

# TOWN OF GREAT BARRINGTON, MASSACHUSETTS

Participant in the Berkshire Regional Group Purchasing Program

OTHER POSTEMPLOYMENT BENEFITS PROGRAM

# FINANCIAL REPORTING AND DISCLOSURES Governmental Accounting Standards Board Statement 75

Disclosures as of June 30, 2022

KMS Actuaries, LLC 52 Hunt Road Kingston, NH 03848

October, 2022





October 27, 2022

Ms. Alicia Dulin Treasurer/Collector Town of Great Barrington, Massachusetts 334 Main Street Great Barrington, MA 01230

Dear Alicia:

We are pleased to present the enclosed report of the July 1, 2021 actuarial valuation of the retiree health care benefits for the Town of Great Barrington, Massachusetts, a Participant in the Berkshire Regional Group Purchasing Program. The valuation was prepared in accordance with and for the purpose of financial reporting and disclosures as of June 30, 2022 under the following Governmental Accounting Standards Board (GASB) Statements:

 GASB Statement No. 75, Accounting and Financial Reporting for Postemployment Benefits Other Than Pensions (GASB 75)

Results are based on liabilities developed in an actuarial valuation performed as of July 1, 2021 and rolled forward to the plan's measurement date of June 30, 2022.

The Principal Valuation Results, including assets, liabilities and the development of future contributions, are provided in Section 1. The Notes to the Financial Statements and the Required Supplementary Information are provided in Sections 2 and 3, respectively. Employer Reporting Amounts under GASB 75 are provided in Section 4. The Summary of Plan Provisions and Actuarial Assumptions and Methods are shown in Sections 5 and 6, respectively. Section 7 summarizes the demographic profile of active members and retired members, covered spouses and survivors. Finally, a Glossary of Terms is provided in Section 8.

Our calculations are based on member census data and other information provided by the Town of Great Barrington, Massachusetts as well as health plan rates provided by the Berkshire Health Group. Although we did not audit the data used in the valuation and disclosure calculations, we believe that the information is complete and reliable.

Liabilities presented in this report are based on a discount rate of 3.54%, the rate that reflects a tax-exempt, high quality municipal bond rate. The municipal bond rate of 3.54% is based on the Bond Buyer 20-Bond GO Index published on June 30, 2022.

Ms. Alicia Dulin October 27, 2022 Page 2

This report was completed in accordance with generally accepted actuarial standards and procedures, and conforms to the Code of Professional Conduct of the American Academy of Actuaries. The actuarial assumptions other than those explicitly applicable to the postemployment benefit plans are consistent with those used by the Berkshire County Retirement System's actuaries for the Retirement System pension valuations.

Future actuarial valuation results may differ significantly from the current results presented in this report. Examples of potential sources of volatility include plan experience differing from that anticipated by the economic or demographic assumptions, the effect of new entrants, changes in economic or demographic assumptions, the effect of law changes and the delayed effect of smoothing techniques.

Our valuation follows generally accepted actuarial methods and we perform such tests as we consider necessary to assure the accuracy of the results. The amounts presented in this report have been appropriately determined according to the actuarial assumptions and methods stated herein.

This report is intended for the sole use of the Town of Great Barrington, Massachusetts and is intended to provide information to comply with the stated purpose of the report. It may not be appropriate for other purposes.

The expected claims, cost trend rates, and analysis of regulatory changes have been developed based on the expertise of the undersigned health and welfare actuary, Christopher E. Bean, ASA, MAAA. The undersigned credentialed actuaries are Members of the American Academy of Actuaries and together meet the Qualification Standards of the American Academy of Actuaries necessary to render the actuarial opinion contained herein. They are available to answer any questions with regard to this report.

KMS Actuaries is completely independent of the Town of Great Barrington, Massachusetts and any of its officers or key personnel. None of the actuaries signing this report or anyone closely associated with them has a relationship with the Town of Great Barrington, Massachusetts, other than as consulting actuary for this assignment, that would impair our independence.

Respectfully submitted,

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## **Purpose of Report**

This report presents the results of the actuarial valuation of the Town of Great Barrington, Massachusetts's retiree health care benefits as of July 1, 2021. The valuation was prepared in accordance with and for the purpose of financial reporting and disclosures as of June 30, 2022 under the following Governmental Accounting Standards Board (GASB) Statements:

 GASB Statement No. 75, Accounting and Financial Reporting for Postemployment Benefits Other Than Pensions (GASB 75)

The results as of the measurement date are based on a roll forward of the liabilities developed in the most recent actuarial valuation.

## **GASB Accounting Standards**

In June 2015, the GASB approved two related Statements that significantly changed the way other postemployment benefits (OPEB) plans and governments account and report OPEB liabilities. GASB Statement No. 74 (GASB 74), Financial Reporting for Postemployment Benefit Plans Other Than Pension Plans, replaced the requirements of Statement No. 43 and GASB Statement No. 75 (GASB 75), Accounting and Financial Reporting for Postemployment Benefits Other Than Pensions, replaced the requirements of Statement No. 45.

The effective date for GASB 75 is for fiscal years beginning after June 15, 2017, which is the fiscal year ending June 30, 2018 for the Town of Great Barrington, Massachusetts.

GASB 74 requires OPEB plans to present a statement of fiduciary net position (OPEB plan assets) and a statement of changes in fiduciary net position. Further, the statement requires that notes to financial statements include descriptive information such as the types of benefits provided, the classes of plan members covered and the authority under which benefit terms are established or may be amended. Finally, GASB 74 requires OPEB plans to present in required supplementary information the sources of the changes in the net OPEB liability and information about the actuarially determined contributions compared with the actual contributions made to the plan and related ratios.

GASB 74 and GASB 75 require projected benefit payments be discounted to their actuarial present value using the single rate that reflects (1) a long-term expected rate of return on OPEB plan investments to the extent that the OPEB plan's assets are sufficient to pay benefits and OPEB plan assets are expected to be invested using a strategy to achieve that return and (2) a tax-exempt, high-quality municipal bond rate to the extent that the conditions for use of the long-term expected rate of return are not met.

GASB 75 establishes standards for measuring and recognizing liabilities, deferred outflows of resources, deferred inflows of resources and OPEB expense by state and local governments.

## Town of Great Barrington, Massachusetts Other Postemployment Benefits Program

The Town of Great Barrington, Massachusetts administers the retiree health care benefits program - a single-employer defined benefit plan that is used to provide postemployment benefits other than pensions (OPEB) for all permanent full-time employees. The Town provides health care benefits for retirees and their dependents. Benefits are provided through the Berkshire Health Group, and the full cost of benefits is shared between the Town and retirees.

## **Summary of Principal Results**

A summary of principal results from the current and prior measurement dates follows:

Disclosure Date	June 30, 2022	June 30, 2021	% Change
Valuation Date	July 1, 2021	July 1, 2019	
Membership Data			
Active Plan Members	72	72	0.0%
Inactive Plan Members (excludes covered spouses)	54	51	5.9%
Total Plan Members	126	123	2.4%
Covered Spouses	25	22	13.6%
Covered Payroll	\$4,885,210	\$4,424,433	10.4%
Net OPEB Liability			
Discount Rate	3.54%	2.16%	
Total OPEB Liability (TOL)	\$15,168,380	\$21,973,136	(31.0%)
Fiduciary Net Position (FNP)	\$0	\$0	0.0%
Net OPEB Liability	\$15,168,380	\$21,973,136	(31.0%)
FNP as % of TOL	0.0%	0.0%	
OPEB Expense			
OPEB Expense	\$826,724	\$1,982,559	(58.3%)
Deferred Outflows	\$3,125,145	\$4,066,202	
Deferred Inflows	\$8,028,702	\$1,804,697	
Recognition Period	6.40	6.52	

## **Experience Gain and Loss**

In developing the Total OPEB Liability, various assumptions are made regarding future premium rates, mortality, retirement, disability and turnover rates. A comparison of the results of the current and prior measurements is made to determine how closely actual experience relates to expected. For the current measurement period, the difference between expected and actual experience resulted in an actuarial gain of approximately \$2,771,000. The gain is mainly attributable to lower than expected premiums since the prior valuation.

