THE POLICE RETIREMENT SYSTEM OF ST. LOUIS

(A Fiduciary Component Unit of the City of St. Louis, Missouri)

REPORT ON ELEMENTS OF GOVERNMENTAL ACCOUNTING STANDARDS BOARD STATEMENT NO. 68 (GASB 68) ACTUARIAL VALUATION

Fiscal Year Ended September 30, 2022

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INDEPENDENT AUDITOR'S REPORT

The Board of Trustees
THE POLICE RETIREMENT SYSTEM OF ST. LOUIS

Opinion

We have audited the accompanying schedule of changes in net pension liability of **THE POLICE RETIREMENT SYSTEM OF ST. LOUIS** (the System), a Fiduciary Component Unit of the City of St. Louis, Missouri, as of and for the year ended September 30, 2022, and the related notes to the schedule. We have also audited deferred outflows of resources, deferred inflows of resources, and pension expense included in the accompanying schedules of other pension amounts of the System as of and for the year ended September 30, 2022, and the related notes to the schedules.

In our opinion, the schedules referred to above present fairly, in all material respects, the City of St. Louis, Missouri net pension liability, total deferred outflows of resources, total deferred inflows of resources, and pension expense for the System as of and for the year ended September 30, 2022, in accordance with accounting principles generally accepted in the United States of America.

Basis for Opinions

We conducted our audit in accordance with auditing standards generally accepted in the United States of America (GAAS) and the standards applicable to financial audits contained in *Government Auditing Standards* issued by the Comptroller General of the United States. Our responsibilities under these standards are further described in the Auditor's Responsibilities for the Audit of the Schedules section of our report. We are required to be independent of the System and to meet our other ethical responsibilities, in accordance with the relevant ethical requirements relating to our audit. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

We have relied on Cheiron's actuarial report titled *GASB 67/68 Report* as of September 30, 2022 for the actuarially determined amounts in these schedules and notes to the schedules. Cheiron provided a certification for this report dated February 17, 2023.

Responsibilities of Management for the Financial Statements

Management is responsible for the preparation and fair presentation of these schedules in accordance with accounting principles generally accepted in the United States of America, and for the design, implementation, and maintenance of internal control relevant to the preparation and fair presentation of the schedules that are free from material misstatement, whether due to fraud or error.

In preparing these schedules, management is required to evaluate whether there are conditions or events, considered in the aggregate, that raise substantial doubt about the System's ability to continue as a going concern for twelve months beyond the date of these schedules, including any currently known information that may raise substantial doubt shortly thereafter.

Auditor's Responsibilities for the Audit of the Financial Statements

Our objectives are to obtain reasonable assurance about whether the schedules as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditor's report that includes our opinion. Reasonable assurance is a high level of assurance but is not absolute assurance and therefore is not a guarantee that an audit conducted in accordance with GAAS and *Government Auditing Standards* will always detect a material misstatement when it exists. The risk of not detecting a material misstatement resulting from fraud is higher than for one resulting from error, as fraud may involve collusion, forgery, intentional omissions, misrepresentations, or the override of internal control. Misstatements are considered material if there is a substantial likelihood that, individually or in the aggregate, they would influence the judgment made by a reasonable user based on the schedules.

In performing an audit in accordance with GAAS and *Government Auditing Standards*, we:

- Exercise professional judgment and maintain professional skepticism throughout the audit.
- Identify and assess the risks of material misstatement of the schedules, whether due to fraud or error, and design and perform audit procedures responsive to those risks. Such procedures include examining, on a test basis, evidence regarding the amounts and disclosures in the schedules.
- Obtain an understanding of internal control relevant to the audit in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of System's internal control. Accordingly, no such opinion is expressed.
- Evaluate the appropriateness of accounting policies used and the reasonableness of significant accounting estimates made by management, as well as evaluating the overall presentation of the schedules.
- Conclude whether, in our judgment, there are conditions or events, considered in the aggregate, that raise substantial doubt about System's ability to continue as a going concern for a reasonable period of time.

