Deloitte.

State of Maine County and Municipal Law Enforcement Officers & Municipal Firefighters Retiree Healthcare Plan

Actuarial Valuation Report

June 30, 2021

Prepared by Deloitte Consulting LLP **September 2022**

Contents

Actuarial Valuation Opinion

This report presents results of the actuarial valuation of the the “Other” Post-Employment Benefits (“OPEB”) provided under the State of Maine County and Municipal Law Enforcement Officers & Municipal Firefighters Retiree Healthcare Plan (“First Responders Plan” or “Plan”) as of June 30, 2021. In our opinion, this report is complete and accurate and represents fairly the actuarial position of the Plan for the purposes stated herein.

The State of Maine provided the participant data, financial information, and plan descriptions as of June 30, 2021 to be used as the basis of this valuation. The actuary has analyzed the data and other information provided for reasonableness but has not independently audited the data or other information provided. The actuary has no reason to believe the data or other information provided is not complete and accurate and knows of no further information that is essential to the preparation of the actuarial valuation.

In our opinion, all costs, liabilities, rates of interest, and other factors underlying these actuarial computations have been determined on the basis of actuarial assumptions and methods that are each reasonable (or consistent with authoritative guidance) for the purposes herein taking into account the experience of the Plan and future expectations.

Future actuarial measurements may differ significantly from the current measurements presented in this report due to such factors as the following: plan experience differing from that anticipated by the economic or demographic assumptions; changes in economic or demographic assumptions; increases or decreases expected as part of the natural operations of the methodology used for these measurements (such as the end of an amortization period or additional cost or contribution requirements based on the Plan’s funded status); and changes in plan provisions or applicable law. Our scope for this actuarial valuation did not include analyzing the potential range of such future measurements, and we did not perform that analysis.

The undersigned with actuarial credentials collectively meet the Qualification Standards of the American Academy of Actuaries to render the actuarial opinions contained herein.

This report was prepared solely for the benefit and internal use of the plan sponsor. This report is not intended for the benefit of any other party and may not be relied upon by any third party for any purpose, and Deloitte Consulting accepts no responsibility or liability with respect to any party other than the plan sponsor.

To the best of our knowledge, no employee of the Deloitte U.S. Firms is an officer or director of the employer. In addition, we are not aware of any relationship between the Deloitte U.S. Firms and the employer that may impair or appear to impair the objectivity of the work detailed in this report.

DELOITTE CONSULTING LLP

Michael de Leon, FCA, ASA, EA, MAAA
Managing Director

John Schubert, FCA, ASA, MAAA, CEBS
Specialist Leader

Griffin Lothrop, FCA, ASA, EA, MAAA
Specialist Leader

Background and Comments

Governmental Accounting Requirements and Report Purpose

The Governmental Accounting Standards Board released the Statement of Governmental Accounting Standard No. 75 in June 2015. GASB No. 75 requires employers and non-employer contributing entities to accrue the cost of post-employment benefits other than pensions ("OPEB") while eligible employees are providing services to the employer. The State of Maine is a non-employer contributing entity with respect to certain OPEB benefits provided to eligible first responders, as described in this report. The State of Maine adopted GASB No. 75 for the June 30, 2018 Reporting Date (using a Measurement Date of June 30, 2017).

The purpose of this actuarial valuation report is to provide information that will serve as the basis for the State of Maine's employer financial reporting. The information provided herein will be used for the Reporting Dates for fiscal years ending June 30, 2022 and June 30, 2023 (for GASB No. 75 the State of Maine has elected to use a measurement date as of the end of the prior fiscal year). GASB No. 75 disclosures will be provided under separate cover.

Overview of Plan

The State of Maine provides a Retiree Healthcare Plan ("Plan") for County and Municipal Law Enforcement Officers & Municipal Firefighters (referred to as "First Responders"). These state-provided benefits became effective July 1, 2007. To be eligible for payment, a retiree must:

- Be at least age 50;
- Be receiving a retirement benefit through the Maine Public Employees Retirement System (or a defined contribution plan);
- For those retired before September 19, 2019, have made at least 5 years of employee contributions into the Firefighters and Law Enforcement Officers Health Insurance Program Fund. For those retired on or after September 19, 2019, have made employee contributions into the Firefighters and Law Enforcement Officers Health Insurance Program Fund.
    - Active employees hired prior to October 1, 2019 generally must enroll in the plan no later than 60 days following the date of hire. There is a special open enrollment period for all actives employees from October 1, 2019 through December 31, 2021. Active employees hired on or after October 1, 2019 must enroll in the plan no later than 5 years following the date of hire.
    - The mandatory contribution requirements (1.50% of compensation) for active employees became effective January 1, 2007. Retirees who did not satisfy the minimum of 5 years of contributions were permitted to pay a make-up contribution in order to qualify for the benefit.

State of Maine Explicit Contributions

- The State of Maine provides a premium subsidy to eligible retirees. Prior to July 1, 2021 the applicable premium subsidy was 45%. Effective July 1, 2021 the applicable premium subsidy is 55%.
- For participants retiring from municipal employers participating in the Maine Municipal Employees Health Trust ("MMEHT"), and who provide continued health insurance coverage to retirees, the premium subsidy is applied to that MMEHT employee-only medical premium.
- Participants retiring from municipal employers who do not participate in MMEHT, or do not provide continued health insurance coverage to retirees, may enroll in the State of Maine Employees Health Plan. For these participants the premium subsidy is applied to the State of Maine Plan's medical premium, but not

greater than the highest MMEHT retiree-only premium for the medical plans elected by the participating municipalities.

Background and Comments (Cont.)

Retirees pay the remaining portion of the employee-only premium and the full additional premium for spouse and family coverage, if applicable. There is no benefit for surviving spouses. The State-paid retiree medical payments cease when the retiree becomes eligible for Medicare. NOTE: Medicare is mandatory for police officers and firefighters hired after March 31, 1986.

