

# GREEN SHEETS

FISCAL YEAR 2023

## **MONTANA'S PUBLIC EMPLOYEE RETIREMENT SYSTEMS** **DRAFT SUMMARY OF BENEFIT, ACTUARIAL, AND INVESTMENT DATA** **AS OF JUNE 30, 2023**

### **STATEWIDE DEFINED BENEFIT RETIREMENT SYSTEMS**

- Teachers' Retirement System (TRS)
- Public Employee Retirement System - Defined Benefit Plan (PERS-DB)
- Sheriffs' Retirement System (SRS)
- Municipal Police Officers' Retirement System (MPORS)
- Game Wardens' and Peace Officers' Retirement System (GWPORS)
- Firefighters' Unified Retirement System (FURS)
- Highway Patrol Officers' Retirement System (HPORS)
- Judges' Retirement System (JRS)
- Volunteer Firefighters' Compensation Act (VFCA)

### **OTHER STATEWIDE RETIREMENT SYSTEMS**

- Public Employee Retirement System - Defined Contribution Plan (PERS-DC)
- 457 (b) Deferred Compensation Plan
- Montana University System Retirement Program (MUS-RP)

**Prepared by Rebecca C. Power, Legislative Research Analyst**

*Information pulled from the fiscal year 2023 actuarial valuations and provided by the Montana Public Employee Retirement Administration, the Teachers' Retirement System, the Montana Board of Investments, the Office of the Commissioner of Higher Education, and the Legislative Fiscal Division. Updated October 25, 2023.*



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# PART ONE

## SUMMARY

### **PART ONE - SUMMARY**

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# INTRODUCTION

Welcome to the Fiscal Year 2023 Green Sheets. The information in Parts Two through Six is about the nine statewide defined benefit plans and the information in Part Seven is about the other three statewide retirement systems. Part Six - Historical Data, beginning on page 20, contains additional graphs this year. The section on the PERS-DC plan now includes a breakdown of average account balances by age group rather than an average account balance for everyone in the plan.

Multiple bills related to the public retirement systems passed during the 2023 Legislative Session. Of note, [HB 569 - Generally revise pension laws](#) will impact the Green Sheets going forward in a few ways. The bill moved the Sheriffs' Retirement System (SRS), the Game Wardens' and Peace Officers' Retirement System (GWPORS), the Highway Patrol Officers' Retirement System (HPORS), and the Judges' Retirement System (JRS) to a layered amortization model with an actuarially determined employer contribution (ADEC) rate. It also changed the retirement eligibility criteria in SRS and HPORS. The changes will be reflected beginning with the FY 2024 Green Sheets. The only impact to this year's Sheets is in Table 7: Sensitivity to Lower Investment Return Assumptions, where the ADEC rate is listed for these systems instead of the amortization period.

Data for the tables were pulled from the annual actuarial valuation reports for the pension systems. Additional information was provided by the Teachers' Retirement System (TRS), the Montana Public Employee Retirement Administration (MPERA), the Montana Board of Investments (BOI), the Office of the Commissioner of Higher Education (OCHE), and the Legislative Fiscal Division (LFD).

# ASSUMPTIONS

	TRS	MPERA SYSTEMS
INVESTMENT RETURN	7.30%	7.30%
WAGE GROWTH	3.50%	3.50%
INFLATION	2.75%	2.75%

# SUMMARY OF VALUATION RESULTS AS OF JUNE 30, 2023

SYSTEM	FUNDED RATIO (ROUNDED)	AMORTIZATION RATE	ACTUARIAL VALUE OF ASSETS	UNFUNDED ACTUARIALLY ACCRUED LIABILITY (UAAL)	MARKET VALUE RATE OF RETURN	ACTIVE MEMBERS	RETIRES & BENEFIT RECIPIENTS
TRS	72%	24 years	\$4,971,905,000	\$1,886,401,000	8.30%	19,978	17,707
PERS-DB	75%	28 years	\$6,999,338,415	\$2,361,877,227	8.35%	29,622	25,468
SRS	78%	25 years	\$499,906,211	\$141,756,205	8.56%	1,543	860
MPORS	73%	21 years	\$594,019,190	\$223,680,100	8.21%	862	928
GWPORS	82%	25 years	\$284,542,535	\$63,761,540	8.40%	1,017	488
FURS	82%	10 years	\$652,590,498	\$142,091,756	8.27%	826	697
HPORS	67%	25 years	\$188,715,871	\$94,718,948	8.37%	235	366
JRS	181%	0 years	\$132,393,655	(\$59,258,266)	8.39%	60	74
VFCA	98%	1 year	\$51,535,670	\$954,800	7.41%	2,510	1,540
TOTALS	--	--	\$14B	\$4B	--	56,653	48,128

# PART TWO

## DEMOGRAPHIC DATA

### **PART TWO - DEMOGRAPHIC DATA**

Table 1: Active Member Data

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Table 2: Retiree & Benefit Recipient Data

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**TABLE 1: ACTIVE MEMBER DATA**

SYSTEM	ACTIVE MEMBERS	AVERAGE AGE ( <i>ROUNDED</i> )	AVERAGE HIRE AGE ( <i>ROUNDED</i> )	AVERAGE YEARS OF SERVICE ( <i>ROUNDED</i> )	AVERAGE FULL-TIME ANNUAL SALARY	RATIO OF ACTIVE MEMBERS TO RETIREES AND BENEFICIARIES
TRS	19,978	44	34	10 yrs.	\$59,667	1.13
PERS-DB	29,622	47	39	8 yrs.	\$49,062	1.16
SRS	1,543	39	32	7 yrs.	\$66,396	1.73
MPORS	862	38	30	8 yrs.	\$77,501	0.93
GWORS	1,017	41	33	8 yrs.	\$57,417	2.08
FURS	826	39	29	10 yrs.	\$79,389	1.19
HPORS	235	39	30	9 yrs.	\$76,615	0.64
JRS	60	58	49	10 yrs.	\$142,685	0.81
VFCA	2,510	43	37	6 yrs.	N/A*	1.63
<b>TOTAL/AVG.</b>	<b>56,653</b>	<b>--</b>	<b>--</b>	<b>--</b>	<b>--</b>	<b>1.18</b>

**NOTE:**

- \*Members of the VFCA are volunteers and do not receive a salary.

