

# Jacksonville Police and Fire Pension Fund

ACTUARIAL VALUATION REPORT AS OF  
OCTOBER 1, 2022

ANNUAL EMPLOYER CONTRIBUTION FOR THE FISCAL YEAR  
ENDING SEPTEMBER 30, 2024





May 8, 2023

Board of Trustees  
Jacksonville Police and Fire Pension Fund  
Jacksonville, Florida

**Re: Jacksonville Police and Fire Pension Fund Actuarial Valuation as of October 1, 2022 and Actuarial Disclosures**

Dear Trustees:

The results of the October 1, 2022 Annual Actuarial Valuation of the Jacksonville Police and Fire Pension Fund are presented in this report.

The computed contribution rates shown on page 1 may be considered as a minimum contribution rate that complies with the Board's funding policy. Users of this report should be aware that contributions made at that rate do not guarantee benefit security. Given the importance of benefit security to any retirement system, we suggest that contributions to the Fund in excess of those presented in this report be considered.

The contribution rate in this report is determined using the actuarial assumptions and methods disclosed in Section B of this report. This report does not include a robust assessment of the risks of future experience not meeting the actuarial assumptions, as the assessment of these risks was outside the scope of this assignment. We encourage a review and assessment of investment and other significant risks that may have a material effect on the Fund's financial condition.

This report was prepared at the request of the Board and is intended for use by the Retirement System and those designated or approved by the Board. This report may be provided to parties other than the Fund only in its entirety and only with the permission of the Board. GRS is not responsible for unauthorized use of this report.

The purposes of the valuation are to measure the Fund's funding progress, to determine the employer contribution rate for the fiscal year ending September 30, 2024, and to determine the actuarial information for Governmental Accounting Standards Board (GASB) Statement No. 67. This report should not be relied on for any purpose other than the purposes described herein. Determinations of financial results associated with the benefits described in this report, for purposes other than those identified above may be significantly different.

The findings in this report are based on data through July 1, 2022 and financial information through September 30, 2022. 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 operation of the methodology used for these measurements (such as the end of an amortization period or additional cost or contribution requirements based on the Fund's funded status); and changes in plan provisions or applicable law. The scope of an actuarial valuation does not include an analysis of the potential range of such future measurements.

This valuation assumed the continuing ability of the plan sponsor to make the contributions necessary to fund this plan. A determination regarding whether or not the plan sponsor is actually able to do so is outside our scope of expertise and was not performed.

The actuarial information for GASB Statement No. 67 is intended to assist in preparation of the financial statements of the Plan. Financial statements are the responsibility of management, subject to the auditor's review. Please let us know if the auditor recommends any changes. Our calculation of the Net Pension Liability associated with the benefits described in this report was performed for the purpose of satisfying the requirements of GASB Statement No. 67. The Net Pension Liability is not an appropriate measure for measuring the sufficiency of plan assets to cover the estimated cost of settling the employer's benefit obligation. The Net Pension Liability is not an appropriate measure for assessing the need for or amount of future employer contributions. A calculation of the plan's liability for purposes other than satisfying the requirements of GASB Statement No. 67 may produce significantly different results.

The valuation was based upon information furnished by the Executive Director concerning Retirement Plan benefits, financial transactions, plan provisions and active members, terminated members, retirees and beneficiaries. We checked for internal and year-to-year consistency, but did not otherwise audit the data. We are not responsible for the accuracy or completeness of the information provided by the Executive Director.

In addition, this report was prepared using certain assumptions and methods approved by the Board and prescribed by the Florida Statutes as described in the section of this report entitled Actuarial Assumptions and Cost Methods. The prescribed assumptions are the assumed mortality rates detailed in the Actuarial Assumptions and Cost Methods section in accordance with Florida House Bill 1309 (codified in Chapter 2015-157). The prescribed methods include the use of an initial 30-year amortization period for amortizing the unfunded liability as required under Florida Statute 112.64(6)(a), the recognition of the present value of future Pension Liability Surtax proceeds as required by Florida Statute 112.64(6), and the use of a payroll growth assumption to amortize the unfunded liability as required under Florida Statute 112.64(6)(b). Additional information and disclosures regarding these prescribed methods can be found on pages 4 and 5 of this actuarial valuation report.

This report was prepared using ProVal's valuation model, a software product of Winklevoss Technologies. We are relying on the ProVal model. We performed tests of the ProVal model with this assignment and made a reasonable attempt to understand the developer's intended purpose of, general



operation of, major sensitivities and dependencies within, and key strengths and limitations of the ProVal model. In our professional judgment, the ProVal valuation model has the capability to provide results that are consistent with the purposes of the valuation and has no material limitations or known weaknesses.

This report has been prepared by actuaries who have substantial experience valuing public employee retirement systems. To the best of our knowledge the information contained in this report is accurate and fairly presents the actuarial position of the Jacksonville Police and Fire Pension Fund as of the valuation date. All calculations have been made in conformity with generally accepted actuarial principles and practices, with the Actuarial Standards of Practice issued by the Actuarial Standards Board and with applicable statutes.

Peter N. Strong and Jeffrey Amrose are members of the American Academy of Actuaries. These actuaries meet the Qualification Standards of the American Academy of Actuaries to render the actuarial opinions contained herein. The signing actuaries are independent of the plan sponsor.

This actuarial valuation and/or cost determination was prepared and completed by us or under our direct supervision, and we acknowledge responsibility for the results. To the best of our knowledge, the results are complete and accurate. In our opinion, the techniques and assumptions used are reasonable, meet the requirements and intent of Part VII, Chapter 112, Florida Statutes, and are based on generally accepted actuarial principles and practices, with some exceptions noted on pages 4 and 5 under the section entitled "Disclosures Regarding the Pension Liability Surtax and Florida Statute 112.64(6)." There is no benefit or expense to be provided by the plan and/or paid from the Fund'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.


Gabriel, Roeder, Smith & Company will be pleased to review this valuation report with the Board of Trustees and to answer any questions pertaining to the valuation.

Respectfully submitted,

GABRIEL, ROEDER, SMITH AND COMPANY



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## **SECTION A**

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### **DISCUSSION OF VALUATION RESULTS**

# DISCUSSION OF VALUATION RESULTS

## Closed Plan

In reviewing this Report, it is important for the reader to keep in mind that this Fund has been closed to new members since October 1, 2017. One consequence of this closure is that the annual payment on the unfunded accrued liability will tend to increase as a percentage of covered payroll over time, as such payroll decreases from year to year. Starting with the fiscal year ending September 30, 2018, it is our understanding that the Plan sponsor has been and will continue to be contributing the dollar amount of the calculated required employer contribution.

## Comparison of Required Employer Contributions

The required employer contribution developed in this year's valuation is compared below to the last valuation.

	<b>For FYE 9/30/24 Based on 10/1/2022 Valuation (if contributed on 12/1/2023)</b>	<b>For FYE 9/30/23 Based on 10/1/2021 Valuation (if contributed on 12/1/2022)</b>
Required Employer Contribution*	\$ 174,039,920	\$ 156,993,838
As % of Contribution Year Payroll	104.43 %	94.79 %

\*This does not reflect the potential use of reserves that have been allocated to the City that may be used to offset the City's required contribution amount. Approximately \$5.2 million in reserves are available for use by the City as of October 1, 2022.

For FYE 9/30/2024 (calculated as of 10/1/2022), if the Pension Liability Surtax did not exist, the required City contribution would be \$262.6 million.

## Payment of Required Contribution

The required employer contributions developed in this valuation have been calculated as though the payment is contributed on December 1.

The actual employer (City) contributions for the year ending September 30, 2022 were \$157,352,434. The required employer contributions for the year ending September 30, 2022 were \$157,352,434.

## Revisions in Benefits

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



## **Revisions in Funding Policy**

There have been no changes in funding policy since the previous valuation.

## **Revisions in Actuarial Assumptions and Methods**

The amortization period for new amortization bases is reduced from 26 years to 25 years this year, and it will continue to be reduced by one year each year until reaching 15 years.

The assumed investment return assumption has been reduced by 0.125% from 6.625% per annum to 6.5% per annum, compounded annually. This assumption change caused the required City contribution for FY 2024 to increase by \$4,952,780.

A new smoothing method has been implemented this year for recognizing the Pension Liability Surtax (PLS). Instead of using the actual amount of surtax revenue received during the most recent fiscal year as the starting point for the projection of future surtax revenue, the difference between the actual and expected increase in the surtax revenue is now being phased in over a 5-year period, similarly to how gains and losses on the market value of assets are phased in to determine the actuarial value of assets. The five-year smoothing caused the recognized rate of growth in fiscal year 2022 to be +5.25% instead of the actual rate of increase of +9.27%, deferring +4.02% of excess PLS revenue growth to fiscal years 2023 through 2026. This method change caused the required City contribution for FY 2024 to be \$3,383,279 higher than it would have been without implementing this new smoothing method.

## **Actuarial Experience**

There were net actuarial experience losses totaling approximately \$79.3 million during the past year, which means that actual experience was less favorable than expected.

Investment experience (on the net Actuarial Value of Assets) resulted in an experience loss (net of reserves) of about \$35.9 million. The investment return on the smoothed Actuarial Value of Assets was 4.84% compared to the assumed annual investment return of 6.625%. (The net money-weighted investment return on the Market Value of Assets was -16.78%, as reported by the Plan's investment consultant.) Investment gains and losses are spread over a five-year smoothing period, with gains and losses from prior years being smoothed into the current year.

Experience from demographic sources resulted in a net experience loss of about \$114.4 million. There were demographic experience losses due to higher salary increases than expected (11.7% actual versus 4.4% assumed) (approximately \$75.1 million of the experience loss), higher retirement experience than expected (163 actual retirements versus 100 expected) and higher actual retirement benefits on average than projected for these new retirees (approximately \$21.5 million of the experience loss), lower inactive mortality experience than expected and more surviving spouses among deceased retirees than expected (approximately \$8.9 million of the experience loss), and data adjustments (primarily due to service purchases).

Offsetting some of these experience losses was an experience gain due to changes in the projected Pension Liability Surtax proceeds (of approximately \$71.0 million). This was primarily caused by a 9.27% increase in actual (unsmoothed) surtax revenue from FY 2021 to FY 2022. The surtax revenue is assumed to



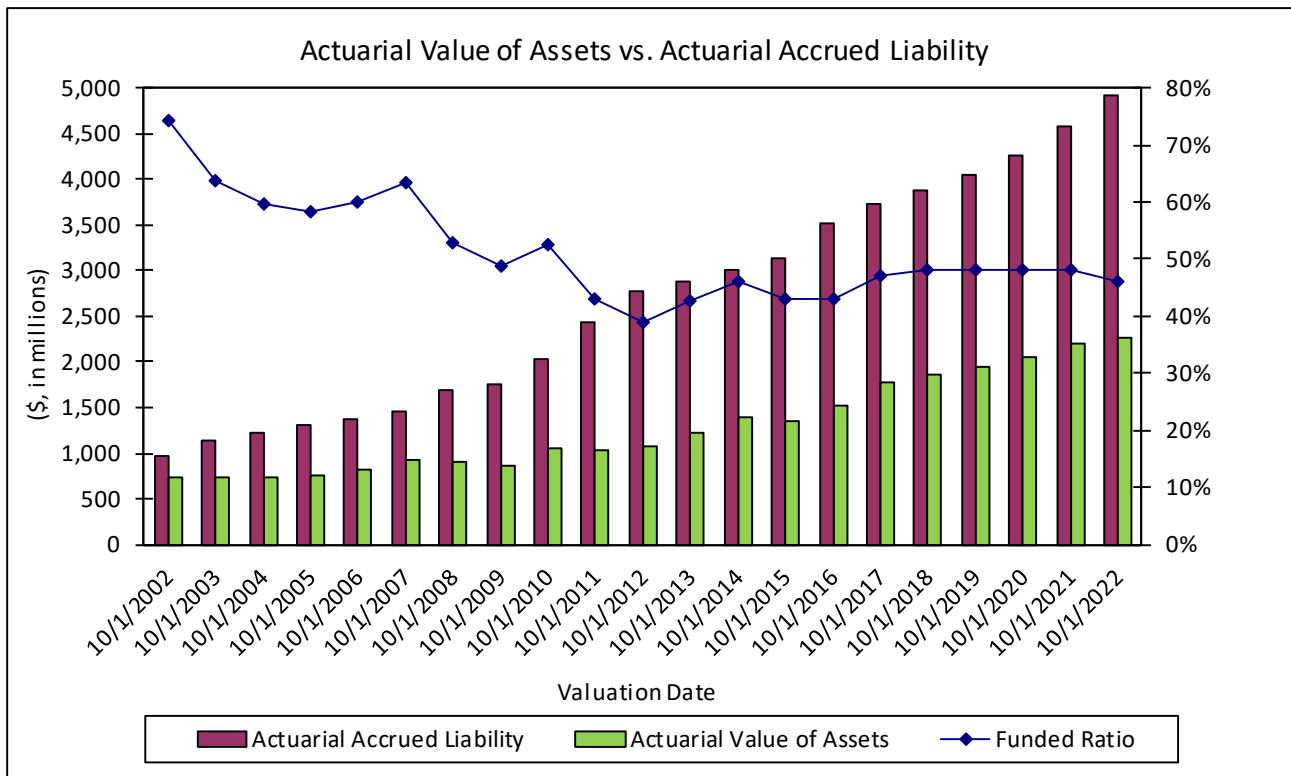


increase by 4.25% per year. In addition, the pro rata share of the Proceeds increased since the previous valuation. The allocation percentage is updated each year by the City based on the relative unfunded actuarial liabilities for all of the City’s pension plans. Based on each pension plan’s respective October 1, 2021 actuarial valuation, the pro rata share of the Proceeds for the Jacksonville Police and Pension Fund is 58.9% as of October 1, 2021. In the previous valuation, the pro rata share of the Proceeds was 58.3%.

Overall, the net actuarial experience loss caused the required City contribution to increase by \$5,637,467.

**Funded Ratio**

The funded ratio is equal to the actuarial value of assets divided by the actuarial accrued (past service) liability. This year’s funded ratio is 45.95% compared to 48.06% last year. Prior to reflecting the assumption and method changes, the funded ratio would have been 46.72%. Below is a historical comparison of the total actuarial value of assets versus the total actuarial accrued liability:



**Analysis of Employer Contribution**

The components of change in the required City contribution are as follows:



<b>Required Contribution Payable December 1, 2022</b>	<b>\$ 156,993,838</b>
Experience (Gains) or Losses	
Investment Experience	2,556,934
Change in Projected Pension Liability Surtax Experience	(5,051,239)
Other Sources Experience	8,131,772
Revision in Assumptions	4,952,780
Revision in Methods	3,383,279
Amortization Payment on UAAL	14,506
Change in Net Employer Normal Cost	320,577
Administrative/Investment Expenses	2,737,473
Court Fines	-
Benefit Changes	-
<b>Required Contribution Payable December 1, 2023</b>	<b>\$ 174,039,920</b>

The change in the contribution rate attributed to the Amortization Payment on the UAAL was caused by the 1.25% payroll growth rate used in the UAAL amortization (UAAL payments are scheduled to increase by 1.25% per year) and the contribution lag (the contribution rate determined in the October 1, 2020 actuarial valuation was contributed during the fiscal year ending September 30, 2022).

### **Required Contributions in Later Years**

It is important to keep in mind that under the asset smoothing method, gains and losses are recognized over five years. As of September 30, 2022, the actuarial value of assets exceeded the market value by \$283,020,822. This difference will be gradually recognized in the absence of offsetting gains. In turn, the computed employer contribution rate is expected to increase by approximately \$19.9 million.

### **Relationship to Market Value**

If Market Value had been the basis for the valuation, the required City contribution would have been \$193,937,745 and the funded ratio would have been 40.20%. In the absence of other gains and losses or other changes, the City contribution rate is expected to increase towards this level over the next few years.

### **Disclosures Regarding the Pension Liability Surtax and Florida Statute 112.64(6)**

The annual pension liability surtax revenue is projected to increase 4.25% annually from calendar year 2022 to calendar year 2060. This assumption was set by the City of Jacksonville. Assumptions regarding future growth in municipal sales tax revenues fall outside of our area of expertise. Since municipal finance projections fall outside of our area of expertise, we are unable to assess the reasonableness of the City's 4.25% annual surtax growth assumption. However, it should be noted that actual surtax revenue growth over the past six years has exceeded this assumption (averaging 5.94% per year; 5.28% per year reflecting surtax smoothing).

Ordinance 2017-257 implemented changes required to reflect the present value of the City of Jacksonville's pension liability surtax, in accordance with Florida Statute 112.64(6). Reflecting the pension liability surtax offsets the Fund's current UAAL by the present value of a future revenue stream (generated



by the pension liability surtax) to be received by the Fund in calendar years 2031 through 2060. This delays the Fund's projected full funding date until almost the fiscal year 2060 and results in annual contributions to the Fund in fiscal years 2018 through 2030 which are significantly lower than the recommended contribution levels would be to ensure the Fund accumulates adequate assets to make all benefit payments (in the absence of the pension liability surtax). The maintenance of a minimum liquidity ratio (defined as the market value of assets divided by the annual benefit payments), which is 5.0 as described in Ordinance 2017-259, will likely help prevent an insolvency in the event the Fund incurs adverse experience, but this is dependent upon the minimum liquidity ratio being adhered to. A full analysis of the impact of the liquidity ratio was outside of the scope of this assignment.

We are unable to assess the risk that the timing and/or amount of future pension liability surtax proceeds may significantly deviate from the projections (due to legal challenges, economic hardships, or any other reason). Any such deviations could have a significant impact on the required contribution amount shown herein and on the future solvency risk that the Fund's future assets may be insufficient to cover all future benefit payments.

The long-term payroll growth assumption for purposes of amortizing the UAAL and projecting the contribution amount to the contribution year (the year beginning one year after the valuation date) is 1.25%. For a closed pension fund, it is our recommendation to use a 0% payroll growth assumption. Based on our understanding, Florida Statute 112.64(6)(b) requires the future payroll of police officers and firefighters expected to be hired after October 1, 2017 (who will not become members of the Fund) to be included when setting this assumption. This is a prescribed method under Florida Statutes for setting this assumption which deviates from our recommended practice for closed pension funds. The 1.25% assumption was set based on the projected 10-year compound average payroll growth rate through 2021. Please refer to our experience study report on the payroll growth assumption dated April 4, 2017 for additional information and background on this assumption.

In conjunction with offsetting the UAAL by the present value of the pension liability surtax, Florida Statute 112.64(6)(a) requires the use of an initial 30-year amortization period for amortizing the UAAL. It is important to note that the average expected future service of current active members is 8.19 years, which is far less than the required initial 30-year amortization period. Though required, a long amortization period carries more risk, especially in a closed plan, and the funded status could deteriorate in the short run. Furthermore, amortizing the UAAL over an initial period of 30 years (currently 25 years) is likely to transfer costs to future taxpayers, which would deviate from language in Florida Statute 112.61 which says *"Accordingly, except as herein provided, it is the intent of this act to prohibit the use of any procedure, methodology, or assumptions the effect of which is to transfer to future taxpayers any portion of the costs which may reasonably have been expected to be paid by the current taxpayers."* When combined with advance recognition of the pension liability surtax, it is our opinion that current costs are likely to be transferred to future taxpayers under this arrangement.

## Conclusion

It is important to note that the Fund's assets are insufficient to cover the actuarial liabilities for inactive members. As of October 1, 2022 the market value of assets, net of reserves, is approximately \$1.98 billion, and the actuarial liability for current inactive members is approximately \$3.74 billion. Given the low funded ratio and the fact that the pension liability surtax revenues will not be received until more than 8 years from now, it is advisable to consider making contributions to the Fund in excess of the minimum



required contribution shown in this report.

In consideration of Actuarial Standard of Practice No. 51 regarding the assessment of risks, which is addressed on the next three pages, we recommend a numerical risk assessment to be conducted at least once every 3 to 5 years.

The remainder of this Report includes detailed actuarial valuation results, information relating to the pension fund, financial accounting information, miscellaneous employee data and summaries of Plan provisions.



## **RISKS ASSOCIATED WITH THE MEASURING THE ACCRUED LIABILITY AND ACTUARIALLY DETERMINED CONTRIBUTION**

The determination of the accrued liability and the actuarially determined contribution requires the use of assumptions regarding future economic and demographic experience. Risk measures, as illustrated in this report, are intended to aid in the understanding of the effects of future experience differing from the assumptions used in the course of the actuarial valuation. Risk measures may also help with illustrating the potential volatility in the accrued liability and the actuarially determined contribution that result from the differences between actual experience and the actuarial assumptions.

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 due to changing conditions; increases or decreases expected as part of the natural operation 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. The scope of an actuarial valuation does not include an analysis of the potential range of such future measurements.

Examples of risk that may reasonably be anticipated to significantly affect the plan's future financial condition include:

1. Investment risk – actual investment returns may differ from the expected returns;
2. Asset/Liability mismatch – changes in asset values may not match changes in liabilities, thereby altering the gap between the accrued liability and assets and consequently altering the funded status and contribution requirements;
3. Contribution risk – actual contributions may differ from expected future contributions. For example, actual contributions may not be made in accordance with the plan's funding policy or material changes may occur in the anticipated number of covered employees, covered payroll, or other relevant contribution base;
4. Salary and Payroll risk – actual salaries and total payroll may differ from expected, resulting in actual future accrued liability and contributions differing from expected;
5. Longevity risk – members may live longer or shorter than expected and receive pensions for a period of time other than assumed; and
6. Other demographic risks – members may terminate, retire or become disabled at times or with benefits other than assumed resulting in actual future accrued liability and contributions differing from expected.

The effects of certain trends in experience can generally be anticipated. For example, if the investment return since the most recent actuarial valuation is less (or more) than the assumed rate, the cost of the plan can be expected to increase (or decrease). Likewise, if longevity is improving (or worsening), increases (or decreases) in cost can be anticipated.

The computed contribution rate shown on page 1 may be considered as a minimum contribution rate that complies with the Board's funding policy. The timely receipt of the actuarially determined contributions is critical to support the financial health of the plan. Users of this report should be aware that contributions made at the actuarially determined rate do not necessarily guarantee benefit security.