The substantive plan benefits are described in Section 7 – Summary of Substantiative Plan Provisions of this report.

Implicit Rate Subsidy

GASB No. 75 requires that employers/non-employer contributing entities recognize the Implicit Rate Subsidy that exists in many postretirement medical plans provided by governmental employers. The Implicit Rate Subsidy refers to the concept that retirees under the age of 65 (i.e., not eligible for Medicare) generate higher claims on average than active participants.

When a medical plan is self-insured through a third-party administrator or fully insured, a premium is usually determined by analyzing the claims of the entire population in that plan and adjusting for administrative costs. The resulting premium is called a blended premium because it blends the claims of active and retired participants. Because individuals generally have more and higher claims as they get older, the blended premium paid for retirees is lower than their expected claims. Another way of considering this is that if the retirees were removed from the plan, the premium for the active group would be lower; therefore, the retirees' premiums are being subsidized by the active group. Because the employer generally pays a large portion or all of the premiums for the active group, this subsidy creates a liability for the employer. The difference between the expected claims for the retiree group and the blended premium is called the Implicit Rate Subsidy.

For municipal employers who provide continued health insurance coverage to retirees, it is our understanding that the Implicit Rate Subsidy is the responsibility of each individual employer because each pays for a portion (or all) of their active employees' premiums and provide retirees access to postretirement medical coverage at a blended premium applicable to that employer.

If certain municipal employers elect to not provide continued health insurance coverage to eligible retirees, then those retirees may enroll in the State of Maine Employees Health Plan. In those cases, because the retiree is subject to the State's blended premium, the State of Maine is responsible for an Implicit Rate Subsidy for those retirees.

The State of Maine has confirmed that the it is currently responsible for the Implicit Rate Subsidy for eligible retirees from the City of Portland, but no other county or municipality at this time.

Medical Costs for Medicare–Eligible Retirees

Medical coverage for Medicare-eligible retirees was not considered in this valuation as the State provides no explicit subsidy after Medicare eligibility.

Background and Comments (Cont.)

Health Care Reform

The Patient Protection and Affordable Care Act ("PPACA") was signed into law on March 23, 2010. The primary objective of the act is to increase the number of Americans with health insurance coverage. There are several provisions within PPACA with potentially significant short- and long-term cost implications for employers. The applicable provisions of PPACA were considered in this valuation. On December 18, 2015, the Consolidated Appropriations Act, 2016 became law. This legislation delayed the effective date of the high cost plan excise tax from 2018 to 2020 and made it tax deductible. On January 22, 2018, the Federal Register Printing Savings Act further delayed the effective date from 2020 to 2022. On December 20, 2019, the excise tax and the health insurance provider fee for calendar years beginning after December 31, 2020 were repealed.

The provisions of PPACA considered are as follows:

- Prohibiting lifetime and annual limits on the dollar value of coverage for "essential health benefits"
- Increasing the dependent child age limit to age 26
- Elimination of cost sharing for in-network preventive services
- Reflecting manufacturer discounts available to certain Medicare beneficiaries receiving applicable covered Part D drugs (mostly brand) while in the coverage gap
- Out-of-pocket limit includes both medical and Rx expenses

Actuarial Methods and Assumptions

The actuarial methods and assumptions are described in Section 5 – Summary of Actuarial Methods & Assumptions of this report.

The majority of the First Responders covered under this plan are participants in the Maine Public Employee Retirement System ("MainePERS") PLD Consolidated Plan. For this reason, several demographic assumptions are selected to be consistent with the most recently available actuarial valuation of that plan.

Because the State's portion of the First Responders' postretirement medical plans are not being funded by assets in a separate trust as of the measurement date, GASB No. 75 requires that the discount rate be based on the index rate as of the measurement date of a 20-year tax-exempt general obligation municipal bond index with an average rating of AA/Aa or higher. The State of Maine elected to determine the discount rate using the Bond Buyer 20-Bond General Obligation Index. The discount rate was 2.16% as of the measurement date, June 30, 2021, (3.50% as of June 30, 2019).

For purposes of calculating the liability associated with Explicit Contributions: Pre-65 claims costs are based on current premiums.

For purposes of calculating the liability associated with the Implicit Rate Subsidy (as applicable): Pre-65 claims costs are based on the State of Maine Retiree Healthcare Plan valuation. Those costs were developed with consideration of the 2021 premium rates developed by the State of Maine for their Employees Health Plan and by applying appropriate age factors to average annual costs per member.

Locations noted as ineligible by the State of Maine were excluded from the valuation.

Background and Comments (Cont.)

For the June 30, 2021 valuation, the valuation was based on the same plan provisions and actuarial methods and assumptions as the previous valuation with the exception of the following:

- The discount rate assumption was updated to 2.16%.
- Healthcare cost trend rates were updated based on industry observations, an update to the most current SOA-Getzen model, and an adjustment to short-term trend rates to estimate the impact of the current general inflation environment;
- The following assumptions were updated to be consistent with the June 30, 2021 MainePERS valuation reports, which are based on the experience study released in June 2021:
    - Salary increase
    - Termination
    - Retirement
    - Mortality (base table and longevity improvement)
        - The headcount-weighted base tables were selected by the State of Maine rather than the benefits-weighted base tables used for MainePERS
- The two-month premium holiday for the year ended June 30, 2022 and the estimated four-month premium holiday for the year ending June 30, 2023 are reflected in the liability calculation for the City of Portland.

The effect of these changes on the Actuarial Accrued Liability is summarized in Section 2 – Actuarial Experience of the report. The actuarial methods and assumptions are described in more detail later in this report.

Valuation Results

Section 1 – Summary of Results

Presented below are the current and prior actuarial valuation results for the First Responders Plan. All information is provided as of the valuation date shown. Dollar amounts are in thousands.

