

OCEAN CITY-WRIGHT FIRE CONTROL
DISTRICT FIREFIGHTERS' PENSION TRUST FUND
ACTUARIAL VALUATION
AS OF OCTOBER 1, 2024
CONTRIBUTIONS APPLICABLE TO THE
PLAN/FISCAL YEAR ENDING SEPTEMBER 30, 2026



November 26, 2024

Board of Trustees
Ocean City-Wright Fire Control
Firefighters' Pension Board

Re: Ocean City-Wright Fire Control District Firefighters' Pension Trust Fund

Dear Board:

We are pleased to present to the Board this report of the annual actuarial valuation of the Ocean City-Wright Fire Control District Firefighters' Pension Trust Fund. The valuation was performed to determine whether the assets and contributions are sufficient to provide the prescribed benefits and to develop the appropriate funding requirements for the applicable plan year. Use of the results for other purposes may not be applicable and may produce significantly different results.

The valuation has been conducted in accordance with generally accepted actuarial principles and practices, including the applicable Actuarial Standards of Practice as issued by the Actuarial Standards Board, and reflects laws and regulations issued to date pursuant to the provisions of Chapters 112 and 175, Florida Statutes, as well as applicable federal laws and regulations. In our opinion, the assumptions used in the valuation, as adopted by the Board of Trustees, represent reasonable expectations of anticipated plan experience.

The funding percentages and unfunded accrued liability as measured based on the actuarial value of assets will differ from similar measures based on the market value of assets. These measures, as provided, are appropriate for determining the adequacy of future contributions, but may not be appropriate for the purpose of settling a portion or all of its liabilities. Future actuarial measurements may differ significantly from the current measurements presented in this report for a variety of reasons including: changes in applicable laws, changes in plan provisions, changes in assumptions, or plan experience differing from expectations. Due to the limited scope of the valuation, we did not perform an analysis of the potential range of such future measurements.

In conducting the valuation, we have relied on personnel, plan design, and asset information supplied by the Ocean City-Wright Fire Control, financial reports prepared by the custodian bank, and the actuarial assumptions and methods described in the Actuarial Assumptions section of this report. While we cannot verify the accuracy of all this information, the supplied information was reviewed for consistency and reasonableness. As a result of this review, we have no reason to doubt the substantial accuracy of the information and believe that it has produced appropriate results. This information, along with any adjustments or modifications, is summarized in various sections of this report.

Additionally, we used third-party software to model (calculate) the underlying liabilities and costs. These results are reviewed in the aggregate and for individual sample lives. The output from the software is either used directly or input into internally developed models that apply the funding rules to generate the results. All internally developed models are reviewed as part of the valuation process. As a result of this review, we believe that the models have produced reasonable results. We do not believe there are any material inconsistencies among assumptions or unreasonable output produced due to the aggregation of assumptions.

In our opinion, the Minimum Required Contribution set forth in this report constitutes a reasonable actuarially determined contribution under Actuarial Standard of Practice No. 4.

The undersigned is familiar with the immediate and long-term aspects of pension valuations, and meets the Qualification Standards of the American Academy of Actuaries necessary to render the actuarial opinions contained herein. All of the sections of this report are considered an integral part of the actuarial opinions.

To our knowledge, no associate of Foster & Foster, Inc. working on valuations of the program has any direct financial interest or indirect material interest in the Ocean City-Wright Fire Control, nor does anyone at Foster & Foster, Inc. act as a member of the Board of Trustees of the District Firefighters' Pension Trust Fund. Thus, there is no relationship existing that might affect our capacity to prepare and certify this actuarial report.


If there are any questions, concerns, or comments about any of the items contained in this report, please contact us at 239-433-5500.

Respectfully submitted,

Foster & Foster, Inc.

A handwritten signature in blue ink, appearing to read "JL Griffin".

By: _____
Joseph L. Griffin, ASA, EA, MAAA
Enrolled Actuary #23-6938

By:  _____
Danny Ibele

JLG/DDI/lke

Enclosures

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SUMMARY OF REPORT

The regular annual actuarial valuation of the Ocean City-Wright Fire Control District Firefighters' Pension Trust Fund, performed as of October 1, 2024, has been completed and the results are presented in this Report. The contribution amounts set forth herein are applicable to the plan/fiscal year ending September 30, 2026.

The contribution requirements, compared with those set forth in the October 1, 2023 actuarial valuation report, are as follows:

Valuation Date Applicable to Fiscal Year Ending	10/1/2024 <u>9/30/2026</u>	10/1/2023 <u>9/30/2025</u>
Minimum Required Contribution % of Projected Annual Payroll	31.7%	33.8%
Member Contributions (Est.) % of Projected Annual Payroll	7.0%	7.0%
District And State Required Contribution % of Projected Annual Payroll	24.7%	26.8%
State Contribution (Est.) ¹ % of Projected Annual Payroll (Est.)	\$438,788 10.3%	\$438,788 10.3%
District Required Contribution (Est.) ² % of Projected Annual Payroll (Est.)	14.4%	16.5%

¹ Represents the amount received in calendar 2024. As per a Mutual Consent Agreement between the Membership and the District, all State Monies received each year will be available to offset the District's required contribution.

² The required contribution from the combination of District and State sources for the year ending September 30, 2026, is 24.7% of the actual payroll realized in that year. As a budgeting tool, the District may contribute 14.4% of each Member's Salary and then make a one-time adjustment to account for the actual State Monies received.

As you can see, the Minimum Required Contribution shows decrease when compared to the results set forth in the October 1, 2023 actuarial valuation report. The decrease is attributable to better than expected investment return.

Plan experience was favorable overall on the basis of the plan's actuarial assumptions. The primary source of actuarial gain was an investment return of 10.61% (Actuarial Asset Basis) which exceeded the 6.80% assumption. There were no significant sources of actuarial loss.

CHANGES SINCE PRIOR VALUATION

Plan Changes

There have been no changes in benefits since the prior valuation.

Actuarial Assumption/Method Changes

The salary increase rates for fiscal 2025 were based on the pay scale that went into effect on October 10, 2024. For fiscal years after 2025, the salary increase rates were updated to the following based on a review of the past 10 years.

Salary Scale	
Service	Rate
0-4	10.50%
5-9	6.00%
10-19	5.75%
20+	3.50%

CONTRIBUTION IMPACT OF ANNUAL CHANGES

(1) Contribution Determined as of October 1, 2023	17.6%
(2) Summary of Contribution Impact by component:	
Change in State Contribution Percentage	-1.1%
Change in Normal Cost Rate	0.1%
Change in Administrative Expense Percentage	0.0%
Payroll Change Effect on UAAL Amortization	0.7%
Investment Return (Actuarial Asset Basis)	-1.9%
Salary Increases	-1.6%
Active Decrements	0.6%
Rehired Member Who Had Been Eligible for Refund Only	0.1%
Inactive Mortality	0.1%
UAAL Amortization Impact from Contribution Policy	-2.1%
Assumption Change	1.7%
Other	<u>0.2%</u>
Total Change in Contribution	-3.2%
(3) Contribution Determined as of October 1, 2024	14.4%

