039	37,092,477	19,072,664	19,072,664	0	6,603,058	0	10,811,669	
June 30, 2040	38,261,878	19,636,975	19,636,975	0	6,409,376	0	10,786,002	
June 30, 2041	39,266,744	20,118,979	20,118,979	0	6,190,911	0	10,707,704	
June 30, 2042	40,071,879	20,811,205	20,811,205	0	6,037,446	0	10,732,284	
June 30, 2043	40,543,439	21,645,668	21,645,668	0	5,920,174	0	10,816,094	
June 30, 2044	40,573,235	22,229,926	22,229,926	0	5,732,036	0	10,763,215	
June 30, 2045	40,043,568	22,601,015	22,601,015	0	5,494,223	0	10,603,188	
June 30, 2046	38,793,358	23,117,037	23,117,037	0	5,298,073	0	10,508,608	
June 30, 2047	36,672,777	23,455,625	23,455,625	0	5,068,042	0	10,331,528	
June 30, 2048	33,711,792	23,383,270	23,383,270	0	4,763,278	0	9,979,926	
June 30, 2049	29,772,263	23,552,151	23,552,151	0	4,523,126	0	9,739,960	
June 30, 2050	24,700,731	23,669,406	23,669,406	0	4,285,513	0	9,484,588	
June 30, 2051	18,491,403	23,632,141	18,491,403	5,140,738	3,156,406	2,693,287	9,175,689	
June 30, 2052	11,010,107	23,848,487	11,010,107	12,838,380	1,771,829	6,582,780	8,972,242	
June 30, 2053	1,986,928	24,032,356	1,986,928	22,045,428	301,453	11,062,660	8,760,745	
June 30, 2054	217,453	24,175,990	217,453	23,958,537	31,104	11,766,390	8,539,520	
June 30, 2055	99,574	24,302,956	99,574	24,203,382	13,428	11,633,246	8,317,883	
June 30, 2056	82,134	24,204,374	82,134	24,122,240	10,442	11,347,087	8,026,978	
June 30, 2057	71,007	23,825,395	71,007	23,754,388	8,511	10,935,849	7,656,017	
June 30, 2058	61,556	23,649,428	61,556	23,587,872	6,956	10,627,701	7,363,562	
June 30, 2059	52,734	23,269,579	52,734	23,216,845	5,618	10,237,542	7,020,375	
June 30, 2060	44,413	22,895,866	44,413	22,851,453	4,461	9,861,619	6,693,194	

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 [6.07%]	VI. Present Value of Unfunded Benefit Payments using the Municipal Bond Rate [2.18%]	VII. Present Value of Benefit Payments using the Single Equivalent Discount Rate [3.20%]
June 30, 2061	37,288	22,765,929	37,288	22,728,641	3,531	9,599,525	6,448,612
June 30, 2062	30,554	22,679,954	30,554	22,649,400	2,728	9,362,135	6,224,831
June 30, 2063	24,763	22,675,750	24,763	22,650,987	2,084	9,163,201	6,030,475
June 30, 2064	19,733	22,687,492	19,733	22,667,759	1,566	8,974,507	5,846,297
June 30, 2065	15,528	22,731,506	15,528	22,715,978	1,162	8,801,878	5,675,801
June 30, 2066	11,831	22,682,856	11,831	22,671,025	834	8,597,199	5,487,837
June 30, 2067	9,003	22,414,721	9,003	22,405,718	599	8,315,466	5,254,620
June 30, 2068	6,688	22,168,238	6,688	22,161,550	419	8,049,516	5,035,512
June 30, 2069	4,843	22,030,819	4,843	22,025,976	286	7,829,729	4,848,949
June 30, 2070	3,336	21,758,913	3,336	21,755,577	186	7,568,748	4,640,435
June 30, 2071	2,190	21,463,742	2,190	21,461,552	115	7,307,292	4,435,387
June 30, 2072	1,326	21,214,945	1,326	21,213,619	66	7,068,903	4,247,882
June 30, 2073	412	20,862,843	412	20,862,431	19	6,803,683	4,047,703
June 30, 2074	25	20,475,137	25	20,475,112	1	6,535,027	3,849,164
June 30, 2075	2	20,013,497	2	20,013,495	0	6,251,524	3,645,584
June 30, 2076	0	19,509,361	0	19,509,361	0	5,964,142	3,443,434
June 30, 2077	0	19,006,658	0	19,006,658	0	5,686,598	3,250,566
June 30, 2078	0	18,411,692	0	18,411,692	0	5,391,162	3,051,065
June 30, 2079	0	17,777,891	0	17,777,891	0	5,094,609	2,854,582
June 30, 2080	0	17,099,236	0	17,099,236	0	4,795,669	2,660,379
June 30, 2081	0	16,348,647	0	16,348,647	0	4,487,415	2,464,638
June 30, 2082	0	15,589,073	0	15,589,073	0	4,187,710	2,277,173
June 30, 2083	0	14,788,169	0	14,788,169	0	3,887,878	2,093,123
June 30, 2084	0	13,945,767	0	13,945,767	0	3,588,249	1,912,614
June 30, 2085	0	13,082,529	0	13,082,529	0	3,294,381	1,738,525
June 30, 2086	0	12,208,456	0	12,208,456	0	3,008,740	1,572,007
June 30, 2087	0	11,363,067	0	11,363,067	0	2,740,700	1,417,731
June 30, 2088	0	10,499,126	0	10,499,126	0	2,478,340	1,269,276
June 30, 2089	0	9,612,713	0	9,612,713	0	2,220,730	1,126,039
June 30, 2090	0	8,758,918	0	8,758,918	0	1,980,350	994,174
June 30, 2091	0	7,928,730	0	7,928,730	0	1,754,434	872,007
June 30, 2092	0	7,117,571	0	7,117,571	0	1,541,371	758,495
June 30, 2093	0	6,343,968	0	6,343,968	0	1,344,554	655,068
June 30, 2094	0	5,612,394	0	5,612,394	0	1,164,146	561,537
June 30, 2095	0	4,926,867	0	4,926,867	0	1,000,166	477,645