	Valuation Date	
	June 30, 2021	June 30, 2019
1. Actuarial Accrued Liability	$32,680	$27,506
2. Actuarial Value of Assets	-	-
3. Unfunded Actuarial Accrued Liability (UAAL) (1) - (2)	$32,680	$27,506
4. Funded ratio (2 / 1)	0.00%	0.00%
5. UAAL as a percentage of covered payroll (3 / 9)	70.72%	41.45%
6. Normal Cost	$1,639	$1,142
7. Discount Rate	2.16%	3.50%
8. Participant Counts		
Actives*	652	598
Retirees and beneficiaries	128	121
Total	780	719
9. Covered Payroll**	$46,207	$66,360
10. Expected Benefit Payments	$1,420	$1,012

*Employees who have opted-out of medical coverage and those who are considered part-time employees as defined in the Participation Requirements of Actuarial Methods section are not included in this valuation.

**June 30, 2021 covered payroll is estimated based on total employee contributions (participating employees contribute 1.5% of pay). June 30, 2019 covered payroll included actives who waived coverage. It was assumed to grow at 3.00% per year from the prior valuation, due to lack of data, as confirmed by the State.

Section 2 – Actuarial Experience

Actuarial gains and losses arise from experience different from that assumed, changes in actuarial assumptions and methods, and changes in plan provisions. The following summarizes the changes in the Actuarial Accrued Liability due to these sources from June 30, 2019 to June 30, 2021. Dollar amounts are in thousands.

1.	Actuarial Accrued Liability as of June 30, 2019		$27,506
2.	Normal Cost for year ending June 30, 2020		1,142
3.	Actual Benefit Payments for the year ending June 30, 2020		(806)
4.	Interest at 3.50% on (1), (2) and (3)		989
5.	Expected Actuarial Accrued Liability as of June 30, 2020		$28,831
	(1) + (2) + (3) + (4)		
6.	Normal Cost for year ending June 30, 2021		$1,176
7.	Actual Benefit Payments for the year ending June 30, 2021		(839)
8.	Interest at 3.50% on (5), (6) and (7)		1,036
9.	Expected Actuarial Accrued Liability as of June 30, 2021		$30,204
	(5) + (6) + (7) + (8)		
10.	(Gain)/Loss		
	i. Demographic and Premium Experience	(1,768)	
	ii. Change in Assumptions	605	
	iii. Change in Discount Rate	3,474	
	iii. Plan Change - Premium Holiday	165	
	iv. Total (Gain)/Loss		2,476
11.	Actual Actuarial Accrued Liability as of June 30, 2021		$32,680
	(9) + (10)(vi)		

Section 3 – Development of Unfunded Actuarial Accrued Liability

Presented below is the development of the Unfunded Actuarial Accrued Liability as of June 30, 2021, which is the Actuarial Accrued Liability minus the Actuarial Value of Assets. The Actuarial Accrued Liability is the portion of the Present Value of Future Benefits accrued to date. The Present Value of Future Normal Costs represents the portion of the Present Value of Future Benefits expected to accrue in the future, based on the current population. Dollar amounts are in thousands.

1. Present Value of Future Benefits	**Explicit Subsidy**	**Implicit Subsidy**	**Total**
Actives	$39,385	$6,759	$46,144
Retirees	5,057	1,126	6,183
Total	$44,442	$7,885	$52,327
2. Present Value of Future Normal Costs	$17,944	$1,703	$19,647
3. Actuarial Accrued Liability			
Actives	$21,441	$5,056	$26,497
Retirees	5,057	1,126	6,183
Total	$26,498	$6,182	$32,680
4. Actuarial Value of Assets			-
5. Unfunded Actuarial Accrued Liability (3) - (4)			$32,680

Section 4 – 10-Year Projection of Employer Benefit Payments

Presented below are the projected employer benefit payments for the next ten years based on the current plan design. These projected benefit payments are based on actuarial assumptions shown in Section 5 - Summary of Actuarial Methods & Assumptions. If actual experience differs from that expected by the actuarial assumptions, the actual employer benefit payments will vary from those presented below. Dollar amounts are in thousands.

Year Ending	Explicit Subsidy	Implicit Subsidy	Total Benefit Payments
6/30/2022	$1,122	$298	$1,420
6/30/2023	1,157	562	1,719
6/30/2024	1,372	393	1,765
6/30/2025	1,532	410	1,942
6/30/2026	1,584	387	1,971
6/30/2027	1,637	390	2,027
6/30/2028	1,747	430	2,177
6/30/2029	1,744	426	2,170
6/30/2030	1,733	404	2,137
6/30/2031	1,766	418	2,184

Basis for the Valuation

Section 5 – Summary of Actuarial Methods & Assumptions

Actuarial Cost Method

The Actuarial Cost Method used in this valuation to determine the Actuarial Accrued Liability was the Entry Age Normal Percent of Pay method. This method is one of the family of projected benefit cost methods. An estimate of the projected monthly benefit payable at retirement is initially required to determine costs and liabilities under this method.

The Normal Cost is the sum of the annual contributions required for each participant from his entry date to his assumed retirement date so that the accumulated contribution at retirement is equal to the liability for the projected benefit. The projected benefits are based on estimates of future years of service. The normal cost is developed as a level percentage of pay.

The Present Value of Future Benefits equals the value of the projected benefit payable at retirement discounted back to the participant's current age. Discounts include such items as interest and mortality.

The Present Value of Future Normal Costs equals the discounted value of the normal costs payable from the member's current age to retirement age.

The difference between the Present Value of Future Benefits and the Present Value of Future Normal Costs represents the Actuarial Accrued Liability at the participant's current age. The Actuarial Accrued Liability for participants currently receiving benefits and terminated vested participants is calculated as the Present Value of Future Benefits expected to be paid. No Normal Cost is payable for these participants.