COMPARATIVE SUMMARY OF PRINCIPAL VALUATION RESULTS

	New Assump <u>10/1/2024</u>	Old Assump <u>10/1/2024</u>	<u>10/1/2023</u>
A. Participant Data			
Actives	53	53	52
Service Retirees	25	25	24
Beneficiaries	1	1	1
Disability Retirees	2	2	2
Terminated Vested	<u>10</u>	<u>10</u>	<u>12</u>
Total	91	91	91
Projected Annual Payroll	4,245,842	3,966,376	4,137,217
Annual Rate of Payments to:			
Service Retirees	1,441,555	1,441,555	1,342,935
Beneficiaries	25,619	25,619	25,619
Disability Retirees	35,909	35,909	35,909
Terminated Vested	104,515	104,515	110,106
B. Assets			
Actuarial Value (AVA) ¹	24,323,471	24,323,471	21,343,779
Market Value (MVA) ¹	27,518,894	27,518,894	20,627,617
C. Liabilities			
Present Value of Benefits			
Actives			
Retirement Benefits	14,164,610	12,826,573	12,967,375
Disability Benefits	407,849	375,298	378,362
Death Benefits	77,280	70,504	70,654
Vested Benefits	2,391,564	2,179,369	2,163,378
Refund of Contributions	360,813	354,297	359,906
Service Retirees	17,196,645	17,196,645	16,468,670
Beneficiaries	179,017	179,017	186,516
Disability Retirees	514,934	514,934	516,554
Terminated Vested	613,969	613,969	628,947
Share Plan Balances ¹	<u>0</u>	<u>0</u>	<u>0</u>
Total	35,906,681	34,310,606	33,740,362

C. Liabilities - (Continued)	New Assump <u>10/1/2024</u>	Old Assump <u>10/1/2024</u>	<u>10/1/2023</u>
Present Value of Future Salaries	37,534,192	34,558,196	36,263,143
Present Value of Future Member Contributions	2,627,393	2,419,074	2,538,420
Normal Cost (Retirement)	606,483	551,900	581,601
Normal Cost (Disability)	28,303	26,742	27,050
Normal Cost (Death)	4,093	3,783	3,935
Normal Cost (Vesting)	140,024	129,606	130,596
Normal Cost (Refunds)	<u>52,633</u>	<u>51,779</u>	<u>47,981</u>
Total Normal Cost	831,536	763,810	791,163
Present Value of Future Normal Costs	7,063,468	6,369,254	6,659,022
Accrued Liability (Retirement)	8,770,476	7,992,524	7,899,831
Accrued Liability (Disability)	155,304	141,221	140,342
Accrued Liability (Death)	43,039	39,549	37,942
Accrued Liability (Vesting)	1,258,360	1,152,214	1,086,980
Accrued Liability (Refunds)	111,469	111,279	115,558
Accrued Liability (Inactives)	18,504,565	18,504,565	17,800,687
Share Plan Balances ¹	<u>0</u>	<u>0</u>	<u>0</u>
Total Actuarial Accrued Liability (EAN AL)	28,843,213	27,941,352	27,081,340
Unfunded Actuarial Accrued Liability (UAAL)	4,519,742	3,617,881	5,737,561
Funded Ratio (AVA / EAN AL)	84.3%	87.1%	78.8%

D. Actuarial Present Value of Accrued Benefits	New Assump <u>10/1/2024</u>	Old Assump <u>10/1/2024</u>	<u>10/1/2023</u>
Vested Accrued Benefits			
Inactives + Share Plan Balances ¹	18,504,565	18,504,565	17,800,687
Actives	2,588,311	2,588,140	2,785,728
Member Contributions	<u>1,367,442</u>	<u>1,367,442</u>	<u>1,239,383</u>
Total	22,460,318	22,460,147	21,825,798
Non-vested Accrued Benefits	<u>1,553,797</u>	<u>1,491,725</u>	<u>1,191,538</u>
Total Present Value			
Accrued Benefits (PVAB)	24,014,115	23,951,872	23,017,336
Funded Ratio (MVA / PVAB)	114.6%	114.9%	89.6%
Increase (Decrease) in Present Value of Accrued Benefits Attributable to:			
Plan Amendments	0	0	
Assumption Changes	62,243	0	
Plan Experience	0	965,108	
Benefits Paid	0	(1,543,279)	
Interest	0	1,512,707	
Other	<u>0</u>	<u>0</u>	
Total	62,243	934,536	

	New Assump	Old Assump	
Valuation Date	10/1/2024	10/1/2024	10/1/2023
Applicable to Fiscal Year Ending	<u>9/30/2026</u>	<u>9/30/2026</u>	<u>9/30/2025</u>

E. Pension Cost

Normal Cost (with interest) % of Projected Annual Payroll ²	20.3	19.9	19.8
Administrative Expenses (with interest) % of Projected Annual Payroll ²	0.9	1.0	1.0
Payment Required to Amortize Unfunded Actuarial Accrued Liability over 27 years (as of 10/1/2024, with interest) % of Projected Annual Payroll ²	10.5	9.1	13.0
Minimum Required Contribution % of Projected Annual Payroll ²	31.7	30.0	33.8
Expected Member Contributions % of Projected Annual Payroll ²	7.0	7.0	7.0
Expected District and State Contribution % of Projected Annual Payroll ²	24.7	23.0	26.8

F. Past Contributions

Plan Years Ending:	<u>9/30/2024</u>
Total Required Contribution	1,342,674
District and State Requirement	1,074,139
Actual Contributions Made:	
Members (excluding buyback)	268,535
District	1,558,213
State	438,788
Total	<u>2,265,536</u>

G. Net Actuarial (Gain)/Loss (1,031,295)

¹ The asset values and liabilities include accumulated Share Plan Balances as of 9/30/2024 and 9/30/2023.

² Contributions developed as of 10/1/2024 are expressed as a percentage of Projected Annual Payroll at 10/1/2024 of \$4,245,842 after assumption changes and of \$3,966,376

H. Schedule Illustrating the Amortization of the Total Unfunded Actuarial Accrued Liability as of:

<u>Year</u>	<u>Projected Unfunded Actuarial Accrued Liability</u>
2024	4,519,742
2025	4,368,111
2026	4,196,537
2032	2,652,678
2039	60,512
2045	0
2051	0

I. (i) 5 Year Comparison of Actual and Assumed Salary Increases

	<u>Actual</u>	<u>Assumed</u>
Year Ended 9/30/2024	-2.73%	7.56%
Year Ended 9/30/2023	16.77%	7.41%
Year Ended 9/30/2022	11.57%	7.05%
Year Ended 9/30/2021	14.01%	7.36%
Year Ended 9/30/2020	7.57%	7.70%

(ii) 5 Year Comparison of Investment Return on Market Value and Actuarial Value

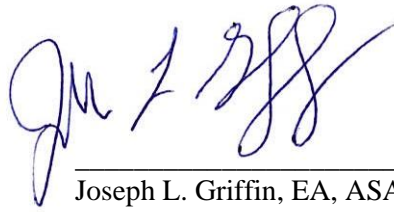
	<u>Market Value</u>	<u>Actuarial Value</u>	<u>Assumed</u>
Year Ended 9/30/2024	30.04%	10.61%	6.80%
Year Ended 9/30/2023	14.90%	6.95%	6.80%
Year Ended 9/30/2022	-15.03%	4.29%	7.00%
Year Ended 9/30/2021	17.89%	11.93%	7.25%
Year Ended 9/30/2020	13.68%	11.50%	7.25%

(iii) Average Annual Payroll Growth

(a) Payroll as of:	10/1/2024	\$4,245,842
	10/1/2014	1,916,330
(b) Total Increase		121.56%
(c) Number of Years		10.00
(d) Average Annual Rate		8.28%

STATEMENT BY ENROLLED ACTUARY

This actuarial valuation was prepared and completed by me or under my direct supervision, and I acknowledge responsibility for the results. To the best of my knowledge, the results are complete and accurate, and in my opinion, the techniques and assumptions used are reasonable and meet the requirements and intent of Part VII, Chapter 112, Florida Statutes. There is no benefit or expense to be provided by the plan and/or paid from the plan's assets for which liabilities or current costs have not been established or otherwise taken into account in the valuation. All known events or trends which may require a material increase in plan costs or required contribution rates have been taken into account in the valuation.