## **TABLE 2: RETIREE AND BENEFIT RECIPIENT DATA**

<b>SYSTEM</b>	<b>NUMBER OF BENEFIT RECIPIENTS</b>	<b>AVERAGE AGE OF CURRENT ANNUITANTS (ROUNDED)</b>	<b>AVERAGE AGE AT RETIREMENT (ROUNDED)</b>	<b>AVERAGE YEARS OF SERVICE AT RETIREMENT (ROUNDED)</b>	<b>AVERAGE ANNUAL BENEFIT (SERVICE RETIREMENT)</b>	<b>PERCENT OF INCOME REPLACEMENT PROVIDED UNDER THE BENEFIT FORMULA IF MEMBER ATTAINS FULL SERVICE RETIREMENT*</b>	<b>TOTAL BENEFITS PAID IN FY 2023</b>
TRS	17,707	73	59	25 yrs.	\$25,204	Tier One** 41.67%  Tier Two** 55.5%	\$429,121,173
PERS-DB	25,554	73	61	22 yrs.	\$21,262	60%	\$541,852,695
SRS	891	65	54	19 yrs.	\$31,889	50%	\$27,343,915
MPORS	928	62	50	21 yrs.	\$35,897	50%***	\$33,957,906
GWPORS	490	65	58	19 yrs.	\$25,292	50%	\$11,833,285
FURS	697	65	53	24 yrs.	\$45,854	50%	\$32,131,050
HPORS	366	64	51	21 yrs.	\$39,546	52%	\$14,608,758
JRS	74	74	66	18 yrs.	\$59,044	49.95%	\$4,427,197
VFCA	1,541	73	60	19 yrs.	\$2,029	Set amount of \$175 per month for full service retirement	\$3,113,937
<b>TOTAL/AVG.</b>	<b>48,128</b>	<b>--</b>	<b>--</b>	<b>--</b>	<b>--</b>	<b>--</b>	<b>\$1,098,389,916</b>

### **NOTES:**

- \*Highest Average Salary x Retirement Factor x Years of Service = Percent of Income Replacement
- \*\*Tier one is calculated with 25 years of service and tier two is calculated with 30 years of service
- \*\*\*MPORS formula: Final Average Salary x Retirement Factor x Years of Service = Percent of Income Replacement

# PART THREE

## FUNDING & INVESTMENT DATA

### **PART THREE - FUNDING & INVESTMENT DATA**

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**TABLE 3: ACTUARIAL FUNDING DATA**

SYSTEM	ACTUARIAL VALUE OF ASSETS	ACTUARIALLY ACCRUED LIABILITY (AAL)	UNFUNDED ACTUARIALLY ACCRUED LIABILITY (UAAL)	NORMAL COST RATE	UAAL RATE	TOTAL CONTRIBUTIONS
TRS	\$4,971,905,000	\$6,858,306,000	\$1,886,401,000	10.75%	9.36%	\$244.94M
PERS-DB	\$6,999,338,415	\$9,361,215,642	\$2,361,877,227	9.49%	7.58%	\$246.91M
SRS	\$499,906,211	\$641,662,416	\$141,756,205	15.81%	6.76%	\$23.53M
MPORS	\$594,019,190	\$817,699,290	\$223,680,100	30.01%	22.77%	\$32.25M
GWPORS	\$284,542,535	\$348,304,075	\$63,761,540	17.92%	2.26%	\$10.42M
FURS	\$652,590,498	\$794,682,254	\$142,091,756	32.01%	25.66%	\$37.65M
HPORS	\$188,715,871	\$283,434,819	\$94,718,948	13.84%	20.56%	\$11.29M
JRS	\$132,393,655	\$73,135,389	(\$59,258,266)	26.76%	(42.91%)	\$0.99M
VFCA	\$51,535,670	\$52,490,470	\$954,800	\$719,594*	\$76,531*	\$0.64M
<b>TOTAL</b>	<b>\$14,374,947,045</b>	<b>\$19,230,930,355</b>	<b>\$4,855,983,310</b>	--	--	<b>\$608.63M</b>

**NOTE:**

- \*Percent not included in VFCA valuation, just dollar amount

## **TABLE 4: INVESTMENTS AND RETURNS**

<b>SYSTEM</b>	<b>AMOUNT INVESTED (FAIR VALUE ON JUNE 30, 2023)</b>	<b>MARKET RATE OF RETURN: FY 23</b>	<b>ACTUARIAL RATE OF RETURN: FY 23 (4-YEAR SMOOTHING)</b>	<b>AVERAGE MARKET RATE OF RETURN LAST 10 YRS.</b>	<b>AVERAGE ACTUARIAL RATE OF RETURN LAST 10 YRS.*</b>	<b>LONGEST MEASURABLE RETURN (28 YRS.)</b>
TRS	\$4.89B	8.46%	7.66%	8.17%	6.6%*	7.72%
PERS-DB	\$6.91B	8.50%	7.55%	8.17%	8.73%	7.71%
SRS	\$493.94M	8.50%	7.50%	8.17%	8.69%	7.62%
MPORS	\$565.74M	8.50%	7.27%	8.18%	8.43%	7.59%
GWPORS	\$280.49M	8.50%	7.41%	8.17%	8.61%	7.63%
FURS	\$621.59M	8.50%	7.24%	8.18%	8.43%	7.59%
HPORS	\$185.97M	8.50%	7.48%	8.18%	8.70%	7.62%
JRS	\$130.63M	8.48%	7.49%	8.17%	8.67%	7.62%
VFCA	\$47.52M	8.46%	7.13%	8.17%	8.32%	7.45%
<b>TOTAL</b>	<b>\$14.13B</b>	<b>--</b>	<b>--</b>	<b>--</b>	<b>--</b>	<b>--</b>

<b><u>Pension Asset Allocation (6/30/23)</u></b>	<b><u>Actual</u></b>	<b><u>Range Set in Policy</u></b>
Domestic Equity	28.40%	23 - 35%
Core Fixed Income	13.17%	9 - 19%
International Equity	14.77%	10 - 20%
Private Investments	17.33%	12 - 20%
Real Estate	12.01%	7 - 15%
Non-Core Fixed Income	6.43%	5 - 9%
Real Assets	6.14%	3 - 9%
Cash Equivalent	1.75%	0 - 5%

### **NOTES:**

- \*The average actuarial rate of return for TRS is based on the last 15 yrs. while the rest are based on the last 10 yrs.