This Actuarial Cost Method is required by GASB No. 75.

Funding Policy

The State currently funds the Plan on a pay-as-you-go basis. It is our understanding the State intends to establish a trust for this plan and will put a funding policy into place at that time.

Financial and Census Data

The State of Maine provided the participant data, financial information and plan descriptions used in this valuation. The actuary has checked the data for reasonableness, but has not independently audited the data. The actuary has no reason to believe the data is not complete and accurate, and knows of no further information that is essential to the preparation of the actuarial valuation.

Plan Fiduciary Net Position

There are currently no plan assets held in a irrevocable trust or equivalent arrangement.

Census Date

June 30, 2021

Measurement Date

June 30, 2021

Section 5 – Summary of Actuarial Methods & Assumptions (Cont.)

Method Changes Since Prior Valuation

None.

Section 5 – Summary of Actuarial Methods & Assumptions (Cont.)

<table>
<tr><td>Discount Rate</td><td>2.16%</td></tr>
<tr><td>Mortality</td><td>Rates are based on the 2010 Public Plan General Headcount-Weighted Employee and Healthy Retiree Mortality Tables and MP-2020 Mortality Improvement Scale with the following adjustments:
Adjustment of 83.5% for males and 88.6% for females applied to the base Employee mortality rates
Adjustment of 112.1% for males and 118.5% for females applied to the base Healthy Retiree mortality rates
MP-2020 Mortality Improvement Scale adjusted to use an ultimate rate of 1.00% for ages 20-80, grading down to 0.05% at age 95, grading down to an ultimate rate of 0.00% at age 115, and convergence to the ultimate rate in the year 2027.</td></tr>
<tr><td>Termination</td><td>Sample rates at select years of service:
<table><tr><th>Service</th><th>Rate</th></tr><tr><td>0</td><td>17.90%</td></tr><tr><td>1</td><td>14.40%</td></tr><tr><td>2</td><td>10.50%</td></tr><tr><td>3</td><td>9.50%</td></tr><tr><td>4</td><td>7.80%</td></tr><tr><td>5</td><td>7.90%</td></tr><tr><td>10</td><td>4.50%</td></tr><tr><td>15</td><td>2.90%</td></tr><tr><td>20</td><td>2.70%</td></tr><tr><td>25</td><td>0.00%</td></tr></table></td></tr>
<tr><td>Retirement</td><td><table><tr><th>Service</th><th>Rate</th></tr><tr><td>20</td><td>35%</td></tr><tr><td>21</td><td>30%</td></tr><tr><td>22</td><td>28%</td></tr><tr><td>23</td><td>25%</td></tr><tr><td>24</td><td>20%</td></tr><tr><td>25</td><td>35%</td></tr><tr><td>26</td><td>25%</td></tr><tr><td>27</td><td>23%</td></tr><tr><td>28</td><td>25%</td></tr><tr><td>29</td><td>40%</td></tr><tr><td>30-33</td><td>25%</td></tr><tr><td>34</td><td>33%</td></tr><tr><td>35</td><td>100%</td></tr></table></td></tr>
</table>

Section 5 – Summary of Actuarial Methods & Assumptions (Cont.)

Disability

None assumed; MainePERS service continues to be credited during disability.

Healthcare Cost Increases

Medical trend rates were developed using a combination of trend surveys and the SOA-Getzen trend rate model. Initial trend rates start at 6.00% in 2022 based on survey data and client market expectations. The SOA-Getzen model was then used to determine the trend rates beginning in year 2026 and thereafter based on reasonable macro-economic assumptions for the growth of health care expenditures during this period relative to the general economy.

The short-term trend rates reflect an estimated impact of recent general inflation. CPI-U for the 12-month period ending in May 2022 was 8.5%. Based on historical information available regarding how general inflation impacts medical inflation, 60% of the increase in general inflation (over the long-term assumption of 2.75%) is assumed to be reflected in higher medical costs. Based on historical observations of CPI-U for medical care lagging general CPI-U, this increase is spread out over a two-year period starting in the fiscal year ending 2023.

Plan Year*	Rate**	Plan Year*	Rate**	Plan Year*	Rate**
2022	6.00%	2044	4.98%	2060	4.79%
2023	7.63%	2045	4.96%	2061	4.78%
2024	7.53%	2046	4.94%	2062	4.77%
2025	5.76%	2047	4.93%	2063	4.77%
2026	5.67%	2048	4.92%	2064	4.76%
2027	5.58%	2049	4.90%	2065	4.75%
2028	5.50%	2050	4.89%	2066	4.69%
2029	5.41%	2051	4.88%	2067	4.63%
2030	5.32%	2052	4.87%	2068	4.57%
2031 – 2037	5.23%	2053	4.86%	2069	4.51%
2038	5.13%	2054	4.85%	2070	4.46%
2039	5.09%	2055	4.84%	2071	4.40%
2040	5.06%	2056	4.83%	2072	4.35%
2041	5.04%	2057	4.82%	2073	4.29%
2042	5.01%	2058	4.81%	2074	4.24%
2043	4.99%	2059	4.80%	2075	4.19%

**Year ending June 30*

*** For retirees participating in the State of Maine Employees Health Plan the trend rate applied to the medical premiums in any given year does not exceed 5.75% (inflation of 2.75% plus 3%).*

Salary Increases

Sample rates at select years of service:

Service	Rate	Service	Rate
0	11.48%	10	3.26%
1	8.66%	15	3.26%
2	4.81%	20	3.01%
3	4.29%	25	2.75%
4	4.03%	30	2.75%
5	3.78%		

Section 5 – Summary of Actuarial Methods & Assumptions (Cont.)