## PLAN MATURITY MEASURES

Risks facing a pension plan evolve over time. A young plan with virtually no investments and paying few benefits may experience little investment risk. An older plan with a large number of members in pay status and a significant trust may be much more exposed to investment risk. Generally accepted plan maturity measures include the following:

	<u>2022</u>	<u>2021</u>
Ratio of the net market value of assets to payroll	12.13	15.20
Ratio of actuarial accrued liability to payroll	30.18	28.27
Ratio of actives to retirees and beneficiaries	0.56	0.65
Ratio of net cash flow to market value of assets (net of reserves)	(2.8%)	(1.8%)
Duration of the actuarial accrued liability	14.99	14.80

### RATIO OF MARKET VALUE OF ASSETS TO PAYROLL

The relationship between assets and payroll is a useful indicator of the potential volatility of contributions. For example, if the market value of assets is 2.0 times the payroll, a return on assets 5% different than assumed would equal 10% of payroll. A higher (lower) or increasing (decreasing) level of this maturity measure generally indicates a higher (lower) or increasing (decreasing) volatility in plan sponsor contributions as a percentage of payroll. We note that this ratio for the Jacksonville Police and Fire Pension Fund (12.13) is higher than it is for most other plans we work with, which means the required contributions as a percentage of payroll are more volatile than most other plans.

### RATIO OF ACTUARIAL ACCRUED LIABILITY TO PAYROLL

The relationship between actuarial accrued liability and payroll is a useful indicator of the potential volatility of contributions for a fully funded plan. A funding policy that targets a funded ratio of 100% is expected to result in the ratio of assets to payroll and the ratio of liability to payroll converging over time.

The ratio of liability to payroll may also be used as a measure of sensitivity of the liability itself. For example, if the actuarial accrued liability is 2.5 times the payroll, a change in liability 2% other than assumed would equal 5% of payroll. A higher (lower) or increasing (decreasing) level of this maturity measure generally indicates a higher (lower) or increasing (decreasing) volatility in liability (and also plan sponsor contributions) as a percentage of payroll. We note that this ratio for the Jacksonville Police and Fire Pension Fund (30.18) is significantly higher than it is for most of the plans we work with, which means the changes in liability and required contributions are more volatile than most other plans.

### RATIO OF ACTIVES TO RETIREES AND BENEFICIARIES

A young plan with many active members and few retirees will have a high ratio of active to retirees. A mature open plan may have close to the same number of actives to retirees resulting in a ratio near 1.0. A super-mature or closed plan may have significantly more retirees than actives resulting in a ratio below 1.0. This ratio for the Jacksonville Police and Fire Pension Fund (0.56) is less than 1.0, indicating it is super-mature. The fact that the Fund is closed has not had much impact on this ratio yet.



## **RATIO OF NET CASH FLOW TO MARKET VALUE OF ASSETS**

A positive net cash flow means contributions exceed benefits and expenses. A negative cash flow means existing funds are being used to make payments. A certain amount of negative net cash flow is generally expected to occur when benefits are prefunded through a qualified trust. Large negative net cash flows as a percent of assets may indicate a super-mature plan or a need for additional contributions.

## **DURATION OF ACTUARIAL ACCRUED LIABILITY**

The duration of the actuarial accrued liability may be used to approximate the sensitivity to a 1% change in the assumed rate of return. For example, duration of 10 indicates that the liability would increase approximately 10% if the assumed rate of return were lowered 1%.

## **ADDITIONAL RISK ASSESSMENT**

Additional risk assessment is outside the scope of the annual actuarial valuation. Additional assessment may include scenario tests, sensitivity tests, stochastic modeling, stress tests, and a comparison of the present value of accrued benefits at low-risk discount rates with the actuarial accrued liability. In consideration of the size of the Jacksonville Police and Fire Pension Fund and the long-term manner in which it is being funded (in part by pension liability surtax proceeds through 2060), we recommend a numerical risk assessment be conducted at least once every 3 to 5 years.

## ORIGINAL VERSUS CURRENT PROJECTION OF PENSION LIABILITY SURTAX

PENSION LIABILITY SURTAX ESTIMATES 4.25% GROWTH						
Fiscal Year	Original Projection of Pension Liability Surtax			Current Projection of <i>Smoothed</i> Pension Liability Surtax		
	Projected Total 1/2-Penny Sales Tax*	Projected Pension Liability Surtax	63% of Revenue for Police and Fire Pension Fund	Projected Total 1/2-Penny Sales Tax*	Projected Pension Liability Surtax	58.9% of Revenue for Police and Fire Pension Fund
2016	<b>\$ 82,875,723</b>			<b>\$ 82,875,723</b>		
2017	<i>86,397,941</i>			<b>86,148,000</b>		
2018	<i>90,069,854</i>			<b>91,529,277</b>		
2019	<i>93,897,823</i>			<b>95,804,756</b>		
2020	<i>97,888,480</i>			<b>93,742,144</b>		
2021	<i>102,048,740</i>			<b>107,207,059</b>		
2022	<i>106,385,812</i>			<b>112,840,490</b>		
⋮	⋮			⋮		
⋮	⋮			⋮		
2031	<i>154,727,777</i>	\$ 116,045,832	\$ 73,108,874	<i>164,115,476</i>	\$ 123,086,607	\$ 72,498,011
2032	<i>161,303,707</i>	161,303,707	101,621,335	<i>171,090,384</i>	171,090,384	100,772,236
⋮	⋮	⋮	⋮	⋮	⋮	⋮
⋮	⋮	⋮	⋮	⋮	⋮	⋮
2060	<i>517,337,703</i>	517,337,703	325,922,753	<i>548,725,802</i>	548,725,802	323,199,497
2061	<i>539,324,556</i>	134,831,139	84,943,617	<i>572,046,649</i>	143,011,662	84,233,869
<b>Total Proceeds from 1/1/31-12/31/60:</b>		<b>\$ 9,105,159,243</b>	<b>\$ 5,736,250,323</b>		<b>\$ 9,700,363,329</b>	<b>\$ 5,713,514,001</b>
<b>Net Present Value** of Proceeds as of 10/1/22:</b>		<b>\$ 2,017,393,174</b>	<b>\$ 1,270,957,699</b>		<b>\$ 2,139,793,177</b>	<b>\$ 1,260,338,181</b>
<i>Change in Total Proceeds from Original to Current Projection:</i>					\$ 595,204,086	\$ (22,736,322)
<i>Change in Net Present Value of Proceeds from Original to Current Projection:</i>					\$ 122,400,003	\$ (10,619,518)

\*Numbers in **bold** are actual numbers; numbers in *italics* are projected. Beginning Fiscal Year 2022 the Projected Total 1/2-Penny Sales Tax uses a five-year smoothing method.

\*\* The Present Value of the Original Projection of Pension Liability Surtax has been adjusted using 6.50% interest rate.

The actual **smoothed** surtax revenue has increased by an average of 5.28% per year from FY 2016 to FY 2022, which is trending higher than the 4.25% assumption. Also, the percentage of the Pension Liability Surtax (PLS) allocated to the Police and Fire Fund (versus the City's other two pension plans) has declined from 63.0% (initially) to 58.9% (currently). The impact of these two variables on the required City contribution and the percentage of the Actuarial Accrued Liability (AAL) covered by the sum of current assets and the present value of the PLS proceeds are shown below:

	If Original Projection Held (4.25%/yr Growth; 63.0% Allocation)	Reflecting <b>Smoothed</b> PLS Growth (≈ 5.28%/yr); Original 63.0% Allocation	Reflecting <b>Smoothed</b> PLS Growth (≈ 5.28%/yr); Actual 58.9% Allocation
Required City Contribution Payable			
December 1, 2023	\$ 173,293,312	\$ 167,871,940	\$ 174,039,920
<i>Impact of Change on Valuation Results</i>	\$ 746,608	\$ 6,167,980	N/A
Percentage of AAL covered by Assets and PLS	71.80 %	73.37 %	71.59 %
<i>Impact of Change on Valuation Results</i>	(0.21) %	(1.78) %	N/A





## **SECTION B**

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### **VALUATION RESULTS**

<b>PARTICIPANT DATA<sup>1</sup></b>		
	<b>October 1, 2022</b>	<b>October 1, 2021</b>
<b>ACTIVE MEMBERS</b>		
Number	1,872	2,057
Annual Payroll	\$ 163,370,080	\$ 162,486,240
Average Annual Payroll	\$ 87,270	\$ 78,992
Average Age	41.7	41.5
Average Past Service	13.3	12.9
Average Age at Hire	28.4	28.6
<b>RETIREES, BENEFICIARIES &amp; DROP</b>		
Number	3,279	3,140
Annual Benefits <sup>2</sup>	\$ 205,103,139	\$ 192,052,407
Average Annual Benefit <sup>2</sup>	\$ 62,551	\$ 61,163
Average Age	64.9	65.1
<b>DISABILITY RETIREES</b>		
Number	45	45
Annual Benefits	\$ 2,059,820	\$ 1,991,287
Average Annual Benefit	\$ 45,774	\$ 44,251
Average Age	63.9	63.9
<b>TERMINATED VESTED MEMBERS</b>		
Number	94	91
Annual Benefits	\$ 1,775,889	\$ 1,632,409
Average Annual Benefit	\$ 18,892	\$ 17,939
Average Age	44.1	44.0

<sup>1</sup>Participant data is collected as of July 1.

<sup>2</sup>Not including distributions or installment payments from DROP accounts.

ACTUARIALLY DETERMINED CONTRIBUTION (ADC)				
A. Valuation Date	October 1, 2022 <i>After Method and Assumption Changes</i>	October 1, 2022 <i>After Assumption Changes</i>	October 1, 2022 <i>Before Changes</i>	October 1, 2021
B. ADC to Be Paid During Fiscal Year Ending	9/30/2024	9/30/2024	9/30/2024	9/30/2023
C. Assumed Date of Employer Contributions	12/1/2023	12/1/2023	12/1/2023	12/1/2022
D. Expected Covered Payroll for the Year Beginning on the Valuation Date	\$ 162,885,451	\$ 162,885,451	\$ 162,885,451	\$ 161,835,740
E. Annual Payment to Amortize Unfunded Actuarial Liability	97,631,905	94,325,284	91,992,542	86,469,709
F. Employer Normal Cost	72,464,672	72,464,672	69,925,194	66,937,017
G. ADC if Paid on the Valuation Date: E + F	170,096,577	166,789,956	161,917,736	153,406,726
H. Contributions from Other Sources	0	0	0	0
I. City Contribution: G - H as % of Covered Payroll	170,096,577 104.43 %	166,789,956 102.40 %	161,917,736 99.41 %	153,406,726 94.79 %
J. Actuarially Determined Contribution (ADC) in Contribution Year*	174,039,920	170,656,641	165,703,861	156,993,838

\* = City Contribution (item G.) x (1+payroll growth of 1.25%) x (1+interest rate) ^ (2/12)



**ACTUARIAL VALUE OF BENEFITS AND ASSETS**

A. Valuation Date	October 1, 2022 <i>After Method and Assumption Changes</i>	October 1, 2022 <i>After Assumption Changes</i>	October 1, 2022 <i>Before Changes</i>	October 1, 2021
<b>B. Actuarial Present Value of All Projected Benefits for</b>				
<b>1. Active Members</b>				
a. Service Retirement Benefits	\$ 1,653,499,309	1,653,499,309	1,605,601,021	\$ 1,590,230,118
b. Vesting Benefits	54,759,818	54,759,818	53,127,084	53,699,356
c. Disability Benefits	18,380,897	18,380,897	17,941,480	19,018,805
d. Preretirement Death Benefits	9,475,791	9,475,791	9,250,454	9,489,410
e. Return of Member Contributions	518,626	518,626	514,926	569,198
f. Total	<u>1,736,634,441</u>	<u>1,736,634,441</u>	<u>1,686,434,965</u>	<u>1,673,006,887</u>
<b>2. Inactive Members</b>				
a. Service Retirees	2,808,281,422	2,808,281,422	2,770,494,107	2,668,073,504
b. DROP Retirees	614,704,274	614,704,274	603,257,976	499,795,047
c. Disability Retirees	31,524,337	31,524,337	31,089,283	31,134,438
d. Beneficiaries	256,722,957	256,722,957	254,045,678	230,704,556
e. Terminated Vested Members	29,955,474	29,955,474	29,277,936	25,785,262
f. Total	<u>3,741,188,464</u>	<u>3,741,188,464</u>	<u>3,688,164,980</u>	<u>3,455,492,807</u>
<b>3. Total for All Members</b>	<b>5,477,822,905</b>	<b>5,477,822,905</b>	<b>5,374,599,945</b>	<b>5,128,499,694</b>
<b>C. Actuarial Accrued (Past Service) Liability</b>				
1. Active Members	1,175,204,361	1,175,204,361	1,147,228,203	1,118,840,768
2. Inactive Members	3,741,188,464	3,741,188,464	3,688,164,980	3,455,492,807
3. Total for All Members	<u>4,916,392,825</u>	<u>4,916,392,825</u>	<u>4,835,393,183</u>	<u>4,574,333,575</u>
<b>D. Actuarial Value of Accumulated Plan Benefits per FASB No. 35</b>	<b>4,770,822,161</b>	<b>4,770,822,161</b>	<b>4,690,987,131</b>	<b>4,433,476,462</b>
<b>E. Plan Assets</b>				
1. Gross Market Value of Assets	1,996,816,815	1,996,816,815	1,996,816,815	2,487,628,465
2. Reserve Accounts, including Share Plan	(17,069,210)	(17,069,210)	(17,069,210)	(22,458,814)
3. Sr. Staff Plan Assets	(3,538,585)	(3,538,585)	(3,538,585)	(4,605,550)
4. Net Market Value of Assets	<u>1,976,209,020</u>	<u>1,976,209,020</u>	<u>1,976,209,020</u>	<u>2,460,564,101</u>
5. Actuarial Value of Assets	2,259,229,842	2,259,229,842	2,259,229,842	2,198,634,746
<b>F. Total Unfunded Actuarial Accrued Liability: C3 - E5</b>	<b>2,657,162,983</b>	<b>2,657,162,983</b>	<b>2,576,163,341</b>	<b>2,375,698,829</b>
<b>G. Net Present Value of Total Pension Liability Surtax Proceeds According to Pro Rata Share</b>	<b>1,260,338,181</b>	<b>1,308,460,932</b>	<b>1,275,691,839</b>	<b>1,129,798,018</b>
<b>H. Net Unfunded Actuarial Accrued Liability: F - G</b>	<b>1,396,824,802</b>	<b>1,348,702,051</b>	<b>1,300,471,502</b>	<b>1,245,900,811</b>
<b>I. Actuarial Present Value of Projected Covered Payroll</b>	<b>1,217,880,794</b>	<b>1,217,880,794</b>	<b>1,210,688,956</b>	<b>1,244,602,525</b>
<b>J. Funded Ratio: E5 / C3</b>	<b>45.95%</b>	<b>45.95%</b>	<b>46.72%</b>	<b>48.06%</b>
<b>K. Percent of Actuarial Accrued Liability Covered by Assets and Total Pension Liability Surtax Proceeds: (G + E5) / C3</b>	<b>71.59%</b>	<b>72.57%</b>	<b>73.11%</b>	<b>72.76%</b>
<b>L. Liquidity Ratio</b>				
1. DROP Balance as of Valuation Date	400,612,610	400,612,610	400,612,610	380,688,717
2. Net Market Value (Net of DROP): E4 - L1	1,575,596,410	1,575,596,410	1,575,596,410	2,079,875,384
3. Annual Benefit Payments in Pay Status	207,162,959	207,162,959	207,162,959	194,043,694
4. Ratio: L2 : L3	7.61 : 1	7.61 : 1	7.61 : 1	10.72 : 1

\*Inactive members liabilities include DROP Account Balances, split based on status as of June 1.



**CALCULATION OF EMPLOYER NORMAL COST**

A. Valuation Date	October 1, 2022 <i>After Assumption Changes</i>	October 1, 2022 <i>Before Changes</i>	October 1, 2021
B. Expected Covered Payroll for the Year Beginning on the Valuation Date	\$ 162,885,451	\$ 162,885,451	\$ 161,835,740
C. Normal Cost (Individual Entry Age) for			
1. Service Retirement Benefits	67,362,328	65,030,654	64,504,006
2. Vesting Benefits	5,062,394	4,906,837	4,835,535
3. Disability Benefits	1,417,744	1,384,949	1,417,872
4. Preretirement Death Benefits	942,515	922,492	916,137
5. Return of Member Contributions	136,591	137,162	143,260
6. Total for Future Benefits	<u>74,921,572</u>	<u>72,382,094</u>	<u>71,816,810</u>
7. Assumed Amount for Expenses	<u>14,654,187</u>	<u>14,654,187</u>	<u>11,979,262</u>
8. Total Normal Cost	89,575,759	87,036,281	83,796,072
D. Expected Member (including DROP) Contribution	17,111,087	17,111,087	16,859,055
E. Employer Normal Cost: C8 - D	72,464,672	69,925,194	66,937,017
F. Employer Normal Cost as a % of Covered Payroll: E / B	44.49%	42.93%	41.36%

## Before Method Changes

PENSION LIABILITY SURTAX ESTIMATES 4.25% GROWTH			
Fiscal Year	Projected Total 1/2-Penny Sales Tax	Projected Pension Liability Surtax	58.9% of Revenue for Police and Fire Pension Fund
2022	\$ 117,149,012		
2023	122,127,845		
2024	127,318,278		
2025	132,729,305		
2026	138,370,301		
2027	144,251,039		
2028	150,381,708		
2029	156,772,930		
2030	163,435,780		
2031	170,381,800	\$ 127,786,350	\$ 75,266,160
2032	177,623,027	177,623,027	104,619,963
2033	185,172,006	185,172,006	109,066,311
2034	193,041,816	193,041,816	113,701,630
2035	201,246,093	201,246,093	118,533,949
2036	209,799,052	209,799,052	123,571,642
2037	218,715,512	218,715,512	128,823,436
2038	228,010,921	228,010,921	134,298,432
2039	237,701,385	237,701,385	140,006,116
2040	247,803,694	247,803,694	145,956,376
2041	258,335,351	258,335,351	152,159,522
2042	269,314,603	269,314,603	158,626,301
2043	280,760,474	280,760,474	165,367,919
2044	292,692,794	292,692,794	172,396,056
2045	305,132,238	305,132,238	179,722,888
2046	318,100,358	318,100,358	187,361,111
2047	331,619,623	331,619,623	195,323,958
2048	345,713,457	345,713,457	203,625,226
2049	360,406,279	360,406,279	212,279,298
2050	375,723,546	375,723,546	221,301,169
2051	391,691,797	391,691,797	230,706,468
2052	408,338,698	408,338,698	240,511,493
2053	425,693,093	425,693,093	250,733,232
2054	443,785,049	443,785,049	261,389,394
2055	462,645,914	462,645,914	272,498,443
2056	482,308,365	482,308,365	284,079,627
2057	502,806,470	502,806,470	296,153,011
2058	524,175,745	524,175,745	308,739,514
2059	546,453,215	546,453,215	321,860,943
2060	569,677,476	569,677,476	335,540,034
2061	593,888,769	148,472,192	87,450,121
<b>Total Proceeds from 2031-2061:</b>		<b>\$ 10,070,746,591</b>	<b>\$ 5,931,669,742</b>
<b>Net Present Value of Proceeds as of 10/1/22:</b>			
<b>Before Changes (at 6.625% interest):</b>		<b>\$ 2,165,860,507</b>	<b>\$ 1,275,691,839</b>
<b>After Assump. Changes (at 6.5% interest):</b>		<b>\$ 2,221,495,640</b>	<b>\$ 1,308,460,932</b>



After Method Changes

Smoothed Total Annual Pension Liability Surtax Revenue

Valuation Date - October 1	2022	2023	2024	2025	2026
A. Smoothed Total Annual PLS Revenue - Previous Year	\$ 107,207,059	\$ -	\$ -	\$ -	\$ -
B. Actual Total Annual PLS Revenue - Current Year	117,149,012	-	-	-	-
C. Actual Total Annual PLS Revenue - Previous Year	107,207,059	-	-	-	-
D. Increase in Total Annual PLS Revenue					
D1. Actual (\$) Increase in Total PLS Revenue: B - C	9,941,953	-	-	-	-
D2. Assumed Rate (%) of Increase	4.25%	-	-	-	-
D3. Assumed (\$) Increase in Total PLS Revenue: D2*C	4,556,300	-	-	-	-
D4. Amount Subject to Phase-In: D1 – D3	5,385,653	-	-	-	-
E. Phase-In Recognition of PLS Revenue Excess/(Shortfall)					
E1. Current Year: 0.2 x D4	1,077,131	-	-	-	-
E2. First Prior Year	-	1,077,131	-	-	-
E3. Second Prior Year	-	-	1,077,131	-	-
E4. Third Prior Year	-	-	-	1,077,131	-
E5. Fourth Prior Year	-	-	-	-	1,077,129
E6. Total Phase-Ins	1,077,131	1,077,131	1,077,131	1,077,131	1,077,129
F. Smoothed Total Annual PLS Revenue - Current Year					
F1. Preliminary Smoothed Total PLS Revenue: A + D3 + E6	\$ 112,840,490	\$ -	\$ -	\$ -	\$ -
F2. Upper Corridor Limit: 120%*B	140,578,814	-	-	-	-
F3. Lower Corridor Limit: 80%*B	93,719,210	-	-	-	-
<b>F4. Final Smoothed Total Annual PLS Revenue</b>	<b>112,840,490</b>	-	-	-	-
G. Difference between Actual & Smoothed Annual PLS Revenue	4,308,522	-	-	-	-
<b>H. Percentage Change in Smoothed Annual PLS Revenue</b>	<b>5.25%</b>	<b>0.00%</b>	<b>0.00%</b>	<b>0.00%</b>	<b>0.00%</b>
<b>I. Percentage Change in Total Actual Annual PLS Revenue</b>	<b>9.27%</b>	<b>0.00%</b>	<b>0.00%</b>	<b>0.00%</b>	<b>0.00%</b>
J. Ratio of Smoothed PLS Revenue to Actual PLS Revenue	96.32%	0.00%	0.00%	0.00%	0.00%