Joseph L. Griffin, EA, ASA, MAAA
Enrolled Actuary #23-6938

Please let us know when the report is approved by the Board and unless otherwise directed we will provide copies of the report to the following offices to comply with Chapter 112 Florida Statutes:

Mr. Keith Brinkman
Bureau of Local
Retirement Systems
Post Office Box 9000
Tallahassee, FL 32315-9000

Mr. Steve Bardin
Municipal Police and Fire
Pension Trust Funds
Division of Retirement
Post Office Box 3010
Tallahassee, FL 32315-3010

RECONCILIATION OF UNFUNDED ACTUARIAL ACCRUED LIABILITIES

(1) Unfunded Actuarial Accrued Liability as of October 1, 2023	\$5,737,561
(2) Sponsor Normal Cost developed as of October 1, 2023	501,558
(3) Expected administrative expenses for the year ended September 30, 2024	39,332
(4) Expected interest on (1), (2) and (3)	425,597
(5) Sponsor contributions to the System during the year ended September 30, 2024	1,997,001
(6) Expected interest on (5)	57,871
(7) Expected Unfunded Actuarial Accrued Liability as of September 30, 2024 (1)+(2)+(3)+(4)-(5)-(6)	4,649,176
(8) Change to UAAL due to Assumption Change	901,861
(9) Change to UAAL due to Actuarial (Gain)/Loss	(1,031,295)
(10) Unfunded Actuarial Accrued Liability as of October 1, 2024	4,519,742

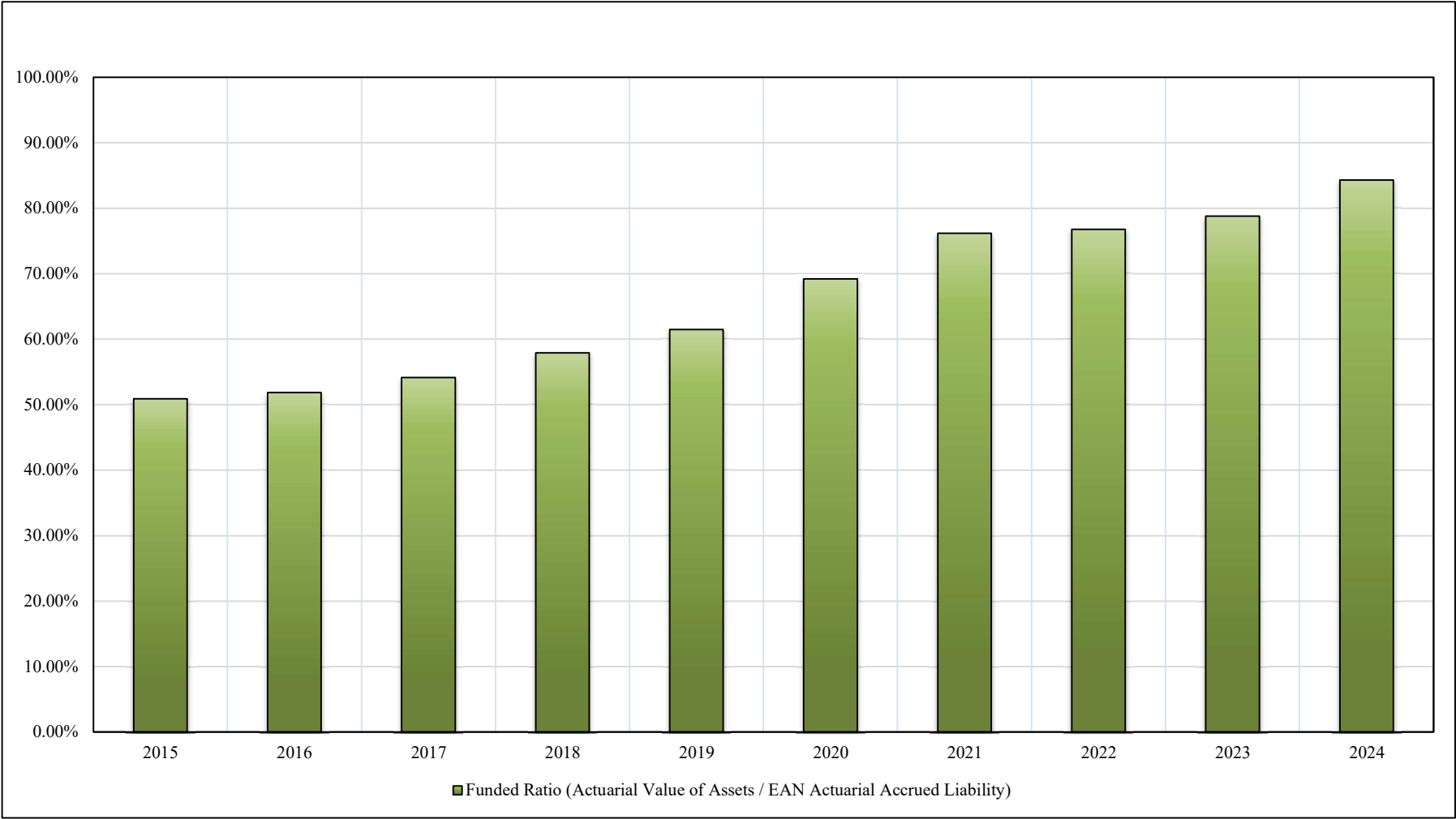
<u>Type of Base</u>	<u>Date Established</u>	<u>Years Remaining</u>	<u>10/1/2024 Amount</u>	<u>Amortization Amount</u>
Initial Base	10/1/2004	20	1,781,931	132,135
Benefit Change	10/1/2005	11	32,527	3,666
Method Change	10/1/2006	12	172,653	18,208
Prior Losses	10/1/2006	12	172,653	18,208
Benefit Change	10/1/2006	12	541,554	57,113
Actuarial Gain	10/1/2007	13	(305,773)	(30,380)
Benefit Change	10/1/2007	13	83,019	8,248
Actuarial Loss	10/1/2008	14	1,157,084	108,933
Method Change	10/1/2008	14	(322,552)	(30,366)
Actuarial Loss	10/1/2009	15	696,005	62,397
Actuarial Gain	10/1/2010	16	(26,886)	(2,305)
Assum. Changes	10/1/2010	16	342,667	29,379
Actuarial Loss	10/1/2011	17	359,345	29,575
Actuarial Gain	10/1/2012	18	(231,569)	(18,356)
Actuarial Gain	10/1/2013	19	(493,559)	(37,790)
Actuarial Gain	10/1/2014	20	(250,741)	(18,593)
Benefit Change	10/1/2014	20	(158,946)	(11,786)
Actuarial Gain	10/1/2015	21	(27,118)	(1,952)
Actuarial Loss	10/1/2016	22	136,746	9,575