## Changes of Assumptions

The discount rate changed from 2.16% as of June 30, 2021 to 3.54% as of June 30, 2022. In addition, many other assumptions were updated in this valuation, including the inflation rate, healthcare trend rates, and mortality tables and mortality improvement rates. A summary of the impact on the Total OPEB Liability (TOL) of each assumption change is provided below:

◆ Decrease due to change in Inflation Assumption	(117,000)
◆ Decrease due to change in Trend Assumption	(501,000)
◆ Decrease due to change in Mortality Tables and Mortality Improvement Rates	(645,000)
♦ Decrease due to change in Discount Rate	(3,896,000)
Total	\$ (5.159.000)

All of the assumptions used in this valuation are shown in Section 6, Actuarial Assumptions and Methods.

#### Changes of Benefit Terms

All benefit terms are the same as those used in the prior measurement. A Summary of the Principal Plan Provisions is provided in Section 5.

## **Total OPEB Liability**

The Total OPEB Liability as of the current measurement date, June 30, 2022, is \$15,168,380. The Total OPEB Liability as of the prior measurement date, June 30, 2021, was \$21,973,136. During the current measurement period ending June 30, 2022, the Total OPEB Liability decreased by \$6,804,756, or -31.0%. The development of the Total OPEB Liability for the current measurement period is shown in Section 1, Exhibit 1.2.

## **Fiduciary Net Position**

The Fiduciary Net Position is equal to the market value of assets and as of the current measurement date, June 30, 2022, there are no assets set aside in an irrevocable OPEB trust.

## **Employer Future Period Contributions**

The Town does not have a policy to contribute to an OPEB trust and has not contributed as of June 30, 2022.

#### **Discount Rate**

As of the June 30, 2022 measurement date, the OPEB plan's fiduciary net position was projected to be insufficient to make all projected benefit payments of current plan members. Therefore, the 3.54% municipal bond rate was applied to all periods to determine the total OPEB liability. Projected benefit payments are discounted to their actuarial present value using a single discount rate of 3.54%.

## **OPEB Expense**

The OPEB Expense for the current measurement period ending June 30, 2022, is \$826,724. Benefit changes are recognized immediately and experience gains and losses and assumption changes developed in this valuation are recognized over 6.4 years. Investment gains and losses are recognized over 5 years. The OPEB Expense for the prior measurement period was \$1,982,559. The development of the OPEB expense for the current measurement period is shown in Section 4, Exhibit 4.2.

#### COVID-19 Pandemic

The assumptions in this report do not reflect the potential impacts of the COVID-19 pandemic on the OPEB program. Especially in the short range, the pandemic is likely to materially affect the economic, demographic and healthcare-specific experience, in a way not anticipated by the assumptions on which the projections are based.

## **SECTION 1 - PRINCIPAL VALUATION RESULTS**

## Exhibit 1.1 - OPEB Trust Assets

The Town has not established an irrevocable trust for the purpose of accumulating assets to prefund the OPEB liabilities. If such a trust existed, Plan assets segregated and restricted in an OPEB trust must be dedicated to providing plan benefits to retirees and beneficiaries in accordance with the terms of the plan and must be legally protected from creditors of the employer. Further, employer contributions to the trust must be irrevocable. Asset activity for the current and prior fiscal years is presented below:

Fiscal Year Ended June 30	2022	2021

Asset Activity		
Market value, beginning of year	<b>\$</b> O	\$0
Employer Premiums	466,418	474,330
OPEB Trust Contributions	<del>-</del>	-
Benefit Payments	(466,418)	(474,330)
Administrative Expenses	<del>-</del>	-
Investment Return	<u>-                                      </u>	-
Market value, end of year	\$0	\$0
Money-Weighted Rate of Return	Not applicable	Not applicable
(Gain) / Loss on	OPEB Plan Investments	
(daiii)/ Loss oii	OF LD FIGH HIVESUITERIES	
Projected earnings	\$0	\$0
Actual earnings	-	-
(Gain) / Loss on OPEB plan investments	\$0	\$0

## **SECTION 1 - PRINCIPAL VALUATION RESULTS**

## Exhibit 1.2 - Total OPEB Liability

The Total OPEB Liability, developed using the Entry Age Normal funding method, is the portion of the actuarial present value of projected benefit payments that is attributed to past periods of member service. The total OPEB liability as of the June 30, 2022 measurement date was developed from an actuarial valuation as of July 1, 2021 and rolled forward to the OPEB plan's fiscal year-end.

The Service Cost is the portion of the actuarial present value of projected benefit payments that is attributed to a valuation year. Only active employees who have not reached the age at which the probability of retirement is 100% incur a service cost.

Actuarial experience gains and losses arise from the difference between expected and actual experience, excluding amounts related to benefit changes and changes in assumptions or other inputs.

The development of the Total OPEB Liability from the beginning of the measurement period, June 30, 2021 to the end of the measurement period, June 30, 2022 is shown below:

Measurement Date June 30, 2022

1. Total OPEB Liability, beginning of year:		
a. Actives	\$11,640,164	
b. Retirees, Covered Spouses and Survivors	10,332,972	
c. Total OPEB Liability at 2.16% (a. + b.)		\$21,973,136
2. Service Cost		\$1,097,979
3. Expected Benefit Payments		
a. Current retirees	(\$442,285)	
b. Future retirees	(24,133)	
c. Total (a. + b.)		(\$466,418)
4. Interest [2.16% x (1.c. + 2. + .5 x 3.c)]		\$493,299
5. Changes of benefit terms		\$0
0.5%		(40.770.705)
6. Differences between expected and actual experience		(\$2,770,735)
7. Changes of assumptions or other inputs		(\$5,158,881)
8. Total OPEB Liability, end of year (1.c. + 2. + 3.c. + 4. + 5. +	+ 6. + 7.)	
a. Actives	\$6,639,453	
b. Retirees, Covered Spouses and Survivors	8,528,927	
c. Total OPEB Liability at 3.54% (a. + b.)		\$15,168,380

## **SECTION 1 - PRINCIPAL VALUATION RESULTS**

## Exhibit 1.3 - Development of Actuarially Determined Employer Contributions

The Town does not have a policy to contribute to an OPEB trust and has not contributed as of June 30, 2022.

The Actuarially Determined Employer Contribution (ADEC) equals the Normal Cost plus a provision for amortizing the Unfunded Actuarial Accrued Liability. We have assumed increasing dollar amortization over an amortization period of 30 years.