Inflation Rate	2.75% annually
Aggregate Payroll Increases	3.00% annually
Coverage Election	90% of eligible participants will elect coverage at retirement. No employee who has waived coverage will be assumed to be eligible for coverage at retirement.
Marriage Assumption at Retirement	Future retirees in State Employees Health Plan – 80%.
Medicare Eligibility	100% of participants are assumed to be eligible for Medicare upon attaining age 65.
Medical Plan at Retirement	Current actives in municipalities participating in MMEHT: Based on current retiree elections for each particular municipality. Current actives in municipalities not participating in MMEHT: • Bangor – Based on current retiree elections, assume 100% CIGNA. • Portland – State Employees Health Plan. • Sagadahoc County Sheriff – Self-Insured. Current retirees: Same as current plan election.
Active Data Assumptions	• Missing birth dates – average age by service group. • Missing hire dates – average service by age group. • Covered payroll is estimated based on total employee contributions (participating employees contribute 1.5% of pay).
Monthly Premiums	For purposes of valuing the liability associated with Explicit Contributions, actual premiums disclosed in Section 8 were used in the valuation. For municipalities where premium information was unavailable, the highest premium of the other municipalities was used ($1,315.27 (Sanford)). These premiums are applicable to both actives and retirees (i.e. – these are blended premiums). The premium holiday is assumed to continue for four months in the plan year beginning July 1, 2022 (Portland only).
Annual Claims Costs: Retirees Covered by State of Maine Employees Health Plan	Sample Costs at Selected Ages: **Age** / **Males** / **Females** 50 / $9,497 / $12,537 55 / 12,497 / 14,622 60 / 16,141 / 17,031 64 / 19,857 / 19,639

Section 5 – Summary of Actuarial Methods & Assumptions (Cont.)

Model Use	Actuarial Standard of Practice No. 56 – Modeling requires disclosure of certain information regarding the actuary's use of models when issuing actuarial reports for work performed on or after October 1, 2020. For this valuation, the liability calculations were determined using industry-leading defined benefit valuation software developed and maintained by a third-party vendor. The model was designed specifically for the measurement of defined benefit pension and postretirement medical plan liabilities and the actuary has updated the applicable parameters for the specific plan provisions and assumptions selected for this valuation. The medical inflation trend rate assumptions were set using the Getzen Model of Long-Run Medical Cost Trends ("Getzen Model"), which adds transparency to the economic assumptions behind medical and prescription drug trends. The Getzen Model is an excel based projection of expected growth rates in medical premiums and expenditures from 2026 to 2101. Development of the model was sponsored by the Society of Actuaries ("SOA"), and it is used primarily in the estimation of reportable liabilities for retiree health benefits in accordance with FASB and GASB standards. It projects medical care cost increases and the health share of GDP for the next 80 years using linked formulas and assumptions developed by the author, Professor Thomas Getzen, with the assistance of a SOA project oversight group.

Section 6 – Rationale for Assumptions

Discount Rate	Because the State funds the retiree health benefits on a pay-as-you-go basis, GASB No. 75 prescribes that the discount rate be based on the index rate of a 20-year tax-exempt general obligation municipal bond index with an average rating of AA/Aa or higher as of the measurement date. The State elected to determine the discount rate using the Bond Buyer 20-Bond General Obligation Index.
Mortality, Termination, Retirement, and Salary Increases	The assumptions used in the actuarial valuation are the same assumptions as the June 30, 2021 actuarial valuation for the MainePERS PLD Consolidated Plan, with the exception of the base mortality rates. Headcount-weighted base mortality rates were used in this valuation rather than the associated Amount-weighted rates used in the MainePERS valuation. Headcount-weighted mortality rates are are more appropriate for retiree medical benefits where the level of benefit is not dependent on employee salary.
Inflation	Inflation is consistent with the assumption used in the June 30, 2021 MainePERS actuarial valuation.
Coverage Election	Based on recent experience of the plan and plan provisions.
Marriage Assumption at Retirement	Based on recent experience of the plan.
Medicare Eligibility	Based on recent experience of the plan.
Medical Plan at Retirement	Active plan elections are not consistently available and current retiree plan elections are generally a good indicator of what plans future retirees will elect.
Healthcare Cost Increases	Rationale described in Section 5 – Summary of Actuarial Methods & Assumptions.
Health Care Reform	Rationale described in the Background and Comments section.
Monthly Premiums	July 1, 2021 premiums were used. For municipalities where premium information was unavailable, the highest premium of the other municipalities was used.
Annual Claims Costs: Retirees Covered by State of Maine Employees Health Plan	Based on the 2021 premium rates for actives and non-Medicare-eligible retirees developed by the State of Maine and by applying appropriate age factors to average annual costs per member.

Section 7 - Summary of Substantive Plan Provisions

Eligibility	• Retired after age 50 (can terminate before 50) and receive a retirement benefit from the Maine Public Employees Retirement System (25 years of service) or a defined contribution plan. • If less than 25 years of service, normal retirement benefit must be at least 50% of final average compensation. • For those retired before September 19, 2019, have made at least 5 years of employee contributions into the Firefighters and Law Enforcement Officers Health Insurance Program Fund. For those retired on or after September 19, 2019, have made employee contributions into the Firefighters and Law Enforcement Officers Health Insurance Program Fund. • Participate in employer's health insurance plan or other fully insured health plan. • Cannot join if waived participation at retirement.
Benefit	• The State of Maine provides a premium subsidy to eligible retirees. Prior to July 1, 2021 the applicable premium subsidy was 45%. Effective July 1, 2021 the applicable premium subsidy is 55%. • For participants retiring from municipal employers participating in the Maine Municipal Employees Health Trust ("MMEHT"), and who provide continued health insurance coverage to retirees, the premium subsidy is applied to that MMEHT employee-only medical premium. • Participants retiring from municipal employers who do not participate in MMEHT, or do not provide continued health insurance coverage to retirees, may enroll in the State of Maine Employees Health Plan. For these participants the premium subsidy is applied to the State of Maine Plan's medical premium, but not greater than the highest MMEHT retiree-only premium for the medical plans elected by the participating municipalities. Retirees enrolled in the State of Maine Employees Health Plan had a two-month premium holiday for the year ended June 30, 2022 and will have an estimated four-month premium holiday for the year ending June 30, 2023. • No cash subsidy after Medicare eligible. • Cash subsidy began July 1, 2007.