## **TABLE 5: CASH FLOW**

<b>SYSTEM</b>	<b>BENEFITS &amp; EXPENSES (INCLUDES WITHDRAWALS)</b>	<b>NET INVESTMENT INCOME</b>	<b>NET CASH NEEDED (CONTRIBUTIONS MINUS BENEFITS &amp; EXPENSES)</b>	<b>NET CASH NEEDED AS PERCENTAGE OF ASSETS INVESTED</b>	<b>NET INCREASE (DECREASE) IN PLAN ASSETS</b>	<b>INCREASE (DECREASE) IN ACTUARIAL ACCRUED LIABILITY (AAL) FY 23</b>
TRS	\$433.39M	\$388.4M	\$188.45M	3.85%	\$199.95M	\$167.03M
PERS-DB	\$525.77M	\$549.22M	\$278.87M	4.04%	\$270.36M	\$334.43M
SRS	\$27.93M	\$38.82M	\$4.39M	0.89%	\$34.43M	\$44.54M
MPORS	\$35.46M	\$44.60M	\$3.21M	0.57%	\$41.39M	\$38.83M
GWPORS	\$11.72M	\$21.97M	\$1.30M	0.46%	\$20.67M	\$27.83M
FURS	\$34.35M	\$48.81M	\$3.30M	0.53%	\$52.11M	\$46.62M
HPORS	\$14.99M	\$44.60M	\$3.70M	1.99%	\$10.94M	\$10.19M
JRS	\$4.77M	\$10.33M	\$3.78M	2.9%	\$6.55M	\$0.21M
VFCA	\$4.05M	\$3.82M	\$3.42M	7.19%	\$0.41M	(\$0.11M)
<b>TOTAL</b>	<b>\$1.09B</b>	<b>\$1.12B</b>	<b>\$483.81M</b>	<b>3.43%</b>	<b>\$483.81M</b>	<b>\$669.57M</b>

## **TABLE 6: INVESTMENT EXPENSE DATA**

<b>SYSTEM</b>	<b>TOTAL ASSETS UNDER MANAGEMENT AS OF JUNE 30, 2023</b>	<b>BOI FIXED/ INTERNAL COSTS</b>	<b>BOI FIXED/ INTERNAL COSTS AS PERCENTAGE OF ASSETS</b>	<b>BOI VARIABLE/ EXTERNAL COSTS TOTAL</b>	<b>BOI VARIABLE/ EXTERNAL COSTS AS PERCENTAGE OF ASSETS</b>
TRS	\$4.89B	\$1,842,307	0.039%	\$19,669,479	0.42%
PERS-DB	\$6.91B	\$2,602,062	0.039%	\$27,785,588	0.42%
SRS	\$493.94M	\$182,855	0.040%	\$1,952,257	0.42%
MPORS	\$565.74M	\$210,799	0.040%	\$2,251,366	0.43%
GWPORS	\$280.49M	\$103,500	0.040%	\$1,105,122	0.43%
FURS	\$621.59M	\$230,275	0.040%	\$2,459,302	0.43%
HPORS	\$185.97M	\$69,640	0.040%	\$743,560	0.42%
JRS	\$130.63M	\$48,879	0.039%	\$522,177	0.42%
VFCA	\$47.52M	\$18,151	0.039%	\$193,906	0.41%
<b>TOTAL</b>	<b>\$14.13B</b>	<b>\$5,308,470</b>	<b>--</b>	<b>\$56,682,756</b>	<b>--</b>

### **NOTES:**

- Each plan has assets allocated to STIP and to CAPP. See Table 4 for general information about asset allocation.
- Fixed costs are those associated with internal management by BOI staff.
- Variable costs are those associated with management of funds by external entities.

## **TABLE 7: SENSITIVITY TO LOWER INVESTMENT RETURN ASSUMPTIONS**

### **0.5% LOWER ASSUMPTION**

- MPERA & TRS - Lowered from 7.30% to 6.80% Investment Return Assumption

<b>SYSTEM</b>	<b>FUNDED RATIO (ROUNDED)</b>	<b>AMORTIZATION PERIOD</b>	<b>CONTRIBUTION INCREASE NEEDED TO MAINTAIN CURRENT AMORTIZATION (PERCENTAGE)</b>	<b>CONTRIBUTION INCREASE NEEDED TO MAINTAIN CURRENT AMORTIZATION (DOLLAR AMOUNT)</b>
TRS	69%	37 years	2.9%	\$28.3M
PERS-DB	71%	47 years	2.4%	\$36.0M
SRS	73%	18.946%*	7.2%	\$7.4M
MPORS	68%	39 years	9.4%	\$6.3M
GWPORS	76%	16.93%*	7.7%	\$4.5M
FURS	76%	19 years	14.1%	\$9.3M
HPORS	62%	50.15%*	16.1%	\$2.9M
JRS	173%	0.00%*	0%	\$0
VFCA	93%	2 years	44.3%	\$1.4M

\*Percentage represents the Actuarially Determined Employer Contribution (ADEC) Rate per the changes in HB 569 (2023).

### **1.0% LOWER ASSUMPTION**

- MPERA & TRS - Lowered from 7.30% to 6.30% Investment Return Assumption

<b>SYSTEM</b>	<b>FUNDED RATIO (ROUNDED)</b>	<b>AMORTIZATION PERIOD</b>	<b>CONTRIBUTION INCREASE NEEDED TO MAINTAIN CURRENT AMORTIZATION (PERCENTAGE)</b>	<b>CONTRIBUTION INCREASE NEEDED TO MAINTAIN CURRENT AMORTIZATION (DOLLAR AMOUNT)</b>
TRS	65%	71 years	6.3%	\$62.1M
PERS-DB	67%	Does not amortize	5.3%	\$77.2M
SRS	68%	26.451%*	15.1%	\$15.5M
MPORS	63%	Does not amortize	19.7%	\$13.2M
GWPORS	71%	24.73%*	16.1%	\$9.4M
FURS	71%	44 years	30.6%	\$20.1M
HPORS	58%	67.43%*	33.3%	\$6.0M
JRS	165%	0.00%*	0%	\$0
VFCA	89%	4 years	145%	\$4.6M

\*Percentage represents the Actuarially Determined Employer Contribution (ADEC) Rate per the changes in HB 569 (2023).