	Fiscal Year Ending	June 30, 2022	June 30, 2023
	Discount Rate	2.16%	3.54%
1.	Normal Cost	\$1,097,979	\$684,517
2.	Unfunded Actuarial Accrued Liability		
	a. Actuarial Accrued Liability b. Actuarial Value of Plan Assets c. Unfunded Actuarial Accrued Liability (a b.)	\$21,973,136 \$0 \$21,973,136	\$15,168,380 \$0 \$15,168,380
3.	Amortization of Unfunded Actuarial Accrued Liabilit	ty	
	a. Unfunded Actuarial Accrued Liability b. Amortization Period in years c. Payroll Growth Rate d. Amortization Factor e. Amortization Amount (3.a. / 3.d.)	\$21,973,136 30 3.5% 36.47 \$602,499	\$15,168,380 30 3.5% 29.83 \$508,494
4.	Interest on 1. and 3.e.	\$36,730	\$42,233
5.	Actuarially Determined Employer Contribution (1. + 3.e. + 4.)	\$1,737,208	\$1,235,244
6.	Actual Employer Contribution to OPEB Trust	\$0	TBD
7.	Expected Benefit Payments	\$466,418	
8.	Total Contribution (6. + 7.)	\$466,418	

## **SECTION 2 - NOTES TO THE FINANCIAL STATEMENTS**

## Exhibit 2.1 - Plan Description

## **Plan Administration**

The Town of Great Barrington, Massachusetts administers the retiree health care benefits program - a single-employer defined benefit plan that is used to provide postemployment benefits other than pensions (OPEB) for all permanent full-time employees.

#### Plan Membership

At June 30, 2022, OPEB plan membership consisted of the following:

Inactive plan members or beneficiaries currently receiving benefit payments <sup>1</sup>	54
Inactive plan members entitled to but not yet receiving benefit payments	0
Active plan members	72
	126

<sup>&</sup>lt;sup>1</sup>Per paragraph 50c of GASB 75 and further clarified by Question 4.148 of the 2017-3 GASB 75 Implementation Guide, the total shown for inactive plan members or beneficiaries currently receiving benefit payments does not include covered spouses or other dependents.

#### **Benefits Provided**

The Town provides health care benefits for retirees and their dependents. Benefits are provided through the Berkshire Health Group, and the full cost of benefits is shared between the Town and retirees.

## **Employer Future Period Contributions**

The Town does not have a policy to contribute to an OPEB trust and has not contributed as of June 30, 2022.

## **SECTION 2 - NOTES TO THE FINANCIAL STATEMENTS**

## Exhibit 2.2 - Net OPEB Liability

The components of the net OPEB liability at June 30, 2022, were as follows:

Total OPEB liability	\$ 15,168,380
Fiduciary net position	
Net OPEB liability	\$ 15,168,380

Fiduciary net position as a percentage of the total OPEB liability

0.00%

## **Actuarial Assumptions**

The total OPEB liability was determined by an actuarial valuation as of July 1, 2021, rolled forward to the measurement date and using the following actuarial assumptions, applied to all periods included in the measurement:

Inflation	2.4% per year, based on current economic data, analyses from economists and other experts, and professional judgment.
Discount rate	3.54%, net of investment expenses, including inflation.
Healthcare cost trend rate	7.5 percent for 2021, decreasing 0.6 percent per year to 5.7 percent, then grading down to an ultimate trend rate of 3.9 percent, utilizing the Society of Actuaries Getzen Medical Trend Model. The ultimate medical inflation rate is reached in 2075.
Pre-Retirement Mortality	RP-2014 Blue Collar Mortality Table, projected with generational mortality improvement using scale MP-2020.
Healthy Retiree Mortality	RP-2014 Blue Collar Mortality Table, projected with generational mortality improvement using scale MP-2020.
Disabled Retiree Mortality	RP-2014 Blue Collar Mortality Table set forward one year with full generational mortality improvement using Scale MP-2020.

## **SECTION 2 - NOTES TO THE FINANCIAL STATEMENTS**

## Exhibit 2.2 - Net OPEB Liability

#### **Discount Rate**

The discount rate used to measure the total OPEB liability was 3.54%. The projection of cash flows used to determine the discount rate assumed that contributions from the Town will be made in accordance with the plan's funding policy. Based on those assumptions, the OPEB plan's fiduciary net position was projected to be insufficient to make all projected benefit payments of current plan members. Therefore, the 3.54% municipal bond rate was applied to all periods to determine the total OPEB liability.

## Sensitivity of the Net OPEB Liability to Changes in the Discount Rate

The following presents the net OPEB liability calculated using the current discount rate of 3.54 percent, as well as what the net OPEB liability would be if it were calculated using a discount rate 1-percentage point lower (2.54 percent) or 1-percentage point higher (4.54 percent) than the current rate:

		Assumed	
	1% Decrease (2.54%)	Discount Rate (3.54%)	1% Increase (4.54%)
Total OPEB Liability	\$ 17,856,508	\$ 15,168,380	\$ 13,045,978
Fiduciary Net Position	-	-	-
Net OPEB Liability	\$ 17,856,508	\$ 15,168,380	\$ 13,045,978
% Change in NOL	17.7%		-14.0%

## Sensitivity of the Net OPEB Liability to Changes in the Healthcare Cost Trend Rates

The following presents the net OPEB liability calculated using the current healthcare cost trend rates as well as what the net OPEB liability would be if it were calculated using healthcare cost trend rates that are 1-percentage point lower (6.5% year 1 decreasing to 2.9%) or 1-percentage point higher (8.5% year 1 decreasing to 4.9%) than the current healthcare cost trend rates:

	1% Decrease 6.5% Year 1 Decreasing to 2.9%	Assumed Healthcare Cost Trend Rates 7.5% Year 1 Decreasing to 3.9%	1% Increase 8.5% Year 1 Decreasing to 4.9%
Total OPEB Liability	\$ 12,757,417	\$ 15,168,380	\$ 18,308,020
Fiduciary Net Position	-	-	-
Net OPEB Liability	\$ 12,757,417	\$ 15,168,380	\$ 18,308,020
% Change in NOL	-15.9%		20.7%

Exhibit 3.1 - Changes in Net OPEB Liability and Related Ratios

Fiscal Year Ended June 30		2022		2021		2020		2019		2018
		To	tal C	PEB Liability						
Service cost	\$	1,097,979	\$	1,035,266	\$	718,482	\$	623,878	\$	655,305
Interest		493,299		472,845		632,124		624,489		579,133
Changes of benefit terms		-		-		(321,896)		-		-
Differences between expected and actual experience		(2,770,735)		-		(2,215,394)		-		_
Changes of assumptions		(5,158,881)		341,776		4,677,168		1,048,232		(776,171)
Benefit payments		(466,418)		(474,330)		(470,212)		(464,153)		(469,964)
Net change in total OPEB liability	\$	(6,804,756)	\$	1,375,557	\$	3,020,272	\$	1,832,446	\$	(11,697)
Total OPEB liability-beginning	\$	21,973,136	\$	20,597,579	\$	17,577,307	\$	15,744,861	\$	15,756,558
Total OPEB liability-ending (a)	\$	15,168,380	\$	21,973,136	\$	20,597,579	\$	17,577,307	\$	15,744,861
On attribution of a secular sec	Φ.			iary Net Positi		470.040	Φ.	404.450	Φ.	400.004
Contributions-employer	\$	466,418	\$	474,330	\$	470,212	\$	464,153	\$	469,964
Net investment income		(466 419)		(474,330)		(470,212)		(464.152)		(469,964)
Benefit payments Administrative expenses		(466,418)		(414,330)		(410,212)		(464,153)		(409,904)
Other		_		-		_		-		-
Net change in plan fiduciary net	_						_			
position	\$	_	\$	_	\$	_	\$	_	\$	_
pooluon	Ψ		Ψ		Ψ		Ψ		Ψ	
Plan fiduciary net position-beginning	\$	<u>-</u>	\$	-	\$	_	\$	<u>-</u>	\$	_
Plan fiduciary net position-ending (b)	\$		\$	_	\$		\$		\$	_
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Net OPEB liability–ending (a) – (b)	\$	15,168,380	\$	21,973,136	\$	20,597,579	\$	17,577,307	\$	15,744,861
Plan fiduciary net position as a percentage of the total OPEB liability		0.00%		0.00%		0.00%		0.00%		0.00%
Covered payroll	\$	4,885,210	\$	4,424,433	\$	4,009,726	\$	3,434,514	\$	3,702,261
Net OPEB liability as a percentage of covered payroll		310.50%		496.63%		513.69%		511.78%		425.28%
Discount Rate		3.54%		2.16%		2.21%		3.50%		3.87%