We are required to communicate with those charged with governance regarding, among other matters, the planned scope and timing of the audit, significant audit findings, and certain internal control related matters that we identified during the audit.

Other Matters

Management is responsible for the supplemental information included in this report. The supplemental information, as listed in the table of contents, does not include the schedules and our auditor's report thereon. Our opinion on the schedules do not cover the supplemental information, and we do not express an opinion or any form of assurance thereon.

In connection with our audit of the schedules, our responsibility is to read the supplemental information and consider whether a material inconsistency exists between the supplemental information and the schedules, or the supplemental information otherwise appears to be materially misstated. If, based on the work performed, we conclude that an uncorrected material misstatement of the supplemental information exists, we are required to describe it in this report.

We have audited, in accordance with auditing standards generally accepted in the United States of America and the standards applicable to financial audits contained in *Government Auditing Standards*, the financial statements of the System as of and for the year ended September 30, 2022, and our report thereon dated June 2, 2023, expressed an unmodified opinion on those financial statements.

Restriction on Use

Our report is intended solely for the information and use of the Board of Trustees, the System's management, the City of St. Louis, and their auditors and is not intended to be and should not be used by anyone other than these specified parties.

Sikich LLP

St. Louis, Missouri
June 2, 2023

SCHEDULE OF CHANGES IN NET PENSION LIABILITY

	For The Year Ended September 30, 2022		
	Total Pension Liability (a)	System's Fiduciary Net Position (b)	Net Pension Liability (a)-(b)
Balance at September 30, 2021	$ 1,156,959,283	931,651,175	225,308,108
Changes for the Year			
Service cost	16,376,468	-	16,376,468
Interest on total pension liability, including service cost	73,349,139	-	73,349,139
Benefit changes	-	-	-
Differences between expected and actual experience	(10,523,277)	-	(10,523,277)
Assumption changes	(16,598,645)	-	(16,598,645)
Contributions:			
Employer	-	37,289,426	(37,289,426)
Members, including portability and restoration	-	5,172,235	(5,172,235)
Net investment income	-	(102,621,111)	102,621,111
Benefit payments	(69,977,396)	(69,977,396)	-
Refunds of Members' contributions	(7,856,810)	(7,856,810)	-
Administrative expenses	-	(1,242,879)	1,242,879
Net Changes	(15,230,521)	(139,236,535)	124,006,014
Balance at September 30, 2022	$ 1,141,728,762	792,414,640	349,314,122

Reconciliation of Net Pension Liability:	
Net pension liability, September 30, 2021	$ 225,308,108
Changes for the year:	
Pension expense	37,675,749
Change in deferred outflows (inflows) of resources	123,619,691
Employer contributions	(37,289,426)
Net Changes	124,006,014
Net Pension Liability, September 30, 2022	$ 349,314,122

See notes to schedules

SCHEDULE OF DEFERRED OUTFLOWS AND INFLOWS OF RESOURCES

	September 30 2022
Deferred outflows (inflows) of resources:	
Net difference between projected and actual earnings on pension plan investments	$ 82,054,624
Changes in assumptions	(12,925,333)
Differences between expected and actual liability experience	(12,578,567)
Net Deferred Outflows (Inflows) Of Resources, September 30, 2022	$ 56,550,724

	For The Year Ended September 30 2021
Reconciliation of net deferred outflows (inflows) of resources:	
Net deferred outflows (inflows) of resources, September 30, 2021	$ (67,068,967)
Changes in components of deferred outflows (inflows) of resources consist of:	
Difference between projected and actual earnings on pension plan investments	166,749,823
Actuarial assumption changes	(16,598,645)
Differences between expected and actual liability experience	(10,523,277)
	139,627,901
Recognition of deferred outflows (inflows)	16,008,210
Change In Deferred Outflows (Inflows) Of Resources	123,619,691
Net Deferred Outflows (Inflows) Of Resources, September 30, 2022	$ 56,550,724