# **PART FOUR**

## **CONTRIBUTIONS**

### **PART FOUR - CONTRIBUTIONS**

Table 8: Employer, Employee, and State  
Contributions

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Table 9: Employer Details and Covered Payroll

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**TABLE 8: EMPLOYER, EMPLOYEE, AND STATE CONTRIBUTIONS**

SYSTEM	EMPLOYER CONTRIBUTIONS FY 23	MEMBER CONTRIBUTIONS FY 23	ADDITIONAL FUNDING FROM STATE GENERAL FUND FY 23
TRS	<p><u>State &amp; MUS</u> 9.85% base + 1.9% supplemental = 11.75%*</p> <p><u>School Districts &amp; Community Colleges &amp; Local Government</u> 7.47% base + 1.9% supplemental = 9.37%*</p>	<p><u>Tier One (Before 7/1/13)</u> 7.15% plus 1% additional contribution until system is 90% funded = 8.15%</p> <p><u>Tier Two (After 7/1/13)</u> 8.15%</p>	<p><u>State General Fund</u> \$25 million + 2.38% for schools/cc + 0.11% for all = \$48.44M</p> <p><u>MUS</u> 4.72% of MUS-RP Payroll = \$13.66M</p>
PERS-DB	<p><u>State &amp; MUS</u> 6.9% base + 2.17% supplemental** = 9.07%</p> <p><u>Local Government &amp; School Districts</u> 6.8% base + 2.17% supplemental** = 8.97%</p>	7.9%***	<p><u>State General Fund</u> 0.1% for local govt + 0.27% for schools + 101% of previous year contribution = \$36.3M</p>
SRS	13.115%	10.495%	None
MPORS	14.41%	9.00%	State General Fund: \$19.6M
GWPORS	9.00%	10.56%	None
FURS	14.36%	10.69%	State General Fund: \$21.6M
HPORS	28.15%	13.05%	State General Fund: \$1.9M
JRS	0%****	7.00%	None
VFCA	0%*****	0%*****	5% of certain fire insurance premiums under 19-17-301, MCA

**NOTES:**

- \*Increases 0.1% each FY to cap of 2% through FY 2024
- \*\*Increases 0.1% each FY to cap of 2.27% through FY 2024
- \*\*\*Decreases to 6.9% when amortization period drops below 25 years and remains below 25 years following the termination of the temporary 1% increase and the additional employer contribution rate
- \*\*\*\*SB 175 (2021) changed the employer contribution rate to 0% from July 2021 to June 2023
- \*\*\*\*\*VFCA are volunteers and not paid for their work, so they do not have a member contribution rate; there is no employer contribution rate, rather there is a GF appropriation (19-17-301, MCA)

**TABLE 9: EMPLOYER DETAILS AND COVERED PAYROLL**

SYSTEM	TOTAL NUMBER OF PARTICIPATING EMPLOYERS	EMPLOYER TYPES	TOTAL OF EMPLOYERS' COVERED PAYROLL (ANNUAL VALUATION COMPENSATION)	PAYROLL BY TYPE OF EMPLOYER (AS PERCENTAGE OF TOTAL COVERED PAYROLL)
TRS	363	<ul style="list-style-type: none"> <li>▪ School Districts</li> <li>▪ Community Colleges</li> <li>▪ Education Co-ops</li> <li>▪ Counties</li> <li>▪ MUS</li> <li>▪ State Agencies</li> </ul>	\$983,749,000	State: 0.9% Local: 97.8% MUS: 1.3%
PERS-DB	551	<ul style="list-style-type: none"> <li>▪ State Agencies</li> <li>▪ MUS</li> <li>▪ Counties</li> <li>▪ Cities</li> <li>▪ Schools &amp; Community Colleges</li> <li>▪ Special Districts</li> <li>▪ Some Smaller Police and Rural Fire Depts</li> </ul>	\$1,453,317,132	State: 41.69% Local: 49.38% MUS: 8.93%
SRS	57	<ul style="list-style-type: none"> <li>▪ Dept of Justice                             <ul style="list-style-type: none"> <li>○ Investigators</li> </ul> </li> <li>▪ Counties                             <ul style="list-style-type: none"> <li>○ Sheriffs</li> <li>○ Deputies</li> <li>○ Detention Officers</li> </ul> </li> </ul>	\$102,449,725	State: 5.07% County: 94.93%
MPORS	36	<ul style="list-style-type: none"> <li>▪ City Police Officers</li> </ul>	\$66,806,214	Cities: 100%
GWPORS	7	<ul style="list-style-type: none"> <li>▪ Dept. of FWP                             <ul style="list-style-type: none"> <li>○ Game Wardens</li> </ul> </li> <li>▪ Dept. of Corrections                             <ul style="list-style-type: none"> <li>○ Security Guards</li> <li>○ Probation/Parole</li> </ul> </li> <li>▪ MUS                             <ul style="list-style-type: none"> <li>○ Campus Security</li> </ul> </li> </ul>	\$58,393,246	State: 94.33% MUS: 5.67%
FURS	28	<ul style="list-style-type: none"> <li>▪ City Firefighters</li> </ul>	\$65,574,963	Cities: 100%
HPORS	1	<ul style="list-style-type: none"> <li>▪ Dept. of Justice                             <ul style="list-style-type: none"> <li>○ Highway Patrol Officers</li> <li>○ Supervisors</li> </ul> </li> </ul>	\$18,004,509	State: 100%
JRS	1	<ul style="list-style-type: none"> <li>▪ Judicial Branch                             <ul style="list-style-type: none"> <li>○ Justices/Judges</li> <li>○ Supreme Court</li> <li>○ District Courts</li> <li>○ Water Court</li> </ul> </li> </ul>	\$8,561,115	State: 100%
VFCA	228	<ul style="list-style-type: none"> <li>▪ Fire Companies as defined in 19-17-109, MCA</li> </ul>	N/A	N/A