PENSION LIABILITY SURTAX ESTIMATES			
4.25% GROWTH			
<u>Fiscal Year</u>	<u>Projected Total 1/2-Penny Sales Tax</u>	<u>Projected Pension Liability Surtax</u>	<u>58.9% of Revenue for Police and Fire Pension Fund</u>
2022	\$ 112,840,490		
2023	117,636,211		
2024	122,635,750		
2025	127,847,769		
2026	133,281,299		
2027	138,945,755		
2028	144,850,949		
2029	151,007,114		
2030	157,424,917		
2031	164,115,476	\$ 123,086,607	\$ 72,498,011
2032	171,090,384	171,090,384	100,772,236
2033	178,361,725	178,361,725	105,055,056
2034	185,942,098	185,942,098	109,519,896
2035	193,844,637	193,844,637	114,174,491
2036	202,083,034	202,083,034	119,026,907
2037	210,671,563	210,671,563	124,085,551
2038	219,625,105	219,625,105	129,359,187
2039	228,959,172	228,959,172	134,856,952
2040	238,689,937	238,689,937	140,588,373
2041	248,834,259	248,834,259	146,563,378
2042	259,409,715	259,409,715	152,792,322
2043	270,434,628	270,434,628	159,285,996
2044	281,928,099	281,928,099	166,055,651
2045	293,910,044	293,910,044	173,113,016
2046	306,401,220	306,401,220	180,470,319
2047	319,423,272	319,423,272	188,140,307
2048	332,998,761	332,998,761	196,136,270
2049	347,151,209	347,151,209	204,472,062
2050	361,905,135	361,905,135	213,162,125
2051	377,286,103	377,286,103	222,221,515
2052	393,320,763	393,320,763	231,665,929
2053	410,036,895	410,036,895	241,511,731
2054	427,463,463	427,463,463	251,775,980
2055	445,630,660	445,630,660	262,476,459
2056	464,569,964	464,569,964	273,631,709
2057	484,314,187	484,314,187	285,261,056
2058	504,897,540	504,897,540	297,384,651
2059	526,355,685	526,355,685	310,023,499
2060	548,725,802	548,725,802	323,199,497
2061	572,046,649	143,011,662	84,233,869
<b>Total Proceeds from 2031-2061:</b>		<b>\$ 9,700,363,329</b>	<b>\$ 5,713,514,001</b>
<b>Net Present Value of Proceeds as of 10/1/22:</b>			
<b>After Method Change (at 6.5% interest):</b>		<b>\$ 2,139,793,177</b>	<b>\$ 1,260,338,181</b>





## LIQUIDATION OF THE UNFUNDED ACTUARIAL ACCRUED LIABILITY

### Before Changes

UAAL AMORTIZATION PERIOD AND PAYMENTS						
Original UAAL				Current UAAL*		
Date Established	Type of Amortization Base	Amortization Period (Years)	Amount	Years Remaining	Amount	Payment
10/1/2016	Fresh Start	30	\$ 1,243,587,908	24	\$ 1,153,848,928	\$ 81,805,951
10/1/2017	Experience (Gain)/Loss	30	(102,449,877)	25	(99,463,964)	(6,910,251)
10/1/2017	Assumption Changes	30	67,640,845	25	65,669,446	4,562,379
10/1/2018	Experience (Gain)/Loss	30	(19,072,874)	25	(18,562,606)	(1,289,636)
10/1/2018	Method Change	29	15,507,222	25	15,092,348	1,048,540
10/1/2019	Experience (Gain)/Loss	28	33,690,255	25	32,742,727	2,274,798
10/1/2019	Benefit Change	28	2,158,327	25	2,097,626	145,732
10/1/2020	Experience (Gain)/Loss	27	84,589,421	25	82,620,735	5,740,069
10/1/2020	Assumption Changes	27	36,384,579	25	35,537,786	2,468,985
10/1/2021	Experience (Gain)/Loss	26	(147,822,021)	25	(145,114,375)	(10,081,809)
10/1/2021	Assumption Changes	26	98,517,513	25	96,712,974	6,719,126
10/1/2022	Experience (Gain)/Loss	25	<u>79,289,877</u>	25	<u>79,289,877</u>	<u>5,508,658</u>
			1,392,021,175		1,300,471,502	91,992,542

### After Assumption Changes

UAAL AMORTIZATION PERIOD AND PAYMENTS						
Original UAAL				Current UAAL*		
Date Established	Type of Amortization Base	Amortization Period (Years)	Amount	Years Remaining	Amount	Payment
10/1/2016	Fresh Start	30	\$ 1,243,587,908	24	\$ 1,153,848,928	\$ 80,936,495
10/1/2017	Experience (Gain)/Loss	30	(102,449,877)	25	(99,463,964)	(6,834,389)
10/1/2017	Assumption Changes	30	67,640,845	25	65,669,446	4,512,293
10/1/2018	Experience (Gain)/Loss	30	(19,072,874)	25	(18,562,606)	(1,275,478)
10/1/2018	Method Change	29	15,507,222	25	15,092,348	1,037,029
10/1/2019	Experience (Gain)/Loss	28	33,690,255	25	32,742,727	2,249,825
10/1/2019	Benefit Change	28	2,158,327	25	2,097,626	144,133
10/1/2020	Experience (Gain)/Loss	27	84,589,421	25	82,620,735	5,677,053
10/1/2020	Assumption Changes	27	36,384,579	25	35,537,786	2,441,880
10/1/2021	Experience (Gain)/Loss	26	(147,822,021)	25	(145,114,375)	(9,971,130)
10/1/2021	Assumption Changes	26	98,517,513	25	96,712,974	6,645,362
10/1/2022	Experience (Gain)/Loss	25	79,289,877	25	79,289,877	5,448,183
10/1/2022	Assumption Changes	25	<u>48,230,549</u>	25	<u>48,230,549</u>	<u>3,314,028</u>
			1,440,251,724		1,348,702,051	94,325,284

\*Reflects an offset equal to the net present value of the total pension liability surtax proceeds based on a pro rata share of 58.9%.



### After Method and Assumption Changes

UAAL AMORTIZATION PERIOD AND PAYMENTS						
Original UAAL				Current UAAL*		
Date Established	Type of Amortization Base	Amortization Period (Years)	Amount	Years Remaining	Amount	Payment
10/1/2016	Fresh Start	30	\$ 1,243,587,908	24	\$ 1,153,848,928	\$ 80,936,495
10/1/2017	Experience (Gain)/Loss	30	(102,449,877)	25	(99,463,964)	(6,834,389)
10/1/2017	Assumption Changes	30	67,640,845	25	65,669,446	4,512,293
10/1/2018	Experience (Gain)/Loss	30	(19,072,874)	25	(18,562,606)	(1,275,478)
10/1/2018	Method Change	29	15,507,222	25	15,092,348	1,037,029
10/1/2019	Experience (Gain)/Loss	28	33,690,255	25	32,742,727	2,249,825
10/1/2019	Benefit Change	28	2,158,327	25	2,097,626	144,133
10/1/2020	Experience (Gain)/Loss	27	84,589,421	25	82,620,735	5,677,053
10/1/2020	Assumption Changes	27	36,384,579	25	35,537,786	2,441,880
10/1/2021	Experience (Gain)/Loss	26	(147,822,021)	25	(145,114,375)	(9,971,130)
10/1/2021	Assumption Changes	26	98,517,513	25	96,712,974	6,645,362
10/1/2022	Experience (Gain)/Loss	25	79,289,877	25	79,289,877	5,448,183
10/1/2022	Assumption Changes	25	48,230,549	25	48,230,549	3,314,028
10/1/2022	Method Change	25	<u>48,122,751</u>	25	<u>48,122,751</u>	<u>3,306,621</u>
			1,488,374,475		1,396,824,802	97,631,905

\*Reflects an offset equal to the net present value of the total pension liability surtax proceeds based on a pro rata share of 58.9%.



**Amortization Schedule**

The UAAL is being amortized as a level percent of pay over the number of years remaining in each amortization period. The following schedule illustrates the expected amortization of the UAAL:

Amortization Schedule	
Year	Expected UAAL*
2022	\$ 1,396,824,802
2023	1,383,640,447
2024	1,368,299,373
2025	1,350,645,159
2026	1,330,510,997
2027	1,307,719,038
2032	1,146,799,292
2037	884,999,401
2042	482,336,733
2047	-

\*Reflects an offset equal to the net present value of the total pension liability surtax proceeds based on a pro rata share of 58.9%.

## ACTUARIAL GAINS AND LOSSES

The assumptions used to anticipate mortality, employment turnover, investment income, expenses, salary increases, and other factors have been based on long range trends and expectations. Actual experience can vary from these expectations. The variance is measured by the gain and loss for the period involved. If significant long term experience reveals consistent deviation from what has been expected and that deviation is expected to continue, the assumptions should be modified. The net actuarial gain (loss) for the past year is computed as follows:

1. UAAL at 10/1/2021	\$ 1,245,900,811
2. 2021-22 Total Normal Cost for Benefits (BOY)	71,816,810
3. 2021-22 Contributions (net of Administrative Expenses)	174,578,515
4. Interest at the Assumed Rate on:	
a. 1 and 2 for one year	87,298,792
b. 3 from dates paid	<u>9,256,273</u>
c. a - b	78,042,519
5. Expected UAAL at 10/1/2022 (before changes): 1 + 2 - 3 + 4c	1,221,181,625
6. Actual UAAL at 10/1/2022 (before changes):	1,300,471,502
7. Net Actuarial Gain/(Loss):	(79,289,877)
8. Gain/(Loss) on the Actuarial Value of Assets (net of reserves):	(35,962,782)
9. Gain/(Loss) Due to Changes in Projected Pension Liability Surtax Proceeds:	71,044,702
10. Gain/(Loss) Due to Other Sources:	(114,371,797)

The annual experience gains/(losses) in previous years have been as follows:

<b>Year Ending</b>	<b>Experience Gain / (Loss)</b>
9/30/2013	\$ 86,047,514
9/30/2014	34,912,618
9/30/2015	(182,600,912)
9/30/2016	45,616,836
9/30/2017	102,449,877
9/30/2018	19,072,874
9/30/2019	(33,690,255)
9/30/2020	(84,589,421)
9/30/2021	147,822,021
9/30/2022	(79,289,877)

The fund earnings, salary increase and annual pension liability surtax revenue increase assumptions have considerable impact on the cost of the plan so it is important that they are in line with the actual experience. The following table shows the actual fund earnings, salary increase rates, and pension liability surtax revenue rates compared to the assumed rates for the last few years:

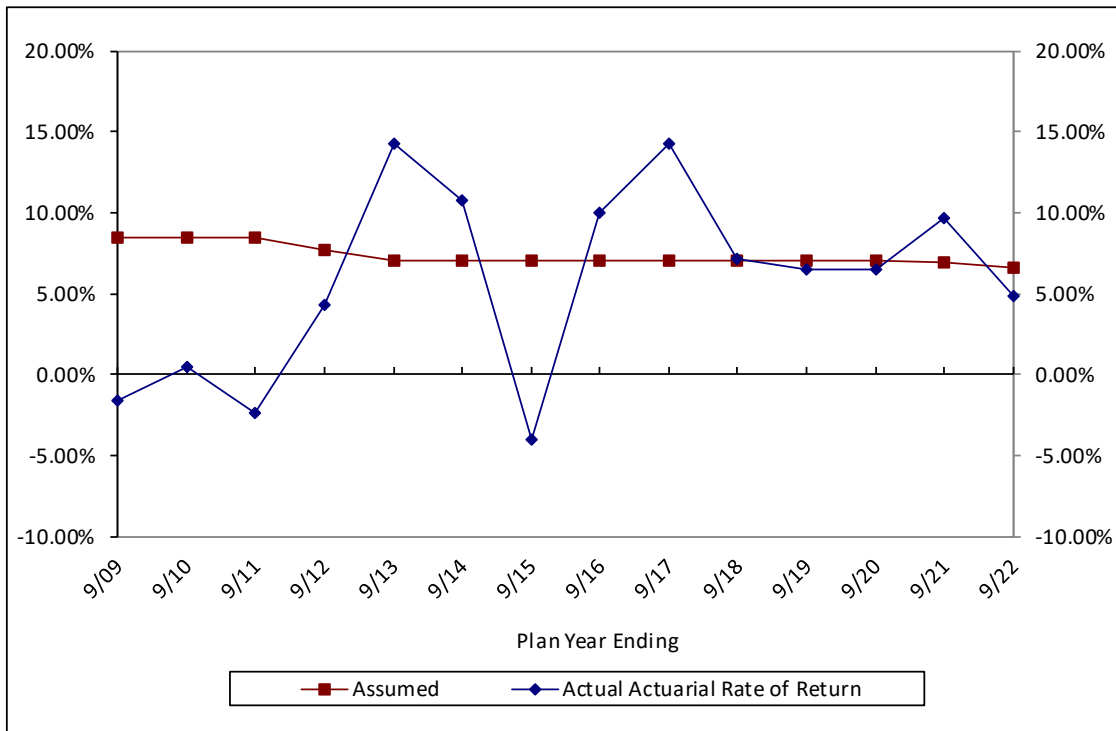
Period Ending	Investment Return		Salary Increases		% Change in Annual PLS Revenue	
	Actual	Assumed	Actual*	Assumed*	Actual*	Assumed*
9/30/2009	(1.63) %	8.50 %	7.0 %	5.5 %		
9/30/2010	0.44	8.50	3.0	5.5		
9/30/2011	(2.41)	8.50	2.5	5.5		
9/30/2012	4.34	7.75	0.4	5.0		
9/30/2013	14.29	7.00	2.9	4.0		
9/30/2014	10.73	7.00	3.0	4.0		
9/30/2015	(4.00)	7.00	3.8	3.5		
9/30/2016	10.00	7.00	2.2	3.5		
9/30/2017	14.27	7.00	12.1	10.0	3.95 %	4.25 %
9/30/2018	7.20	7.00	10.4	10.0	6.25	4.25
9/30/2019	6.46	7.00	11.6	10.5	4.67	4.25
9/30/2020	6.50	7.00	3.4	3.5	(2.15)	4.25
9/30/2021	9.72	6.90	2.3	4.8	14.36	4.25
9/30/2022	4.84	6.625	11.7	4.4	5.25 **	4.25
Average	5.61 %	7.34 %	5.4 %	5.7 %	5.28 %	4.25 %

\*Actual and assumed rates are based on average compound increases for the period.

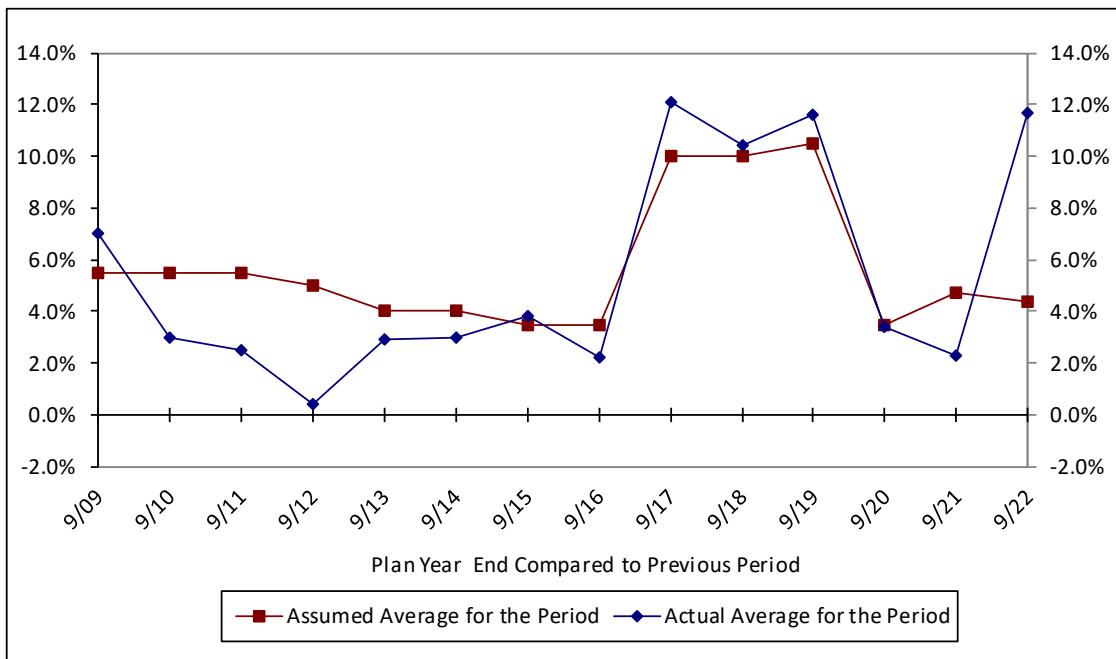
\*Beginning 9/30/2022 the Annual PLS Revenue uses a five-year smoothing method.

The actual investment return rates shown above are based on the actuarial value of assets. The actual salary increase rates shown above are the increases received by those active members who were included in the actuarial valuations both at the beginning and end of each period. The actual pension liability surtax rates shown above are based on the smoothed pension liability surtax revenue.

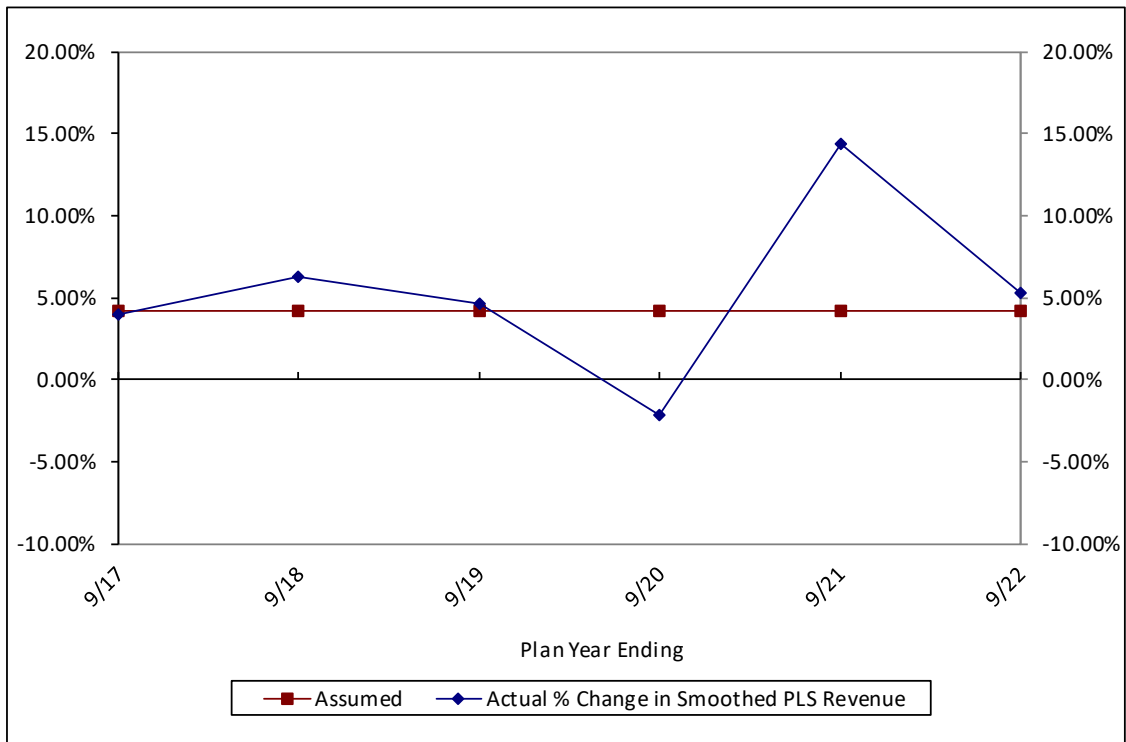
## History of Investment Return Based on Actuarial Value of Assets



## History of Salary Increases



## History of Pension Liability Surtax Revenue Increases





**Number Added To and Removed from Active Participation  
Actual (A) Compared to Expected (E)**

Year Ended	Number Added During Year		Service & DROP Retirement		Disability Retirement		Died In Service		Terminations				Active Members End of Year
	A	E	A	E	A	E	A	E	Vested	Other	Totals		
	A	E	A	E	A	E	A	E	A	A	A	E	
9/30/2017	231	163	110	107	2	3	4	3	16	31	47	25	2,362
9/30/2018	132	28	68	79	0	3	3	3	18	21	39	27	2,384
9/30/2019	0	0	50	87	2	3	2	3	16	13	29	27	2,301
9/30/2020	0	0	56	92	0	3	1	3	6 *	2	8	24	2,236
9/30/2021	0	0	145	115	0	2	2	3	22	10	32	22	2,057
9/30/2022	0	0	163	100	1	2	6	3	13 *	2	15	20	1,872
6-Yr Total	363	191	592	580	5	16	18	18	91	79	170	145	

\*Adjusted to reflect rehired vested terminated members.

Note: Participant data is collected as of July 1. The plan was closed to new members as of October 1, 2017.

## RECENT HISTORY OF VALUATION RESULTS

Valuation Date	Number of		Covered Annual Payroll	Actuarial Accrued Liability (AAL)	Actuarial Value of Assets	Funded Ratio	Unfunded AAL (UAAL)	UAAL as a % of Covered Payroll
	Active Members	Inactive Members						
10/1/2000	2,049	1,797	\$ 97,207	\$ 939,802	\$ 814,889	86.7 %	\$ 124,913	128.5 %
10/1/2001	2,037	1,883	96,199	927,625	790,823	85.3	136,802	142.2
10/1/2002	2,068	1,975	101,698	977,779	725,416	74.2	252,363	248.1
10/1/2003	2,182	1,994	109,637	1,146,459	732,526	63.9	413,933	377.6
10/1/2004	2,347	2,019	118,510	1,222,355	727,955	59.6	494,400	417.2
10/1/2005	2,450	2,046	130,392	1,314,424	765,180	58.2	549,244	421.2
10/1/2006	2,509	2,068	134,694	1,376,659	827,338	60.1	549,321	407.8
10/1/2007	2,541	2,117	143,006	1,464,508	930,454	63.5	534,054	373.4
10/1/2008	2,534	2,164	148,277	1,692,975	894,903	52.9	798,072	538.2
10/1/2009	2,583	2,278	155,558	1,753,946	855,997	48.8	897,949	577.2
10/1/2010	2,620	2,353	158,047	2,024,453	1,060,406	52.4	964,047	610.0
10/1/2011	2,451	2,481	148,968	2,427,198	1,039,894	42.8	1,387,304	931.3
10/1/2012	2,213	2,647	133,611	2,762,977	1,078,907	39.0	1,684,070	1,260.4
10/1/2013	2,150	2,725	130,972	2,876,606	1,228,131	42.7	1,648,475	1,258.6
10/1/2014	2,237	2,801	134,521	2,983,906	1,389,748	46.6	1,594,158	1,185.1
10/1/2015	2,202	2,906	132,735	3,142,228	1,354,405	43.1	1,787,823	1,346.9
10/1/2016	2,294	2,963	135,600	3,518,252	1,513,398	43.0	2,004,853	1,478.5
10/1/2017	2,362	3,055	149,490	3,736,610	1,765,159	47.2	1,971,451	1,318.8
10/1/2018	2,384	3,092	162,004	3,880,073	1,865,496	48.1	2,014,577	1,243.5
10/1/2019	2,301	3,127	174,125	4,036,925	1,946,967	48.2	2,089,958	1,200.3
10/1/2020	2,236	3,150	174,186	4,253,525	2,041,049	48.0	2,212,476	1,270.2
10/1/2021	2,057	3,276	161,836	4,574,334	2,198,635	48.1	2,375,699	1,468.0
10/1/2022	1,872	3,418	162,885	4,916,393	2,259,230	46.0	2,657,163	1,631.3

Note: Dollar amounts are in thousands.