See notes to schedules

SCHEDULE OF PENSION EXPENSE

	For The Year Ended September 30 2022
Pension expense:	
Operating expenses:	
Service cost	$ 16,376,468
Members' contributions, including portability and restoration	(5,172,235)
Administrative expenses	1,242,879
Total Operating Expenses	12,447,112
Financing expenses:	
Interest on total pension liability, including service cost	73,349,139
Expected return on investment assets	(64,128,712)
Total Financing Expenses	9,220,427
Recognition of deferred outflows (inflows):	
Recognition of investment gains and losses	23,848,164
Recognition of assumption changes	6,705,134
Recognition of liability experience gains and losses	(14,545,088)
Total Recognition Of Deferred Outflows (Inflows)	16,008,210
Pension Expense	$ 37,675,749
Reconciliation of pension expense:	
Change in net pension liability	$ 124,006,014
Change in deferred outflows (inflows) of resources	(123,619,691)
Employer contributions	37,289,426
Pension Expense	$ 37,675,749

NOTE A - SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

The significant accounting policies consistently applied by **THE POLICE RETIREMENT SYSTEM OF ST. LOUIS** (the System) in the preparation of the accompanying schedules are summarized as follows:

1. Reporting Entity

The System administers a single-employer, defined benefit pension plan providing benefits to the City of St. Louis (the City) police officers (Members). The System is a fiduciary trust fund of the City. As such, the System is included in the City's Annual Comprehensive Financial Report as a Pension Trust Fund. The System and its Board of Trustees are not financially accountable for any other entities or other organizations.

2. Basis of Accounting

The System's financial statements were prepared in accordance with accounting principles generally accepted in the United States of America as applicable to governmental organizations. In doing so, the System adheres to the reporting requirements established by the Governmental Accounting Standards Board (GASB). Employer's contributions are recognized in the period in which the contributions are due. Benefits and refunds are recognized when due and payable in accordance with the System's benefit provisions. Expenses are recorded when the corresponding liabilities are incurred, regardless of when payment is made. Dividend income is recognized based on the ex-dividend date and interest income is recognized on the accrual basis as earned. Fair value changes are recorded as investment income or loss. Investment purchases and sales are recorded on a trade-date basis (the date upon which the transaction is initiated).

3. Net Pension Liability

Net pension liability represents the actuarially computed liability of the employer for accrued vested benefits provided through a defined benefit pension plan. It is calculated as the total pension liability less the System's fiduciary net position.

4. Use of Estimates in the Preparation of the Schedules

The preparation of the schedules in conformity with accounting principles generally accepted in the United States of America requires management and the System's Actuary to make estimates and assumptions that affect certain amounts and disclosures. Actual results could differ from those estimates.

5. Fair Value Measurements

The System follows guidance issued by accounting principles generally accepted in the United States of America on fair value measurements, which establishes a framework for measuring fair value. This guidance applies whenever fair value is an applicable measurement.

NOTE A - SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (Continued)

6. Deferred Outflows of Resources and Deferred Inflows of Resources

Deferred outflows of resources represent consumption of net assets by a government employer that is applicable to a future reporting period. In accordance with GASB 68, these include demographic experience losses due to differences between expected and actual actuarial assumptions on the total pension liability, actuarial assumption changes increasing the total pension liability, or investment earnings that are below projected earnings. These outflows will be recognized in future reporting periods.

Deferred inflows of resources represent an acquisition of net assets by a government employer that is applicable to a future reporting period. In accordance with GASB 68, these include experience gains due to differences between expected and actual actuarial assumptions on the total pension liability, actuarial assumption changes reducing the total pension liability, or investment earnings that are greater than projected earnings. These inflows will be recognized in future reporting periods.

The City will need to calculate an additional type of deferred outflows of resources for contributions made to the System subsequent to the measurement date and before the end of the City's reporting period.