APPENDIX II – PLAN PROVISIONS

<u>Plan Year</u>	July 1 through June 30.
<u>Premium Effective Date</u>	<b>Medicare Supplement Plans:</b> effective January 1, 2021 <b>Non-Medicare Plans:</b> effective July 1, 2021 <b>Dental Plans:</b> N/A
<u>Creditable Service</u>	Elapsed time from date of hire to termination of service date.
<u>Benefits Offered</u>	Comprehensive Medical & Dental Insurance as well as \$5,000 Group Term Life Insurance. Retired Teachers shall receive Medical & Dental Insurance as well as \$5,000 Group Term Life Insurance via the GIC.
<u>Medicare Part A</u>	To the best of our knowledge the City does not pay any Medicare Part A premiums or penalties.
<u>Medicare Part B</u>	Medicare Part B Premium reimbursements by the City were not reflected in this valuation. Medicare Part B Penalty reimbursements by the City were not reflected in this valuation.
<u>Surviving Spouse Coverage</u>	Upon the death of the retiree their spouse is no longer eligible for coverage for non-teachers. Surviving spouses of retired teachers pay 10%

## APPENDIX II – PLAN PROVISIONS

### Eligibility

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

### Participant Contributions

Group	Individual	Two-Person / Family
<b>Medical</b>	<ul style="list-style-type: none"> <li>• 15% of underlying gross premiums for participants who retire on or after April 15, 2003</li> <li>• Participants who retired prior to April 15, 2003 will pay the same percentage as the insurance as active employees at their time of retirement</li> <li>• Teachers who retired prior to July 1, 1990 pay 10% and all other teachers pay 15% of premiums</li> </ul>	<ul style="list-style-type: none"> <li>• 15% of underlying gross premiums for participants who retire on or after April 15, 2003</li> <li>• Participants who retired prior to April 15, 2003 will pay the same percentage as the insurance as active employees at their time of retirement</li> <li>• Teachers who retired prior to July 1, 1990 pay 10% and all other teachers pay 15% of premiums</li> </ul>
<b>Dental</b>	100%	100%
<b>Life</b>	<ul style="list-style-type: none"> <li>• 15% of Premiums</li> <li>• Teachers who retired prior to July 1, 1990 pay 10% and all other teachers pay 15% of premiums</li> </ul>	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

3.25% per annum (previously 3.75%, used in the calculation of the Interest Cost)

### Net Long Term Rate of Return

6.07% (based on investment policy)

### Municipal Bond Rate

2.18% as of June 30, 2021 (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, 2021

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 Safety
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

Trend Rate

**Medicare Part A & B Premiums & Penalties:** N/A

**Medical 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.

<b>Impact of Implicit Subsidy</b>		
	<b>As of the Measurement Date</b>	
<b>Impact on Liability</b>	<b><u>June 30, 2021</u></b>	<b><u>June 30, 2020</u></b>
I. Total OPEB Liability	355,113,853	289,938,132
II. Total OPEB Liability (Excluding Implicit Subsidy)	<u>268,047,977</u>	<u>240,464,177</u>
III. Liability from Implicit Subsidy [I. - II.]	87,065,876	49,473,955