**RECENT HISTORY OF REQUIRED AND ACTUAL CITY CONTRIBUTIONS**

Valuation Date	End of Year To Which Valuation Applies	Required Contributions		Actual Contributions			
		Amount	% of Payroll	City Contributions	Alotted from Reserves*	Total	% of Payroll
10/1/2003	9/30/2005	\$ 35,929	27.55 %	\$ 27,176	\$ 8,753	\$ 35,929	27.55 %
10/1/2003	9/30/2006	38,230	28.38	36,124	2,106	38,230	28.38
10/1/2003	9/30/2007	39,850	27.87	44,208	(4,358)	39,850	27.87
10/1/2006	9/30/2008	48,807	32.92	48,364	443	48,807	32.92
10/1/2006	9/30/2009	50,564	32.51	50,235	329	50,564	32.51
10/1/2008	9/30/2010	77,182	48.83	82,197	(5,015)	77,182	48.83
10/1/2008	9/30/2011	77,065	51.73	75,903	1,162	77,065	51.73
10/1/2008	9/30/2012	73,729	55.18	70,599	3,130	73,729	55.18
10/1/2011	9/30/2013	99,997	76.35	122,580	(22,583)	99,997	76.35
10/1/2012	9/30/2014	142,433	105.88	149,159	(6,726)	142,433	105.88
10/1/2013	9/30/2015	153,604	115.72	153,936	(332)	153,604	115.72
10/1/2014	9/30/2016	149,499	110.70	149,499	0	149,499	110.70
10/1/2015	9/30/2017	167,788	119.60	167,788	0	167,788	119.60
10/1/2016	9/30/2018	135,648	90.74	115,691	20,000	135,691	90.77
10/1/2017	9/30/2019	135,264	88.36	110,528	24,736	135,264	83.49
10/1/2018	9/30/2020	140,293	84.57	123,329	16,964	140,293	80.57
10/1/2019	9/30/2021	148,476	83.27	134,725	13,751	148,476	85.24
10/1/2020	9/30/2022	157,352	88.23	157,352	0	157,352	97.23
10/1/2021	9/30/2023	156,994	94.79	---	---	---	---
10/1/2022	9/30/2024	174,040	104.43	---	---	---	---

Note: Dollar amounts are in thousands.

\*Actual contributions include the use of funds from the City Contribution reserve (or the City Budget Stabilization Account (CBSA) prior to fiscal year ending Spetember 30, 2016).

# ACTUARIAL ASSUMPTIONS AND COST METHOD

## Valuation Methods

**Actuarial Cost Method** - Normal cost and the allocation of benefit values between service rendered before and after the valuation date were determined using an **Individual Entry-Age Actuarial Cost Method** having the following characteristics:

- (i) the annual normal cost for each individual active member, payable from the date of employment to the dates of expected retirement, is sufficient to accumulate the value of the member's benefit at the time of retirement;
- (ii) each annual normal cost is a constant percentage of the member's year by year projected covered pay.

Actuarial gains/(losses), as they occur, reduce (increase) the Unfunded Actuarial Accrued Liability.

**Financing of Unfunded Actuarial Accrued Liabilities** - Unfunded Actuarial Accrued Liabilities were amortized as a level (principal & interest combined) percent of payroll over a prescribed period of up to 25 years. *The maximum prescribed period was 26 years in the prior valuation.* This period will be reduced by 1 year in each future year until it reaches 15 years. The assumed payroll growth rate is 1.25%.

**Actuarial Value of Assets** - The Actuarial Value of Assets phase in the difference between the expected actuarial value and actual market value of assets at the rate of 20% per year. The Actuarial Value of Assets will be further adjusted to the extent necessary to fall within the corridor whose lower limit is 80% of the Market Value of plan assets and whose upper limit is 120% of the Market Value of plan assets. During periods when investment performance exceeds the assumed rate, Actuarial Value of Assets will tend to be less than Market Value. During periods when investment performance is less than assumed rate, Actuarial Value of Assets will tend to be greater than Market Value.

**Smoothed Annual Pension Liability Surtax Revenue** - The Smoothed Annual Pension Liability Surtax (PLS) Revenue phases in the difference between the expected smoothed value and Actual Pension Liability Surtax Revenue at the rate of 20% per year. The Smoothed Annual PLS Revenue will be further adjusted to the extent necessary to fall within the corridor whose lower limit is 80% of the Actual PLS Revenue and whose upper limit is 120% of the Actual PLS Revenue. During periods when actual increases in the surtax revenue exceed the assumed rate, the smoothed Annual PLS Revenue will tend to be lower than the Actual PLS Revenue. During periods when actual increases in the surtax revenue are less than the assumed rate, the smoothed Annual PLS Revenue will tend to be higher than the Actual PLS Revenue. *The actual (unsmoothed) pension liability surtax revenue received during the most recent fiscal year was used in the prior valuation.*

## Valuation Assumptions

The actuarial assumptions used in the valuation are shown in this Section.



## Economic Assumptions

The ***investment return rate*** assumed in the valuation is 6.50% per year, compounded annually. *This rate was 6.625% in the previous valuation.*

The ***inflation rate*** assumed in this valuation was 2.25% per year.

The assumed ***real rate of return*** over inflation is defined to be the portion of total investment return that is more than the assumed inflation rate. Considering other economic assumptions, the 6.50% investment return rate translates to an assumed real rate of return over inflation of 4.25%.

The ***rates of salary increase*** used are in accordance with the following tables below and are based on the Experience Study dated October 22, 2020. Part of the assumption is for merit and/or seniority service increase, and 2.25% recognizes inflation. This assumption is used to project a member's current salary to the salaries upon which benefits will be based.

% Increase in Salary			
Years of Service	Merit and Seniority	Inflation	Total Increase
3	9.25%	2.25%	11.50%
4	7.50%	2.25%	9.75%
5	4.25%	2.25%	6.50%
6 - 7	2.75%	2.25%	5.00%
8 - 10	2.00%	2.25%	4.25%
11 - 14	1.40%	2.25%	3.65%
15 - 18	1.10%	2.25%	3.35%
19 & Over	0.50%	2.25%	2.75%

Note the plan is closed to new entrants effective October 1, 2017. As of October 1, 2020, active members have a minimum of 3 years of service.

## Demographic Assumptions

The ***mortality table*** is the PUB-2010 Headcount Weighted Safety Healthy Employee Mortality Table (for pre-retirement mortality) and the PUB-2010 Headcount Weighted Safety Healthy Retiree Mortality Table (for postretirement mortality), with separate rates for males and females and ages set forward one year, with mortality improvements projected to all future years after 2010 using Scale MP-2018. For males, the base mortality rates for both pre-retirement and postretirement mortality are based on the Below Median Healthy tables. These are the same rates currently in use for Special Risk class members of the Florida Retirement System (FRS), as mandated by Chapter 112.63, Florida Statutes.



**FRS Healthy Post-Retirement Mortality for Special Risk Class Members**

Sample Attained Ages in 2022	Probability of Dying Next Year		Future Life Expectancy (years)	
	Men	Women	Men	Women
	50	0.42 %	0.20 %	32.59
55	0.55	0.36	27.82	31.39
60	0.92	0.60	23.23	26.59
65	1.31	0.92	18.95	22.07
70	2.08	1.44	14.93	17.81
75	3.51	2.40	11.32	13.88
80	6.24	4.12	8.24	10.41

This assumption is used to measure the probabilities of each benefit payment being made after retirement.

**FRS Healthy Pre-Retirement Mortality for Special Risk Class Members**

Sample Attained Ages in 2022	Probability of Dying Next Year		Future Life Expectancy (years)	
	Men	Women	Men	Women
	50	0.16 %	0.10 %	35.74
55	0.25	0.16	30.66	34.51
60	0.42	0.22	25.70	29.44
65	0.69	0.30	20.93	24.42
70	1.17	0.54	16.40	19.51
75	2.06	1.06	12.16	14.81
80	6.24	4.12	8.24	10.41

This assumption is used to measure the probabilities of active members dying prior to retirement.

For disabled retirees, the mortality table is 80% of the PUB-2010 Headcount Weighted General Disabled Retiree Mortality Table, and 20% of the PUB-2010 Headcount Weighted Safety Disabled Retiree Mortality Table, both with separate rates for males and females, with no provision being made for future mortality improvements. These are the same rates currently in use for Special Risk class members of the Florida Retirement System (FRS), as mandated by Chapter 112.63, Florida Statutes.

**FRS Disabled Mortality for Special Risk Class Members**

Sample Attained Ages in 2022	Probability of Dying Next Year		Future Life Expectancy (years)	
	Men	Women	Men	Women
	50	1.45 %	1.25 %	24.04
55	1.91	1.50	20.88	23.54
60	2.37	1.81	17.92	20.32
65	3.00	2.22	15.07	17.17
70	3.91	2.90	12.39	14.10
75	5.30	4.13	9.87	11.22
80	7.66	6.21	7.60	8.67



The **rates of retirement** used to measure the probability of eligible members retiring during the next year were as follows and are based on the Experience Study dated October 22, 2020.

<b>Service</b>	<b>Age</b>	<b>Service Retirement</b>
20	Under 50	45.0%
	50 - 54	55.0
	55 - 59	60.0
	60 & Over	100.0
21	Under 50	25.0
	50 - 59	30.0
	60 & Over	50.0
22 - 23	Under 50	15.0
	50 - 59	30.0
	60 & Over	50.0
24 - 28	Under 60	25.0
	60 & Over	50.0
29	Any Age	50.0
30 & Over	Any Age	100.0

**Rates of separation from active membership** were as shown below (rates do not apply to members eligible to retire and do not include separation on account of death or disability) and are based on the Experience Study dated October 22, 2020. This assumption measures the probabilities of members separating from employment for reasons other than death, disability or retirement.

<b>Sample Ages</b>	<b>% of Active Members Separating Within Next Year</b>
20	1.6%
25	1.6
30	1.6
35	1.2
40	0.9
45	0.9
50	0.9
55	0.5

***Rates of disability*** among active members are shown below and are based on the Experience Study dated October 22, 2020.

**% Becoming Disabled Within Next Year**

<u>Sample Ages</u>	<u>Male/Female</u>
20	0.025%
25	0.025
30	0.025
35	0.034
40	0.042
45	0.084
50	0.185
55	0.378
60	0.756
64	0.470



## Miscellaneous and Technical Assumptions

<b><i>Administrative &amp; Investment Expenses</i></b>	Annual administrative and investment expenses are assumed to be equal to the prior year's expenses. Assumed administrative and investment expenses are added to the Normal Cost.
<b><i>Benefit Service</i></b>	Exact fractional service is used to determine the amount of benefit payable. Actual credited service as of the July 1 <sup>st</sup> prior to the valuation date is used in the valuation.
<b><i>Decrement Operation</i></b>	Disability and mortality decrements operate during retirement eligibility.
<b><i>Decrement Relativity</i></b>	Decrement rates are used without adjustment for multiple decrement table effects.
<b><i>Decrement Timing</i></b>	Decrements of all types are assumed to occur at the beginning of the year.
<b><i>DROP Load</i></b>	Explicit valuation of the liabilities and costs associated with the actual DROP interest crediting rate using procedures described in the DROP Interest Study dated September 28, 2017.
<b><i>DROP Participation</i></b>	For purposes of the explicit valuation of the DROP Load, active members who choose to retire are assumed to elect to enter the DROP (as a Phase I member) 96% of the time (versus separating from employment). Members whose DROP entry dates are less than 18 months prior to the valuation date are assumed to remain employed (as a Phase I member) for an average total active DROP participation period of 4 years and 7 months. Phase I members whose DROP entry dates are 18 or more months prior to the valuation date are assumed to remain employed (as a Phase I member) for the 5-year maximum DROP participation period. At the end of the DROP participation period, Phase I members are assumed to elect a bi-weekly distribution (as a Phase II member) 95% of the time (versus electing a lump sum) over an assumed distribution period of 30 years.
<b><i>Eligibility Testing</i></b>	Eligibility for benefits is determined based upon the age nearest birthday and service nearest whole year on the date the decrement is assumed to occur.
<b><i>Forfeitures</i></b>	No vested terminated refunds or disability recoveries are assumed to occur.

***Incidence of Contributions***

Member contributions are assumed to be received continuously throughout the year based upon the member contribution rate. Employer contributions are assumed to be received in full on December 1<sup>st</sup> and are assumed to be equal to the dollar amount shown.

***Marriage and Survivor Assumption***

For death-in-service, 50% of active member deaths are assumed to have a surviving spouse and an additional 20% of active member deaths are assumed to have an eligible orphaned child. Orphaned children of active members are assumed to be paid for a period of 10 years. For all retirees (current and future), 65% of males and 65% of females are assumed to be married and a 75% survivor benefit will be paid after the death of the retiree. Male members are assumed to be 5 years older than their surviving spouse and female members are assumed to be 5 years younger than their surviving spouse.

***Normal Form of Benefit***

A 75% joint and contingent life annuity is the normal form of benefit.

***Pension Liability Surtax***

58.9% of the total proceeds from the City of Jacksonville’s pension liability is assumed to be allocated to the Jacksonville Police and Fire Pension Fund beginning with fiscal year 2031. Sales tax revenue is projected to increase by 4.25% annually. In the previous valuation, the pro rata share of the total proceeds was 58.3%. This allocation percentage is updated each year by the City based on the relative unfunded actuarial liabilities for all three of the City’s pension plans.

***Pay Increase Timing***

Reported pays were assumed to be the pays for the current year beginning on the valuation date. Future pay increases are assumed to occur at the end of the year.

***Service Credit Accruals***

It is assumed that members accrue one year of service credit per year.

## GLOSSARY

<b><i>Actuarial Accrued Liability (AAL)</i></b>	The difference between the Actuarial Present Value of Future Benefits, and the Actuarial Present Value of Future Normal Costs.
<b><i>Actuarial Assumptions</i></b>	Assumptions about future plan experience that affect costs or liabilities, such as: mortality, withdrawal, disablement, and retirement; future increases in salary; future rates of investment earnings; future investment and administrative expenses; characteristics of members not specified in the data, such as marital status; characteristics of future members; future elections made by members; and other items.
<b><i>Actuarial Cost Method</i></b>	A procedure for allocating the Actuarial Present Value of Future Benefits between the Actuarial Present Value of Future Normal Costs and the Actuarial Accrued Liability.
<b><i>Actuarial Equivalent</i></b>	Of equal Actuarial Present Value, determined as of a given date and based on a given set of Actuarial Assumptions.
<b><i>Actuarial Present Value (APV)</i></b>	The amount of funds required to provide a payment or series of payments in the future. It is determined by discounting the future payments with an assumed interest rate and with the assumed probability each payment will be made.
<b><i>Actuarial Present Value of Future Benefits (APVFB)</i></b>	The Actuarial Present Value of amounts which are expected to be paid at various future times to active members, retired members, beneficiaries receiving benefits, and inactive, nonretired members entitled to either a refund or a future retirement benefit. Expressed another way, it is the value that would have to be invested on the valuation date so that the amount invested plus investment earnings would provide sufficient assets to pay all projected benefits and expenses when due.
<b><i>Actuarial Valuation</i></b>	The determination, as of a valuation date, of the Normal Cost, Actuarial Accrued Liability, Actuarial Value of Assets, and related Actuarial Present Values for a plan.
<b><i>Actuarial Value of Assets</i></b>	The value of the assets as of a given date, used by the actuary for valuation purposes. This may be the market or fair value of plan assets or a smoothed value in order to reduce the year-to-year volatility of calculated results, such as the funded ratio and the actuarially determined contribution (ADC).

<b><i>Actuarially Determined Contribution (ADC)</i></b>	The employer's periodic required contributions, expressed as a dollar amount or a percentage of covered plan compensation, determined under GASB. The ADC consists of the Employer Normal Cost and Amortization Payment.
<b><i>Amortization Method</i></b>	A method for determining the Amortization Payment. The most common methods used are level dollar and level percentage of payroll. Under the Level Dollar method, the Amortization Payment is one of a stream of payments, all equal, whose Actuarial Present Value is equal to the UAAL. Under the Level Percentage of Pay method, the Amortization Payment is one of a stream of increasing payments, whose Actuarial Present Value is equal to the UAAL. Under the Level Percentage of Pay method, the stream of payments increases at the rate at which total covered payroll of all active members is assumed to increase.
<b><i>Amortization Payment</i></b>	That portion of the plan contribution or ADC which is designed to pay interest on and to amortize the Unfunded Actuarial Accrued Liability.
<b><i>Amortization Period</i></b>	The period used in calculating the Amortization Payment.
<b><i>Closed Amortization Period</i></b>	A specific number of years that is reduced by one each year, and declines to zero with the passage of time. For example, if the amortization period is initially set at 30 years, it is 29 years at the end of one year, 28 years at the end of two years, etc.
<b><i>Employer Normal Cost</i></b>	The portion of the Normal Cost to be paid by the employer. This is equal to the Normal Cost less expected member contributions.
<b><i>Equivalent Single Amortization Period</i></b>	For plans that do not establish separate amortization bases (separate components of the UAAL), this is the same as the Amortization Period. For plans that do establish separate amortization bases, this is the period over which the UAAL would be amortized if all amortization bases were combined upon the current UAAL payment.
<b><i>Experience Gain/Loss</i></b>	A measure of the difference between actual experience and that expected based upon a set of Actuarial Assumptions, during the period between two actuarial valuations. To the extent that actual experience differs from that assumed, Unfunded Actuarial Accrued Liabilities emerge which may be larger or smaller than projected. Gains are due to favorable experience, e.g., the assets earn more than projected, salaries do not increase as fast as assumed, members retire later than assumed, etc. Favorable experience means actual results produce actuarial liabilities not as large as projected by the actuarial assumptions. On the other hand, losses are the result of unfavorable experience, i.e., actual results that produce Unfunded Actuarial Accrued Liabilities which are larger than projected.



<b><i>Funded Ratio</i></b>	The ratio of the Actuarial Value of Assets to the Actuarial Accrued Liability.
<b><i>GASB</i></b>	Governmental Accounting Standards Board.
<b><i>Normal Cost</i></b>	The annual cost assigned, under the Actuarial Cost Method, to the current plan year.
<b><i>Unfunded Actuarial Accrued Liability</i></b>	The difference between the Actuarial Accrued Liability and Actuarial Value of Assets.
<b><i>Valuation Date</i></b>	The date as of which the Actuarial Present Value of Future Benefits are determined. The benefits expected to be paid in the future are discounted to this date.

## SECTION C

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### PENSION FUND INFORMATION

## Statement of Total Plan Assets at Market Value

Item	September 30	
	2022	2021
A. Cash and Short-Term Investments (Operating Cash)	\$ 25,366,384	\$ 27,436,489
B. Receivables:		
1. Accounts Receivable	\$ 81,351	\$ 81,351
2. Interest and Dividends	1,985,159	1,492,958
3. Employer Contribution	27,290	964,402
4. Prepaid Items and Recoverable Taxes	-	81,675
5. Other Assets	399,075	-
6. Securities Lending Collateral	82,803,809	89,580,224
7. Deferred Outflows	70,447	112,110
8. Total Receivables	<u>\$ 85,367,131</u>	<u>\$ 92,312,720</u>
C. Property, Plant and Equipment		
1. Furniture and Equipment	\$ 311,510	\$ 311,510
2. Accumulated Depreciation	(311,510)	(311,510)
3. Net Total	<u>\$ 0</u>	<u>\$ 0</u>
D. Investments		
1. Cash and Cash Equivalents	\$ 18,542,690	\$ 10,893,760
2. Domestic and International Equities	1,284,566,586	1,841,549,716
3. Fixed Income Securities	211,493,584	341,556,255
4. Real Estate	334,610,244	274,371,010
5. Other Securities (Partnership)	123,092,173	-
6. Total Investments	<u>\$ 1,972,305,277</u>	<u>\$ 2,468,370,741</u>
E. Liabilities		
1. Accounts Payable	\$ (2,531,466)	\$ (10,691,600)
2. Other Post Employment Benefits	-	-
3. Securities Lending Collateral	(82,803,809)	(89,580,224)
4. Other Liabilities and Deferred Inflows	(886,702)	(219,661)
5. Total Liabilities	<u>\$ (86,221,977)</u>	<u>\$ (100,491,485)</u>
F. Total Market Value of Assets	\$ 1,996,816,815	\$ 2,487,628,465
G. Allocation of Investments		
1. Cash and Cash Equivalents	1.0%	0.5%
2. Domestic and International Equities	65.1%	74.6%
3. Fixed Income Securities	10.7%	13.8%
4. Real Estate	17.0%	11.1%
5. Other Securities (Partnership)	6.2%	0.0%
6. Total Investments	<u>100.0%</u>	<u>100.0%</u>



## Reconciliation of Plan Assets

Item	September 30	
	2022	2021
A. Market Value at Beginning of Year	\$ 2,487,628,465	\$ 2,054,799,648
Beginning of Year Adjustment	(728,568)	-
Adjusted Market Value at Beginning of Year	\$ 2,486,899,897	\$ 2,054,799,648
B. Revenues and Expenditures		
1. Contributions		
a. Member Contributions	\$ 17,362,646	\$ 17,995,930
b. Plan Member Buybacks and Pension Transfers	914,588	1,122,389
c. Employer Contributions	157,352,434	134,725,329
d. Military Leave Pension Contributions	168,042	-
e. State Contributions	15,797,724	14,306,665
f. Court Fines and Penalties	666,933	724,217
g. Supplemental Payment	-	-
h. Miscellaneous	259,815	(33,717)
i. Total	\$ 192,522,182	\$ 168,840,813
2. Investment Income		
a. Parking and Rental Revenue	\$ 598,765	\$ 695,577
b. Securities Lending Net Revenue	220,700	(38,107)
c. Investment Income and Realized Gains	107,883,663	139,972,136
d. Unrealized Gains/(Losses)	(529,034,309)	360,464,598
e. Investment Expenses	(12,508,244)	(9,774,491)
f. Net Investment Income	\$ (432,839,425)	\$ 491,319,713
3. Benefits and Refunds		
a. Regular Monthly Benefits	\$ (184,989,472)	\$ (166,933,156)
b. Refunds	(1,579,603)	(1,387,209)
c. DROP Payments	(42,661,634)	(41,194,484)
d. Reserve Distributions	(18,389,187)	(15,612,089)
e. Total	\$ (247,619,896)	\$ (225,126,938)
4. Administrative and Miscellaneous Expenses	\$ (2,145,943)	\$ (2,204,771)
C. Market Value of Assets at End of Year	\$ 1,996,816,815	\$ 2,487,628,465





**RESERVE ACCOUNT BALANCES AS OF SEPTEMBER 30, 2022**

	City of Jacksonville Contribution <u>Reserve</u>	Balance to be Allocated to Police Officers and Firefighters <u>and Firefighters</u>	<u>TOTALS</u>
Account Value, 10/1/2021	\$ 6,308,079	\$ 2,801,824	\$ 9,109,903
Annual Retiree Bonus paid December 2021	-	(2,818,846)	(2,818,846)
Annual Earnings (-16.78%)	(1,058,496)	(89,115)	(1,147,611)
Allocated Towards Required City Contribution	-	-	-
Receipt of FY 2022 Chapter Funds	-	15,797,724	15,797,724
FY 2022 Chapter Funds Re-allocated to Jax Beach	-	(158,582)	(158,582)
Partial Disbursement of FY 2022 Chapter Funds	-	(12,605,692)	(12,605,692)
<b>Account Value, 9/30/2022</b>	<b>\$ 5,249,583</b>	<b>\$ 2,927,313</b>	<b>\$ 8,176,896</b>

<b>RECONCILIATION OF SHARE PLAN</b>	
Account Value, 9/30/2021	\$ 13,348,911
Contributions credited to accounts	+ 0
Investment Earnings credited (-16.78%)	+ (2,026,726) <sup>1</sup>
Payments from accounts	- <u>2,429,871</u>
Account Value, 9/30/2022	8,892,314

<b>RECONCILIATION OF JPPPF SENIOR STAFF VOLUNTARY RETIREMENT TRUST FUND</b>	
Account Value, 9/30/2021	\$ 4,605,550
Contributions credited to accounts	+ 49,031
Investment Earnings credited (-16.78%)	+ (739,800) <sup>1</sup>
Payments from accounts	- <u>376,196</u>
Account Value, 9/30/2022	3,538,585

<sup>1</sup> -16.78% applied to beginning-of-year account value, and mid-year timing assumed on regular payments from accounts during the year.