# **PART FIVE**

## **PLAN DETAILS**

### **PART FIVE - PLAN DETAILS**

Table 10: Benefit Formula and Eligibility

Page 18

Table 11: Post-Retirement Benefit Increases

Page 19

**TABLE 10: BENEFIT FORMULA AND ELIGIBILITY**

SYSTEM	SERVICE AND AGE ELIGIBILITY CRITERIA FOR FULL RETIREMENT	MINIMUM SERVICE FOR VESTING	HIGHEST AVERAGE COMPENSATION (HAC) PERIOD USED IN BENEFIT CALCULATION	SERVICE RETIREMENT BENEFIT MULTIPLIER*	SOCIAL SECURITY COVERAGE
TRS	<p><u>Tier 1 (Before 7/1/13)</u> 5 yrs., age 60; or 25 years</p> <p><u>Tier 2 (After 7/1/13)</u> 30 yrs., age 55; or 5 yrs., age 60</p>	5 yrs.	<p><u>Tier 1 (Before 7/1/13)</u> 3 yrs.</p> <p><u>Tier 2 (After 7/1/13)</u> 5 yrs.</p>	<p><u>Tier 1 (Before 7/1/13)</u> 1.67% per year</p> <p><u>Tier 2 (After 7/1/13)</u> 1.67% per year, then 1.85% per year if attained 30 yrs. service and age 60</p>	Yes <i>(most members)</i>
PERS-DB	<p><u>Before 7/1/11</u> 5 yrs., age 60; or 30 yrs.; or age 65</p> <p><u>After 7/1/11</u> 5 yrs., age 65; or age 70</p>	5 yrs.	<p><u>Before 7/1/11</u> 3 yrs.</p> <p><u>After 7/1/11</u> 5 yrs.</p>	<p><u>Before 7/1/11</u> &lt; 25 yrs.: 1.7857% 25 yrs. or more: 2%</p> <p><u>After 7/1/11</u> &lt; 10 yrs.: 1.5% 10-29 yrs.: 1.78571% 30 yrs. or more: 2%</p>	Yes <i>(most members)</i>
SRS	20 yrs.	5 yrs.	<p><u>Before 7/1/11</u> 3 yrs.</p> <p><u>After 7/1/11</u> 5 yrs.</p>	2.5% per year	Yes
MPORS	20 yrs.; or 5 yrs., age 50	5 yrs.	3 yrs. (final average, not highest average)	2.5% per year	No
GWPORS	20 yrs., age 50; or 5 yrs., age 55	5 yrs.	<p><u>Before 7/1/11</u> 3 yrs.</p> <p><u>After 7/1/11</u> 5 yrs.</p>	2.5% per year	Yes
FURS	20 yrs.; or 5 yrs., age 50	5 yrs.	3 yrs.	2.5% per year	No
HPORS	20 yrs.	<p><u>Before 7/1/13</u> 5 yrs.</p> <p><u>After 7/1/11</u> 10 yrs.</p>	3 yrs.	2.6% per year	No
JRS	5 yrs., age 60	5 yrs.	3 yrs.	<p>Up to 15 yrs.: 3.33%</p> <p>15 yrs. or more: 1.785% for each year more than 15 yrs.</p>	Yes
VFCA	<p>For full benefit: Age 55 and 20 years of service</p> <p>For reduced benefit: Age 60 and 10 years of service</p>	N/A	N/A	N/A	N/A

**NOTES:**

- \*PERS-DB also offers a money purchase option: calculated by taking the greater of the service benefit multiplier equation listed or actuarial equivalent of 2x member’s accumulated contributions plus interest set by Board (0.22%)
- The information listed above reflects the benefit eligibility as of June 20, 2023 and does not include changes made during the 2023 Legislative Session.

## **TABLE 11: POST-RETIREMENT BENEFIT INCREASES**

SYSTEM	MINIMUM BENEFIT	GABA	WAITING PERIOD FOR GABA
TRS	N/A	<u>Tier 1 (Before 7/1/13)</u> 1.5%  <u>Tier 2 (After 7/1/13)</u> Equal to or greater than 0.5%, but no more than 1.5%, depending on the status of the plan*	3 yrs.
PERS-DB	N/A	<u>Before 7/1/07</u> 3.0%  <u>7/1/07 – 6/30/13</u> 1.5%  <u>After 7/1/13</u> 1.5%**	1 yr.
SRS	N/A	<u>Before 7/1/07</u> 3.0%  <u>After 7/1/07</u> 1.5%	1 yr.
MPORS	<u>Before 7/1/97</u> 1/2 of monthly salary of new officer	<u>After 7/1/97 or elected GABA</u> 3.0%	1 yr.
GWPORS	N/A	<u>Before 7/1/07</u> 3.0%  <u>After 7/1/07</u> 1.5%	1 yr.
FURS	<u>10+ yrs. service &amp; didn't elect GABA</u> 1/2 of monthly salary of new firefighter	<u>After 7/1/97 or elected GABA</u> 3.0%	1 yr.
HPORS	<u>Before 7/1/97 &amp; didn't elect GABA</u> 2% of base salary of probationary officer	<u>Before 7/1/13</u> 3.0%  <u>After 7/1/13</u> 1.5%	<u>Before 7/1/13</u> 1 yr.  <u>After 7/1/13</u> 3 yrs.
JRS	<u>Before 7/1/97</u> Benefits increased same as salary of sitting judge	<u>After 7/1/97 or elected GABA</u> 3.0%	1 yr.
VFCA	N/A	N/A	N/A

### **NOTES:**

- \*If system liabilities are at least 90% funded and the provision of the increase is not projected to cause the system's liabilities to be less than 85% funded, the GABA will be set by the board to an amount that is at least 0.5% but no more than 1.5%. The benefit increase will be effective on January 1.
- \*\*Reduced 0.1% for every two years the system is below 90% funded. If the amortization period is 40 years or greater, the applicable GABA increase must be reduced to 0%.

# PART SIX

## HISTORICAL DATA (FY17-23)

### **PART SIX - HISTORICAL DATA (FY17-23)**

Table 12: Funded Ratio & Amortization Rate	Page 21
Table 13: Active Members & Retirees/Benefit Recipients	Page 24
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Table 15: Actuarial Value of Assets	Page 28
Table 16: Actuarially Accrued Liability & Unfunded Actuarially Accrued Liability	Page 29