The City is solely responsible for its financial statements and, therefore, is responsible for evaluating the information used to recognize and disclose pension amounts in its financial statements. Similarly, the City's auditor is solely responsible for the audit of the City's financial statements and, therefore, is responsible for determining the sufficiency of audit evidence necessary to reduce audit risk to the appropriate level. Nevertheless, the City and their auditor may use the System's report to provide evidence that the pension amounts are not materially misstated.

The impact of the difference between projected and actual investment gains or losses on pension plan investments is recognized over a period of 5 years. During the measurement year, there was an actuarial investment loss of approximately $166.7 million. Approximately $33.3 million of that loss was recognized in the current year and an identical amount will be recognized in each of the next 4 years. Combined with $13.8 million of unrecognized investment losses and $65.1 million of unrecognized investment gains from prior years, this results in a deferred outflow of resources of approximately $82.1 million.

The increase in the blended discount rate assumption caused an decrease in the net pension liability during the measurement year and increased the deferred inflows of resources by approximately $16.6 million. Approximately $5.5 million of this amount was recognized in the current year and an identical amount will be recognized in each of the next 2 years. This combined with $1.8 million of net unrecognized assumption changes resulted in a deferred inflows of resources of approximately $12.9 million.

NOTE A - SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (Continued)

6. Deferred Outflows of Resources and Deferred Inflows of Resources (Continued)

The impact of experience gains or losses and assumption changes on the total pension liability are recognized in the pension expense over the average expected remaining service life of all active and inactive members of the System. As of the measurement date, this recognition period was 3 years. There was an experience gain of approximately $10.5 million in the current year of which $3.5 million of that gain was recognized in the current year and an identical amount will be recognized in the next 2 years. Combined with $5.6 million of unrecognized experience gain from prior year, this resulted in a deferred inflow of resources of approximately $12.6 million.

Amounts reported as net deferred outflows (inflows) of resources will be recognized in the City's pension expense as follows:

For The Years Ending September 30	Net Outflows (Inflows) From Investment (Gains) And Losses	Net Outflows (Inflows) From Assumption Changes	Net Outflows (Inflows) From Experience Gains	Total Net Outflows (Inflows)
2023	$ 22,649,365	(7,392,452)	(9,070,808)	6,186,105
2024	14,422,935	(5,532,881)	(3,507,759)	5,382,295
2025	11,632,361	-	-	11,632,361
2026	33,349,963	-	-	33,349,963
Total	$ 82,054,624	(12,925,333)	(12,578,567)	56,550,724

7. Pension Expense

Pension expense represents the economic cost of pensions that an entity recognizes during a reporting period. Pension expense is calculated in two different ways. First, it is calculated as the change in the amounts reported on the City's statement of net position that relate to the System and are not attributable to employer contributions. Therefore, it includes: 1) change in net pension liability, 2) change in deferred outflows (inflows) of resources, and 3) plus employer contributions.

The pension expense can also be calculated by its individual components as shown in the schedule of pension expense. Operating expenses include service cost less employee contributions and administrative expenses, collectively the cost of operating the System for the year. Financing expenses include interest on the total pension liability and interest on service costs, less the expected return on investment assets. The changes component of the pension expense calculation represents the items that drive the volatility in pension expense from year to year. Changes include benefit changes, recognized amounts due to assumption changes, recognized amounts from experience gains or losses on the total pension liability, and recognized amounts of differences in expected and actual investment gains or losses.

Changes in benefits must be enacted by the General Assembly of the State of Missouri. There were no changes in benefits during the year ended September 30, 2022.