Health Insurance Plan at Retirement	• Active coverage under MMEHT – continued coverage under MMEHT at retirement.
	• Active coverage under other fully insured employer plan:
	    • Continued coverage under employer's plans if plans allow retiree coverage.
	    • If plans do not allow retiree coverage, retiree coverage under State Employees Health Plan.

Employee Contributions	• The mandatory contribution requirements (1.50% of compensation) for active employees became effective January 1, 2007. • Active employees hired prior to October 1, 2019 generally must enroll in the plan no later than 60 days following the date of hire. There is a special open enrollment period for all actives employees from October 1, 2019 through December 31, 2021. Active employees hired on or after October 1, 2019 must enroll in the plan no later than 5 years following the date of hire. • Actives who did not satisfy the contributions requirement at retirement must pay the make-up contribution amount less any active contributions already made. • Retirees who did not satisfy the contributions requirement are permitted to pay a make-up contribution in order to qualify for the benefit.
Surviving Spouse Benefit	None
Dependent Benefits	No cash subsidy for spouse or dependents. Retiree must pay full cost to cover spouse and/or dependents.

Section 7 - Summary of Substantive Plan Provisions (Cont.)

Dental, Vision, Life	None
Changes Since Last Valuation	• Retirees enrolled in the State of Maine Employees Health Plan had a two-month premium holiday for the year ended June 30, 2022 and will have an estimated four-month premium holiday for the year ending June 30, 2023. • The 5-year requirement for employee contributions has been eliminated effective March 17, 2021 retroactive to September 19, 2019.

Medical Benefits

Plan participants under the Maine Municipal Employees Health Trust are covered by one of six medical plans: POS A, POS C, POS 200, PPO 500, PPO 1500, and PPO 2500. The monthly costs for each plan for fiscal year 2022 are determined using 2021 premiums and are summarized in Section 5 – Summary of Actuarial Methods & Assumptions of this report.

POS A

Deductible Single/Family:	$0 in-network, $250/$500 out-of-network
Coinsurance Percentage:	90% or 80% in-network, 80% out-of-network
Out-of-Pocket Limit Single/Family:	$1,000/$2,000 in-network, $2,250/$4,500 out-of-network
Lifetime Benefit Maximum:	Unlimited
Physician Services:	$10-$20 copayment per visit in-network, 80% after deductible out-of-network
Hospital Services:	100% or 90% in-network, 90% or 80% after deductible out-of-network
Retail Prescription Drugs (30-day supply):	$4 Generic, $10 Standard, $30 Tier 2, $50 Tier 3, $60 Tier 4
Mail Order Prescription Drugs (90-day supply):	$8 Generic, $20 Standard, $60 Tier 2, $100 Tier 3, $120 Tier 4

POS C

Deductible Single/Family:	$0 in-network, $250/$500 out-of-network
Coinsurance Percentage:	90% or 80% in-network, 70% out-of-network
Out-of-Pocket Limit Single/Family:	$1,500/$3,000 in-network, $2,250/$4,500 out-of-network
Lifetime Benefit Maximum:	Unlimited
Physician Services:	$15-$25 copayment per visit in-network, 70% after deductible out-of-network
Hospital Services:	100% or 90% in-network, 90% or 70% after deductible out-of-network
Retail Prescription Drugs (30-day supply):	$4 Generic, $10 Standard, $30 Tier 2, $50 Tier 3, $60 Tier 4
Mail Order Prescription Drugs (90-day supply):	$8 Generic, $20 Standard, $60 Tier 2, $100 Tier 3, $120 Tier 4

POS 200

Deductible Single/Family:	$200/$400 in-network, $300/$600 out-of-network
Coinsurance Percentage:	80% in-network, 60% out-of-network
Out-of-Pocket Limit Single/Family:	$1,700/$3,400 in-network, $2,300/$4,600 out-of-network
Lifetime Benefit Maximum:	Unlimited
Physician Services:	$20-$30 copayment per visit in-network, 60% after deductible out-of-network
Hospital Services:	80% in-network, 80% or 60% after deductible out-of-network
Retail Prescription Drugs (30-day supply):	$8 Generic, $15 Standard, $35 Tier 2, $60 Tier 3, $80 Tier 4
Mail Order Prescription Drugs (90-day supply):	$16 Generic, $30 Standard, $70 Tier 2, $120 Tier 3, $160 Tier 4

Section 7 - Summary of Substantive Plan Provisions (Cont.)

Medical Benefits

PPO 500

Deductible Single/Family:	$500/$1,000 in-network, $1,000/$2,000 out-of-network
Coinsurance Percentage:	80% in-network, 60% out-of-network
Out-of-Pocket Limit Single/Family:	$2,000/$4,000 in-network, $3,000/$6,000 out-of-network
Lifetime Benefit Maximum:	Unlimited
Physician Services:	$20-$35 copayment per visit in-network, 80% after $20-$35 copayment per visit out-of-network
Inpatient Services:	80% after deductible in-network, 80% or 60% after deductible out-of-network
Retail Prescription Drugs (30-day supply):	$8 Generic, $15 Standard, $35 Tier 2, $60 Tier 3, $80 Tier 4
Mail Order Prescription Drugs (90-day supply):	$16 Generic, $30 Standard, $70 Tier 2, $120 Tier 3, $160 Tier 4