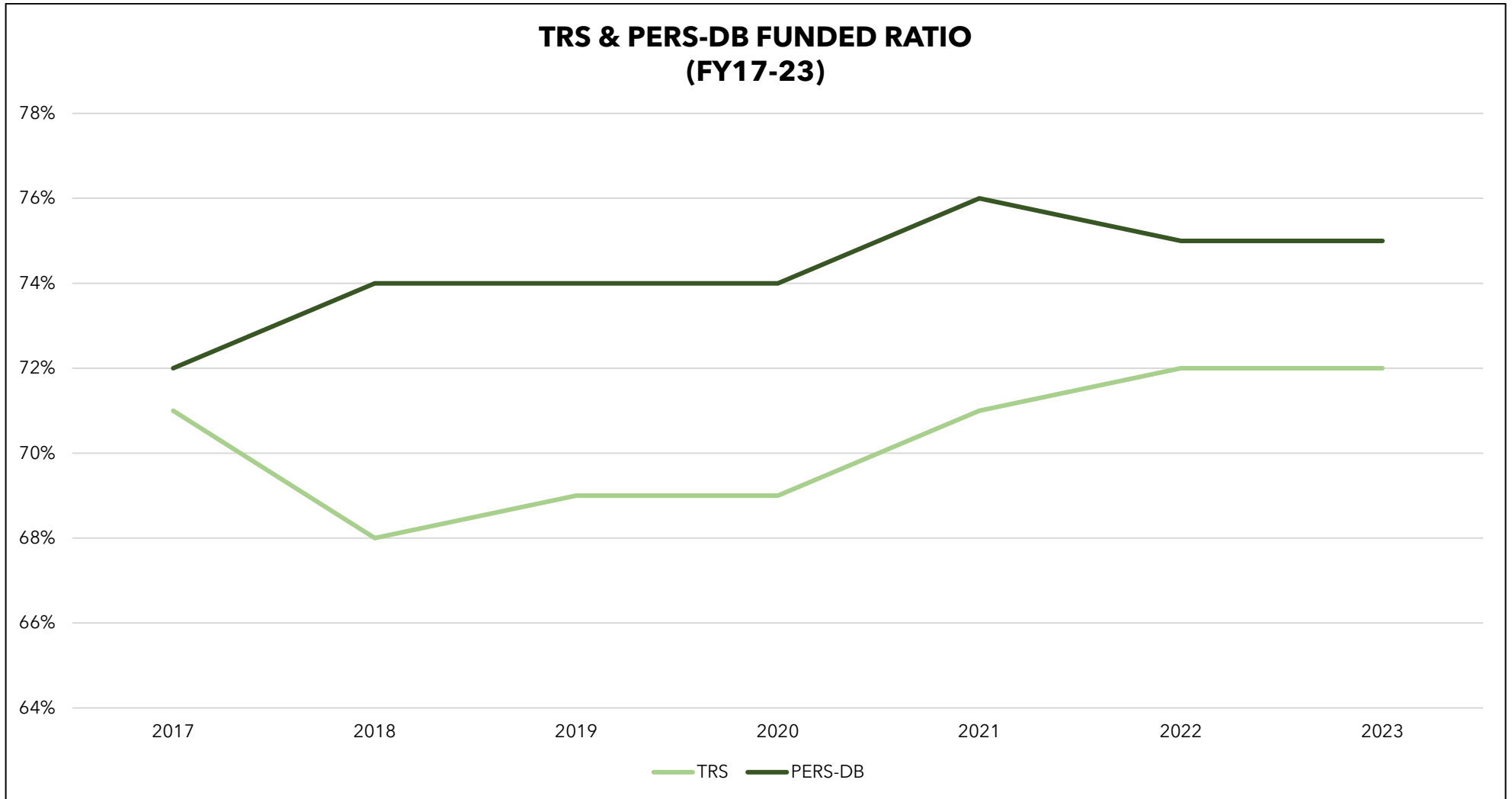
**TABLE 12: FUNDED RATIO & AMORTIZATION RATE (FY17-23)**

SYSTEM	FY 2017	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023
<b>FUNDED RATIO (ROUNDED)</b>							
TRS	71%	68%	69%	69%	71%	72%	72%
PERS-DB	72%	74%	74%	74%	76%	75%	75%
SRS	81%	81%	82%	81%	83%	79%	78%
MPORS	68%	68%	69%	71%	74%	71%	73%
GWPORS	81%	83%	84%	84%	85%	83%	82%
FURS	76%	78%	80%	82%	86%	81%	82%
HPORS	64%	64%	65%	65%	67%	66%	67%
JRS	167%	161%	161%	163%	177%	174%	181%
VFCA	81%	83%	85%	87%	99%	91%	98%
<b>AMORTIZATION RATE</b>							
TRS	22 yrs.	31 yrs.	29 yrs.	29 yrs.	24 yrs.	25 yrs.	24 yrs.
PERS-DB	30 yrs.	38 yrs.	36 yrs.	35 yrs.	28 yrs.	32 yrs.	28 yrs.
SRS	25 yrs.	21 yrs.	21 yrs.	21 yrs.	18 yrs.	33 yrs.	25 yrs.
MPORS	16 yrs.	20 yrs.	18 yrs.	16 yrs.	15 yrs.	24 yrs.	21 yrs.
GWPORS	70 yrs.	72 yrs.	53 yrs.	40 yrs.	35 yrs.	DNA*	25 yrs.
FURS	10 yrs.	10 yrs.	9 yrs.	8 yrs.	6 yrs.	12 yrs.	10 yrs.
HPORS	37 yrs.	40 yrs.	42 yrs.	39 yrs.	26 yrs.	47 yrs.	25 yrs.
JRS	0 yrs.	0 yrs.	0 yrs.	0 yrs.	0 yrs.	0 yrs.	0 yrs.
VFCA	6 yrs.	5 yrs.	5 yrs.	4 yrs.	1 yr.	3 yrs.	1 yr.