Type of <u>Base</u>	Date <u>Established</u>	Years <u>Remaining</u>	10/1/2024 <u>Amount</u>	Amortization <u>Amount</u>
Assum. Changes	10/1/2016	22	191,979	13,443
Benefit Change	10/1/2016	22	37,683	2,639
Actuarial Gain	10/1/2017	23	(102,045)	(6,964)
Assum. Changes	10/1/2017	23	245,582	16,761
Benefit Change	10/1/2017	23	55,201	3,767
Actuarial Gain	10/1/2018	24	(399,516)	(26,621)
Assum. Changes	10/1/2018	24	291,346	19,413
Benefit Change	10/1/2018	24	(610)	(41)
Actuarial Loss	10/1/2019	25	45,714	2,979
Actuarial Gain	10/1/2020	26	(375,671)	(23,971)
Assump Change	10/1/2020	26	(179,556)	(11,457)
Actuarial Gain	10/1/2021	27	(758,629)	(47,467)
Assump Change	10/1/2021	27	408,144	25,538
Actuarial Loss	10/1/2022	13	425,424	42,268
Assump Change	10/1/2022	13	214,557	21,317
Actuarial Loss	10/1/2023	14	890,533	83,839
Actuarial Gain	10/1/2024	15	(1,031,295)	(92,455)
Assump Change	10/1/2024	15	901,861	80,851
			<u>4,519,742</u>	<u>429,748</u>

DETAILED ACTUARIAL (GAIN)/LOSS ANALYSIS

(1) Unfunded Actuarial Accrued Liability (UAAL) as of October 1, 2023	\$5,737,561
(2) Expected UAAL as of October 1, 2024	4,649,176
 (3) Summary of Actuarial (Gain)/Loss, by component:	
Investment Return (Actuarial Asset Basis)	(825,956)
Salary Increases	(695,768)
Active Decrements	256,949
New Hires	28,622
Inactive Mortality	64,049
Other	<u>140,809</u>
Increase in UAAL due to (Gain)/Loss	(1,031,295)
Assumption Changes	<u>901,861</u>
(4) Actual UAAL as of October 1, 2024	\$4,519,742

HISTORY OF FUNDING PROGRESS



ACTUARIAL ASSUMPTIONS AND METHODS

Mortality Rate

Healthy Active Lives:

Female: PubS.H-2010 (Below Median) for Employees, set forward one year.

Male: PubS.H-2010 (Below Median) for Employees, set forward one year.

Healthy Retiree Lives:

Female: PubS.H-2010 for Healthy Retirees, set forward one year.

Male: PubS.H-2010 (Below Median) for Healthy Retirees, set forward one year.

Beneficiary Lives:

Female: PubG.H-2010 (Below Median) for Healthy Retirees.

Male: PubG.H-2010 (Below Median) for Healthy Retirees, set back one year.

Disabled Lives:

80% PubG.H-2010 for Disabled Retirees / 20% PubS.H-2010 for Disabled Retirees.

All rates for healthy lives are projected generationally with Mortality Improvement Scale MP-2018. We feel this assumption sufficiently accommodates future mortality improvements.

The previously described mortality assumption rates were mandated by Chapter 2015-157, Laws of Florida. This law mandates the use of the assumptions used in either of the two most recent valuations of the Florida Retirement System (FRS). The above rates are those outlined in Milliman's July 1, 2021 FRS valuation report for special risk employees, with appropriate adjustments made based on plan demographics.

Interest Rate

6.80% per year compounded annually, net of investment related expenses. This is supported by the target asset allocation of the trust and the expected long-term return by asset class.

Salary Increases

See table later in this section. This assumption was adopted in conjunction with the experience study dated June 6, 2022. Projected salary at retirement is increased based on individual accruals (as provided by the District) to account for non-regular pay.

Payroll Growth

2.10% for purposes of amortizing the Unfunded Actuarial Accrued Liability. This assumption cannot exceed the ten-year average payroll growth, in compliance with Part VII of Chapter 112, Florida Statutes.

Administrative Expenses

\$38,181 annually, based on the average of actual expenses incurred in the prior two fiscal years.

Amortization Method

New UAAL amortization bases are amortized over 15 years.

Bases established prior to the valuation date are adjusted proportionally to match the Expected Unfunded Actuarial Accrued Liability as of the valuation date, in order to align prior year bases with the portion of the current year UAAL associated with prior year sources.

Funding Method

Entry Age Normal Actuarial Cost Method. The following loads are applied for determining the minimum required contribution:

Interest - A half year, based on current 6.80% assumption.

Salary - None.

Retirement

See tables later in this section. This assumption was adopted in conjunction with the experience study dated June 6, 2022.

Disability Rate

See table on the following page (1201 times 2). It is assumed that 90% of disablements are service related. This assumption was adopted in conjunction with the experience study dated June 6, 2022.

Termination Rate

See table on the following page. This assumption was adopted in conjunction with the experience study dated June 6, 2022.

Actuarial Asset Method

Each year, the prior Actuarial Value of Assets is brought forward utilizing the historical geometric four-year average Market Value return (net of fees). It is possible that over time this technique will produce an insignificant bias above or below Market Value of Assets.

Low-Default-Risk Obligation Measure

Based on the Entry Age Normal Actuarial Cost Method and an interest rate of 4.06% per year compounded annually, net of investment related expenses. This rate is consistent with the Yield to Maturity of the S&P Municipal Bond 20-Year High Grade Rate Index as of September 30, 2024. All other assumptions for the Low-Default-Risk Obligation Measure are consistent with the assumptions shown in this section unless otherwise noted.

Assumption Tables

<u>% Terminating During the Year</u>		<u>% Becoming Disabled During the Year</u>		<u>Salary Scale</u>	
<u>Age</u>	<u>Rate</u>	<u>Age</u>	<u>Rate</u>	<u>Service</u>	<u>Rate</u>
< 30	12.0%	20	0.06%	0-4	10.50%
30-39	9.0%	25	0.06%	5-9	6.00%
40-44	5.0%	30	0.08%	10-19	5.75%
45+	3.0%	35	0.10%	20+	3.50%
		40	0.14%		
		45	0.20%		
		50	0.36%		
		55	0.72%		
		60	1.80%		
		65	4.44%		

<u>% Retiring During the Year (10-24 Years of Service)</u>		<u>% Retiring During the Year (>= 25 Years of Service)</u>	
<u>Age</u>	<u>Rate</u>	<u>Age</u>	<u>Rate</u>
50-54	10.0%	25	66.7%
55+	100.0%	26	100.0%

GLOSSARY

Actuarial Value of Assets is the asset value used in the valuation to determine contribution requirements. It represents the plan's Market Value of Assets (see below), with adjustments according to the plan's Actuarial Asset Method. These adjustments produce a "smoothed" value that is likely to be less volatile from year to year than the Market Value of Assets.

Entry Age Normal Cost Method - Under this method, the normal cost is the sum of the individual normal costs for all active participants. For an active participant, the normal cost is the participant's normal cost accrual rate, multiplied by the participant's current compensation.

(a) The normal cost accrual rate equals:

(i) the present value of future benefits for the participant, determined as of the participant's entry age, divided by

(ii) the present value of the compensation expected to be paid to the participant for each year of the participant's anticipated future service, determined as of the participant's entry age.