PPO 1500

Deductible Single/Family:	$1,500/$3,000 in-network, $2,500/$5,000 out-of-network
Coinsurance Percentage:	80% in-network, 60% out-of-network
Out-of-Pocket Limit Single/Family:	$4,000/$8,000
Lifetime Benefit Maximum:	Unlimited
Physician Services:	$25-$40 copayment per visit in-network, 80% after $25-$40 copayment per visit out-of-network
Hospital Services:	80% after deductible in-network, 80% or 60% after deductible out-of-network
Retail Prescription Drugs (30-day supply):	$8 Generic, $20 Standard, $40 Tier 2, $70 Tier 3, $80 Tier 4
Mail Order Prescription Drugs (90-day supply):	$16 Generic, $40 Standard, $80 Tier 2, $140 Tier 3, $160 Tier 4

PPO 2500

Deductible Single/Family:	$2,500/$5,000 in-network, $5,000/$10,000 out-of-network
Coinsurance Percentage:	80% in-network, 60% out-of-network
Out-of-Pocket Limit Single/Family:	$5,000/$10,000 in-network, $7,000/$14,000 out-of-network
Lifetime Benefit Maximum:	Unlimited
Physician Services:	$25-$40 copayment per visit in-network, 80% after $25-$40 copayment per visit out-of-network
Hosptial Services:	80% after deductible in-network, 80% or 60% after deductible out-of-network
Retail Prescription Drugs (30-day supply):	$8 Generic, $20 Standard, $40 Tier 2, $70 Tier 3, $80 Tier 4
Mail Order Prescription Drugs (90-day supply):	$16 Generic, $40 Standard, $80 Tier 2, $140 Tier 3, $160 Tier 4

Section 8 – Monthly Premiums

Monthly Premiums – MMEHT Medical Plans

See Section 6 – Rationale for Assumptions for a description of the application of the monthly premiums disclosed below.

Monthly Premiums Effective July 1, 2021

Municipality[1]	POS A	POS C	POS 200	PPO 500	PPO 1500	PPO 2500
Auburn[2]		841.11	802.93	774.87	710.29	657.63
Bar Harbor[2]	1,223.10	1,076.34	1,024.73	990.82	903.26	832.87
Bath[2]		869.76	831.40	801.23	734.52	679.52
Biddeford		894.56			903.42	
Brewer		965.75		891.75		736.96
Brunswick	1,117.27	9,893.18			903.39	
Bucksport		1,118.55	1,064.91		920.63	
Buxton		1,118.55	1,064.91			
Caribou			1,120.05	1,083.09		
Camden		973.81				
Ellsworth[2]	957.16	889.53	849.54	819.84	750.73	700.48
Falmouth			808.56	779.40		641.95
Freeport[2]		856.99	817.76	788.16	722.28	668.10
Gardiner		959.49	1,111.82			840.80
Gorham[2]		970.20	923.18	889.71	813.72	752.55
Hallowell				1,029.68		
Hampden						841.33
Kennebec County	931.24	819.49		755.06		
Lewiston[2]		937.30	895.26	863.44	790.98	732.15
Lincoln County			1,097.74			869.95
Madawaska			1,064.91	1,029.68		840.80
Old Town						736.97
Oxford County[2]		953.19	909.88	877.93	804.02	744.24
Presque Isle[2]		972.90	927.25	894.55	819.09	757.76
Rockland		1,118.55				700.47
Saco	931.25			812.47		
Sanford[2]	1,315.27	1,157.44	1,101.33	1,062.08	971.39	898.35
Scarborough[2]	846.74	745.14	709.19	683.64	625.23	578.22
South Portland[2]	1,027.07	903.83	864.35	833.96	763.09	706.17
Washburn		1,118.55				
Wells		910.70		840.02	755.04	
Westbrook[2]		890.68	849.33	819.22	750.89	694.88
Windham				789.43		
Winslow		1,118.55	1,064.91	1,029.68		
Yarmouth					755.04	
York		1,014.38	967.98	933.68		

[1] For municipalites where premium information was unavailable, the highest premium of the other municipalities ($1,315.27) was used as an assumption.

[2] For municipalites where 2022 premium information was provided, the 2021 premium was set equal to the 2022 premium adjusted by the first year of assumed trend.

Section 8 – Monthly Premiums (Cont.)

Monthly Premiums – Non MMEHT Medical Plans

The premium rates below were used for this valuation.

Monthly Premiums Effective July 1, 2021

Municipality	Premium Rate
Bangor	1,153.85
Portland*	969.96

*Covered under State of Maine OPEB plan.

Section 9 – Summary of Participant Demographic Information

The table below presents a summary of the basic participant information as of June 30, 2021 for the active and inactive participants covered under the terms of the Plan. The participant data used in the valuation was provided by the State of Maine.

1.	Active participant characteristics		
	a.	Count	652
	b.	Average age	41.5
	c.	Average past service	14.32
2.	Inactive participant characteristics		
	a.	Count	128
	b.	Average age	59.46

The following table displays the distribution of Active participants by Age and Service.

	Service Group										
Age Group	<1	1-4	5-9	10-14	15-19	20-24	25-29	30-34	35-39	40+	All Years
0 - 24	31	29									60
25 - 29	19	42	18								79
30 - 34	14	23	35	10							82
35 - 39	2	17	26	18	11	1					75
40 - 44	7	9	8	17	19	15					75
45 - 49	1	2	3	7	19	36	18	1			87
50 - 54	2	1	2	6	11	36	26	19	1		104
55 - 59		1	2		2	8	11	24	10		58
60 - 64		1	2				1	12	11	5	32
Total	76	125	96	58	62	96	56	56	22	5	652

The following table displays the distribution of Inactive participants by Age.

Age Group	Count
Under 55	15
55-59	49
60-64	63
Over 65	0
Total	**127**

Section 9 – Summary of Participant Demographic Information (Cont.)