## Exhibit 3.1 - Changes in Net OPEB Liability and Related Ratios

Fiscal Year Ended June 30		2017	2016	2015	2014	2013
		To	tal OPEB Liability			
Service cost						
Interest						
Changes of benefit terms						
Differences between expected and actual experience						
Changes of assumptions						
Benefit payments						
Net change in total OPEB liability						
Total OPEB liability-beginning						
Total OPEB liability–ending (a)	\$ 15,7	56,558				
		Plan I	Fiduciary Net Positio	n		
Contributionsemployer	\$ 4	21,783				
Net investment income		-				
Benefit payments	(4	21,783)				
Administrative expenses		-				
Other						
Net change in plan fiduciary net position	\$	-				
Plan fiduciary net position-beginning	\$	-				
Plan fiduciary net position–ending (b)	\$	-				
Net OPEB liability–ending (a) – (b)	\$ 15,7	56,558				
Plan fiduciary net position as a percentage of the total OPEB liability		0.00%				
Covered payroll		N/A				
Net OPEB liability as a percentage of covered payroll						
Discount Rate		3.58%				

Note: Only 6 years are presented here and on the previous page, beginning with the year of implementation; 10 years of information will be required.

## Exhibit 3.1 - Changes in Net OPEB Liability and Related Ratios

## **Changes of Benefit Terms**

All benefit terms are the same as those used in the prior measurement.

## **Changes of Assumptions**

The discount rate changed from 2.16% as of June 30, 2021 to 3.54% as of June 30, 2022. In addition, many other assumptions were updated in this valuation, including the inflation rate, healthcare trend rates, and mortality tables and mortality improvement rates.

## **Exhibit 3.2 - Investment Returns**

Fiscal Year Ended June 30	2022	2021	2020	2019	2018	2017	2016	2015	2014	2013
Annual money-weighted rate of return, net of investment expenses	Not applicable	Not applicable	Not applicable	Not applicable	Not applicable	Not applicable				

The money-weighted rate of return considers the changing amounts actually invested during a period and weights the amount of OPEB plan investments by the proportion of time they are available to earn a return during that period. The rate of return is then calculated by solving, through an iterative process, for the rate that equates the sum of the weighted external cash flows into and out of the OPEB plan investments to the ending fair value of OPEB plan investments.

Note: Only 6 years are presented here, beginning with the year of implementation; 10 years of information will be required.

**Exhibit 3.2 - Investment Returns** 

## Calculation of Money-Weighted Rate of Return

	Inves Net E Casl	Plan tments/ External n Flows (a)	Periods Invested (b)	Period Weight (c)=(b)÷12	=(a) x r <sub>mw</sub> ) <sup>(c)</sup>
Beginning value - July 1, 2021	\$	-	12	1.00	\$ -
Monthly net external cash flows:					
July		-	11	0.92	-
August		-	10	0.83	-
September		-	9	0.75	-
October		-	8	0.67	-
November		-	7	0.58	-
December		-	6	0.50	-
January		-	5	0.42	-
February		-	4	0.33	-
March		-	3	0.25	-
April		-	2	0.17	-
May		-	1	0.08	-
June		-	0	0.00	-
Ending value - June 30, 2022					\$ -

Not applicable, as there are no OPEB trust assets as of June 30, 2022.

## **Exhibit 3.3 - Schedule of Employer Contributions**

Fiscal Year Ended June 30	2022	2021	2020	2019	2018
Actuarially determined contribution	\$ 1,737,208	\$ 1,639,714	\$ 1,350,046	\$ 1,221,853	\$ 1,228,837
Contributions in relation to the					
actuarially determined contribution	466,418	474,330	470,212	464,153	469,964
Contribution deficiency (excess)	\$ 1,270,790	\$ 1,165,384	\$ 879,834	\$ 757,700	\$ 758,873
Covered payroll	\$ 4,885,210	\$ 4,424,433	\$ 4,009,726	\$ 3,434,514	\$ 3,702,261
Contributions as a percentage of					
covered payroll	9.55%	10.72%	11.73%	13.51%	12.69%
Discount rate	2.16%	2.21%	3.50%	3.87%	3.58%
Inflation	2.40%	2.20%	2.40%	2.60%	2.60%

## **Exhibit 3.3 - Schedule of Employer Contributions**

Fiscal Year Ended June 30	2017	2016	2015	2014	2013
Actuarially determined contribution	\$ 872,614				
Contributions in relation to the actuarially determined contribution	421,783				
Contribution deficiency (excess)	\$ 450,831				
Covered payroll	N/A				
Contributions as a percentage of covered payroll					
Discount rate	3.58%				
Inflation	2.60%				

Note: Only 6 years are presented here and on the previous page, beginning with the year of implementation; 10 years of information will be required.

## **Notes to Schedule**

## **Valuation Date**

Actuarially determined contributions are determined as of July 1, one year prior to the end of the fiscal year in which contributions are reported.

## Methods and Assumptions as of Current Measurement Date

Actuarial cost method	Entry Age Normal
Amortization method	Increasing at 3.5% over 30 years on an open amortization period
Amortization period	30 years
Asset valuation method	Market value
Healthcare cost trend rates	7.5 percent for 2021, decreasing 0.6 percent per year to 5.7 percent, then grading down to an ultimate trend rate of 3.9 percent, utilizing the Society of Actuaries Getzen Medical Trend Model. The ultimate medical inflation rate is reached in 2075.

## Exhibit 4.1 - Deferred Outflows and Deferred Inflows of Resources

Deferred Outflows of Resources and Deferred Inflows of Resources arising from differences between expected and actual experience are recognized in OPEB Expense over the average expected remaining service life of all active and inactive participants.

							Balances at June 30, 2022			
	erience osses		erience ains	0	Amounts Recognized in OPEB Expense through June 30, 2022		ferred lows of ources		Deferred Inflows of Resources	
Year	(a)		(b)		(c)	(a	) - (c)		(b) + (c)	
2018	\$ -	\$	-	\$	-	\$	-	\$	-	
2019	-		-		-		-		-	
2020	-	2,	215,394		(1,019,352)		-		1,196,042	
2021	-		-		-		-		-	
2022	-	2,	770,735		(432,927)		-		2,337,808	
Total						\$	-	\$	3,533,850	

Deferred Outflows of Resources and Deferred Inflows of Resources arising from changes of assumptions are recognized in OPEB Expense over the average expected remaining service life of all active and inactive participants.

					nces at 30, 2022
	Increases in the Total OPEB Liability	Decreases in the Total OPEB Liability	the OPEB Expense Total OPEB through		Deferred Inflows of Resources
Year	(a)	(b)	(c)	(a) - (c)	(p) + (c)
2018	\$ -	\$ 776,171	\$ (634,125)	\$ -	\$ 142,046
2019	1,048,232	-	685,120	363,112	-
2020	4,677,168	-	2,152,071	2,525,097	-
2021	341,776	-	104,840	236,936	-
2022	-	5,158,881	(806,075)	<u>-</u>	4,352,806
Total				\$ 3,125,145	\$ 4,494,852

## SECTION 4 - EMPLOYER REPORTING AMOUNTS UNDER GASB 75

## Exhibit 4.1 - Deferred Outflows and Deferred Inflows of Resources

Deferred Outflows of Resources and Deferred Inflows of Resources arising from differences between projected and actual earnings on OPEB Plan investments are recognized in OPEB Expense over five years.