(b) In calculating the present value of future compensation, the salary scale is applied both retrospectively and prospectively to estimate compensation in years prior to and subsequent to the valuation year based on the compensation used for the valuation.

(c) The accrued liability is the sum of the individual accrued liabilities for all participants and beneficiaries. A participant's accrued liability equals the present value, at the participant's attained age, of future benefits less the present value at the participant's attained age of the individual normal costs payable in the future. A beneficiary's accrued liability equals the present value, at the beneficiary's attained age, of future benefits. The unfunded accrued liability equals the total accrued liability less the actuarial value of assets.

(d) Under this method, the entry age used for each active participant is the participant's age at the time he or she would have commenced participation if the plan had always been in existence under current terms, or the age as of which he or she first earns service credits for purposes of benefit accrual under the current terms of the plan.

Market Value of Assets is the fair market value of plan assets as of the valuation date. This amount may be adjusted to produce an Actuarial Value of Assets for plan funding purposes.

Normal (Current Year's) Cost is the current year's cost for benefits yet to be funded. Under the Entry Age Normal cost method, it is determined for each participant as the present value of future benefits, determined as of the Member's entry age, amortized as a level percentage of compensation over the anticipated number of years of participation, determined as of the entry age.

Payroll Under Assumed Ret. Age is the projected annual rate of pay for the fiscal year beginning on the valuation date of all covered Members, excluding any Members who are assumed to retire with 100% probability on the valuation date.

Projected Annual Payroll is the projected annual rate of pay for the fiscal year following the fiscal year beginning on the valuation date of all covered Members.

Present Value of Benefits is the single sum value on the valuation date of all future benefits to be paid to current plan participants.

Total Annual Payroll is the projected annual rate of pay for the fiscal year beginning on the valuation date of all covered Members.

Total Required Contribution is equal to the Normal Cost plus an amount sufficient to amortize the Unfunded Accrued Liability over no more than 30 years. The required amount is adjusted for interest according to the timing of contributions during the year.

Unfunded Actuarial Accrued Liability (UAAL) is the difference between the actuarial accrued liability (described above) and the Actuarial Value of Assets. Under the Entry Age Normal Actuarial Cost Method, an actuarial gain or loss, based on actual versus expected UAAL, is determined in conjunction with each valuation of the plan.

DISCUSSION OF RISK

ASOP No. 51, Assessment and Disclosure of Risk Associated with Measuring Pension Obligations and Determining Pension Plan Contributions, states that the actuary should identify risks that, in the actuary's professional judgment, may reasonably be anticipated to significantly affect the plan's future financial condition.

Throughout this report, actuarial results are determined using various actuarial assumptions. These results are based on the premise that all future plan experience will align with the plan's actuarial assumptions; however, there is no guarantee that actual plan experience will align with the plan's assumptions. It is possible that actual plan experience will differ from anticipated experience in an unfavorable manner that will negatively impact the plan's funded position.

Below are examples of ways in which plan experience can deviate from assumptions and the potential impact of that deviation. Typically, this results in an actuarial gain or loss representing the current-year financial impact on the plan's unfunded liability of the experience differing from assumptions; this gain or loss is amortized over a period of time determined by the plan's amortization method. When assumptions are selected that adequately reflect plan experience, gains and losses typically offset one another in the long term, resulting in a relatively low impact on the plan's contribution requirements associated with plan experience. When assumptions are too optimistic, losses can accumulate over time and the plan's amortization payment could potentially grow to an unmanageable level.

- Investment Return: When the rate of return on the Actuarial Value of Assets falls short of the assumption, this produces a loss representing assumed investment earnings that were not realized. Further, it is unlikely that the plan will experience a scenario that matches the assumed return in each year as capital markets can be volatile from year to year. Therefore, contribution amounts can vary in the future.
- Salary Increases: When a plan participant experiences a salary increase that was greater than assumed, this produces a loss representing the cost of an increase in anticipated plan benefits for the participant as compared to the previous year. The total gain or loss associated with salary increases for the plan is the sum of salary gains and losses for all active participants.
- Payroll Growth: The plan's payroll growth assumption, if one is used, causes a predictable annual increase in the plan's amortization payment in order to produce an amortization payment that remains constant as a percentage of payroll if all assumptions are realized. If payroll increases less than the plan's payroll growth assumption, the plan's amortization payment can increase significantly as a percentage of payroll even if all assumptions other than the payroll growth assumption are realized.
- Demographic Assumptions: Actuarial results take into account various potential events that could happen to a plan participant, such as retirement, termination, disability, and death. Each of these potential events is assigned a liability based on the likelihood of the event and the financial consequence of the event for the plan. Accordingly, actuarial liabilities reflect a blend of financial consequences associated with various possible outcomes (such as retirement at one of various possible ages). Once the outcome is known (e.g. the participant retires) the liability is adjusted to reflect the known outcome. This adjustment produces a gain or loss depending on whether the outcome was more or less favorable than other outcomes that could have occurred.

Impact of Plan Maturity on Risk

For newer pension plans, most of the participants and associated liabilities are related to active members who have not yet reached retirement age. As pension plans continue in operation and active members reach retirement ages, liabilities begin to shift from being primarily related to active members to being shared amongst active and retired members. Plan maturity is a measure of the extent to which this shift has occurred. It is important to understand that plan maturity can have an impact on risk tolerance and the overall risk characteristics of the plan. For example, closed plans with a large amount of retired liability do not have as long of a time horizon to recover from losses (such as losses on investments due to lower than expected investment returns) as plans where the majority of the liability is attributable to active members. For this reason, less tolerance for investment risk may be warranted for highly mature closed plans with a substantial inactive liability. Similarly, mature closed plans paying substantial retirement benefits resulting in a small positive or net negative cash flow can be more sensitive to near term investment volatility, particularly if the size of the fund is shrinking, which can result in less assets being available for investment in the market.

To assist with determining the maturity of the plan, we have provided some relevant metrics in the table following titled “Plan Maturity Measures and Other Risk Metrics”. Highlights of this information are discussed below:

- The Support Ratio, determined as the ratio of active to inactive members, has decreased from 212.5% on October 1, 2014 to 165.6% on October 1, 2024, indicating that the plan has been maturing during the period.
- The Accrued Liability Ratio, determined as the ratio of the Inactive Accrued Liability, which is the liability associated with members who are no longer employed but are due a benefit from the plan, to the Total Accrued Liability, is 64.2%. With a plan of this maturity, losses due to lower than expected investment returns or demographic factors may result in larger increases in contribution requirements than would be needed for a less mature plan. Please note Chapter 112, Florida Statutes, requires that the plan sponsor contributes the minimum required contribution; thus, there is minimal solvency risk to the plan.
- The Funded Ratio, determined as the ratio of the Actuarial Value of Assets to the Total Accrued Liability, has increased from 46.7% on October 1, 2014 to 84.3% on October 1, 2024.
- The Net Cash Flow Ratio, determined as the ratio of the Net Cash Flow (contributions minus benefit payments and administrative expenses) to the Market Value of Assets, decreased from 5.9% on October 1, 2014 to 2.5% on October 1, 2024. The current Net Cash Flow Ratio of 2.5% indicates that contributions are generally in excess of the plan's benefit payments and administrative expenses.