## Actuarial Value of Assets

Valuation Date - September 30	2021	2022	2023	2024	2025	2026
A. Actuarial Value of Assets Beginning of Year	\$ 2,075,783,788	\$ 2,225,699,110	\$ -	\$ -	\$ -	\$ -
B. Market Value End of Year	2,487,628,465	1,996,816,815	-	-	-	-
C. Market Value Beginning of Year	2,054,799,648	2,487,628,465	-	-	-	-
D. Non-Investment/Administrative Net Cash Flow	(58,490,896)	(57,972,225)	-	-	-	-
E. Investment Income						
E1. Actual Market Total: B-C-D	491,319,713	(432,839,425)	-	-	-	-
E2. Assumed Rate of Return	6.90%	6.625%	-	-	-	-
E3. Assumed Amount of Return <sup>1</sup>	146,440,865	170,891,608	-	-	-	-
E4. Amount Subject to Phase-In: E1-E3	344,878,848	(603,731,033)	-	-	-	-
F. Phase-In Recognition of Investment Income						
F1. Current Year: 0.2 x E4	68,975,770	(120,746,207)	-	-	-	-
F2. First Prior Year	3,923,923	68,975,770	(120,746,207)	-	-	-
F3. Second Prior Year	(14,811,146)	3,923,923	68,975,770	(120,746,207)	-	-
F4. Third Prior Year	3,876,806	(14,811,146)	3,923,923	68,975,770	(120,746,207)	-
F5. Fourth Prior Year	-	3,876,804	(14,811,148)	3,923,921	68,975,768	(120,746,205)
F6. Total Phase-Ins	61,965,353	(58,780,856)	(62,657,662)	(47,846,516)	(51,770,439)	(120,746,205)
<b>G. Actuarial Value of Assets End of Year</b>						
G1. Preliminary Actuarial Value of Assets End of Year	\$ 2,225,699,110	\$ 2,279,837,637	\$ -	\$ -	\$ -	\$ -
G2. Upper Corridor Limit: 120%*B	2,985,154,158	2,396,180,178	-	-	-	-
G3. Lower Corridor Limit: 80%*B	1,990,102,772	1,597,453,452	-	-	-	-
G4. Funding Value End of Year	2,225,699,110	2,279,837,637	-	-	-	-
G5. Less: Reserve Accounts, including Share Plan	(22,458,814)	(17,069,210)	-	-	-	-
G6. Less: Sr. Staff Plan Assets	(4,605,550)	(3,538,585)	-	-	-	-
G7. Final Funding Value End of Year	2,198,634,746	2,259,229,842	-	-	-	-
G8. Final Market Value End of Year	2,460,564,101	1,976,209,020	-	-	-	-
H. Difference between Market & Actuarial Value of Assets	261,929,355	(283,020,822)	-	-	-	-
<b>I. Actuarial Rate of Return (net money-weighted)<sup>1</sup></b>	9.72%	4.84%	0.00%	0.00%	0.00%	0.00%
<b>J. Market Value Rate of Return (net money-weighted)</b>	23.15%	-16.78%	0.00%	0.00%	0.00%	0.00%
<b>K. Ratio of Actuarial Value of Assets to Market Value</b>	89.47%	114.17%	0.00%	0.00%	0.00%	0.00%

<sup>1</sup>Derived based on the net money-weighted rate of return on the market value of assets provided by the Plan's investment consultant, which was -16.78% as of September 30, 2022 and 23.15% as of September 30, 2021.



Period Ending	Net Investment Rate of Return	
	Total Market Value	Total Actuarial Value
9/30/2008	(13.1) %	N/A
9/30/2009	(1.7)	(1.6) %
9/30/2010	8.5	0.4
9/30/2011	0.1	(2.4)
9/30/2012	18.3	4.3
9/30/2013	14.3	14.3 *
9/30/2014	10.7	10.7 *
9/30/2015	(4.0)	(4.0) *
9/30/2016	10.0	10.0 *
9/30/2017	14.3	14.3 *
9/30/2018	8.0	7.2 **
9/30/2019	3.0	6.5 **
9/30/2020	8.0	6.5 **
9/30/2021	23.2	9.7 **
9/30/2022	(16.8)	4.8 **
<b>Average Returns:</b>		
Last 3 Years	3.4 %	7.0 %
Last 5 Years	4.3 %	6.9 %
Last 10 Years	6.5 %	7.9 %
All Years Shown Above	5.0 %	5.6 %

\*For YE 9/30/2013 to YE 9/30/2017 the Actuarial Value is equal to the Market Value.

\*\*Beginning 9/30/2018 the Actuarial Value of Assets uses a five-year smoothing method.

The above rates are based on the retirement system's financial information reported to the actuary. They may differ from figures that the investment consultant reports, in part because of differences in the handling of administrative and investment expenses, and in part because of differences in the handling of cash flows.



## **SECTION D**

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### **FINANCIAL ACCOUNTING INFORMATION**

<b>FASB NO. 35 INFORMATION</b>		
A. Valuation Date	October 1, 2022	October 1, 2021
B. Actuarial Present Value of Accumulated Plan Benefits		
1. Vested Benefits		
a. Members Currently Receiving Payments	\$ 3,711,232,990	\$ 3,429,707,545
b. Terminated Vested Members	29,955,474	25,785,262
c. Other Members	999,029,523	947,049,871
d. Total	<u>4,740,217,987</u>	<u>4,402,542,678</u>
2. Non-Vested Benefits	30,604,174	30,933,784
3. Total Actuarial Present Value of Accumulated Plan Benefits: 1d + 2	4,770,822,161	4,433,476,462
4. Accumulated Contributions of Active Members	125,251,287	126,675,159
C. Changes in the Actuarial Present Value of Accumulated Plan Benefits		
1. Total Value at Beginning of Year	4,433,476,462	4,082,580,032
2. Increase (Decrease) During the Period Attributable to:		
a. Plan Amendments	0	0
b. Change in Actuarial Assumptions	79,835,030	159,441,349
c. Latest Member Data, Benefits Accumulated and Decrease in the Discount Period	486,741,378	400,969,930
d. Benefits Paid (Net of Reserves)	<u>(229,230,709)</u>	<u>(209,514,849)</u>
e. Net Increase	337,345,699	350,896,430
3. Total Value at End of Period	4,770,822,161	4,433,476,462
D. Net Market Value of Assets	1,976,209,020	2,460,564,101
E. Funded Ratio Using Net Market Value: D / C3	41.4%	55.5%
F. Actuarial Assumptions - See page entitled Actuarial Assumptions and Methods		

# SUMMARY OF DISCLOSURES

## GASB Statement No. 67

Actuarial Valuation Date September 30, 2022  
Pension Plan's Fiscal Year Ending Date (Asset Measurement Date & Reporting Date) September 30, 2022

### Membership

Number of	
- Retirees and Beneficiaries	3,324
- Inactive, Nonretired Members	94
- Active Members	1,872
- Total	5,290
Covered Payroll	\$ 162,885,451

### Net Pension Liability

Total Pension Liability	\$ 4,933,462,035
Total Plan Fiduciary Net Position	1,993,278,230
City's Net Pension Liability	\$ 2,940,183,805
Plan Fiduciary Net Position as a Percentage of Total Pension Liability	40.40%
Net Pension Liability as a Percentage of Covered Payroll	1,805.06%

### Development of the Single Discount Rate

Single Discount Rate	6.50%
Long-Term Expected Rate of Return	6.50%
Long-Term Municipal Bond Rate*	4.40%
Last year ending September 30 in the 2023 to 2122 projection period for which projected benefit payments are fully funded	2122

\* Source: Fidelity General Obligation AA rate as of September 30, 2022. This is the rate for Fixed Income Market Data/Yield Curve/Data Municipal bonds with 20 years to maturity that include only federally tax-exempt municipal bonds as reported in Fidelity Investments' "20-Year Municipal GO AA Index." In describing this index, Fidelity notes that the municipal curves are constructed using option adjusted analytics of a diverse population of over 10,000 tax exempt securities.

# SCHEDULE OF CHANGES IN THE EMPLOYER'S NET PENSION LIABILITY AND RELATED RATIOS

## GASB Statement No. 67

Fiscal year ending September 30,	2022	2021	2020	2019	2018	2017	2016	2015	2014	2013
<b>Total pension liability</b>										
Service Cost	\$ 71,816,810	\$ 71,448,042	\$ 70,109,932	\$ 65,147,956	\$ 60,154,158	\$ 45,257,077	\$ 44,087,089	\$ 46,662,780	\$ 47,915,012	\$ 46,109,290
Interest on the Total Pension Liability	301,236,742	292,913,908	283,845,921	269,658,004	259,433,546	233,338,035	217,546,212	210,942,612	203,577,435	195,519,742
Benefit Changes	-	-	2,706,557	-	-	26,818,328	-	(28,684,960)	-	-
Difference between actual & expected experience	114,062,428	10,351,290	3,122,601	8,465,296	8,132,052	24,030,616	3,566,449	24,831,339	22,671,112	(4,675,994)
Assumption Changes	80,999,642	162,092,668	56,025,218	-	-	232,927,458	97,813,304	24,514,349	-	5,332,605
Benefit Payments	(227,651,106)	(208,127,640)	(192,399,945)	(188,392,606)	(183,474,634)	(170,465,766)	(159,726,007)	(148,628,476)	(138,179,183)	(128,655,957)
Refunds	(1,579,603)	(1,387,209)	(715,829)	(732,596)	(782,240)	(811,383)	-	-	-	-
Distributions from Reserve Accounts	(18,012,991)	(15,237,677)	(24,557,185)	(55,472,334)	-	-	-	-	-	-
Other (Adj. to Report on Gross Basis and Net Changes in Reserves)	15,797,724	556,047	(3,075,278)	110,374,742	-	-	-	-	-	-
<b>Net Change in Total Pension Liability</b>	336,669,646	312,609,429	195,061,992	209,048,462	143,462,882	391,094,365	203,287,047	129,637,644	135,984,376	113,629,686
<b>Total Pension Liability - Beginning</b>	4,596,792,389	4,284,182,960	4,089,120,968	3,880,072,506	3,736,609,624	3,345,515,259	3,142,228,212	3,012,590,568	2,876,606,192	2,762,976,506
<b>Total Pension Liability - Ending (a)</b>	\$ 4,933,462,035	\$ 4,596,792,389	\$ 4,284,182,960	\$ 4,089,120,968	\$ 3,880,072,506	\$ 3,736,609,624	\$ 3,345,515,259	\$ 3,142,228,212	\$ 3,012,590,568	\$ 2,876,606,192
<b>Plan Fiduciary Net Position</b>										
Contributions - Employer (City) (Including Buyback)	\$ 157,520,476	\$ 134,725,329	\$ 123,328,488	\$ 110,527,718	\$ 115,690,989	\$ 184,526,198	\$ 157,494,371	\$ 154,664,523	\$ 150,520,270	\$ 121,822,333
Contributions - Employer (State)	15,797,724	14,306,665	13,888,871	12,756,091	11,791,197	10,874,768	10,680,624	10,577,853	10,110,493	9,667,185
Contributions - Non-Employer Contributing Entity	-	-	-	-	-	-	-	-	-	-
Contributions - Employee (Including Buyback)	18,277,234	19,118,319	19,035,433	17,745,867	16,636,624	13,570,483	12,830,861	12,061,321	11,583,565	10,753,501
Net Investment Income, including Securities Lending	(432,099,625)	490,416,930	159,428,214	54,129,569	156,442,808	243,421,930	154,313,142	(62,884,634)	147,332,798	169,202,439
Benefit Payments	(227,651,106)	(208,127,640)	(192,399,945)	(188,392,606)	(183,474,634)	(170,465,766)	(159,726,007)	(148,628,476)	(138,179,183)	(128,655,957)
Distributions from Reserve Accounts	(18,012,991)	(15,237,677)	(24,557,185)	(55,472,334)	-	-	-	-	-	-
Refunds	(1,579,603)	(1,387,209)	(715,829)	(732,596)	(782,240)	(811,383)	-	-	-	-
Administrative Expense	(2,145,943)	(2,204,771)	(2,184,754)	(2,116,593)	(2,137,969)	(2,173,617)	(3,519,224)	(2,228,452)	(2,224,248)	(2,505,985)
Court Fines	666,933	724,217	519,212	701,652	775,741	759,291	832,536	920,774	881,291	757,984
Other	(517,784)	(33,717)	672,843	(3,261,537)	82,245	51,404	122,886	327,418	141,855	1,187,289
<b>Net Change in Plan Fiduciary Net Position</b>	(489,744,685)	432,300,446	97,015,348	(54,114,769)	115,024,761	279,753,308	173,029,189	(35,189,673)	180,166,841	182,228,789
Cummulative Effect of Change in Accounting Principle	-	-	-	-	-	-	2,238,000	-	-	-
<b>Plan Fiduciary Net Position - Beginning (adjusted)</b>	2,483,022,915	2,050,722,469	1,953,707,121	2,007,821,890	1,892,797,131	1,613,043,823	1,437,776,634	1,473,097,052	1,292,930,211	1,110,737,208
<b>Plan Fiduciary Net Position - Ending</b>	\$ 1,993,278,230	\$ 2,483,022,915	\$ 2,050,722,469	\$ 1,953,707,121	\$ 2,007,821,892	\$ 1,892,797,131	\$ 1,613,043,823	\$ 1,437,907,379	\$ 1,473,097,052	\$ 1,292,965,997
less Reserve Accounts and Sr. Staff Assets	-	-	-	-	(126,819,144)	(127,638,125)	(99,645,357)	(83,502,014)	(83,349,437)	(64,834,813)
<b>Total Plan Fiduciary Net Position - Ending (b)</b>	\$ 1,993,278,230	\$ 2,483,022,915	\$ 2,050,722,469	\$ 1,953,707,121	\$ 1,881,002,748	\$ 1,765,159,006	\$ 1,513,398,466	\$ 1,354,405,365	\$ 1,389,747,615	\$ 1,228,131,184
<b>City's Net Pension Liability - Ending (a) - (b)</b>	\$ 2,940,183,805	\$ 2,113,769,474	\$ 2,233,460,491	\$ 2,135,413,847	\$ 1,999,069,758	\$ 1,971,450,618	\$ 1,832,116,793	\$ 1,787,822,847	\$ 1,622,842,953	\$ 1,648,475,008
<b>Plan Fiduciary Net Position as a Percentage of Total Pension Liability</b>	40.40 %	54.02 %	47.87 %	47.78 %	48.48 %	47.24 %	45.24 %	43.10 %	46.13 %	42.69 %
<b>Covered Payroll</b>	\$ 162,885,451	\$ 161,835,740	\$ 174,185,559	\$ 174,124,935	\$ 162,003,561	\$ 149,489,571	\$ 135,599,741	\$ 132,735,243	\$ 134,521,216	\$ 130,972,174
<b>Net Pension Liability as a Percentage of Covered Payroll</b>	1,805.06 %	1,306.12 %	1,282.23 %	1,226.37 %	1,233.97 %	1,318.79 %	1,351.12 %	1,346.91 %	1,206.38 %	1,258.65 %





## SCHEDULE OF THE EMPLOYER'S NET PENSION LIABILITY

### GASB Statement No. 67

FY Ending September 30,	Total Pension Liability	Plan Net Position	Net Pension Liability	Plan Net Position as a % of Total Pension Liability	Covered Payroll	Net Pension Liability as a % of Covered Payroll
2013	\$ 2,876,606,192	\$ 1,228,131,184	\$ 1,648,475,008	42.69%	\$ 130,972,174	1,258.65%
2014	3,012,590,568	1,389,747,615	1,622,842,953	46.13%	134,521,216	1,206.38%
2015	3,142,228,212	1,354,405,365	1,787,822,847	43.10%	132,735,243	1,346.91%
2016	3,345,515,259	1,513,398,466	1,832,116,793	45.24%	135,599,741	1,351.12%
2017	3,736,609,624	1,765,159,006	1,971,450,618	47.24%	149,489,571	1,318.79%
2018	3,880,072,506	1,881,002,748	1,999,069,758	48.48%	162,003,561	1,233.97%
2019	4,089,120,968	1,953,707,121	2,135,413,847	47.78%	174,124,935	1,226.37%
2020	4,284,182,960	2,050,722,469	2,233,460,491	47.87%	174,185,559	1,282.23%
2021	4,596,792,389	2,483,022,915	2,113,769,474	54.02%	161,835,740	1,306.12%
2022	4,933,462,035	1,993,278,230	2,940,183,805	40.40%	162,885,451	1,805.06%



# NOTES TO NET PENSION LIABILITY

## GASB Statement No. 67

Valuation Date: September 30, 2022  
Measurement Date: September 30, 2022

### Methods and Assumptions Used to Determine Net Pension Liability:

Actuarial Cost Method	Entry Age Normal
Inflation	2.25%
Salary Increases	A range of 2.75% to 11.50%, depending on completed years of service, including inflation.
Investment Rate of Return	6.50%
Retirement Age	Experience-based table of rates that are specific to the type of eligibility condition.
Mortality	PUB-2010 Headcount Weighted Safety Healthy Employee Mortality Table (for pre-retirement mortality) and the PUB-2010 Headcount Weighted Safety Healthy Retiree Mortality Table (for postretirement mortality), with separate rates for males and females and ages set forward one year, with mortality improvements projected to all future years after 2010 using Scale MP-2018. For males, the base mortality rates for both pre-retirement and post-retirement mortality are based on the Below Median Healthy tables. These are the same rates currently in use for Special Risk Class members of the Florida Retirement System (FRS), as mandated by Chapter 112.63, Florida Statutes.

### Other Information:

Notes See Discussion of Valuation Results in the October 1, 2022 Actuarial Valuation Report.

Assumption changes reflect the investment return assumption change from 6.625% to 6.50%.

## SCHEDULE OF CONTRIBUTIONS

### GASB Statement No. 67

FY Ending September 30,	Actuarially Determined Contribution	Actual Contribution	Contribution Deficiency (Excess) <sup>1</sup>	Covered Payroll	Actual Contribution as a % of Covered Payroll
2013	\$ 99,996,835	\$122,580,317	\$ (22,583,482)	\$130,972,174	93.59%
2014	142,432,577	149,158,659	(6,726,082)	134,521,216	110.88%
2015	153,603,996	153,935,565	(331,569)	132,735,243	115.97%
2016	149,499,492	149,499,492 *	-	135,599,741	110.25%
2017	167,788,151	167,788,151 **	-	149,489,571	112.24%
2018	135,648,057	115,690,989	19,957,068 ***	162,003,561	71.41%
2019	135,264,010	110,527,718	24,736,292 ***	174,124,935	63.48%
2020	140,292,637	123,328,488	16,964,149 ***	174,185,559	70.80%
2021	148,475,947	134,725,329	13,750,618 ***	161,835,740	83.25%
2022	157,352,434	157,352,434	-	162,885,451	96.60%

<sup>1</sup>Contribution deficiency (excess) was assigned to the City Budget Stabilization Account prior to fiscal year ending September 30, 2016.

\*Plus \$5,000,000 Supplemental Payment

\*\*Plus \$10,000,000 Supplemental Payment

\*\*\*Contributions of \$20,000,000, \$24,736,292, \$16,964,149, and \$13,750,618 were allocated from the City Contribution Reserve (resulting from previous years' excess contributions) to fully meet the Actuarially Determined Contribution for fiscal year ending September 30, 2018, 2019, 2020 and 2021, respectively.



# NOTES TO SCHEDULE OF CONTRIBUTIONS

## GASB Statement No. 67

**Valuation Date:** October 1, 2020  
**Notes** Actuarially determined contribution rates are calculated as of October 1, which is two years prior to the end of the fiscal year in which contributions are reported.