								Balances at June 30, 2022					
	Earn Less	tment iings Than ected	Ear Great	stment nings er Than ected	OPE t	Recognized in B Expense hrough e 30, 2022	Outfl	erred lows of ources	Inf	eferred lows of sources			
Year	(6	a)	(	b)		(c)	(a)	) - (C)	(b	) + (c)			
2018	\$	-	\$	-	\$	-	\$	-	\$	-			
2019		-		-		-		-		-			
2020		-		-		-		-		-			
2021		-		-		-		-		-			
2022		-		-		-		-		-			
Subtotal							\$	-	\$	-			
Net							\$	-	\$	-			

Amounts reported as Deferred Outflows of Resources and Deferred Inflows of Resources will be recognized in OPEB expense as follows:

Yea	r ended June 30	
	2023	\$ (764,554)
	2024	\$ (652,950)
	2025	\$ (788,457)
	2026	\$ (990,246)
	2027	\$ (1,211,746)
	Thereafter	(495,604)
D	eferred Outflows	\$ 3,125,145
	Deferred Inflows	\$ 8.028.702

## Exhibit 4.2 - OPEB Expense

The OPEB Expense and deferred outflows and inflows of resources primarily result from changes in the components of the net OPEB liability (NOL). Most changes in the NOL are included in the OPEB Expense in the period of the change, including service cost, interest on total OPEB liability, changes in benefit terms and projected earnings on the OPEB plan's investments. Other changes in the net OPEB liability are included in OPEB Expense over the current and future periods. These include the effects on the total OPEB liability of changes of economic and demographic assumptions and differences between expected and actual experience. In addition, the effect on the net OPEB liability of differences between the projected earnings on OPEB plan investments and actual experience with regard to those earnings are included in OPEB expense over the current and future periods. The OPEB Expense for the reporting period ending June 30, 2022 is presented below:

## Fiscal Year Ended June 30, 2022

	Measurement Date		6/30/2022
1.	Service cost		\$ 1,097,979
2.	Interest on the total OPEB liability		
	a. Total OPEB liability, beginning of year	21,973,136	
	b. Service cost, beginning of year	1,097,979	
	c. Benefit payments	(466,418)	
	d. Interest on total OPEB liability = 2.16% times (a. + b. + .5 times c.)		493,299
	(a. + b. + .5 times c.)		
3.	Differences between expected and actual experience		(772,711)
4.	Changes of benefit terms		-
5.	Changes of assumptions		8,157
6.	Projected earnings on OPEB plan investments		
	a. Plan fiduciary net position, beginning of year	-	
	b. Contributions - Employer	466,418	
	c. Benefit payments	(466,418)	
	d. Administrative expenses and other	-	
	e. Total projected earnings		-
7.	Differences between projected and actual earnings		
	on OPEB plan investments		-
8.	OPEB plan administrative expenses		-
9.	Other changes in fiduciary net position		-
10.	Total OPEB Expense		\$ 826,724

## **SECTION 5 - SUMMARY OF PLAN PROVISIONS**

# Eligibility for Postemployment Benefits

Employees of the Town and their dependents are eligible for postemployment medical and life insurance based on the eligibility requirements under the Berkshire County Retirement System.

#### **Retirement Eligibility**

General employees hired before April 2, 2012: retire after attaining age 55 with 10 or more years of service or any age with 20 or more years of service

General employees hired after April 1, 2012: retire after attaining age 60 with 10 or more years of service

Public Safety employees hired before April 2, 2012: retire after attaining age 55 or any age with 20 or more years of service

Public Safety employees hired after April 1, 2012: retire after attaining age 55

## **Ordinary Disability Eligibility**

Any member who is unable to perform his or her duties due to a non-occupational disability and has ten or more years of creditable service.

## **Accidental Disability Eligibility**

Any member who is unable to perform his or her duties due to a job-related disability.

#### **Medical Premiums**

The total monthly premiums by plan are shown below:

Non-Medicare Plans - July 1, 2022	Individual	Family
Network Blue	\$788.00	\$2,114.00
Blue Choice	\$932.00	\$2,503.00
Blue Care Elect	\$1,176.00	\$3,155.00
Access HMO Blue NE Saver	\$671.00	\$1,796.00
Blue Care Elect PPO Saver	\$1,000.00	\$2,682.00

Medicare Plans - January 1, 2022	
Medex 2 Blue RX	\$362.00

## **Participant Contributions**

Retired employees contribute 20% or 32% of the total medical premium, depending on coverage elected.

## **SECTION 5 - SUMMARY OF PLAN PROVISIONS**

Continuation of Coverage to Surviving spouse of Spouse After Death of Retiree medical premium.

Surviving spouse may continue coverage for lifetime by paying the required  $% \left( 1\right) =\left( 1\right) \left( 1\right)$ 

Medicare Penalty Reimbursement

The Town reimburses the Medicare late-enrollment penalty, if applicable,

based on information provided in the retiree data.

Dental Coverage

Dental coverage is not offered to retirees.

Life Insurance Coverage

Retirees are eligible for a \$4,000 life insurance benefit. The total monthly

cost is \$3.60. Retirees contribute \$.36 towards the monthly premiums.

Valuation Date July 1, 2021

Disclosure Date June 30, 2022

GASB 75 Reporting Date June 30, 2022

Municipal Bond Rate 3.54%, based on the Bond Buyer 20-Bond GO Index published on June 30,

2022.

Discount Rate (GASB) 3.54%, compounded annually, for the measurement as of June 30, 2022.

2.16%, compounded annually, for the measurement as of June 30, 2021.

The single rate that reflects the long-term expected rate of return on OPEB plan investments to the extent that the OPEB plan's assets, which are expected to be invested using a strategy to achieve that return, are sufficient to pay benefits, and a tax-exempt, high-quality municipal bond rate to the extent that the conditions for use of the long-term expected rate of return are not met.

Discount Rate (ADEC)

 $2.16\%,\,compounded$  annually, for development of the Actuarially Determined

Contribution (ADEC) as of June 30, 2022.

**Amortization Method** 

Increasing at 3.5% over 30 years on an open amortization period for pay-as-

you-go funding.

**Medical Trend Rates** 

Year	Trend
1	7.50%
2	6.90%
3	6.30%
4	5.70%
Ultimate	3.90%

Trend rates after year 4 grade down to the ultimate rate of 3.9 percent utilizing the Society of Actuaries Getzen Medical Trend Model. The ultimate trend rate is reached in 2075.

Health care trend assumptions begin at current levels and grade down over a period of years to a lower level equal to some real rate plus inflation. The principal components of health trend are medical inflation, deductible erosion, cost shifting, utilization, technology and catastrophic claims. The overall effect of these components are expected to decline year by year.