NOTE B - ACTUARIAL METHODS AND ASSUMPTIONS

The following are the actuarial methods and assumptions that were used in the measurements of the pension liability:

Actuarial methods:	
Valuation date	October 1, 2022
Timing	Actuarially determined contributions are calculated based on the actuarial valuation at the beginning of the plan year
Actuarial cost method:	
GASB 67 and 68 reporting	Entry Age Normal
Amortization method/period	None - Aggregate is funded over the future working lifetime of current participants
Asset valuation method:	
GASB 67 and 68 reporting	Fair Value
Actuarial assumptions:	
Investment rate of return	7.0%, net of investment expenses and includes 0.15% administrative expenses
Long-term municipal bond rate	4.02%
Rate of payroll growth	3.0% to 6.25%, varies by years of service, including merit and promotions
Consumer price inflation	2.5%
Mortality (ordinary)	Pub-2010 Safety employee below-median income weighted mortality, projected fully generationally with Scale MP-2020
Mortality (accidental)	0.03% Per year for all ages in addition to ordinary mortality
Mortality (retirees)	Pub-2010 Safety healthy retiree below-median income weighted mortality, projected fully generationally with Scale MP-2020
Mortality (disabled)	Pub-2010 Safety disabled retiree mortality, projected fully generationally with Scale MP-2020
Mortality (beneficiaries)	Pub-2010 General retiree below-median income weighted mortality, projected fully generationally with Scale MP-2020

The actuarial assumptions were last updated as a result of the experience study performed by Cheiron for the five-year period ending September 30, 2020. The mortality, termination, DROP and retirement, percent married, and investment return, assumptions were changed in the October 1, 2021 actuarial valuation when the results of the experience study were first approved by the Trustees and became effective.

NOTE B - ACTUARIAL METHODS AND ASSUMPTIONS (Continued)

Discount Rate

The discount rate used to calculate the present value of future benefit payments for reporting purposes is based upon the projected plan net position (PNP) using actuarial assumptions about contributions, benefit payments, and long-term rate of return. If the projected PNP is not sufficient to cover projected benefit payments, a blended discount rate is required using both the weighted average of the long-term rate of return and the high grade bond muni-bond rate for periods after the PNP is exhausted. The System currently uses the long-term discount rate of 7.0% and expects assets will be sufficient to cover PNP until 2066. The muni-bond rate used in the valuation was 4.02% and is based on the Bond Buyers General Obligation 20 Year High Grade Rate Municipal Bond Index (AA/Aa or higher). Since the PNP was projected to be insufficient to make all projected benefit payments of current Members, a blended discount rate of 6.65% was used to calculate the present value of future benefit payments.

Proposition P

In November 2017, Proposition P was passed by City voters which approved a 0.5% sales tax earmarked for City law enforcement and firefighter needs “public safety”. This allowed for pay increases for the City’s police officers to take effect during 2018 (a one-time $6 thousand pay increase), which impacted the System’s pension liability in the October 1, 2018 actuarial valuation, increasing the September 30, 2019 pension liability (difference between expected and actual experience) by $36.5 million.

NOTE C - EXPERIENCE RISKS

Actuarial present value of accumulated plan benefits are reported based on certain actuarial methods and assumptions pertaining to interest rates, inflation rates, and employee demographics, all of which are subject to change. Due to uncertainties inherent in the estimations and assumptions process, it is at least reasonably possible that changes in these estimates and assumptions in the near term could be material to the System’s reported net pension liability and change to the net pension liability.

NOTE D - ADDITIONAL FINANCIAL AND ACTUARIAL INFORMATION

Additional financial and actuarial information supporting the preparation of the schedules is included in the System’s annual financial report for the year ended September 30, 2022 and the actuarial valuation report as of October 1, 2022. These reports can be obtained at www.stlouisprs.org or from:

Mark Lawson, J.D., Executive Director
The Police Retirement System of St. Louis
2020 Market Street
St. Louis, MO 63103-2210