**Methods and Assumptions Used to Determine Contribution Rates:**

Actuarial Cost Method	Entry Age Normal
Amortization Method	Level Percent of Payroll, Closed
Remaining Amortization Period	27 years
Asset Valuation Method	5-year smoothed market
Inflation	2.25%
Salary Increases	A range of 2.75% to 11.50%, depending on completed years of service, including inflation.
Investment Rate of Return	6.90%
Retirement Age	Experience-based table of rates that are specific to the type of eligibility condition.
Mortality	PUB-2010 Headcount Weighted Safety Healthy Employee Mortality Table (for pre-retirement mortality) and the PUB-2010 Headcount Weighted Safety Healthy Retiree Mortality Table (for postretirement mortality), with separate rates for males and females and ages set forward one year, with mortality improvements projected to all future years after 2010 using Scale MP-2018. For males, the base mortality rates for both pre-retirement and post-retirement mortality are based on the Below Median Healthy tables. These are the same rates currently in use for Special Risk Class members of the Florida Retirement System (FRS), as mandated by Chapter 112.63, Florida Statutes.

**Other Information:**

**Notes** See Discussion of Valuation Results in the October 1, 2020 Actuarial Valuation Report, dated April 12, 2021.



## SINGLE DISCOUNT RATE

### GASB Statement No. 67

A single discount rate of 6.50% was used to measure the total pension liability. This single discount rate was based on the expected rate of return on pension plan investments of 6.50%. The projection of cash flows used to determine this single discount rate assumed that plan member contributions will be made at the current contribution rate and that employer contributions will be made at rates equal to the difference between the total actuarially determined contribution rates and the member rate. Based on these assumptions, the pension plan's fiduciary net position was projected to be available to make all projected future benefit payments of current plan members. Therefore, the long-term expected rate of return on pension plan investments (6.50%) was applied to all periods of projected benefit payments to determine the total pension liability.

Regarding the sensitivity of the net pension liability to changes in the single discount rate, the following presents the plan's net pension liability, calculated using a single discount rate of 6.50%, as well as what the plan's net pension liability would be if it were calculated using a single discount rate that is 1-percentage-point lower or 1-percentage-point higher:

#### Sensitivity of the Net Pension Liability to the Single Discount Rate Assumption

1% Decrease	Current Single Discount Rate Assumption	1% Increase
5.50%	6.50%	7.50%
\$3,677,345,179	\$2,940,183,805	\$2,347,890,521

# CALCULATION OF THE SINGLE DISCOUNT RATE

## GASB Statement No. 67

GASB Statement No. 67 includes a specific requirement for the discount rate that is used for the purpose of the measurement of the Total Pension Liability. This rate considers the ability of the fund to meet benefit obligations in the future. To make this determination, employer contributions, future pension liability surtax revenue (using the prescribed annual increase assumption of 4.25%, which was set by the City of Jacksonville), employee contributions, benefit payments, expenses and investment returns are projected into the future. The Plan Net Position (assets) in future years can then be determined and compared to its obligation to make benefit payments in those years. As long as assets are projected to be on hand in a future year, the assumed valuation discount rate is used. In years where assets are not projected to be sufficient to meet benefit payments, the use of a “risk-free” rate is required, as described in the following paragraph.

We are unable to assess the risk that the timing and/or amount of future pension liability surtax proceeds may significantly deviate from the projections (due to legal challenges, economic hardships, or any other reason). Any such deviations could have a significant impact on the required contribution amount shown herein and on the future solvency risk that the Fund’s future assets may be insufficient to cover all future benefit payments.

The *Single Discount Rate* (SDR) is equivalent to applying these two rates to the benefits that are projected to be paid during the different time periods. The SDR reflects (1) the long-term expected rate of return on pension plan investments (during the period in which the fiduciary net position is projected to be sufficient to pay benefits) and (2) tax-exempt municipal bond rate based on the Bond Buyer 20-Bond Index of general obligation bonds with an average AA credit rating (which is published by the Federal Reserve) as of the measurement date (to the extent that the contributions for use with the long-term expected rate of return are not met).

For the purpose of this valuation, the expected rate of return on pension plan investments is 6.50%; the municipal bond rate is 4.40%; and the resulting single discount rate is 6.50%.

The tables in this section provide background for the development of the single discount rate.

The **Projection of Contributions** table shows the development of expected contributions in future years.

The **Projection of Plan Fiduciary Net Position** table shows the development of expected asset levels in future years.

**The Present Values of Projected Benefit Payments table shows the development of the Single Discount Rate (SDR). It breaks down the benefit payments into present values for funded and unfunded portions and shows the equivalent total at the SDR.**



## SINGLE DISCOUNT RATE DEVELOPMENT PROJECTION OF CONTRIBUTIONS ENDING SEPTEMBER 30 FOR 2023 TO 2072

Year	Payroll for Current	Contributions from	Service Cost and	UAL	Pension Liability	Additional	Total Contributions
	Employees	Current Employees	Expense	Contributions	Surtax	Contributions	
	(a)	(b)	(c)	(d)	(e)	(f)	(g)=(b)+(c)+(d)+(e)+(f)
1	162,885,451	\$ 16,809,589	\$ 62,723,190	\$ 121,242,475	\$ -	\$ -	\$ 200,775,254
2	157,473,934	16,251,127	60,752,446	122,653,184	-	-	199,656,757
3	149,313,273	15,408,956	57,801,272	124,186,349	-	-	197,396,577
4	139,051,890	14,349,993	54,042,524	125,738,678	-	-	194,131,195
5	132,433,637	13,666,997	51,681,149	127,310,411	-	-	192,658,558
6	123,454,873	12,740,399	48,422,640	128,901,792	-	-	190,064,831
7	115,676,544	11,937,685	45,651,319	130,513,064	-	-	188,102,068
8	106,042,090	10,943,420	42,209,007	132,144,477	-	-	185,296,904
9	95,692,915	9,875,398	38,427,748	133,796,283	72,498,011	-	254,597,440
10	90,976,630	9,388,682	36,717,258	135,468,737	100,772,236	-	282,346,913
11	86,731,061	8,950,545	35,193,499	137,162,096	105,055,056	-	286,361,196
12	80,730,126	8,331,255	33,030,468	138,876,622	109,519,896	-	289,758,241
13	72,190,830	7,450,010	29,879,825	140,612,580	114,174,491	-	292,116,906
14	61,194,951	6,315,248	25,819,680	142,370,237	119,026,907	-	293,532,073
15	50,600,981	5,221,962	21,944,017	144,149,865	124,085,551	-	295,401,395
16	36,496,090	3,766,354	16,764,808	145,951,739	129,359,187	-	295,842,087
17	24,382,960	2,516,293	12,353,225	147,776,135	134,856,952	-	297,502,605
18	18,066,019	1,864,392	10,061,563	149,623,337	140,588,373	-	302,137,664
19	13,917,333	1,436,253	8,578,933	151,493,629	146,563,378	-	308,072,193
20	10,475,761	1,081,086	7,356,425	153,387,299	152,792,322	-	314,617,132
21	7,666,468	791,171	6,368,367	155,304,640	159,285,996	-	321,750,174
22	5,290,750	545,999	5,543,215	157,245,948	166,055,651	-	329,390,813
23	3,215,887	331,876	4,833,649	159,211,523	173,113,016	-	337,490,063
24	1,977,172	204,042	4,443,321	161,201,667	180,470,319	-	346,319,348
25	680,179	70,194	4,031,156	163,216,687	188,140,307	-	355,458,345
26	-	-	3,862,567	-	196,136,270	106,137,433	306,136,270
27	-	-	3,949,475	-	204,472,062	106,050,525	314,472,062
28	-	-	4,038,339	-	213,162,125	105,961,661	323,162,125
29	-	-	4,129,201	-	222,221,515	105,870,799	332,221,515
30	-	-	4,222,108	-	231,665,929	105,777,892	341,665,929
31	-	-	4,317,106	-	241,511,731	105,682,894	351,511,731
32	-	-	4,414,240	-	251,775,980	105,585,760	361,775,980
33	-	-	4,513,561	-	262,476,459	105,486,439	372,476,459
34	-	-	4,615,116	-	-	-	4,615,116
35	-	-	4,718,956	-	-	-	4,718,956
36	-	-	4,825,132	-	-	-	4,825,132
37	-	-	4,933,697	-	-	-	4,933,697
38	-	-	5,044,705	-	-	-	5,044,705
39	-	-	5,158,211	-	-	-	5,158,211
40	-	-	5,274,271	-	-	-	5,274,271
41	-	-	5,392,942	-	-	-	5,392,942
42	-	-	5,514,283	-	-	-	5,514,283
43	-	-	5,638,355	-	-	-	5,638,355
44	-	-	5,765,219	-	-	-	5,765,219
45	-	-	5,894,936	-	-	-	5,894,936
46	-	-	6,027,573	-	-	-	6,027,573
47	-	-	6,163,193	-	-	-	6,163,193
48	-	-	6,301,865	-	-	-	6,301,865
49	-	-	6,443,657	-	-	-	6,443,657
50	-	-	6,588,639	-	-	-	6,588,639



## SINGLE DISCOUNT RATE DEVELOPMENT PROJECTION OF CONTRIBUTIONS ENDING SEPTEMBER 30 FOR 2073 TO 2122

Year	Payroll for Current	Contributions from	Service Cost and	UAL	Pension Liability	Additional	Total Contributions
	Employees	Current Employees	Expense	Contributions	Surtax	Contributions	
	(a)	(b)	(c)	(d)	(e)	(f)	(g)=(b)+(c)+(d)+(e)+(f)
51	-	-	6,736,883	-	-	-	6,736,883
52	-	-	6,888,463	-	-	-	6,888,463
53	-	-	7,043,453	-	-	-	7,043,453
54	-	-	7,201,930	-	-	-	7,201,930
55	-	-	7,363,974	-	-	-	7,363,974
56	-	-	7,529,664	-	-	-	7,529,664
57	-	-	7,699,081	-	-	-	7,699,081
58	-	-	7,872,311	-	-	-	7,872,311
59	-	-	8,049,438	-	-	-	8,049,438
60	-	-	8,230,550	-	-	-	8,230,550
61	-	-	8,415,737	-	-	-	8,415,737
62	-	-	8,605,092	-	-	-	8,605,092
63	-	-	8,798,706	-	-	-	8,798,706
64	-	-	8,996,676	-	-	-	8,996,676
65	-	-	9,199,102	-	-	-	9,199,102
66	-	-	9,406,082	-	-	-	9,406,082
67	-	-	9,617,719	-	-	-	9,617,719
68	-	-	9,834,118	-	-	-	9,834,118
69	-	-	10,055,385	-	-	-	10,055,385
70	-	-	10,281,631	-	-	-	10,281,631
71	-	-	10,512,968	-	-	-	10,512,968
72	-	-	10,749,510	-	-	-	10,749,510
73	-	-	10,991,374	-	-	-	10,991,374
74	-	-	11,238,679	-	-	-	11,238,679
75	-	-	11,491,550	-	-	-	11,491,550
76	-	-	11,750,109	-	-	-	11,750,109
77	-	-	12,014,487	-	-	-	12,014,487
78	-	-	12,284,813	-	-	-	12,284,813
79	-	-	12,561,222	-	-	-	12,561,222
80	-	-	12,843,850	-	-	-	12,843,850
81	-	-	13,132,836	-	-	-	13,132,836
82	-	-	13,428,326	-	-	-	13,428,326
83	-	-	13,730,463	-	-	-	13,730,463
84	-	-	14,039,398	-	-	-	14,039,398
85	-	-	14,355,284	-	-	-	14,355,284
86	-	-	14,678,278	-	-	-	14,678,278
87	-	-	15,008,539	-	-	-	15,008,539
88	-	-	15,346,232	-	-	-	15,346,232
89	-	-	15,691,521	-	-	-	15,691,521
90	-	-	16,044,581	-	-	-	16,044,581
91	-	-	16,405,584	-	-	-	16,405,584
92	-	-	16,774,710	-	-	-	16,774,710
93	-	-	17,152,141	-	-	-	17,152,141
94	-	-	17,538,064	-	-	-	17,538,064
95	-	-	17,932,671	-	-	-	17,932,671
96	-	-	18,336,156	-	-	-	18,336,156
97	-	-	18,748,719	-	-	-	18,748,719
98	-	-	19,170,565	-	-	-	19,170,565
99	-	-	19,601,903	-	-	-	19,601,903
100	-	-	20,042,946	-	-	-	20,042,946





## SINGLE DISCOUNT RATE DEVELOPMENT PROJECTION OF PLAN FIDUCIARY NET POSITION ENDING SEPTEMBER 30 FOR 2023 TO 2072

Year	Projected Beginning Plan Net Position	Projected Total Contributions	Projected Benefit Payments	Projected Administrative Expenses	Projected Investment Earnings at 6.50%	Projected Ending Plan Net Position
	(a)	(b)	(c)	(d)	(e)	(f)=(a)+(b)-(c)-(d)+(e)
1	\$ 1,976,209,020	\$ 200,775,254	\$ 227,815,616	\$ 2,214,588	\$ 127,517,768	\$ 2,074,471,838
2	2,074,471,838	199,656,757	233,263,165	2,264,417	133,693,220	2,172,294,233
3	2,172,294,233	197,396,577	241,321,828	2,315,366	139,719,963	2,265,773,579
4	2,265,773,579	194,131,195	263,804,812	2,367,462	144,970,806	2,338,703,306
5	2,338,703,306	192,658,558	274,367,845	2,420,730	149,324,533	2,403,897,822
6	2,403,897,822	190,064,831	289,649,621	2,475,196	152,988,626	2,454,826,461
7	2,454,826,461	188,102,068	303,006,797	2,530,889	155,807,146	2,493,197,989
8	2,493,197,989	185,296,904	321,450,604	2,587,834	157,619,754	2,512,076,209
9	2,512,076,209	254,597,440	329,989,083	2,646,059	160,788,655	2,594,827,162
10	2,594,827,162	282,346,913	346,343,500	2,705,596	166,530,071	2,694,655,050
11	2,694,655,050	286,361,196	357,015,271	2,766,472	172,803,974	2,794,038,477
12	2,794,038,477	289,758,241	372,009,183	2,828,717	178,890,941	2,887,849,760
13	2,887,849,760	292,116,906	388,448,729	2,892,363	184,536,214	2,973,161,789
14	2,973,161,789	293,532,073	394,953,862	2,957,441	189,916,595	3,058,699,152
15	3,058,699,152	295,401,395	403,393,980	3,023,984	195,264,206	3,142,946,789
16	3,142,946,789	295,842,087	412,805,084	3,092,024	200,451,177	3,223,342,945
17	3,223,342,945	297,502,605	425,519,775	3,161,594	205,321,096	3,297,485,278
18	3,297,485,278	302,137,664	440,573,627	3,232,730	209,804,792	3,365,621,377
19	3,365,621,377	308,072,193	450,545,228	3,305,467	214,102,173	3,433,945,049
20	3,433,945,049	314,617,132	468,046,858	3,379,840	218,190,345	3,495,325,828
21	3,495,325,828	321,750,174	480,867,437	3,455,887	221,995,728	3,554,748,407
22	3,554,748,407	329,390,813	485,140,598	3,533,644	225,963,429	3,621,428,407
23	3,621,428,407	337,490,063	489,453,820	3,613,151	230,416,194	3,696,267,694
24	3,696,267,694	346,319,348	492,211,409	3,694,447	235,472,371	3,782,153,557
25	3,782,153,557	355,458,345	494,222,560	3,777,572	241,280,302	3,880,892,072
26	3,880,892,072	306,136,270	495,499,448	3,862,567	246,077,008	3,933,743,335
27	3,933,743,335	314,472,062	496,209,607	3,949,475	249,753,491	3,997,809,806
28	3,997,809,806	323,162,125	496,132,846	4,038,339	254,195,406	4,074,996,152
29	4,074,996,152	332,221,515	494,897,276	4,129,201	259,538,931	4,167,730,119
30	4,167,730,119	341,665,929	492,609,117	4,222,108	265,938,973	4,278,503,796
31	4,278,503,796	351,511,731	488,574,918	4,317,106	273,580,221	4,410,703,725
32	4,410,703,725	361,775,980	483,666,177	4,414,240	282,655,469	4,567,054,756
33	4,567,054,756	372,476,459	477,962,830	4,513,561	293,339,840	4,750,394,664
34	4,750,394,664	4,615,116	467,956,090	4,615,116	293,806,500	4,576,245,074
35	4,576,245,074	4,718,956	460,312,914	4,718,956	282,731,269	4,398,663,429
36	4,398,663,429	4,825,132	451,849,926	4,825,132	271,459,179	4,218,272,682
37	4,218,272,682	4,933,697	442,619,373	4,933,697	260,029,051	4,035,682,360
38	4,035,682,360	5,044,705	431,507,866	5,044,705	248,516,119	3,852,690,613
39	3,852,690,613	5,158,211	421,246,519	5,158,211	236,949,899	3,668,393,993
40	3,668,393,993	5,274,271	409,371,775	5,274,271	225,350,473	3,484,372,691
41	3,484,372,691	5,392,942	397,470,231	5,392,942	213,769,799	3,300,672,259
42	3,300,672,259	5,514,283	384,332,532	5,514,283	202,249,525	3,118,589,252
43	3,118,589,252	5,638,355	369,789,204	5,638,355	190,879,347	2,939,679,395
44	2,939,679,395	5,765,219	356,605,112	5,765,219	179,671,944	2,762,746,227
45	2,762,746,227	5,894,936	343,206,125	5,894,936	168,599,900	2,588,140,002
46	2,588,140,002	6,027,573	329,417,524	6,027,573	157,691,570	2,416,414,048
47	2,416,414,048	6,163,193	314,232,413	6,163,193	147,015,130	2,249,196,765
48	2,249,196,765	6,301,865	298,234,448	6,301,865	136,657,755	2,087,620,072
49	2,087,620,072	6,443,657	282,560,984	6,443,657	126,656,639	1,931,715,727
50	1,931,715,727	6,588,639	265,349,836	6,588,639	117,073,413	1,783,439,304

*Reserve Accounts and Sr. Staff Plan Assets are excluded from the Plan Net Position for the purpose of this projection.*



## SINGLE DISCOUNT RATE DEVELOPMENT PROJECTION OF PLAN FIDUCIARY NET POSITION ENDING SEPTEMBER 30 FOR 2073 TO 2122

Year	Projected Beginning Plan Net Position	Projected Total Contributions	Projected Benefit Payments	Projected Administrative Expenses	Projected Investment Earnings at 6.50%	Projected Ending Plan Net Position
	(a)	(b)	(c)	(d)	(e)	(f)=(a)+(b)-(c)-(d)+(e)
51	1,783,439,304	6,736,883	248,617,818	6,736,883	107,970,675	1,642,792,161
52	1,642,792,161	6,888,463	233,724,784	6,888,463	99,305,015	1,508,372,392
53	1,508,372,392	7,043,453	219,333,480	7,043,453	91,028,085	1,380,066,997
54	1,380,066,997	7,201,930	205,337,590	7,201,930	83,135,940	1,257,865,347
55	1,257,865,347	7,363,974	191,647,291	7,363,974	75,630,763	1,141,848,819
56	1,141,848,819	7,529,664	178,274,688	7,529,664	68,517,456	1,032,091,587
57	1,032,091,587	7,699,081	165,209,522	7,699,081	61,801,169	928,683,234
58	928,683,234	7,872,311	152,542,256	7,872,311	55,484,832	831,625,810
59	831,625,810	8,049,438	140,315,993	8,049,438	49,567,197	740,877,014
60	740,877,014	8,230,550	128,480,547	8,230,550	44,047,122	656,443,589
61	656,443,589	8,415,737	117,208,959	8,415,737	38,919,510	578,154,140
62	578,154,140	8,605,092	106,468,543	8,605,092	34,174,264	505,859,861
63	505,859,861	8,798,706	96,156,969	8,798,706	29,804,986	439,507,878
64	439,507,878	8,996,676	86,306,881	8,996,676	25,807,195	379,008,192
65	379,008,192	9,199,102	76,948,209	9,199,102	22,174,085	324,234,068
66	324,234,068	9,406,082	68,110,231	9,406,082	18,896,479	275,020,316
67	275,020,316	9,617,719	59,818,898	9,617,719	15,962,811	231,164,229
68	231,164,229	9,834,118	52,095,259	9,834,118	13,359,232	192,428,202
69	192,428,202	10,055,385	44,957,200	10,055,385	11,069,725	158,540,727
70	158,540,727	10,281,631	38,418,319	10,281,631	9,076,208	129,198,616
71	129,198,616	10,512,968	32,486,827	10,512,968	7,358,709	104,070,498
72	104,070,498	10,749,510	27,163,627	10,749,510	5,895,662	82,802,533
73	82,802,533	10,991,374	22,441,009	10,991,374	4,664,313	65,025,837
74	65,025,837	11,238,679	18,302,446	11,238,679	3,641,214	50,364,605
75	50,364,605	11,491,550	14,724,069	11,491,550	2,802,700	38,443,236
76	38,443,236	11,750,109	11,674,055	11,750,109	2,125,376	28,894,557
77	28,894,557	12,014,487	9,114,256	12,014,487	1,586,596	21,366,897
78	21,366,897	12,284,813	7,000,644	12,284,813	1,164,909	15,531,162
79	15,531,162	12,561,222	5,285,277	12,561,222	840,458	11,086,343
80	11,086,343	12,843,850	3,918,060	12,843,850	595,280	7,763,563
81	7,763,563	13,132,836	2,848,983	13,132,836	413,497	5,328,077
82	5,328,077	13,428,326	2,029,776	13,428,326	281,396	3,579,697
83	3,579,697	13,730,463	1,415,361	13,730,463	187,405	2,351,741
84	2,351,741	14,039,398	964,664	14,039,398	122,005	1,509,082
85	1,509,082	14,355,284	641,839	14,355,284	77,559	944,802
86	944,802	14,678,278	416,267	14,678,278	48,096	576,631
87	576,631	15,008,539	262,866	15,008,539	29,072	342,837
88	342,837	15,346,232	161,514	15,346,232	17,118	198,441
89	198,441	15,691,521	96,537	15,691,521	9,811	111,715
90	111,715	16,044,581	56,111	16,044,581	5,467	61,071
91	61,071	16,405,584	31,645	16,405,584	2,957	32,383
92	32,383	16,774,710	17,334	16,774,710	1,550	16,599
93	16,599	17,152,141	9,203	17,152,141	785	8,181
94	8,181	17,538,064	4,728	17,538,064	381	3,834
95	3,834	17,932,671	2,336	17,932,671	175	1,673
96	1,673	18,336,156	1,082	18,336,156	74	665
97	665	18,748,719	460	18,748,719	29	233
98	233	19,170,565	176	19,170,565	10	66
99	66	19,601,903	56	19,601,903	3	12
100	12	20,042,946	12	20,042,946	0	0

Reserve Accounts and Sr. Staff Plan Assets are excluded from the Plan Net Position for the purpose of this projection.