Low Default-Risk Obligation Measure

ASOP No. 4, Measuring Pension Obligations and Determining Pension Plan Costs or Contributions, was revised as of December 2021 to include a “low-default-risk obligation measure” (LDROM). This liability measure is consistent with the determination of the actuarial accrued liability shown on page 10 in terms of member data, plan provisions, and assumptions/methods, under the Entry Age Normal Cost Method, except that the interest rate is tied to low-default-risk fixed income securities. The S&P Municipal Bond 20 Year High Grade Rate Index (daily rate closest to, but not later than, the measurement date) was selected to represent a current market rate of low risk but longer-term investments that could be included in a low-risk asset portfolio. The interest rate used in this valuation was 4.06%, resulting in an LDROM of \$42,156,181. The LDROM should not be considered the “correct” liability measurement; it simply shows a possible outcome if the Board elected to hold a very low risk asset portfolio. The Board actually invests the pension plan’s contributions in a diversified portfolio of stocks and bonds and other investments with the objective of maximizing investment returns at a reasonable level of risk. Consequently, the difference between the plan’s Actuarial Accrued Liability disclosed earlier in this section and the LDROM can be thought of as representing the expected taxpayer savings from investing in the plan’s diversified portfolio compared to investing only in high quality bonds.

The actuarial valuation reports the funded status and develops contributions based on the expected return of the plan’s investment portfolio. If instead, the plan switched to investing exclusively in high quality bonds, the LDROM illustrates that reported funded status would be lower (which also implies that the Actuarially Determined Contributions would be higher), perhaps significantly. Unnecessarily high contribution requirements in the near term may not be affordable and could imperil plan sustainability and benefit security.

It is important to note that the actuary has identified the risks above as the most significant risks based on the characteristics of the plan and the nature of the project, however, it is not an exhaustive list of potential risks that could be considered. Additional advanced modeling, as well as the identification of additional risks, can be provided at the request of the audience addressed on page 2 of this report.

PLAN MATURITY MEASURES AND OTHER RISK METRICS

	<u>10/1/2024</u>	<u>10/1/2023</u>	<u>10/1/2019</u>	<u>10/1/2014</u>
<u>Support Ratio</u>				
Total Actives	53	52	53	34
Total Inactives ¹	32	31	26	16
Actives / Inactives ¹	165.6%	167.7%	203.8%	212.5%
<u>Asset Volatility Ratio</u>				
Market Value of Assets (MVA)	27,518,894	20,627,617	13,996,773	8,166,018
Total Annual Payroll	4,245,842	4,137,217	2,994,265	1,916,330
MVA / Total Annual Payroll	648.1%	498.6%	467.5%	426.1%
<u>Accrued Liability (AL) Ratio</u>				
Inactive Accrued Liability	18,504,565	17,800,687	14,225,610	7,186,589
Total Accrued Liability (EAN)	28,843,213	27,081,340	22,046,020	16,069,606
Inactive AL / Total AL	64.2%	65.7%	64.5%	44.7%
<u>Funded Ratio</u>				
Actuarial Value of Assets (AVA)	24,323,471	21,343,779	13,558,608	7,501,952
Total Accrued Liability (EAN)	28,843,213	27,081,340	22,046,020	16,069,606
AVA / Total Accrued Liability (EAN)	84.3%	78.8%	61.5%	46.7%
<u>Net Cash Flow Ratio</u>				
Net Cash Flow ²	679,589	760,303	268,548	485,847
Market Value of Assets (MVA)	27,518,894	20,627,617	13,996,773	8,166,018
Ratio	2.5%	3.7%	1.9%	5.9%

¹ Excludes terminated participants awaiting a refund of member contributions.

² Determined as total contributions minus benefit payments and administrative expenses.

PARTIAL HISTORY OF PREMIUM TAX REFUNDS

<u>Received During Fiscal Year</u>	<u>Amount</u>	<u>Increase from Previous Year</u>
2005	23,346.92	N/A
2006	81,748.84	250.1%
2007	117,833.20	44.1%
2008	240,958.80	104.5%
2009	267,235.56	10.9%
2010	208,041.34	-22.2%
2011	212,600.02	2.2%
2012	261,902.86	23.2%
2013	256,099.63	-2.2%
2014	271,574.54	6.0%
2015	293,053.63	7.9%
2016	296,666.27	1.2%
2017	281,984.74	-4.9%
2018	243,013.78	-13.8%
2019	260,766.27	7.3%
2020	287,907.20	10.4%
2021	341,369.51	18.6%
2022	369,467.43	8.2%
2023	380,219.21	2.9%
2024	438,788.14	15.4%

STATEMENT OF FIDUCIARY NET POSITION
SEPTEMBER 30, 2024

<u>ASSETS</u>	COST VALUE	MARKET VALUE
Cash and Cash Equivalents:		
Short Term Investments	1,835,606.80	1,835,606.80
Cash	2,706.80	2,706.80
Total Cash and Equivalents	1,838,313.60	1,838,313.60
Receivables:		
Member Contributions in Transit	10,652.60	10,652.60
District Contributions in Transit	57,828.08	57,828.08
Custodial Correction of Fees	3,925.00	3,925.00
Investment Income	48,799.76	48,799.76
Total Receivable	121,205.44	121,205.44
Investments:		
Corporate Bonds	5,451,323.04	5,537,649.67
Stocks	10,738,013.84	20,029,035.55
Total Investments	16,189,336.88	25,566,685.22
Total Assets	18,148,855.92	27,526,204.26
<u>LIABILITIES</u>		
Payables:		
Refunds of Member Contributions	2,219.13	2,219.13
Investment Expenses	5,091.34	5,091.34
Total Liabilities	7,310.47	7,310.47
NET POSITION RESTRICTED FOR PENSIONS	18,141,545.45	27,518,893.79

STATEMENT OF CHANGES IN FIDUCIARY NET POSITION
FOR THE YEAR ENDED SEPTEMBER 30, 2024
Market Value Basis

ADDITIONS

Contributions:

Member	268,534.86
District	1,558,212.87
State	438,788.14

Total Contributions 2,265,535.87

Investment Income:

Net Realized Gain (Loss)	1,087,358.99
Unrealized Gain (Loss)	4,845,621.98
Net Increase in Fair Value of Investments	5,932,980.97
Interest & Dividends	409,464.48
Less Investment Expense ¹	(130,757.88)

Net Investment Income 6,211,687.57

Total Additions 8,477,223.44

DEDUCTIONS

Distributions to Members:

Benefit Payments	1,478,392.76
Lump Sum DROP Distributions	0.00
Refunds of Member Contributions	64,886.19

Total Distributions 1,543,278.95

Administrative Expense 42,667.77

Total Deductions 1,585,946.72

Net Increase in Net Position 6,891,276.72

NET POSITION RESTRICTED FOR PENSIONS

Beginning of the Year 20,627,617.07

End of the Year 27,518,893.79

¹Investment related expenses include investment advisory, custodial and performance monitoring fees.

ACTUARIAL ASSET VALUATION
SEPTEMBER 30, 2024

Actuarial Assets for funding purposes are developed by increasing the Actuarial Assets used in the most recent actuarial valuation of the Fund by the average annual market value rate of return (net of investment related expenses) for the past four years. Actuarial Assets shall not be less than 80% nor greater than 120% of Market Value of Assets.