	<b>For the Measurement Period Ending</b>	
<b>Impact on Payments</b>	<b><u>June 30, 2021</u></b>	<b><u>June 30, 2020</u></b>
IV. Employer Payments (Including Implicit Subsidy)	8,364,989	8,490,326
V. Actual Employer Payments	<u>6,228,872</u>	<u>6,545,297</u>
VI. Implicit Subsidy [IV. - V.]	2,136,117	1,945,029

APPENDIX III – ACTUARIAL METHODS & ASSUMPTIONS

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

**ANNUAL PER CAPITA CLAIMS\* (Non-GIC)**

ACTIVE EMPLOYEES			RETIREE - NOT MEDICARE ELIGIBLE			RETIREE - MEDICARE ELIGIBLE		
Age Bracket	Female	Male	Age Bracket	Female	Male	Age Bracket	Female	Male
24 & Under	4,281	2,699	44 & Under	8,794	5,762	65 to 69	4,332	4,448
25 to 29	6,316	2,809	45 to 49	9,659	7,275	70 to 74	5,110	5,330
30 to 34	7,982	3,525	50 to 54	11,363	9,582	75 to 79	5,929	6,294
35 to 39	8,222	4,426	55 to 59	13,136	12,457	80 to 84	6,799	7,235
40 to 44	8,415	5,514	60 to 64	15,631	15,985	85 to 89	7,601	8,060
45 to 49	9,243	6,962	65 to 69	18,737	19,939	90 & Over	7,601	8,060
50 to 54	10,874	9,169	70 to 74	22,096	23,895			
55 to 59	12,570	11,921	75 to 79	25,661	28,221			
60 to 64	14,958	15,297	80 to 84	29,422	32,439			
65 to 69	17,930	19,080	85 to 89	33,585	37,130			
70 & Over	21,144	22,866	90 & Over	33,585	37,130			

\*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.

**ANNUAL PER CAPITA CLAIMS\* (GIC)**

ACTIVE EMPLOYEES			RETIREE - NOT MEDICARE ELIGIBLE			RETIREE - MEDICARE ELIGIBLE		
Age Bracket	Female	Male	Age Bracket	Female	Male	Age Bracket	Female	Male
24 & Under	5,479	3,455	44 & Under	11,256	7,375	65 to 69	3,309	3,398
25 to 29	8,084	3,594	45 to 49	12,363	9,312	70 to 74	3,904	4,073
30 to 34	10,216	4,512	50 to 54	14,544	12,264	75 to 79	4,529	4,809
35 to 39	10,523	5,665	55 to 59	16,813	15,945	80 to 84	5,195	5,527
40 to 44	10,771	7,057	60 to 64	20,007	20,461	85 to 89	5,808	6,158
45 to 49	11,831	8,911	65 to 69	23,983	25,522	90 & Over	5,808	6,158
50 to 54	13,918	11,736	70 to 74	28,282	30,585			
55 to 59	16,089	15,258	75 to 79	32,845	36,122			
60 to 64	19,145	19,580	80 to 84	37,659	41,520			
65 to 69	22,950	24,423	85 to 89	42,987	47,526			
70 & Over	27,064	29,268	90 & Over	42,987	47,526			

\*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, 2021 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	July 1, 2018
<b>A. Average Age at Hire</b>	33.10	34.30
<b>B. Average Service</b>	<u>9.29</u>	<u>10.15</u>
<b>C. Average Current Age</b>	42.39	44.45

### Retired Employees & Spouses

Valuation Date	July 1, 2020	July 1, 2018
<b>A. Under Age 65</b>	165	138
<b>B. Age 65 &amp; Over</b>	<u>799</u>	<u>842</u>
<b>C. Total</b>	964	980

### 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	124	9								133
25-29	130	44	23							197
30-34	95	92	27	6						220
35-39	60	70	60	9	4					203
40-44	101	21	37	32	7	1				199
45-49	39	54	24	19	48	17				201
50-54	31	32	47	10	29	28	4			181
55-59	19	32	17	19	13	18	12	2		132
60-64	12	19	9	14	21	4	4			83
65-69	10	8	9	6	7	6				46
70+	14	8	8	2	7	2		1		42
<b>Total</b>	635	389	261	117	136	76	20	3		1,637

APPENDIX IV – PLAN DEMOGRAPHICS

Plan Offerings - Non-GIC

	Number of Contracts			
	<u>Single</u>	<u>Two-Person</u>	<u>Family</u>	<u>Total</u>
Network Blue	155		113	268
Blue Care Elect	117		194	311
Harvard Pilgrim	239		365	604
Tufts Med Preferred	4	4		8
Managed Blue	4	5		9
Medex	93	158		251
Total	612	167	672	1,451