Dental Trend Rates Not applicable - Dental coverage is not offered.

Medicare Trend Rates 6% per year.

Inflation 2.4% per year, based on current economic data, analyses from economists

and other experts, and professional judgment.

Payroll Growth 3.5% per year.

Participation Rates Medical - 90% of eligible retired employees will elect to participate.

Dental - Not offered to retired employees.

Life - 80% of eligible retirees will elect to participate.

Medicare - all retired employees are assumed to enroll in Medicare at age 65.

Dependent Status Male spouses are assumed to be three years older and female spouses are

assumed to be three years younger than the retired employee.

60% of employees are assumed to retire with a covered spouse.

For current retirees, the actual census information is used.

## **Medical Per Capita Costs**

The following annual per capita costs are for the fiscal year beginning July 1, 2021 and are applicable to retirees, survivors and spouses. Annual costs for current and future retirees are based on the blended curves shown below, developed using the plan coverages elected by current retirees and survivors and premium rates currently in effect. Future years' costs are based on the first year cost adjusted with trend.

	Medicare	e-Eligible	Medicare	e-Ineligible
Age	Male	Female	Male	Female
Under 20	\$3,720	\$4,367	\$3,720	\$4,367
20-24	2,931	4,650	2,931	4,650
25-29	3,050	6,859	3,050	6,859
30-34	3,831	8,667	3,831	8,667
35-39	4,806	8,927	4,806	8,927
40-44	5,989	9,143	5,989	9,143
45-49	7,558	10,036	7,558	10,036
50-54	9,961	11,806	9,961	11,806
55-59	12,944	13,651	12,944	13,651
60-64	16,612	16,247	16,612	16,247
65-69	3,316	3,229	20,726	19,476
70-74	3,973	3,809	24,832	22,965
75-79	4,692	4,419	29,333	26,670
80-84	5,393	5,068	33,715	30,575
85-89	6,008	5,666	38,587	34,905
90-94	6,540	6,047	38,587	34,905
95+	6,951	5,848	38,587	34,905

## **Retiree Contributions**

Annual per capita participant contributions for the fiscal year beginning July 1, 2021 are as follows:

Plan	Contribution
Non-Medicare	\$ 2,432
Medicare	838

## **Actuarial Cost Method**

Entry Age Normal. The costs of each employee's postemployment benefits are allocated as a level basis over the earnings of the employee between the employee's date of hire and the assumed exit ages.

## **Employee Data**

Employee and retiree data were compiled and submitted by the Town as of June 30, 2022. We made reasonable adjustments for missing or invalid data.

## Use of ProVal®

KMS Actuaries has used ProVal® to develop the liabilities, normal costs and projected benefit payments in this report. We have a lease agreement with WinTech, the developer of ProVal®, and have relied on their system to perform these calculations. The actuaries signing this report and the KMS staff members who were involved in preparing it have a clear understanding of ProVal® and have used it only for its intended purpose. We have reviewed the output produced by ProVal® for reasonableness and we are not aware of any material inconsistencies, limitations or known weaknesses that would affect this report.

## **General and Public Safety Employees**

## **Pre-Retirement Mortality**

Pre-retirement mortality rates for General and Public Safety employees are based on the RP-2014 Blue Collar Mortality Table, projected with generational mortality improvement using scale MP-2020.

## **Healthy Retiree Mortality**

Healthy retiree mortality rates for General and Public Safety employees are based on the RP-2014 Blue Collar Mortality Table, projected with generational mortality improvement using scale MP-2020.

## **Disabled Retiree Mortality**

Disabled retiree mortality rates for General and Public Safety employees are based on the RP-2014 Blue Collar Mortality Table set forward one year with full generational mortality improvement using Scale MP-2020.

#### **Turnover Rates**

Turnover rates for General and Public Safety employees are as follows:

General Employees	
Service	Rate
0	15.00%
1	12.00%
2	10.00%
3	9.00%
4	8.00%
5	7.60%
10	5.40%
15	3.30%
20	2.00%
25	1.00%
30	0.00%

## **Disability Rates**

Disability rates for General and Public Safety employees are as follows:

General Employees	
Age	Rate
25	0.02%
30	0.03%
35	0.06%
40	0.10%
45	0.15%
50	0.19%
55	0.24%
60	0.28%

55% of the General employee disabilities are job-related. 90% of the Public Safety employee disabilities are job-related.

## **General and Public Safety Employees**

#### **Retirement Rates**

Retirement rates for General and Public Safety employees hired prior to April 2, 2012 are as follows:

	General Employees				
Α	ge	Male	Female		
4	15	0.00%	0.00%		
5	50	1.00%	1.50%		
5	55	2.00%	5.50%		
6	60	12.00%	5.00%		
6	52	30.00%	15.00%		
6	35	40.00%	15.00%		
6	69	30.00%	20.00%		
7	70	100.00% 1	L00.00%		

Retirement rates for General and Public Safety employees hired after April 1, 2012 are as follows:

General Employees						
Age	Male	Female				
45	0.00%	0.00%				
50	0.00%	0.00%				
55	0.00%	0.00%				
60	12.00%	5.00%				
62	30.00%	15.00%				
65	40.00%	15.00%				
69	30.00%	20.00%				
70	100.00%	100.00%				

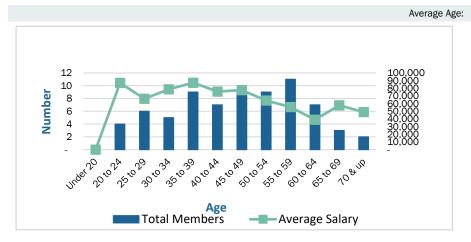
Public Safety						
Age	All					
45	1.00%					
50	2.00%					
55	15.00%					
60	20.00%					
62	25.00%					
65	100.00%					

ΑII 1.00% 2.00% 15.00% 20.00% 25.00% 100.00%

## **SECTION 7 - PLAN MEMBER INFORMATION**

Exhibit 7.1 - Active Members by Age and Years of Service as of July 1, 2021

	Years of Service											
Age	0 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 to 39	40 & up	Total	Total Salary	Average Salary
Under 20	-	-	-	-	-	-	-	-	-	-	-	-
20 to 24	4	-	-	-	-	-	-	-	-	4	347,702	86,926
25 to 29	6	-	-	-	-	-	-	-	-	6	398,542	66,424
30 to 34	4	1	-	-	-	-	-	-	-	5	393,171	78,634
35 to 39	4	2	3	-	-	-	-	-	-	9	785,292	87,255
40 to 44	3	1	1	1	1	-	-	-	-	7	529,445	75,635
45 to 49	2	3	2	-	1	1	-	-	-	9	697,907	77,545
50 to 54	4	-	1	2	-	1	1	-	-	9	576,895	64,099
55 to 59	6	1	2	1	-	-	1	-	-	11	611,541	55,595
60 to 64	3	2	1	1	-	-	-	-	-	7	273,213	39,030
65 to 69	-	1	1	-	-	1	-	-	-	3	173,351	57,784
70 & up	1	-	-	-	-	1	-	-	-	2	98,150	49,075
Total	37	11	11	5	2	4	2	-	-	72	4,885,210	67,850
Total Salary	2,283,362	630,298	953,839	378,289	184,110	305,643	149,669	-	-			
Average Salary	61,712	57,300	86,713	75,658	92,055	76,411	74,835	-	-			





## **SECTION 7 - PLAN MEMBER INFORMATION**

Exhibit 7.2 - Retired Members, Covered Spouses and Survivors as of July 1, 2021

		Non-Me	dicare Plans	Medicare Plans	
Age	Wethork Blue	dine Choice	Ame Cate Elect.	Medet 2 Blue Rit	Total
Under 40	0	0	0	0	0
40 to 44	0	0	0	0	0
45 to 49	0	0	0	0	0
50 to 54	1	0	0	0	1
55 to 59	1	0	0	0	1
60 to 64	5	0	0	0	5
65 to 69	4	0	2	8	14
70 to 74	1	0	0	12	13
75 to 79	0	0	0	7	7
80 to 84	0	0	0	2	2
85 to 89	0	0	0	5	5
90+	0	0	0	3	3
Total	12	0	2	37	51
Covered					
Spouses	11	0	0	14	25

Average Age: 73.9

In addition, there are 3 retirees that are not covered under any medical plan but are covered under a life insurance policy which the Town contributes to.