Details of the derivation are set forth as follows:

Plan Year End	Rate of Return ¹	
09/30/2021	17.89%	
09/30/2022	-15.03%	
09/30/2023	14.90%	
09/30/2024	30.04%	
Annualized Rate of Return for prior four (4) years:		10.61%
(A) 10/01/2023 Actuarial Assets:		\$21,343,779.12
(I) Net Investment Income:		
1. Interest and Dividends	409,464.48	
2. Realized Gain (Loss)	1,087,358.99	
3. Unrealized Gain (Loss)	4,845,621.98	
4. Change in Actuarial Value	(3,911,584.95)	
5. Investment Related Expenses	(130,757.88)	
Total		2,300,102.62
(B) 10/01/2024 Actuarial Assets:		\$24,323,470.89
Actuarial Asset Rate of Return = $2I/(A+B-I)$, based on Unlimited Actuarial Assets:		10.61%
10/01/2024 Limited Actuarial Assets		\$24,323,470.89
10/01/2024 Market Value of Assets		\$27,518,893.79
Actuarial Asset Rate of Return, based on Limited Actuarial Assets:		10.61%
Actuarial Gain/(Loss) due to Investment Return (Limited Actuarial Asset Basis)		\$825,955.79

¹Market Value Basis, net of investment related expenses.

CHANGES IN NET ASSETS AVAILABLE FOR BENEFITS
 SEPTEMBER 30, 2024
 Actuarial Asset Basis

REVENUES

Contributions:		
Member	268,534.86	
District	1,558,212.87	
State	438,788.14	
Total Contributions		2,265,535.87
Earnings from Investments:		
Interest & Dividends	409,464.48	
Net Realized Gain (Loss)	1,087,358.99	
Unrealized Gain (Loss)	4,845,621.98	
Change in Actuarial Value	(3,911,584.95)	
Total Earnings and Investment Gains		2,430,860.50

EXPENDITURES

Distributions to Members:		
Benefit Payments	1,478,392.76	
Lump Sum DROP Distributions	0.00	
Refunds of Member Contributions	64,886.19	
Total Distributions		1,543,278.95
Expenses:		
Investment related ¹	130,757.88	
Administrative	42,667.77	
Total Expenses		173,425.65
Change in Net Assets for the Year		2,979,691.77
Net Assets Beginning of the Year		21,343,779.12
Net Assets End of the Year²		24,323,470.89

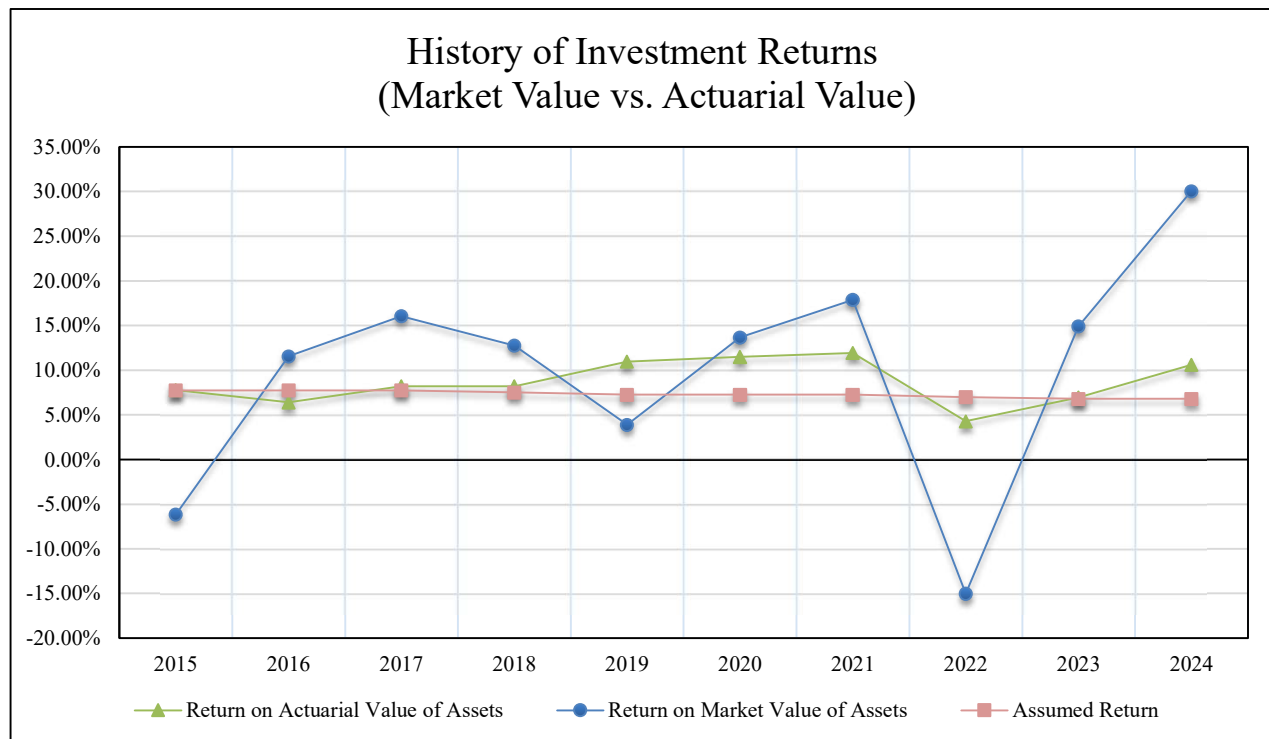
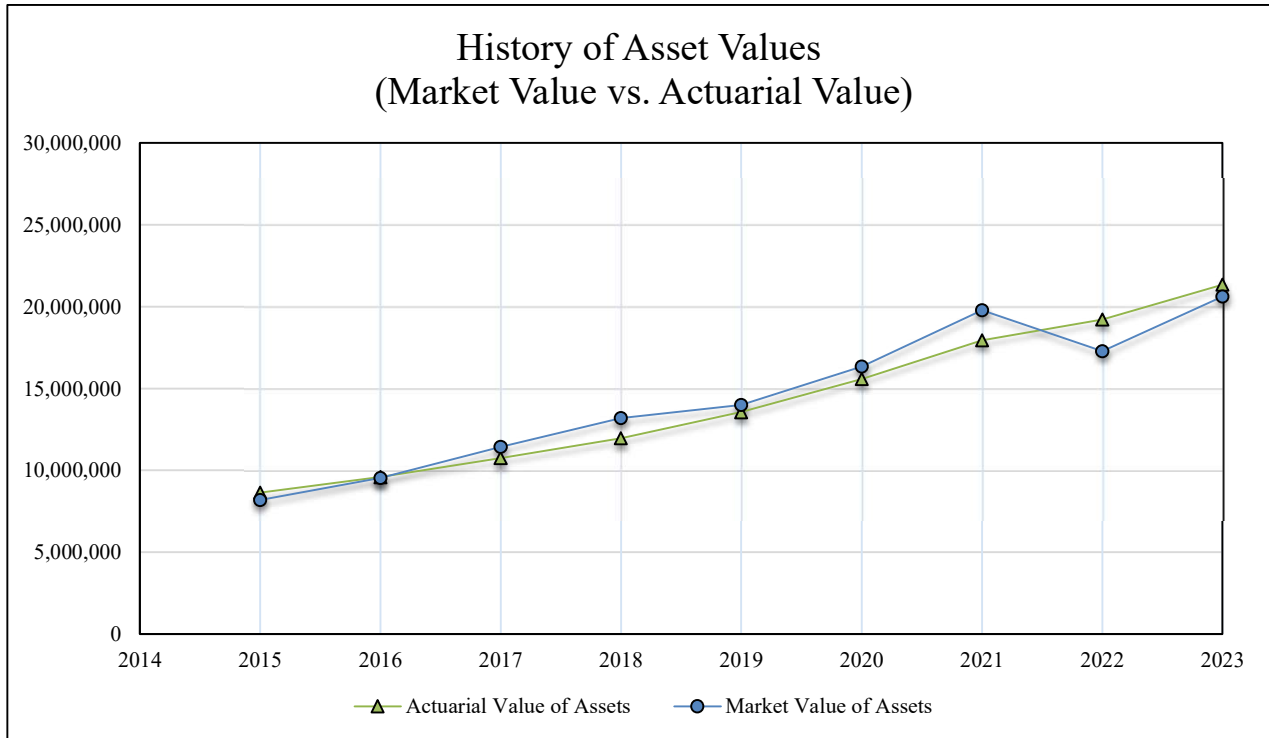
¹Investment related expenses include investment advisory, custodial and performance monitoring fees.