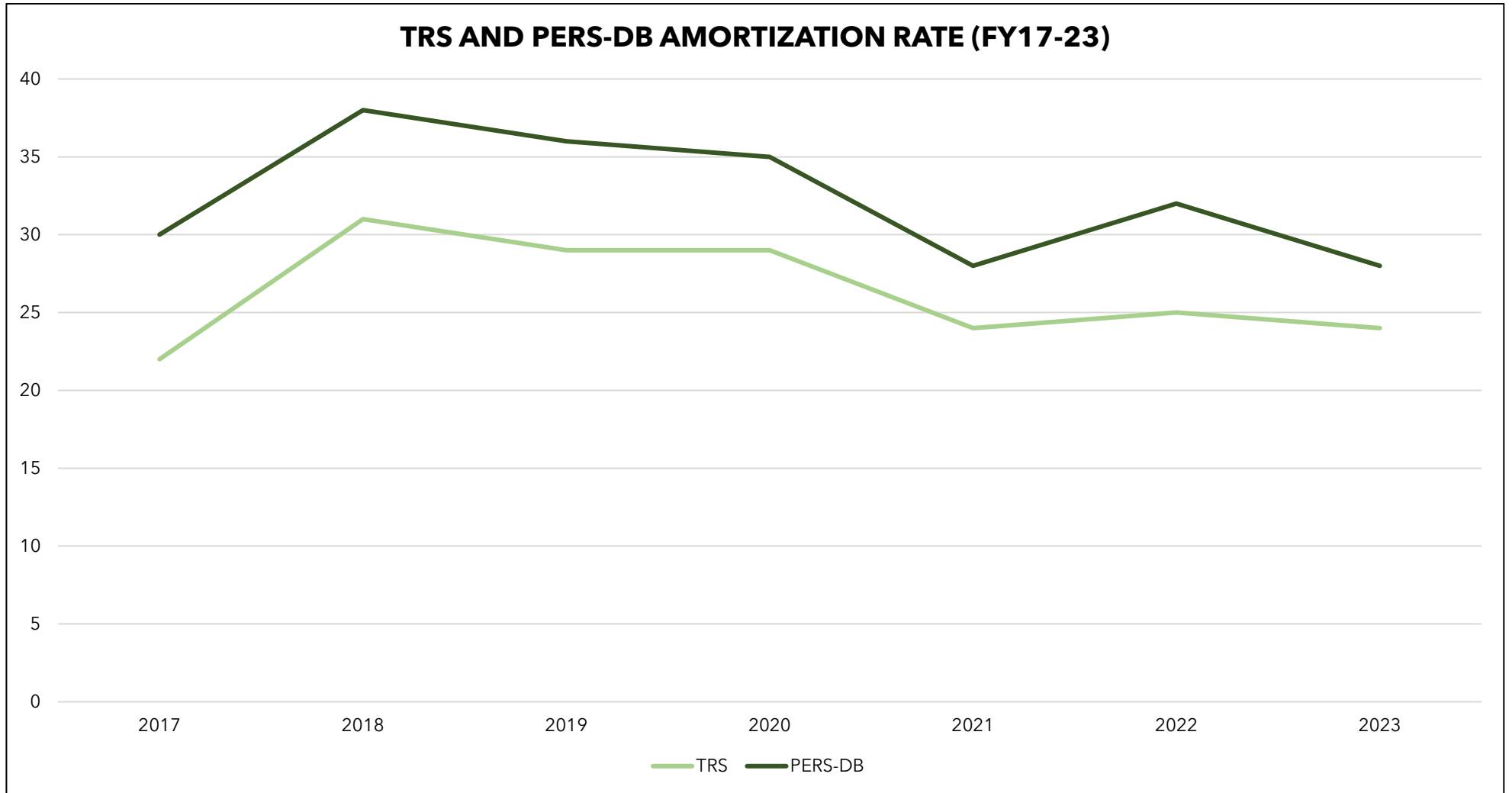
**NOTES:**

- \*DNA = does not amortize

**GRAPH 1: TRS AND PERS-DB FUNDED RATIO (FY 17-23)**



**GRAPH 2: TRS AND PERS-DB AMORTIZATION RATE (FY 17-23)**

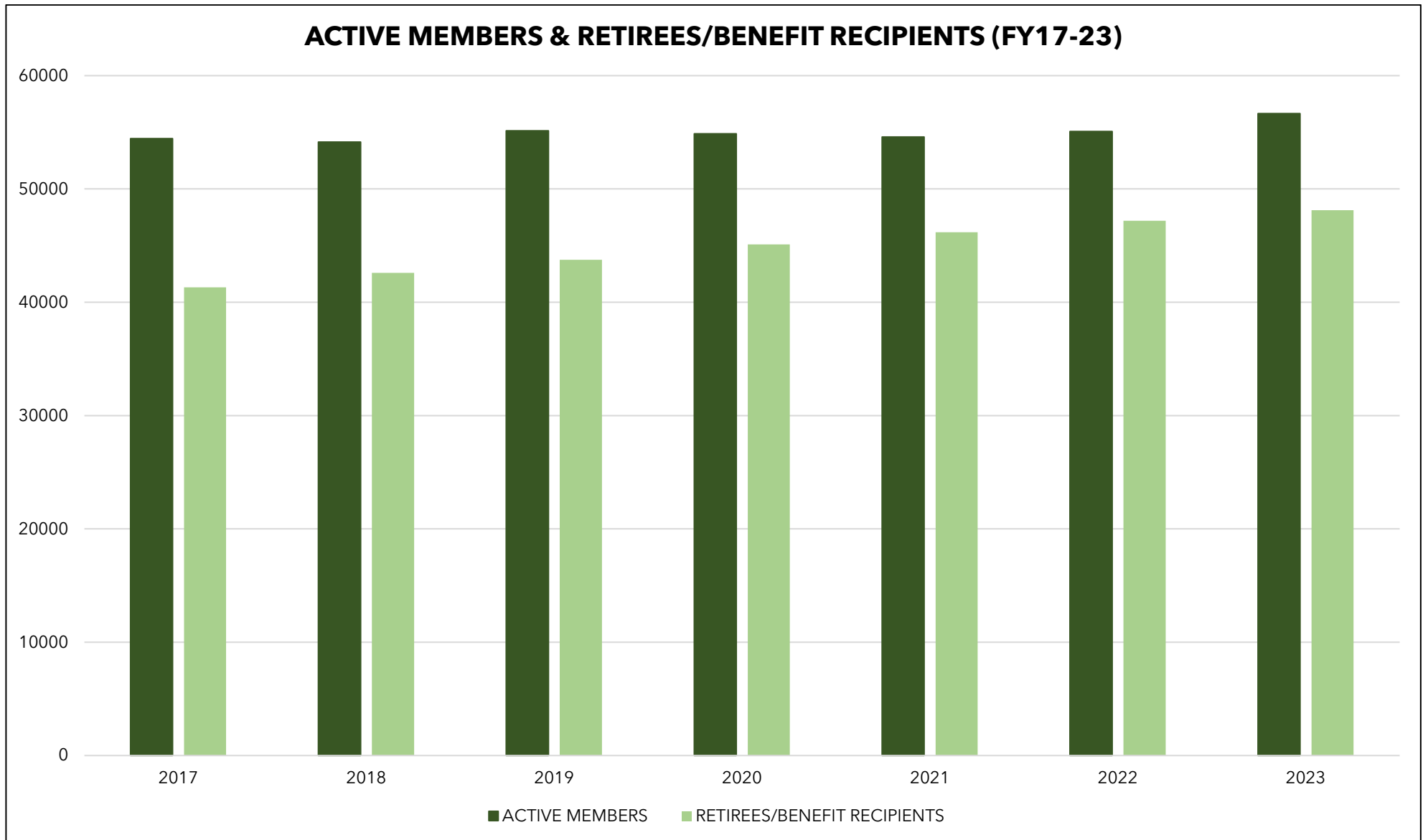


**TABLE 13: ACTIVE MEMBERS & RETIREES/BENEFIT RECIPIENTS (FY17-23)**

SYSTEM	FY 2017	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023
<b>ACTIVE MEMBERS</b>							
TRS	18,917	19,267	19,686	19,046	19,161	19,975	19,978
PERS-DB	29,395	28,646	28,908	29,039	29,028	28,508	29,622
SRS	1,415	1,429	1,454	1,505	1,495	1,481	1,543
MPORS	775	787	806	829	823	841	862
GWPORS	1,012	1,010	1,021	1,033	1,023	977	1,017
FURS	678	691	722	735	734	749	826
HPORS	238	233	232	233	244	252	235
JRS	56	55	58	58	57	59	60
VFCA	1,957	2,029	2,249	2,401	2,031	2,233	2,510
<b>TOTAL BY FY</b>	<b>54,443</b>	<b>54,147</b>	<b>55,136</b>	<b>54,879</b>	<b>54,596</b>	<b>55,075</b>	<b>56,653</b>
<b>RETIREES &amp; BENEFIT RECIPIENTS</b>							
TRS	15,566	15,933	16,256	16,605	16,985	17,369	17,707
PERS-DB	21,644	22,398	23,099	23,856	24,403	25,026	25,468
SRS	619	654	697	763	805	809	860
MPORS	761	780	818	870	910	908	928
GWPORS	273	309	342	384	420	442	488
FURS	624	643	651	678	692	691	697
HPORS	325	331	336	350	356	354	366
JRS	67	69	73	72	73	74	74
VFCA	1,437	1,473	1,487	1,523	1,531	1,523	1,540
<b>TOTAL BY FY</b>	<b>41,316</b>	<b>42,590</b>	<b>43,759</b>	<b>45,101</b>	<b>46,175</b>	<b>47,196</b>	<b>48,128</b>