## SECTION 8 - GLOSSARY OF TERMS

**Actuarial Assumptions** – Assumptions as to the occurrence of future events affecting OPEB costs, such as mortality, withdrawal, disability and retirement; changes in compensation and OPEB benefits; rates of investment earnings and asset appreciation or depreciation; procedures used to determine the Actuarial Value of Assets; characteristics of future entrants for Open Group Actuarial Cost Methods; and other relevant items.

Actuarial Cost Method (or Funding Method) – A procedure for allocating the Actuarial Present Value of projected benefit payments to the current year (Service Cost) and the past (Total OPEB Liability).

Actuarial Gain or Loss (or Experience Gain or Loss) – A measure of the difference between actual experience and that expected based upon the set of Actuarial Assumptions during the period between the valuation date and the most recent immediately preceding valuation date.

**Actuarial Present Value of Projected Benefit Payments** – The dollar value on the valuation date of all benefits expected to be paid to current members based upon the Actuarial Assumptions and the terms of the Plan.

Actuarially Determined Contribution – A target or recommended contribution to a defined benefit OPEB plan for the reporting period, determined in conformity with Actuarial Standards of Practice based on the most recent measurement available when the contribution for the reporting period was adopted.

**Actuarial Valuation Date** – The date as of which an actuarial valuation is performed. This date may be up to 24 months prior to the measurement date and up to 30 months prior to the employer's reporting date.

**Deferred Inflow of Resources** – Acquisition of resources by a governmental entity that is applicable to future reporting periods. Under GASB 75, deferred inflows of resources are made up of experience gains, assumption changes reducing the Total OPEB Liability and investment gains that are recognized in future reporting periods.

**Deferred Outflow of Resources** – Consumption of resources by a governmental entity that is applicable to future reporting periods. Under GASB 75, deferred outflows of resources are made up of experience losses, assumption changes increasing the Total OPEB Liability and investment losses that are recognized in future reporting periods.

**Discount Rate** – Single rate of return that, when applied to all projected benefit payments, results in an actuarial present value of projected benefit payments equal to the sum of:

- (1) a long-term expected rate of return on OPEB plan investments to the extent that the OPEB plan's assets are sufficient to pay benefits and OPEB plan assets are expected to be invested using a strategy to achieve that return and
- (2) a tax-exempt, high-quality municipal bond rate to the extent that the conditions for use of the long-term expected rate of return are not met.

**Employer Future Period Contributions** – Contributions made by the employer, generally to an outside trust fund, to pay for future OPEB costs. These are costs in addition to the employer contributions made during the year to pay for ongoing premiums.

## **SECTION 8 - GLOSSARY OF TERMS**

Entry Age Normal Actuarial Cost Method – A method under which the actuarial present value of the projected benefits of each individual in an actuarial valuation is allocated on a level basis over the earnings or service of the individual between entry age and assumed exit age.

**Explicit Subsidy** – The difference between (a) the blended rates based on combined active and retired member experience and (b) actual cash contributions made by the employer.

Fiduciary Net Position - The fair market value of assets as of the measurement date.

Funded Ratio - The Actuarial Value of Assets expressed as a percentage of the Actuarial Accrued Liability.

GASB - Governmental Accounting Standards Board.

**Health Cost Trend Rate** – The rate of change in per capita health claims cost over time as a result of factors such as medical inflation, utilization of healthcare services, plan design, and technological developments.

Implicit Subsidy – In an experience-rated healthcare plan that includes both active employees and retirees with blended premium rates for all plan members, the difference between (a) the age-adjusted premiums approximating claim costs for retirees in the group and (b) the blended rates based on combined active and retired member experience.

**Long-Term Expected Rate of Return –** Long-term expected rate of return on OPEB plan investments expected to be used to finance the payment of benefits, net of investment expenses.

Measurement Date - The date as of which the Total OPEB Liability and Fiduciary Net Position are measured.

**Municipal Bond Rate** – Yield or index rate for 20-year, tax-exempt general obligation municipal bonds with an average rating of AA/Aa or higher.

**Net OPEB Liability** – The liability of the employer for benefits provided through an OPEB plan. It is calculated as the Total OPEB Liability less the Fiduciary Net Position.

OPEB - Other Postemployment Benefits including medical, dental, vision, hearing and life insurance benefits.

Pay-As-You-Go – A method of financing an OPEB plan under which the contributions to the plan are generally made at about the same time and in about the same amount as benefit payments and expenses becoming due.

**Present Value of Future Benefits –** The actuarial present value of the cost to finance benefits payable in the future, discounted to reflect the expected effects of the time value of money and the probabilities of payment.

Reporting Date - The last day of the Plan or employer's fiscal year.

## **SECTION 8 - GLOSSARY OF TERMS**

**Service Cost** – The portion of the actuarial present value of projected benefit amounts that is attributed to a valuation year.

Substantive Plan - The terms of an OPEB plan as understood by the employer and plan members.

**Total OPEB Liability** – The portion of the actuarial present value of projected benefit amounts that is attributed to past periods of employee service.

Unfunded Actuarial Accrued Liability - The excess of the Actuarial Accrued Liability over the Actuarial Value of Assets.

# **SECTION 9 - BREAKOUT OF RESULTS BY DEPARTMENT**

Department	Town	Waste Water	Total
Summary of Member Data Used in Valuation			
Active Members	68	4	72
Average Age	47.1	43.2	46.9
Average Service	8.2	8.6	8.2
Covered Payroll	4,622,311	262,899	4,885,210
Retired Members and Survivors	49	5	54
Average Age	73.9	73.5	73.9
Covered Spouses	21	4	25
Expected Benefit Payments	402,954	63,464	466,418
OPEB Trust contributions	0	0	0
Total Employer Contributions	402,954	63,464	466,418
Beginning Net OPEB Liability - June 30, 2021 Total OPEB Liability	19,706,910	2,266,226	21,973,136
Fiduciary Net Position	0	0	0
Net OPEB Liability	19,706,910	2,266,226	21,973,136
Total OPEB Liability, beginning of year	19,706,910	2,266,226	21,973,136
Service cost	1,049,254	48,725	1,097,979
Interest	443,981	49,318	493,299
Changes of benefit terms	0	0	0
Differences between expected and actual			
experience	(2,173,463)	(597,272)	(2,770,735)
Changes of assumptions	(4,781,050)	(377,831)	(5,158,881)
Benefit payments	(402,954)	(63,464)	(466,418)
Net change in total OPEB liability	(5,864,232)	(940,524)	(6,804,756)
Total OPEB Liability, end of year	13,842,678	1,325,702	15,168,380
Ending Net OPEB Liability - June 30, 2022	10.010.070	4 005 700	45 400 000
Total OPEB Liability	13,842,678	1,325,702	15,168,380
Fiduciary Net Position	0	0	0
Net OPEB Liability	13,842,678	1,325,702	15,168,380
Total Deferred Outflows of Resources			
Differences between Expected and Actual			
Experience	0	0	0
Changes in Assumptions	2,802,829	322,316	3,125,145
Differences between Expected and Actual	_,00_,0_0	322,323	3,223,213
Earnings on OPEB Plan Investments	0	0	0
Total Deferred Outflows of Resources	2,802,829	322,316	3,125,145
Total Deferred Inflows of Resources			
Differences between Expected and Actual			
Experience	3,169,382	364,468	3,533,850
Changes in Assumptions	4,031,270	463,582	4,494,852
Differences between Expected and Actual			
Earnings on OPEB Plan Investments	0	0	0
Total Deferred Inflows of Resources	7,200,652	828,050	8,028,702