²Net Assets may be limited for actuarial consideration.

DISTRICT CONTRIBUTIONS IN EXCESS OF MINIMUM REQUIREMENT
FOR THE FISCAL YEAR ENDED (FYE) SEPTEMBER 30, 2024

(1)	Total Required Contribution Rate	35.0%
(2)	Pensionable Payroll Derived from Member Contributions	\$3,836,212.29
(3)	Total Required Contribution (1) x (2)	1,342,674.30
(4)	Less Actual Member Contributions	(268,534.86)
(5)	Less Allowable State Contribution	<u>(438,788.14)</u>
(6)	Equals Required District Contribution for Fiscal 2024	635,351.30
(7)	Less 2023 Prepaid Contribution	0.00
(8)	Less Actual District Contributions	<u>(1,558,212.87)</u>
(9)	District Contributions in Excess of Minimum Requirement Applied to Reduce Unfunded Actuarial Accrued Liability as of September 30, 2024	(\$922,861.57)

HISTORY OF ASSET VALUES AND INVESTMENT RETURNS



STATISTICAL DATA

	<u>10/1/2024</u>	<u>10/1/2023</u>	<u>10/1/2022</u>	<u>10/1/2021</u>
<u>Actives - Hired before 10/1/2014</u>				
Number	12	13	12	14
Average Current Age	41.9	41.9	41.7	42.4
Average Age at Employment	25.6	26.5	26.9	27.4
Average Past Service	16.3	15.4	14.8	15.0
Average Annual Salary	\$108,364	\$97,626	\$88,903	\$83,945
<u>Actives - Hired on or after 10/1/2014</u>				
Number	41	39	39	41
Average Current Age	32.3	31.7	32.0	32.2
Average Age at Employment	28.1	28.0	28.8	29.6
Average Past Service	4.2	3.7	3.2	2.6
Average Annual Salary	\$71,841	\$73,540	\$63,962	\$56,628
<u>Service Retirees</u>				
Number	25	24	24	21
Average Current Age	61.3	60.6	59.6	59.4
Average Annual Benefit	\$57,662	\$55,956	\$55,956	\$57,559
<u>Beneficiaries</u>				
Number	1	1	1	1
Average Current Age	80.6	79.6	78.6	77.6
Average Annual Benefit	\$25,619	\$25,619	\$25,619	\$25,619
<u>Disability Retirees</u>				
Number	2	2	2	2
Average Current Age	46.9	45.9	44.9	43.9
Average Annual Benefit	\$17,955	\$17,955	\$17,955	\$17,955
<u>Terminated Vested</u>				
Number	10	12	9	10
Average Current Age ¹	44.0	43.0	42.0	43.7
Average Annual Benefit ¹	\$26,129	\$27,527	\$27,527	\$24,907

¹ The Average Current Age and Average Annual Benefit exclude participants awaiting a refund of contributions.

AGE AND SERVICE DISTRIBUTION

PAST SERVICE

AGE	0	1	2	3	4	5-9	10-14	15-19	20-24	25-29	30+	Total
15 - 19												0
20 - 24	1	3		1	1							6
25 - 29	3	1	1	1		2						8
30 - 34	1	1	1	1		8	3					15
35 - 39					1	6	1					8
40 - 44	1	1	1	2		1	1	3				10
45 - 49						2			2			4
50 - 54								1	1			2
55 - 59												0
60 - 64												0
65+												0
Total	6	6	3	5	2	19	5	4	3	0	0	53

VALUATION PARTICIPANT RECONCILIATION

1. Active lives

a. Number in prior valuation 10/1/2023	52
b. Terminations	
i. Vested (partial or full) with deferred annuity	0
ii. Vested in refund of member contributions only	0
iii. Refund of member contributions or full lump sum distribution	(4)
c. Deaths	
i. Beneficiary receiving benefits	0
ii. No future benefits payable	0
d. Disabled	0
e. Retired	(1)
f. Continuing participants	47
g. New entrants / Rehires	<u>6</u>
h. Total active life participants in valuation	53

2. Non-Active lives (including beneficiaries receiving benefits)

	Service Retirees, Vested Receiving <u>Benefits</u>	Receiving Death <u>Benefits</u>	Receiving Disability <u>Benefits</u>	Vested (Deferred Annuity)	Vested (Due Refund)	<u>Total</u>
a. Number prior valuation	24	1	2	4	8	39
Retired	1					1
Vested (Deferred Annuity)						
Vested (Due Refund)						
Hired/Terminated in Same Year						
Death, With Survivor						
Death, No Survivor						
Disabled						
Refund of Contributions					(2)	(2)
Rehires						
Expired Annuities						
Data Corrections						
b. Number current valuation	25	1	2	4	6	38

SUMMARY OF CURRENT PLAN
(Through Ordinance No. 2020-01)

<u>Credited Service</u>	Total years and fractional parts of years of contributing employment with the District as a Firefighter.
<u>Salary</u>	Total W-2 Compensation, including lump sum sick and vacation payouts at retirement. Effective October 1, 2014, Salary shall not include more than three hundred (300) hours of overtime per calendar year. Additionally, Salary will include the lesser of the amount of sick and vacation leave time accrued as of October 1, 2014, or the actual amount of sick and vacation leave time for which the retiree receives payment at the time of retirement.
<u>Average Final Compensation</u>	Members hired before October 1, 2014: average Salary for the best 3 years during the 5 years immediately preceding retirement or termination. Members hired on or after October 1, 2014: average base pay plus Paramedic or EMT incentive pay.
<u>Member Contributions</u>	7.0% of Salary.
<u>District and State Contributions</u>	Remaining amount required in order to fund to actuarial soundness. District contributions shall not be less than Member contributions.
<u>Normal Retirement</u>	
Date	Earlier of: 1) Age 50 and 25 years of Credited Service, or 2) age 55 and 10 years of Credited Service.
Benefit	3.0% of Average Final Compensation times Credited Service.
Form of Benefit	Ten Year Certain and Life Annuity (options available).
<u>Early Retirement</u>	
Eligibility	Age 50 and 10 Years of Credited Service.
Benefit	Accrued benefit, reduced 3% per year.
<u>Supplement</u>	\$10 for each year of Credited Service. Commencing immediately after Retirement and ceasing at the earlier of death or age 65.

Share Plan

Funded Status

Not currently funded.