SUPPLEMENTAL INFORMATION SECTION

SCHEDULE OF CHANGES IN NET PENSION LIABILITY - COMPARATIVE BY YEAR

	For The Years Ended September 30								
	2022	2021	2020	2019	2018	2017	2016	2015	2014
Discount Rate Assumption "Blended"	6.65 %	6.51	6.33	6.69	7.24	6.67	6.19	7.29	7.48
Total Pension Liability (A)									
Service cost	$ 16,376,468	20,487,163	18,188,606	15,678,890	16,369,318	17,988,134	12,617,971	12,977,679	12,991,999
Interest on total pension liability, including service cost	73,349,139	71,739,532	72,663,853	71,309,613	68,899,130	66,042,714	67,036,489	66,579,275	65,906,383
Benefit changes	-	-	-	-	-	-	-	-	-
Differences between expected and actual experience	(10,523,277)	(16,689,147)	(16,422,842)	22,854,628	(4,886,531)	3,911,067	(3,684,265)	(2,041,444)	- (B)
Assumption changes	(16,598,645)	(5,578,712) (D)	42,292,759	59,418,045	(59,545,809)	(55,153,649)	131,846,504 (D)	16,248,637	6,650,362
Benefit payments	(69,977,396)	(65,981,928)	(65,762,646)	(63,865,309)	(63,603,561)	(59,959,184)	(59,673,662)	(67,107,828)	(58,302,794)
Refunds of Members' contributions	(7,856,810)	(5,400,986)	(4,201,135)	(4,683,627)	(4,972,550)	(3,493,396)	(2,963,770)	(2,425,249)	(2,670,671)
Net Change In Total Pension Liability	(15,230,521)	(1,424,078)	46,758,595	100,712,240	(47,740,003)	(30,664,314)	145,179,267	24,231,070	24,575,279
Total Pension Liability Beginning	1,156,959,283	1,158,383,361	1,111,624,766	1,010,912,526	1,058,652,529	1,089,316,843	944,137,576	919,906,506	895,331,227
Total Pension Liability Ending (a)	$ 1,141,728,762	$ 1,156,959,283	1,158,383,361	1,111,624,766	1,010,912,526	1,058,652,529	1,089,316,843	944,137,576	919,906,506
System's Fiduciary Net Position									
Contributions - Employer	$ 37,289,426	32,839,034	35,335,830	35,970,630	33,104,561	33,826,528	30,778,664	30,600,069	32,324,823
Contributions - Members	5,172,235	5,898,084	6,169,551 (F)	5,228,438	5,129,154 (E)	4,653,968	4,376,867	4,487,942	4,438,346
Net investment income (loss)	(102,621,111)	167,070,589	43,802,433	17,514,881	51,089,258	93,520,079	52,927,643	(8,325,611)	48,094,636
Benefit payments	(69,977,396)	(65,981,928)	(65,762,646)	(63,865,309)	(63,603,561)	(59,959,184)	(59,673,662)	(67,107,828)	(58,302,794)
Refunds of Members' contributions	(7,856,810)	(5,400,986)	(4,201,135)	(4,683,627)	(4,972,550)	(3,493,396)	(2,963,770)	(2,425,249)	(2,670,671)
Administrative expenses	(1,242,879)	(1,423,896)	(1,446,227)	(1,572,951)	(1,165,930)	(1,206,161)	(1,102,866)	(1,125,310)	(1,095,653)
Net Change In System's Fiduciary Net Position	(139,236,535)	133,000,897	13,897,806	(11,407,938)	19,580,932	67,341,834	24,342,876	(43,895,987)	22,788,687
System's Fiduciary Net Position Beginning	931,651,175	798,650,278	784,752,472	796,160,410	776,579,478	709,237,644	684,894,768	728,790,755 (C)	706,276,668
System's Fiduciary Net Position Ending (b)	$ 792,414,640	931,651,175	798,650,278	784,752,472	796,160,410	776,579,478	709,237,644	684,894,768	729,065,355
Net Pension Liability Ending (a)-(b)	$ 349,314,122	225,308,108	359,733,083	326,872,294	214,752,116	282,073,051	380,079,199	259,242,808	190,841,151

Notes:

(A) The total pension liability as of the end of each measurement year is measured as of the measurement date (October 1) at the beginning of each year and projected to the end of each year.