# **SECTION 9 - BREAKOUT OF RESULTS BY DEPARTMENT**

Department	Town	Waste Water	Total							
Sensitivity of the Net OPEB Liability										
to Changes in the Discount Rate										
Current Discount Rate: 3.54%	13,842,678	1,325,702	15,168,380							
1% Decrease in the Discount Rate: 2.54%	16,295,866	1,560,642	17,856,508							
1% Increase in the Discount Rate: 4.54%	11,905,772	1,140,206	13,045,978							
Sensitivity of the Net OPEB Liability to Changes in the Healthcare Cost Trend Rates	<b>;</b>									
Current Trend Rates	13,842,678	1,325,702	15,168,380							
1% Decrease in Trend Rates	11,642,431	1,114,986	12,757,417							
1% Increase in Trend Rates	16,707,916	1,600,104	18,308,020							
Deferred Outflows of Resources and Deferred Inflows of Resources recognized in OPEB Expense										
2023	(685,701)	(78,853)	(764,554)							
2024	(585,607)	(67,343)	(652,950)							
2025	(707,139)	(81,318)	(788,457)							
2026	(888,116)	(102,130)	(990,246)							
2027	(1,086,771)	(124,975)	(1,211,746)							
Thereafter	(444,489)	(51,115)	(495,604)							

## APPENDIX A - CALCULATION OF SINGLE DISCOUNT RATE

Under GASB 74 and GASB 75, a series of projections and calculations are used to determine the discount rate for the purpose of the measurement of the Total OPEB Liability. The discount rate is the single rate that reflects (1) the long-term expected rate of return on OPEB plan investments that are expected to be used to finance the payment of benefits, to the extent that the OPEB plan's fiduciary net position is projected to be sufficient to make projected benefit payments and OPEB plan assets are expected to be invested using a strategy to achieve that return, and (2) a yield or index rate for 20-year, tax-exempt general obligation municipal bonds with an average rating of AA/Aa or higher, to the extent that the conditions for use of the long-term expected rate of return are not met.

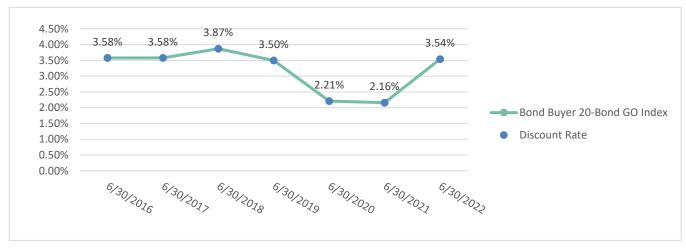
Projected cash flows into and out of the OPEB plan are assumed to be contributions to the OPEB plan, benefit payments, OPEB plan administrative expenses and OPEB plan investment earnings. These projected cash flows are used to project the OPEB plan's fiduciary net position at the beginning of each period. The OPEB plan's projected fiduciary net position at the beginning of each period is compared to the amount of benefit payments projected to occur in that period.

It is assumed that the OPEB plan's fiduciary net position is expected to always be invested using a strategy to achieve the long-term expected rate of return on OPEB plan investments.

The benefit payments that are projected to occur in a period are discounted using the long-term expected rate of return on OPEB plan investments if the amount of the OPEB plan's beginning fiduciary net position is projected to be sufficient to make the benefit payments in that period. In periods in which benefit payments are projected to be greater than the amount of the OPEB plan's fiduciary net position, they are discounted using a municipal bond rate as required by GASB 74.

For purposes of this valuation, liabilities are based on a discount rate of 3.54%, the rate that reflects a taxexempt, high quality municipal bond rate. The municipal bond rate of 3.54% is based on the Bond Buyer 20-Bond GO Index published on June 30, 2022.

Below are the historical Bond Buyer 20-Bond GO Indices and the Town's discount rate used in disclosures since the implementation of GASB 74 and GASB 75:



## APPENDIX B - SCHEDULE OF DEFERRED OUTFLOWS OF RESOURCES AND DEFERRED INFLOWS OF RESOURCES

Year	Differences between Expected and Actual Experience	Recognition Period (Years)	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031
2018	-	6.12	-	-	-	-	-	-	-	-	-	-
2019	-	6.12	-	-	-	-	-	-	-	-	-	-
2020	(2,215,394)	6.52	(339,784)	(339,784)	(339,784)	(339,784)	(176,690)	-	-	-	-	-
2021	-	6.52	-	-	-	-	-	-	-	-	-	-
2022	(2,770,735)	6.40	(432,927)	(432,927)	(432,927)	(432,927)	(432,927)	(432,927)	(173,173)	-	-	-
Net Increa	ase (Decrease) in OPEB Ex	pense	(772,711)	(772,711)	(772,711)	(772,711)	(609,617)	(432,927)	(173,173)	-	-	-
Year	Changes of Assumptions	Recognition Period (Years)	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031
0040	(770 474)	0.40	(400.005)	(4.00.005)	(45.004)							
2018	(776,171)	6.12	(126,825)	(126,825)	(15,221)	-	-	-	-	-	-	-
2019	1,048,232	6.12	171,280	171,280	171,280	20,552	-	-	-	-	-	-
2020	4,677,168	6.52	717,357	717,357	717,357	717,357	373,026	-	-	-	-	-
2021	341,776	6.52	52,420	52,420	52,420	52,420	52,420	27,256	-	-	-	-
2022	(5,158,881)	6.40	(806,075)	(806,075)	(806,075)	(806,075)	(806,075)	(806,075)	(322,431)	-	-	-
Net Increase (Decrease) in OPEB Expense			8,157	8,157	119,761	(15,746)	(380,629)	(778,819)	(322,431)	-	-	-

## APPENDIX B - SCHEDULE OF DEFERRED OUTFLOWS OF RESOURCES AND DEFERRED INFLOWS OF RESOURCES

	Differences between Projected and Actual Earnings on OPEB Plan	Recognition Period	0000	0000	0004	0005	0000	0007	0000	0000	0000	0004
Year	Investments	(Years)	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031
2018	-	5	-	-	-	-	-	-	-	-	-	-
2019	-	5	-	-	-	-	-	-	-	-	-	-
2020	-	5	-	-	-	-	-	-	-	-	-	-
2021	-	5	-	-	-	-	-	-	-	-	-	-
2022	-	5	-	-	-	-	-	-	-	-	-	-
Net Incr	ease (Decrease) in OPEB Ex	pense	-	-	-	-	-	-	-	-	-	-