## SINGLE DISCOUNT RATE DEVELOPMENT PRESENT VALUES OF PROJECTED BENEFITS ENDING SEPTEMBER 30 FOR 2023 TO 2072

Year	Projected Beginning Plan Net Position	Projected Benefit Payments	Funded Portion of Benefit Payments	Unfunded Portion of Benefit Payments	Present Value of Funded Benefit Payments using Expected Return Rate (v)	Present Value of Unfunded Benefit Payments using Municipal Bond Rate (vf)	Present Value of Benefit Payments using Single Discount Rate (sdr)
(a)	(b)	(c)	(d)	(e)	(f)=(d)*v <sup>n</sup> ((a)-.5)	(g)=(e)*vf <sup>n</sup> ((a)-.5)	(h)=((c)/(1+sdr) <sup>n</sup> ((a)-.5)
1	\$ 1,976,209,020	\$ 227,815,616	\$ 227,815,616	\$ -	\$ 220,754,053	\$ -	\$ 220,754,053
2	2,074,471,838	233,263,165	233,263,165	-	212,237,320	-	212,237,320
3	2,172,294,233	241,321,828	241,321,828	-	206,168,631	-	206,168,631
4	2,265,773,579	263,804,812	263,804,812	-	211,621,158	-	211,621,158
5	2,338,703,306	274,367,845	274,367,845	-	206,661,690	-	206,661,690
6	2,403,897,822	289,649,621	289,649,621	-	204,856,676	-	204,856,676
7	2,454,826,461	303,006,797	303,006,797	-	201,224,066	-	201,224,066
8	2,493,197,989	321,450,604	321,450,604	-	200,443,597	-	200,443,597
9	2,512,076,209	329,989,083	329,989,083	-	193,209,246	-	193,209,246
10	2,594,827,162	346,343,500	346,343,500	-	190,408,253	-	190,408,253
11	2,694,655,050	357,015,271	357,015,271	-	184,296,001	-	184,296,001
12	2,794,038,477	372,009,183	372,009,183	-	180,315,546	-	180,315,546
13	2,887,849,760	388,448,729	388,448,729	-	176,792,406	-	176,792,406
14	2,973,161,789	394,953,862	394,953,862	-	168,782,206	-	168,782,206
15	3,058,699,152	403,393,980	403,393,980	-	161,867,664	-	161,867,664
16	3,142,946,789	412,805,084	412,805,084	-	155,534,278	-	155,534,278
17	3,223,342,945	425,519,775	425,519,775	-	150,539,760	-	150,539,760
18	3,297,485,278	440,573,627	440,573,627	-	146,352,572	-	146,352,572
19	3,365,621,377	450,545,228	450,545,228	-	140,530,519	-	140,530,519
20	3,433,945,049	468,046,858	468,046,858	-	137,079,333	-	137,079,333
21	3,495,325,828	480,867,437	480,867,437	-	132,238,651	-	132,238,651
22	3,554,748,407	485,140,598	485,140,598	-	125,271,146	-	125,271,146
23	3,621,428,407	489,453,820	489,453,820	-	118,671,258	-	118,671,258
24	3,696,267,694	492,211,409	492,211,409	-	112,056,201	-	112,056,201
25	3,782,153,557	494,222,560	494,222,560	-	105,647,002	-	105,647,002
26	3,880,892,072	495,499,448	495,499,448	-	99,455,356	-	99,455,356
27	3,933,743,335	496,209,607	496,209,607	-	93,519,152	-	93,519,152
28	3,997,809,806	496,132,846	496,132,846	-	87,797,827	-	87,797,827
29	4,074,996,152	494,897,276	494,897,276	-	82,233,967	-	82,233,967
30	4,167,730,119	492,609,117	492,609,117	-	76,857,989	-	76,857,989
31	4,278,503,796	488,574,918	488,574,918	-	71,576,116	-	71,576,116
32	4,410,703,725	483,666,177	483,666,177	-	66,532,382	-	66,532,382
33	4,567,054,756	477,962,830	477,962,830	-	61,735,060	-	61,735,060
34	4,750,394,664	467,956,090	467,956,090	-	56,753,578	-	56,753,578
35	4,576,245,074	460,312,914	460,312,914	-	52,419,357	-	52,419,357
36	4,398,663,429	451,849,926	451,849,926	-	48,315,129	-	48,315,129
37	4,218,272,682	442,619,373	442,619,373	-	44,439,558	-	44,439,558
38	4,035,682,360	431,507,866	431,507,866	-	40,679,764	-	40,679,764
39	3,852,690,613	421,246,519	421,246,519	-	37,288,630	-	37,288,630
40	3,668,393,993	409,371,775	409,371,775	-	34,025,803	-	34,025,803
41	3,484,372,691	397,470,231	397,470,231	-	31,020,264	-	31,020,264
42	3,300,672,259	384,332,532	384,332,532	-	28,164,265	-	28,164,265
43	3,118,589,252	369,789,204	369,789,204	-	25,444,616	-	25,444,616
44	2,939,679,395	356,605,112	356,605,112	-	23,039,849	-	23,039,849
45	2,762,746,227	343,206,125	343,206,125	-	20,820,803	-	20,820,803
46	2,588,140,002	329,417,524	329,417,524	-	18,764,610	-	18,764,610
47	2,416,414,048	314,232,413	314,232,413	-	16,807,156	-	16,807,156
48	2,249,196,765	298,234,448	298,234,448	-	14,977,918	-	14,977,918
49	2,087,620,072	282,560,984	282,560,984	-	13,324,662	-	13,324,662
50	1,931,715,727	265,349,836	265,349,836	-	11,749,334	-	11,749,334

*Reserve Accounts and Sr. Staff Plan Assets are excluded from the Plan Net Position for the purpose of this projection.*



## SINGLE DISCOUNT RATE DEVELOPMENT PRESENT VALUES OF PROJECTED BENEFITS ENDING SEPTEMBER 30 FOR 2073 TO 2122

Year	Projected Beginning Plan Net Position	Projected Benefit Payments	Funded Portion of Benefit Payments	Unfunded Portion of Benefit Payments	Present Value of Funded Benefit Payments using Expected Return Rate (v)	Present Value of Unfunded Benefit Payments using Municipal Bond Rate (vf)	Present Value of Benefit Payments using Single Discount Rate (sdr)
(a)	(b)	(c)	(d)	(e)	(f)=(d)*v <sup>n</sup> ((a)-.5)	(g)=(e)*vf <sup>n</sup> ((a)-.5)	(h)=((c)/(1+sdr) <sup>n</sup> (a-.5)
51	\$ 1,783,439,304	\$ 248,617,818	\$ 248,617,818	\$ -	\$ 10,336,584	\$ -	\$ 10,336,584
52	1,642,792,161	233,724,784	233,724,784	-	9,124,309	-	9,124,309
53	1,508,372,392	219,333,480	219,333,480	-	8,039,898	-	8,039,898
54	1,380,066,997	205,337,590	205,337,590	-	7,067,478	-	7,067,478
55	1,257,865,347	191,647,291	191,647,291	-	6,193,684	-	6,193,684
56	1,141,848,819	178,274,688	178,274,688	-	5,409,865	-	5,409,865
57	1,032,091,587	165,209,522	165,209,522	-	4,707,412	-	4,707,412
58	928,683,234	152,542,256	152,542,256	-	4,081,198	-	4,081,198
59	831,625,810	140,315,993	140,315,993	-	3,524,968	-	3,524,968
60	740,877,014	128,480,547	128,480,547	-	3,030,650	-	3,030,650
61	656,443,589	117,208,959	117,208,959	-	2,596,029	-	2,596,029
62	578,154,140	106,468,543	106,468,543	-	2,214,218	-	2,214,218
63	505,859,861	96,156,969	96,156,969	-	1,877,718	-	1,877,718
64	439,507,878	86,306,881	86,306,881	-	1,582,506	-	1,582,506
65	379,008,192	76,948,209	76,948,209	-	1,324,795	-	1,324,795
66	324,234,068	68,110,231	68,110,231	-	1,101,065	-	1,101,065
67	275,020,316	59,818,898	59,818,898	-	908,008	-	908,008
68	231,164,229	52,095,259	52,095,259	-	742,506	-	742,506
69	192,428,202	44,957,200	44,957,200	-	601,660	-	601,660
70	158,540,727	38,418,319	38,418,319	-	482,770	-	482,770
71	129,198,616	32,486,827	32,486,827	-	383,319	-	383,319
72	104,070,498	27,163,627	27,163,627	-	300,948	-	300,948
73	82,802,533	22,441,009	22,441,009	-	233,451	-	233,451
74	65,025,837	18,302,446	18,302,446	-	178,778	-	178,778
75	50,364,605	14,724,069	14,724,069	-	135,046	-	135,046
76	38,443,236	11,674,055	11,674,055	-	100,537	-	100,537
77	28,894,557	9,114,256	9,114,256	-	73,701	-	73,701
78	21,366,897	7,000,644	7,000,644	-	53,155	-	53,155
79	15,531,162	5,285,277	5,285,277	-	37,681	-	37,681
80	11,086,343	3,918,060	3,918,060	-	26,229	-	26,229
81	7,763,563	2,848,983	2,848,983	-	17,908	-	17,908
82	5,328,077	2,029,776	2,029,776	-	11,980	-	11,980
83	3,579,697	1,415,361	1,415,361	-	7,844	-	7,844
84	2,351,741	964,664	964,664	-	5,020	-	5,020
85	1,509,082	641,839	641,839	-	3,136	-	3,136
86	944,802	416,267	416,267	-	1,910	-	1,910
87	576,631	262,866	262,866	-	1,132	-	1,132
88	342,837	161,514	161,514	-	653	-	653
89	198,441	96,537	96,537	-	367	-	367
90	111,715	56,111	56,111	-	200	-	200
91	61,071	31,645	31,645	-	106	-	106
92	32,383	17,334	17,334	-	55	-	55
93	16,599	9,203	9,203	-	27	-	27
94	8,181	4,728	4,728	-	13	-	13
95	3,834	2,336	2,336	-	6	-	6
96	1,673	1,082	1,082	-	3	-	3
97	665	460	460	-	1	-	1
98	233	176	176	-	0	-	0
99	66	56	56	-	0	-	0
100	12	12	12	-	0	-	0
<b>Totals</b>					\$ 5,477,822,905	\$ -	\$ 5,477,822,905

Reserve Accounts and Sr. Staff Plan Assets are excluded from the Plan Net Position for the purpose of this projection.



## **SECTION E**

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### **PROJECTION OF ASSETS, LIABILITIES AND CONTRIBUTION REQUIREMENTS**

**Jacksonville Police and Fire Pension Fund**  
**40-Year Projection - Current Plan, Methods and Assumptions**

Valuation Date	Covered October 1 Payroll	Actuarial Accrued Liability	Net Actuarial Value of Assets	Unfunded Actuarial Accrued Liability	Net Present Value of Future Pension Liability Surtax Proceeds	Net Unfunded Actuarial Accrued Liability	Funded Ratio on Valuation Date	Total Contribution					
								Fiscal Year Ending	Pension Liability Surtax Contribution	% of Total Cont'n	Required City Contribution <sup>12</sup>	% of Total Cont'n	Total Contribution
10/1/22	162,885,451	4,916,392,825	2,259,229,842	2,657,162,983	1,260,338,181	1,396,824,802	45.95%	2023	0	0.0%	156,993,838	100.0%	156,993,838
10/1/23	157,473,934	5,080,646,767	2,278,153,424	2,802,493,343	1,356,639,870	1,445,853,473	44.84%	2024	0	0.0%	174,039,920	100.0%	174,039,920
10/1/24	149,313,273	5,247,293,873	2,324,899,748	2,922,394,125	1,458,977,908	1,463,416,217	44.31%	2025	0	0.0%	177,917,846	100.0%	177,917,846
10/1/25	139,051,890	5,412,489,327	2,365,429,672	3,047,059,655	1,567,728,324	1,479,331,331	43.70%	2026	0	0.0%	178,986,263	100.0%	178,986,263
10/1/26	132,433,637	5,560,194,725	2,316,290,367	3,243,904,358	1,683,290,960	1,560,613,398	41.66%	2027	0	0.0%	179,340,452	100.0%	179,340,452
10/1/27	123,454,873	5,703,403,318	2,373,025,544	3,330,377,774	1,792,704,872	1,537,672,902	41.61%	2028	0	0.0%	186,741,538	100.0%	186,741,538
10/1/28	115,676,544	5,835,774,664	2,423,937,729	3,411,836,935	1,909,230,689	1,502,606,246	41.54%	2029	0	0.0%	185,904,455	100.0%	185,904,455
10/1/29	106,042,090	5,959,219,861	2,462,263,561	3,496,956,300	2,033,330,684	1,463,625,616	41.32%	2030	0	0.0%	184,584,670	100.0%	184,584,670
10/1/30	95,692,915	6,067,017,939	2,481,266,733	3,585,751,206	2,165,497,178	1,420,254,028	40.90%	2031	75,266,160	29.2%	182,513,358	70.8%	257,779,518
10/1/31	90,976,630	6,167,946,791	2,566,041,103	3,601,905,688	2,229,189,729	1,372,715,959	41.60%	2032	104,619,963	36.7%	180,089,209	63.3%	284,709,172
10/1/32	86,731,061	6,256,229,518	2,666,838,927	3,589,390,591	2,266,120,476	1,323,270,115	42.63%	2033	109,066,311	37.8%	179,691,738	62.2%	288,758,049
10/1/33	80,730,126	6,337,150,003	2,766,325,349	3,570,824,654	2,300,863,142	1,269,961,512	43.65%	2034	113,701,630	38.7%	179,803,103	61.3%	293,504,733
10/1/34	72,190,830	6,404,921,216	2,860,556,596	3,544,364,620	2,333,080,487	1,211,284,133	44.66%	2035	118,533,949	39.8%	179,275,273	60.2%	297,809,222
10/1/35	61,194,951	6,455,905,594	2,946,940,999	3,508,964,595	2,362,405,061	1,146,559,534	45.65%	2036	123,571,642	41.0%	177,693,954	59.0%	301,265,596
10/1/36	50,600,981	6,498,062,492	3,034,127,645	3,463,934,847	2,388,436,893	1,075,497,954	46.69%	2037	128,823,436	42.4%	174,987,844	57.6%	303,811,280
10/1/37	36,496,090	6,529,052,915	3,119,282,056	3,409,770,859	2,410,741,003	999,029,856	47.78%	2038	134,298,432	43.8%	172,241,454	56.2%	306,539,886
10/1/38	24,382,960	6,545,428,295	3,201,204,666	3,344,223,629	2,428,844,747	915,378,882	48.91%	2039	140,006,116	45.5%	168,024,972	54.5%	308,031,088
10/1/39	18,066,019	6,543,832,116	3,275,086,605	3,268,745,511	2,442,234,973	826,510,538	50.05%	2040	145,956,376	47.0%	164,343,942	53.0%	310,300,318
10/1/40	13,917,333	6,543,832,116	3,339,224,823	3,184,260,828	2,450,354,963	733,905,865	51.19%	2041	152,159,522	48.3%	162,933,132	51.7%	315,092,654
10/1/41	10,475,761	6,489,479,134	3,401,055,871	3,088,423,263	2,452,601,179	635,822,084	52.41%	2042	158,626,301	49.4%	162,693,273	50.6%	321,319,574
10/1/42	7,666,468	6,433,495,820	3,454,250,218	2,979,245,602	2,448,319,757	530,925,845	53.69%	2043	165,367,919	50.4%	162,828,642	49.6%	328,196,561
10/1/43	5,290,750	6,359,245,570	3,503,685,225	2,855,560,345	2,436,802,772	418,757,573	55.10%	2044	172,396,056	51.4%	163,260,995	48.6%	335,657,051
10/1/44	3,215,887	6,274,574,396	3,558,582,579	2,715,991,817	2,417,284,227	298,707,590	56.71%	2045	179,722,888	52.3%	163,707,741	47.7%	343,430,629
10/1/45	1,977,172	6,178,913,113	3,619,711,134	2,559,201,979	2,388,935,771	170,266,208	58.58%	2046	187,361,111	53.4%	163,718,327	46.6%	351,079,438
10/1/46	680,179	6,073,569,411	3,689,074,186	2,384,495,225	2,350,862,108	33,633,117	60.74%	2047	195,323,958	54.6%	162,442,588	45.4%	357,766,546
10/1/47	0	5,958,653,624	3,766,910,228	2,191,743,396	2,302,096,092	(110,352,696)	63.22%	2048	203,625,226	64.9%	110,000,000	35.1%	313,625,226
10/1/48	0	5,834,616,441	3,800,478,204	2,034,138,237	2,241,593,472	(207,455,235)	65.14%	2049	212,279,298	65.9%	110,000,000	34.1%	322,279,298
10/1/49	0	5,701,783,965	3,843,813,665	1,857,970,300	2,168,227,280	(310,256,980)	67.41%	2050	221,301,169	66.8%	110,000,000	33.2%	331,301,169
10/1/50	0	5,560,396,595	3,898,729,374	1,661,667,221	2,080,781,821	(419,114,600)	70.12%	2051	230,706,468	67.7%	110,000,000	32.3%	340,706,468
10/1/51	0	5,411,094,139	3,967,555,527	1,443,538,612	1,977,946,247	(534,407,635)	73.32%	2052	240,511,493	68.6%	110,000,000	31.4%	350,511,493
10/1/52	0	5,254,448,377	4,052,680,670	1,201,767,707	1,858,307,689	(656,539,982)	77.13%	2053	250,733,232	69.5%	110,000,000	30.5%	360,733,232
10/1/53	0	5,091,783,887	4,157,381,440	934,402,447	1,720,343,909	(785,941,462)	81.65%	2054	261,389,394	70.4%	110,000,000	29.6%	371,389,394
10/1/54	0	4,923,611,969	4,284,266,027	639,345,942	1,562,415,448	(923,069,506)	87.01%	2055	272,498,443	71.2%	110,000,000	28.8%	382,498,443
10/1/55	0	4,750,394,664	4,436,048,377	314,346,287	1,382,757,227	(1,068,410,940)	93.38%	2056	284,079,627	72.1%	110,000,000	27.9%	394,079,627
10/1/56	0	4,576,245,074	4,619,259,385	(43,014,311)	0	(43,014,311)	100.94%	2057	0	0.0%	31,246,726	100.0%	31,246,726
10/1/57	0	4,398,663,429	4,444,495,882	(45,832,453)	0	(45,832,453)	101.04%	2058	0	0.0%	31,949,777	100.0%	31,949,777
10/1/58	0	4,218,272,682	4,267,106,957	(48,834,275)	0	(48,834,275)	101.16%	2059	0	0.0%	32,668,647	100.0%	32,668,647
10/1/59	0	4,035,682,360	4,087,714,086	(52,031,726)	0	(52,031,726)	101.29%	2060	0	0.0%	33,403,691	100.0%	33,403,691
10/1/60	0	3,852,690,613	3,908,128,147	(55,437,534)	0	(55,437,534)	101.44%	2061	0	0.0%	34,155,275	100.0%	34,155,275
10/1/61	0	3,668,393,993	3,727,459,247	(59,065,254)	0	(59,065,254)	101.61%	2062	0	0.0%	34,923,768	100.0%	34,923,768
10/1/62	0	3,484,372,691	3,547,302,013	(62,929,322)	0	(62,929,322)	101.81%	2063	0	0.0%	35,709,553	100.0%	35,709,553
								2064	0	0.0%	36,513,018	100.0%	36,513,018
<b>Total:</b>									<b>4,581,926,120</b>	<b>45.1%</b>	<b>5,585,328,982</b>	<b>54.9%</b>	<b>10,167,255,102</b>
<b>Total Present Value at 6.5%:</b>									<b>1,169,823,867</b>	<b>32.5%</b>	<b>2,433,176,139</b>	<b>67.5%</b>	<b>3,603,000,006</b>

<sup>1</sup>Future City contributions are assumed to be equal to the dollar amount of the calculated contribution, payable in December of the fiscal year beginning one year after the valuation date.

<sup>2</sup>Future City contributions does not reflect the potential use of reserves that have been allocated to the City that may be used to offset the City's required contribution amount. As of October 1, 2022, approximately \$5.2 million in reserves are available for use the by the City.