	Per Contract Costs (monthly)		
	<u>Single</u>	<u>Two-Person</u>	<u>Family</u>
Network Blue	687.34		1,835.59
Blue Care Elect	1,005.51		2,227.69
Harvard Pilgrim	750.95		2,035.40
Tufts Med Preferred	346.00	692.00	
Managed Blue	516.83	1,033.66	
Medex	502.67	1,005.34	
Dental Plan	N/A		N/A

APPENDIX IV – PLAN DEMOGRAPHICS

	Active Plan Average Premium Calculation - Non-GIC					
	Single	Two-Person	Family	Number of Participants	Total Premiums Paid	Claims Without Children
Network Blue	155		113	381	3,767,512.44	3,142,518.48
Blue Care Elect	117		194	505	6,597,798.36	6,093,390.60
Harvard Pilgrim	239		365	969	11,068,776.60	8,732,046.60
<b>Total</b>	511	0	672	1,855	21,434,087.40	17,967,955.68
<b>Blended Average Monthly Rate:</b>						<b>\$ 807.19</b>

	Medicare Supplement Plan Average Premium Calculation - Non-GIC					
	Single	Two-Person	Family	Number of Participants	Total Premiums Paid	Claims Without Children
Tufts Med Preferred	4	4		12	49,824.00	49,824.00
Managed Blue	4	5		14	86,827.44	86,827.44
Medex	93	158		409	2,467,104.36	2,467,104.36
<b>Total</b>	101	167	0	435	2,603,755.80	2,603,755.80
<b>Blended Average Monthly Rate:</b>						<b>\$ 498.83</b>

APPENDIX IV – PLAN DEMOGRAPHICS

Plan Offerings - GIC

	Number of Contracts			
	<u>Single</u>	<u>Two-Person</u>	<u>Family</u>	<u>Total</u>
Fallon Direct	1			1
Harvard Pilgrim			1	1
Harvard Primary Choice	1		3	4
Tufts Navigator			1	1
Unicare Basic w/ CIC	41		12	53
Unicare Basic w/o CIC				0
Unicare OME w/ CIC	88	87		175
Unicare OME w/o CIC				0
Tufts Medicare Complement	3			3
Tufts Medicare Preferred	1	2		3
Harvard Senior	14	11		25
Total	149	100	17	266

	Per Contract Costs (monthly)		
	<u>Single</u>	<u>Two-Person</u>	<u>Family</u>
Fallon Direct	618.59		1,561.48
Harvard Pilgrim	917.18		2,239.19
Harvard Primary Choice	665.43		1,697.02
Tufts Navigator	799.04		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 OME w/ CIC	399.86	799.72	
Unicare OME w/o CIC	388.80	777.60	
Tufts Medicare Complement	383.88	767.76	
Tufts Medicare Preferred	325.13	650.26	
Harvard Senior	404.04	808.08	
Dental Plan	N/A		N/A

### APPENDIX IV – PLAN DEMOGRAPHICS

	Active Plan Average Premium Calculation - GIC					
	Single	Two-Person	Family	Number of Participants	Total Premiums Paid	Claims Without Children
Fallon Direct	1			1	7,423.08	7,423.08
Harvard Pilgrim			1	2	26,870.28	22,012.32
Harvard Primary Choice	1		3	7	69,077.88	55,896.12
Tufts Navigator			1	2	23,417.52	19,176.96
Unicare Basic w/ CIC	41		12	65	898,285.68	863,787.60
Unicare Basic w/o CIC				0	0.00	0.00
<b>Total</b>	<b>43</b>	<b>0</b>	<b>17</b>	<b>77</b>	<b>1,025,074.44</b>	<b>968,296.08</b>
<b>Blended Average Monthly Rate:</b>						<b>\$ 1,047.94</b>

	Medicare Supplement Plan Average Premium Calculation - GIC					
	Single	Two-Person	Family	Number of Participants	Total Premiums Paid	Claims Without Children
Unicare OME w/ CIC	88	87		262	1,222,387.20	1,222,387.20
Unicare OME w/o CIC				0	0.00	0.00
Tufts Medicare Complement	3			3	13,819.68	13,819.68
Tufts Medicare Preferred	1	2		5	19,507.80	19,507.80
Harvard Senior	14	11		36	174,545.28	174,545.28
<b>Total</b>	<b>106</b>	<b>100</b>	<b>0</b>	<b>306</b>	<b>1,430,259.96</b>	<b>1,430,259.96</b>
<b>Blended Average Monthly Rate:</b>						<b>\$ 389.50</b>

## 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 organizations<sup>1</sup>, 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 Conduct<sup>2</sup>, 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 March 2, 2020 and its subject is the City of Everett’s GASB 75 OPEB liabilities.

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<sup>1</sup>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.

<sup>2</sup> 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 Everett 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, 2021.
- ✓ 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.