(B) Because the beginning and ending values are based on the same actuarial valuation (September 30, 2013) and there were no significant events, no liability gains or losses due to experience are reported for the year ended September 30, 2014.

(C) The September 30, 2014 System's fiduciary net position was restated (decreased) by $274,600 from recording the beginning net pension liability resulting from implementing GASB 68 for the System's staff participation in ERS during the year ended September 30, 2015.

(D) The actuarial assumptions were updated based on an actuarial experience review for the five-year period (2016 - 2020) and (2011 - 2015), and were first effective with the actuarial valuation as of October 1, 2021 and 2016.

(E) Proposition P wage increase became effective in July 2018.

(F) There were Member contributions for 27 payroll periods received during the fiscal year ending September 30, 2020, which happens every 11 years. There were 26 payroll periods during all other fiscal years presented.

SCHEDULE OF ACTIVITY OF DEFERRED OUTFLOWS (INFLOWS) OF RESOURCES BY SOURCE BY FISCAL YEAR ESTABLISHED

	Amortization Factor In Years	For The Year Ended September 30, 2022					Future Recognition In City's Pension Expenses			
		Balance 9/30/2021	Increase (Decrease)	Recognized	Net Change	Balance 9/30/2022	2023	2024	2025	2026
Investment (gains) losses										
2018	5	$ 1,198,801	-	(1,198,801)	(1,198,801)	-	-	-	-	-
2019	5	16,452,862	-	(8,226,430)	(8,226,430)	8,226,432	8,226,432	-	-	-
2020	5	8,371,712	-	(2,790,570)	(2,790,570)	5,581,142	2,790,570	2,790,572	-	-
2021	5	(86,870,410)	-	21,717,602	21,717,602	(65,152,808)	(21,717,602)	(21,717,602)	(21,717,604)	-
2022	5	-	166,749,823	(33,349,965)	133,399,858	133,399,858	33,349,965	33,349,965	33,349,965	33,349,963
		(60,847,035)	166,749,823	(23,848,164)	142,901,659	82,054,624	22,649,365	14,422,935	11,632,361	33,349,963
Assumption changes										
2020	3	14,097,587	-	(14,097,587)	(14,097,587)	-	-	-	-	-
2021	3	(3,719,141)	-	1,859,571	1,859,571	(1,859,570)	(1,859,570)	-	-	-
2022	3	-	(16,598,645)	5,532,882	(11,065,763)	(11,065,763)	(5,532,882)	(5,532,881)	-	-
		10,378,446	(16,598,645)	(6,705,134)	(23,303,779)	(12,925,333)	(7,392,452)	(5,532,881)	-	-
Experience (gains) losses										
2020	3	(5,474,280)	-	5,474,280	5,474,280	-	-	-	-	-
2021	3	(11,126,098)	-	5,563,049	5,563,049	(5,563,049)	(5,563,049)	-	-	-
2022	3	-	(10,523,277)	3,507,759	(7,015,518)	(7,015,518)	(3,507,759)	(3,507,759)	-	-
		(16,600,378)	(10,523,277)	14,545,088	4,021,811	(12,578,567)	(9,070,808)	(3,507,759)	-	-
Totals		$ (67,068,967)	139,627,901	(16,008,210)	123,619,691	56,550,724	6,186,105	5,382,295	11,632,361	33,349,963

Note: Deferrals are related to future periods with recognition using amortization factors starting with year established:
Investment (gains) losses - 5-year smoothed
Assumption changes - average remaining service lives of current active Members of 2.66 years for 2022 (rounded to the nearest year - 3-year smoothed)
Experience (gains) losses - average remaining service lives of current active Members of 2.66 years for 2022 (rounded to the nearest year - 3-year smoothed)