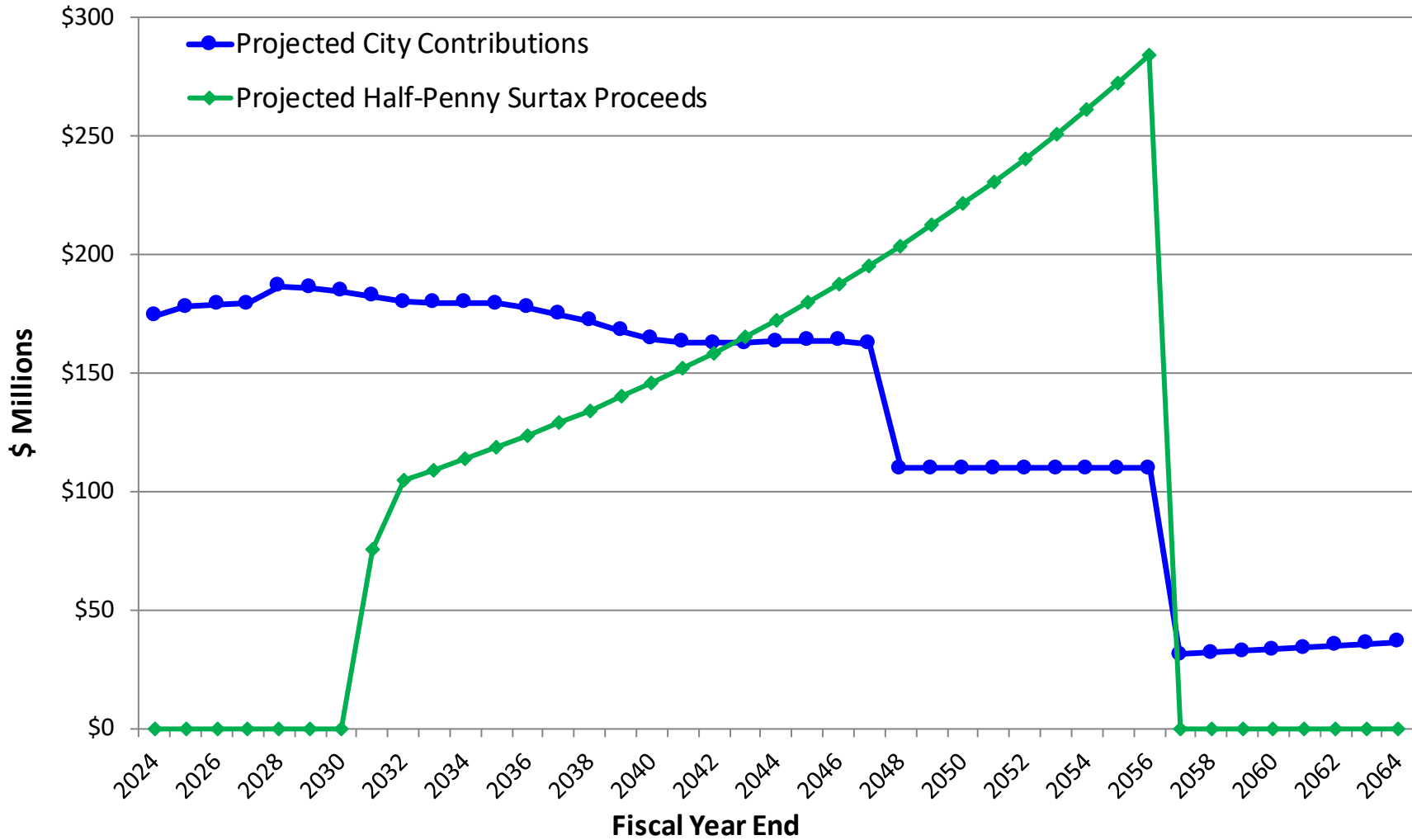
**Assumptions**

Investment Return Assumption:	6.5% per year
Actuarial Value of Assets:	5-Year Smoothed Market
Payroll Growth Rate Assumption:	1.25% per year
Pension Liability Surtax Proceeds:	5-Year Smoothed Pension Liability Surtax Revenue; 58.9% of Total Revenue Allocated to Police and Fire Pension Fund; Projected to increase 4.25% annually
Annual Expenses:	Projected to increase 2.25% annually

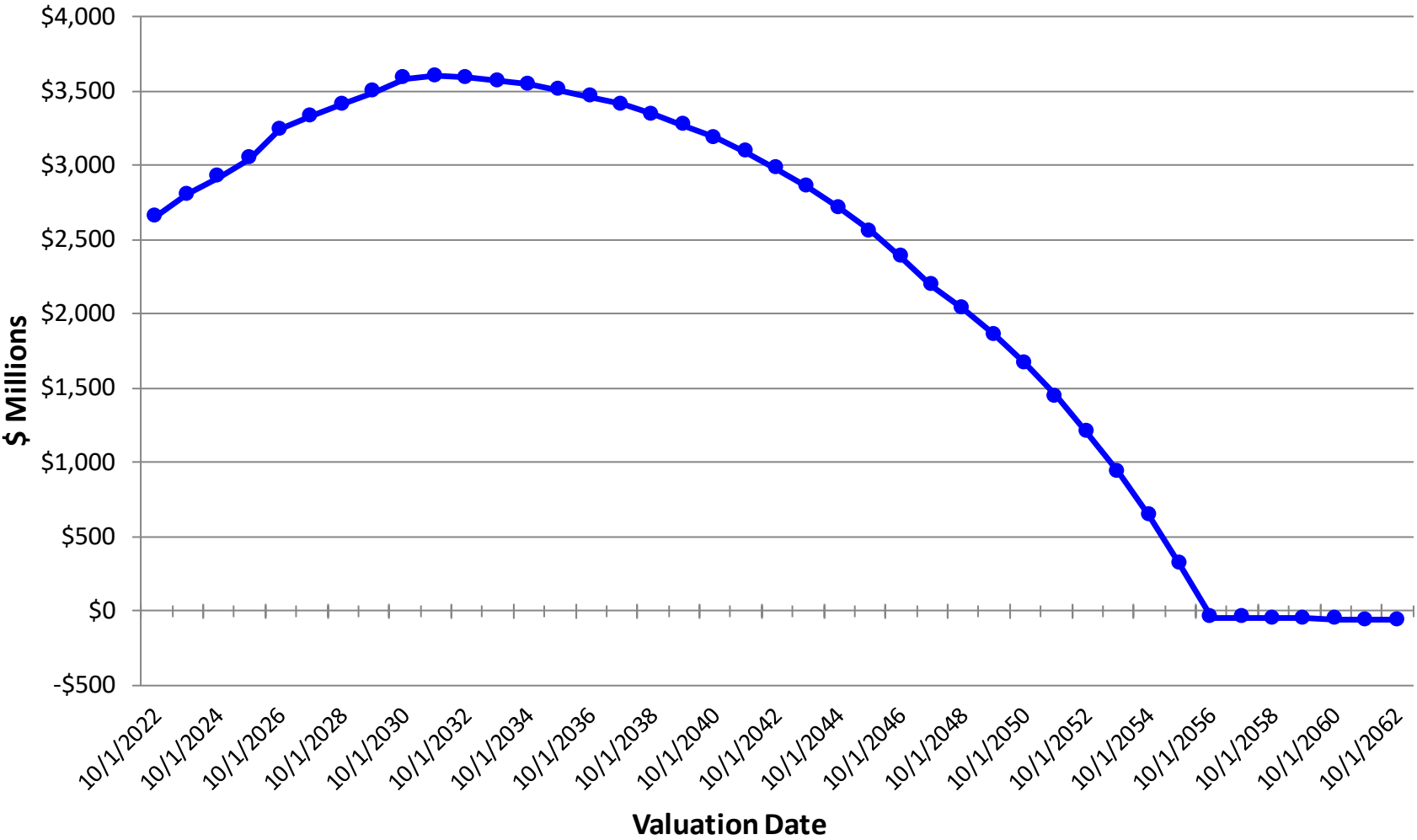
Future experience was assumed to be consistent with the aforementioned actuarial assumptions and methods. If experience differs from the actuarial assumptions or if the Board adopts different assumptions or methods, future results could be significantly different from the projected results above.



### Jacksonville Police and Fire Pension Fund 40-Year Projection of Pension Liability Surtax Proceeds and Required City Contributions

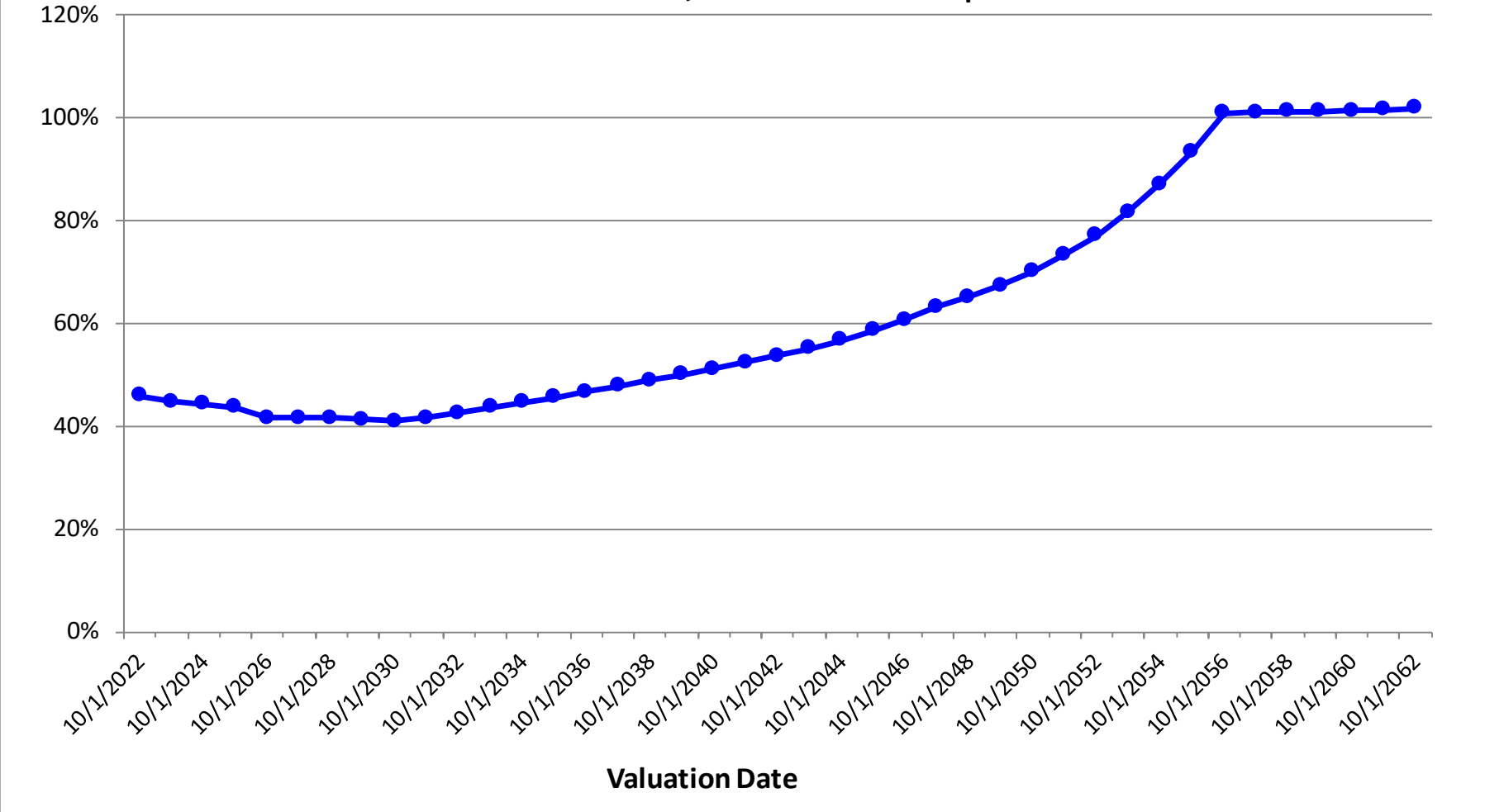


**Jacksonville Police and Fire Pension Fund  
40-Year Projection of Unfunded Actuarial Accrued Liability  
Current Plan, Methods and Assumptions**





**Jacksonville Police and Fire Pension Fund  
40-Year Projection of Funded Ratio  
Current Plan, Methods and Assumptions**



## SECTION F

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### MISCELLANEOUS INFORMATION

<b>RECONCILIATION OF TOTAL MEMBERSHIP DATA</b>		
	<b>From 10/1/21 To 10/1/22</b>	<b>From 10/1/20 To 10/1/21</b>
<b>A. Active Members</b>		
1. Number Included in Last Valuation	2,057	2,236
2. New Members Included in Current Valuation	0	0
3. Non-Vested Employment Terminations	(2)	(10)
4. Vested Employment Terminations	(16)	(22)
5. DROP Retirement	(151)	(139)
6. Service Retirements	(12)	(6)
7. Disability Retirements	(1)	0
8. Deaths	(6)	(2)
9. Other - Rehires	3	0
10. Number Included in This Valuation	<u>1,872</u>	<u>2,057</u>
<b>B. Terminated Vested Members</b>		
1. Number Included in Last Valuation	91	83
2. Additions from Active Members	16	22
3. Lump Sum Payments/Refund of Contributions	(4)	(5)
4. Payments Commenced	(6)	(9)
5. Deaths	0	0
6. Rehire	(3)	0
7. Other - Data Corrections	0	0
8. Number Included in This Valuation	<u>94</u>	<u>91</u>
<b>C. DROP Retirees, Service Retirees, Disability Retirees and Beneficiaries</b>		
1. Number Included in Last Valuation	3,185	3,067
2. Additions from Active Members	164	145
3. Additions from Terminated Vested Members	6	9
4. Deaths	(77)	(70)
5. Additions from New Survivor Benefits	51	37
6. End of Certain Period - No Further Payments	(4)	(4)
7. Other - Data Corrections	(1)	1
8. Number Included in This Valuation	<u>3,324</u>	<u>3,185</u>

Note: Participant Data is collected as of July 1.



## ACTIVE MEMBERS AS OF OCTOBER 1, 2022

Age Group	Years of Service to Valuation Date									Earnings	
	0-1	1-4	5-9	10-14	15-19	20-24	25-29	30+	Total	Total	Average
< 25	-	-	-	-	-	-	-	-	-	\$ -	\$ -
25-29	-	-	105	1	-	-	-	-	106	7,648,730	72,158
30-34	-	-	262	35	-	-	-	-	297	22,784,664	76,716
35-39	-	-	187	144	85	-	-	-	416	35,182,854	84,574
40-44	-	-	94	88	228	30	-	-	440	40,365,236	91,739
45-49	-	-	40	46	148	74	12	-	320	30,068,311	93,963
50-54	-	-	17	19	94	37	16	1	184	17,589,102	95,593
55-59	-	-	2	18	50	12	4	-	86	7,702,203	89,561
60-64	-	-	1	3	14	1	1	-	20	1,768,804	88,440
65-69	-	-	-	-	2	1	-	-	3	260,176	86,725
70+	-	-	-	-	-	-	-	-	-	-	-
<b>Total</b>	-	-	708	354	621	155	33	1	1,872	163,370,080	87,270

Average Age: 41.7    Average Service: 13.3

## INACTIVE MEMBERS AS OF OCTOBER 1, 2022

Age	<u>Terminated Vested</u>		<u>Disabled</u>		<u>Retired</u>		<u>DROP</u>		<u>Beneficiaries</u>		<u>Grand Total</u>	
	Number	Benefits	Number	Benefits	Number	Benefits	Number	Benefits	Number	Benefits	Number	Benefits
Under 25	0	0	0	0	0	0	0	0	25	266,663	25	266,663
25 - 29	2	18,387	0	0	0	0	0	0	0	0	2	18,387
30 - 34	10	121,437	0	0	0	0	0	0	1	16,641	11	138,078
35 - 39	17	307,314	1	42,122	0	0	0	0	1	40,852	19	390,288
40 - 44	27	504,401	0	0	8	414,629	23	1,211,760	7	219,026	65	2,349,816
45 - 49	15	352,700	1	38,376	50	2,405,206	113	6,501,900	8	324,781	187	9,622,963
50 - 54	17	303,755	5	246,341	339	18,622,049	174	11,114,502	15	658,090	550	30,944,737
55 - 59	4	114,930	11	531,148	438	26,674,682	90	5,352,391	27	1,246,778	570	33,919,929
60 - 64	2	52,965	6	302,742	359	23,775,271	19	1,036,768	34	1,569,005	420	26,736,751
65 - 69	0	0	9	436,540	322	23,656,274	6	364,158	60	3,208,988	397	27,665,960
70 - 74	0	0	8	360,258	340	25,145,621	0	0	64	3,167,126	412	28,673,005
75 - 79	0	0	2	72,971	277	21,000,914	0	0	97	4,861,981	376	25,935,866
80 - 84	0	0	1	24,775	125	9,416,427	0	0	73	3,280,809	199	12,722,011
85 - 89	0	0	1	4,547	62	4,294,564	0	0	55	2,433,190	118	6,732,301
90 - 94	0	0	0	0	26	1,552,037	0	0	32	1,005,031	58	2,557,068
95 - 99	0	0	0	0	3	85,844	0	0	6	179,181	9	265,025
100 & Over	0	0	0	0	0	0	0	0	0	0	0	0
<b>Total</b>	<b>94</b>	<b>1,775,889</b>	<b>45</b>	<b>2,059,820</b>	<b>2,349</b>	<b>157,043,518</b>	<b>425</b>	<b>25,581,479</b>	<b>505</b>	<b>22,478,142</b>	<b>3,418</b>	<b>208,938,848</b>
Average Age:		44.1		63.9		65.7		52.5		71.6		64.3
Avg. Annual Benefit:		18,892		45,774		66,855		60,192		44,511		61,129



## **SECTION G**

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### **SUMMARY OF PLAN PROVISIONS**

# SUMMARY OF PLAN PROVISIONS

## POLICE AND FIREFIGHTERS PENSION FUND

### A. Ordinances

The Plan was established under the Code of Ordinances for the City of Jacksonville, Florida, Title V, Chapter 121. The Plan is also governed by certain provisions of Chapter 175, Florida Statutes, Chapter 185, Florida Statutes, Part VII, Chapter 112, Florida Statutes and the Internal Revenue Code.

### B. Effective Date

Not Available.

### C. Plan Year

October 1 through September 30

### D. Type of Plan

Qualified, governmental defined benefit retirement plan; for GASB purposes it is a single employer plan.

### E. Eligibility Requirements

Any police officer or firefighter employed by the City on a regular full-time basis in an approved budgeted position. The plan is closed to new entrants effective October 1, 2017.

### F. Credited Service

Credited Service is measured as the total number of months and fractional parts thereof of full-time employment with the City during which time prescribed employee contributions are made. Members may purchase up to 5 years of service as a Florida State Certified Police Officer or Firefighter with another public employer and up to 2 years of wartime military service. No service is credited for any periods of employment for which the member received a refund of their contributions.

### G. Compensation

Amounts actually paid to participants, including base salary, longevity, City college incentive, enhanced certification pay, emergency operation and hazardous duty pay; shift differential, and "upgrade" pay; and excluding all overtime, state incentive pay, reimbursed expenses and allowances such as cleaning/clothes allowances, and payments for unused accrued time.



## H. Average Final Compensation (AFC)

The average of Compensation shall be the final two years of Credited Service immediately preceding the time of retirement.

## I. Time Service Retirement

Eligibility: A member may retire on the first day of the month coincident with attainment of 20 years of Credited Service.

Benefit: Average final compensation multiplied by:  
(1) 3.0% for each year of Credited Service for the first 20 years of service, plus  
(2) 2.0% for each year of Credited Service for years in excess of 20 years of service.

The maximum benefit is 80% of AFC.

Normal Form  
of Benefit: 75% Joint and Survivor option.

Health Care  
Supplement: Monthly benefit of \$5.00 multiplied by years of Credited Service (not in excess of 30).

COLA: Each retiree will receive a 3.0% increase in benefits beginning with the first bi-weekly pay period in the first January after commencement of benefit and in each subsequent first bi-weekly pay period in January.

## J. Delayed Retirement

Same as Time Service Retirement taking into account compensation earned and service credited until the date of actual retirement.

## K. Disability Retirement

Eligibility: Any member who becomes totally and permanently disabled as a result of an act occurring in the performance of service for the City is immediately eligible for a disability benefit.

Benefit: The greater of:  
(1) the member's accrued benefit to date of disability, or  
(2) 60% of AFC in effect on the date of disability.

Normal Form  
of Benefit: 75% Joint and Survivor option.





#### Health Care

Supplement: Monthly benefit of \$5.00 multiplied by years of actual years of Credited Service (not in excess of 30).

COLA: Each disabled retiree will receive a 3.0% increase in benefits beginning with the first bi-weekly pay period in the first January after commencement of benefit and in each subsequent first bi-weekly pay period in January.

#### L. Pre-Retirement Death

Eligibility: Any member who is killed or dies from effects of an injury or of any illness or disease is eligible for survivor benefits regardless of Credited Service.

Benefit: If the member has a legal spouse, the pension benefit is the greater of:  
(1) 75% of the member's accrued benefit to date of death, or  
(2) 45% of AFC (i.e. 75% of the member's minimum projected time service retirement benefit) in effect on the date of death.

If the member had children, an additional \$200/month per child (total 75% of normal benefit if orphan) until (i) child reaches age 18 years, whether or not the child is a qualified student, or (ii) child reaches age 22, provided the child is a qualified student, or (iii) each child becomes married, provided that the total of the surviving spouse and children's benefits do not exceed the total of the deceased member's projected benefit.

If the member does not have a surviving spouse or children, a refund of the member's contributions to the Plan without interest shall be payable to the estate of the Member.

#### Normal Form

of Benefit: Payable for the life of the beneficiary.

#### Health Care

Supplement: Monthly benefit of \$5.00 multiplied by years of actual years of Credited Service (not in excess of 30).

COLA: Each beneficiary will receive a 3.0% increase in benefits beginning with the first bi-weekly pay period in the first January after commencement of benefit and in each subsequent first bi-weekly pay period in January.

#### M. Vested Termination

Eligibility: A member has earned a non-forfeitable right to Plan benefits after the completion of 5 years of Credited Service. Optionally, vested members may elect a refund in lieu of the vested benefits otherwise due.



**Benefit:** The benefit is the member’s accrued Time Service Retirement Benefit. The benefit begins on the date that would have been the member’s Time Service Retirement date based on years of Credited Service at the termination date.

**Normal Form of Benefit:** 75% Joint and Survivor option.

**Health Care Supplement:** Same as Time Service Retirement.

**COLA:** Same as Time Service Retirement.

**N. Refunds**

Members terminating employment with less than 5 years of Credited Service will receive a refund of the member’s contributions without interest.

**O. Member Contributions**

10% of Compensation; 2% of Compensation for members in the DROP.

**P. Employer Contributions**

Any additional amount determined by the actuary needed to fund the plan properly according to State laws.

**Q. Cost of Living Increases**

Each retiree and beneficiary will receive a 3.0% increase in benefits on each first bi-weekly pay period in January.

**R. Deferred Retirement Option Plan**

**Eligibility:** Same as Time Service Retirement.

**Benefit:** The member’s Credited Service and AFC are frozen upon entry into the DROP. The monthly retirement benefit as described under Normal Retirement is calculated based upon the frozen Credited Service and AFC.

**Maximum**

**DROP Period:** The following time limits will apply for eligibility to elect to participate in the DROP:

<b>Years of Credited Service at Time of Election:</b>	<b>Maximum Pay Periods of Participation:</b>	<b>Maximum Months of Participation:</b>
20 but less than 30 years	130 biweekly	60
30 but less than 31 years	78 biweekly	36
31 but less than 32 years	52 biweekly	24



Interest

Credited: An annual rate of return of 8.40%.

Normal Form

of Benefit: Lump Sum, Direct Rollover, Partial Lump Sum with a Direct Rollover, or Monthly Distribution of the remaining balance.

COLA: Same as Normal Retirement.

**S. Other Ancillary Benefits**

There are no ancillary retirement type benefits not required by statutes but which might be deemed a City of Jacksonville Police and Fire Pension Fund liability if continued beyond the availability of funding by the current funding source.

**T. Changes from Previous Valuation**

None.