The following table displays the Participant Counts by Municipality:

Municipality	Actives	Retirees	Total
Alfred	1	0	1
Androscoggin Cnty.	1	0	1
Auburn	44	12	56
Augusta	8	0	8
Bangor*	48	26	74
Bar Harbor	0	1	1
Bath	12	4	16
Biddeford	5	3	8
Brewer	8	3	11
Brunswick	6	1	7
Bucksport	13	1	14
Buxton	2	0	2
Camden	0	1	1
Caribou	14	0	14
Cumberland Cnty.	24	0	24
Ellsworth	7	5	12
Falmouth	13	1	14
Farmington	4	0	4
Fort Fairfield	6	0	6
Fort Kent	1	0	1
Franklin Cnty.	7	0	7
Freeport	1	2	3
Gardiner	7	5	12
Gorham	4	1	5
Hallowell	1	1	2
Hampden	3	0	3
Houlton	3	0	3
Kennebec Cnty.	1	0	1
Kennebunk	4	0	4
Lewiston	22	10	32
Lincoln Cnty. Sheriff	6	0	6
Lisbon	1	0	1
Madawaska	2	1	3
North Berwick	6	0	6
Ogunquit	8	0	8

Municipality	Actives	Retirees	Total
Old Orchard Beach	24	0	24
Old Town	5	0	5
Oxford	15	1	16
Poland	1	0	1
Portland*	117	25	142
Presque Isle	5	0	5
Rockland	3	2	5
Rockport	1	0	1
Rumford	2	0	2
Saco	9	1	10
Sagadahoc Cnty. Sheriff*	6	0	6
Sanford	39	5	44
Scarborough	14	1	15
Somerset Cnty. Sheriff	8	0	8
South Portland	36	3	39
Washington Cnty.	1	0	1
Waterville	4	0	4
Wells	13	0	13
Westbrook	15	6	21
Windham	18	1	19
Winslow	1	1	2
Winthrop	2	0	2
Yarmouth	2	1	3
York	13	2	15
York Cnty.	5	0	5

Total	652	127	779

*These municipalities are not participating in MMEHT.

Section 9 – Summary of Participant Demographic Information (Cont.)

The following table displays the Retiree Coverage of Municipalities Participating in MMEHT 2021 Group Medical Plan Elections*

Municipality	MMEHT Medical Plans					
	POS A	POS C	POS 200	PPO 500	PPO 1500	PPO 2500
Auburn	0%	17%	0%	83%	0%	0%
Bar Harbor	0%	50%	0%	50%	0%	0%
Bath	0%	67%	0%	33%	0%	0%
Biddeford	0%	50%	0%	0%	50%	0%
Brewer	0%	67%	0%	0%	0%	33%
Brunswick	0%	0%	0%	0%	100%	0%
Bucksport	0%	100%	0%	0%	0%	0%
Camden	0%	100%	0%	0%	0%	0%
Ellsworth	20%	60%	0%	0%	0%	20%
Falmouth	0%	0%	100%	0%	0%	0%
Freeport	0%	100%	0%	0%	0%	0%
Gardiner	0%	40%	40%	0%	0%	20%
Gorham	0%	0%	0%	100%	0%	0%
Hallowell	0%	0%	0%	100%	0%	0%
Lewiston	0%	67%	0%	17%	0%	17%
Madawaska	0%	0%	100%	0%	0%	0%
Oxford County	0%	100%	0%	0%	0%	0%
Rockland	0%	0%	0%	0%	0%	100%
Saco	100%	0%	0%	0%	0%	0%
Sanford	0%	80%	0%	0%	0%	20%
Scarborough	0%	100%	0%	0%	0%	0%
South Portland	0%	67%	0%	33%	0%	0%
Westbrook	0%	20%	20%	60%	0%	0%
Windham	0%	0%	0%	100%	0%	0%
Winslow	0%	0%	0%	100%	0%	0%
Yarmouth	0%	0%	0%	0%	100%	0%
York	0%	50%	50%	0%	0%	0%

*Municipalities not shown did not have data available for elections, so all participants are assumed to select the highest cost plan. The table above shows the actual retiree elections for municipalities shown that had data available for elections.

Glossary

Brief explanations of terms used in this report or the accompanying GASB 75 results:

Annual OPEB Expense

The amount recognized by an employer in each accounting period for contributions to a defined benefit OPEB plan on the modified accrual basis of accounting.

Collective deferred outflows of resources and deferred inflows of resources related to OPEB

Deferred outflows of resources and deferred inflows of resources related to OPEB arising from certain changes in the collective net OPEB liability or collective total OPEB liability.

Covered Payroll

Annual compensation paid (or expected to be paid) to active employees covered by an OPEB plan, in aggregate.

Net OPEB liability (NOL)

The liability of employers and nonemployer contributing entities to plan members for benefits provided through a defined benefit OPEB plan that is administered through a trust that meets the criteria of the GASB No. 75 Statements.

Normal Cost or Service Cost

The portion of the Total Present Value of Future Benefits attributed to employee service during the current fiscal year by the actuarial cost method. These terms are used interchangeably.

Other Postemployment Benefits (OPEB)

Retiree health care benefits and post-employment benefits provided separately from a pension plan (excluding termination offers and benefits).

Plan Fiduciary Net Position (FNP)

Set equal to the market value of assets as of the measurement date

Present Value of Future Benefits (PVFB)

The value, as of the valuation date, of the projected benefits payable to all members for their accrued service and their expected future service, discounted to reflect the time value (present value) of money and adjusted for the probabilities of retirement, withdrawal, death and disability.

Total OPEB liability (TOL)

The portion of the actuarial present value of projected benefit payments that is attributed to past periods of member service in conformity with the GASB No. 75 Statements. The total OPEB liability is the liability of employers and nonemployer contributing entities to plan members for benefits provided through a defined benefit OPEB plan that is not administered through a trust that meets the criteria of the GASB No. 75 Statements.