**GRAPH 3: ACTIVE MEMBERS & RETIREES/BENEFIT RECIPIENTS (FY17-23)**



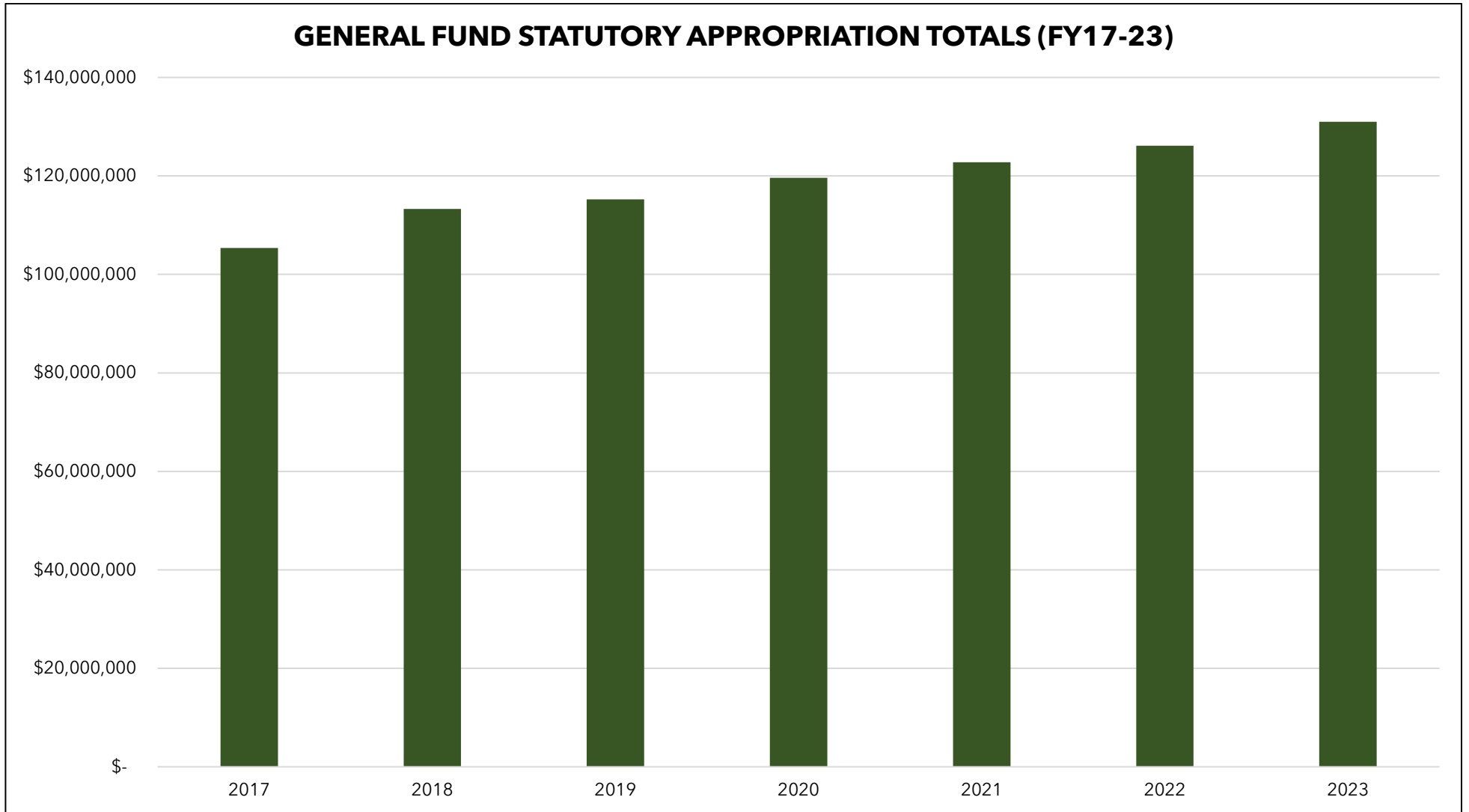
**TABLE 14: GENERAL FUND STATUTORY APPROPRIATIONS (FY17-23)**

SYSTEM	FY 2017	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023
<b>GENERAL FUND STATUTORY APPROPRIATIONS</b>							
TRS	\$44,414,109	\$45,005,672	\$45,495,334	\$45,948,388	\$47,020,467	\$47,999,500	\$48,437,855
PERS-DB	\$28,807,314	\$32,354,637	\$33,073,273	\$35,102,627	\$35,494,697	\$35,873,500	\$36,298,004
SRS	--	--	--	--	--	--	--
MPORS	\$13,960,572	\$15,857,660	\$15,981,505	\$16,636,173	\$17,387,351	\$18,122,207	\$19,621,586
GWPORS	--	--	--	--	--	--	--
FURS	\$14,438,412	\$16,156,512	\$16,605,850	\$17,721,053	\$18,437,718	\$19,436,204	\$21,567,679
HPORS	\$1,686,173	\$1,709,764	\$1,694,015	\$1,709,685	\$1,836,687	\$1,864,976	\$1,906,039
JRS	--	--	--	--	--	--	--
VFCA	\$2,064,561	\$2,212,113	\$2,370,449	\$2,486,769	\$2,591,791	\$2,851,974	\$3,156,488
<b>TOTAL BY FY</b>	<b>\$105,371,140</b>	<b>\$113,296,357</b>	<b>\$115,220,425</b>	<b>\$119,604,695</b>	<b>\$122,768,711</b>	<b>\$126,148,361</b>	<b>\$130,987,651</b>

**NOTES:**

- Table 14 and Graph 4 only include general fund statutory contributions.
- Some of the systems receive multiple appropriations; the numbers listed are the sum totals of all contributions to the system. The specific statutes can be found in Part 9 of this document, beginning on page 42.

**GRAPH 4: GENERAL FUND STATUTORY APPROPRIATIONS (FY17-23)**



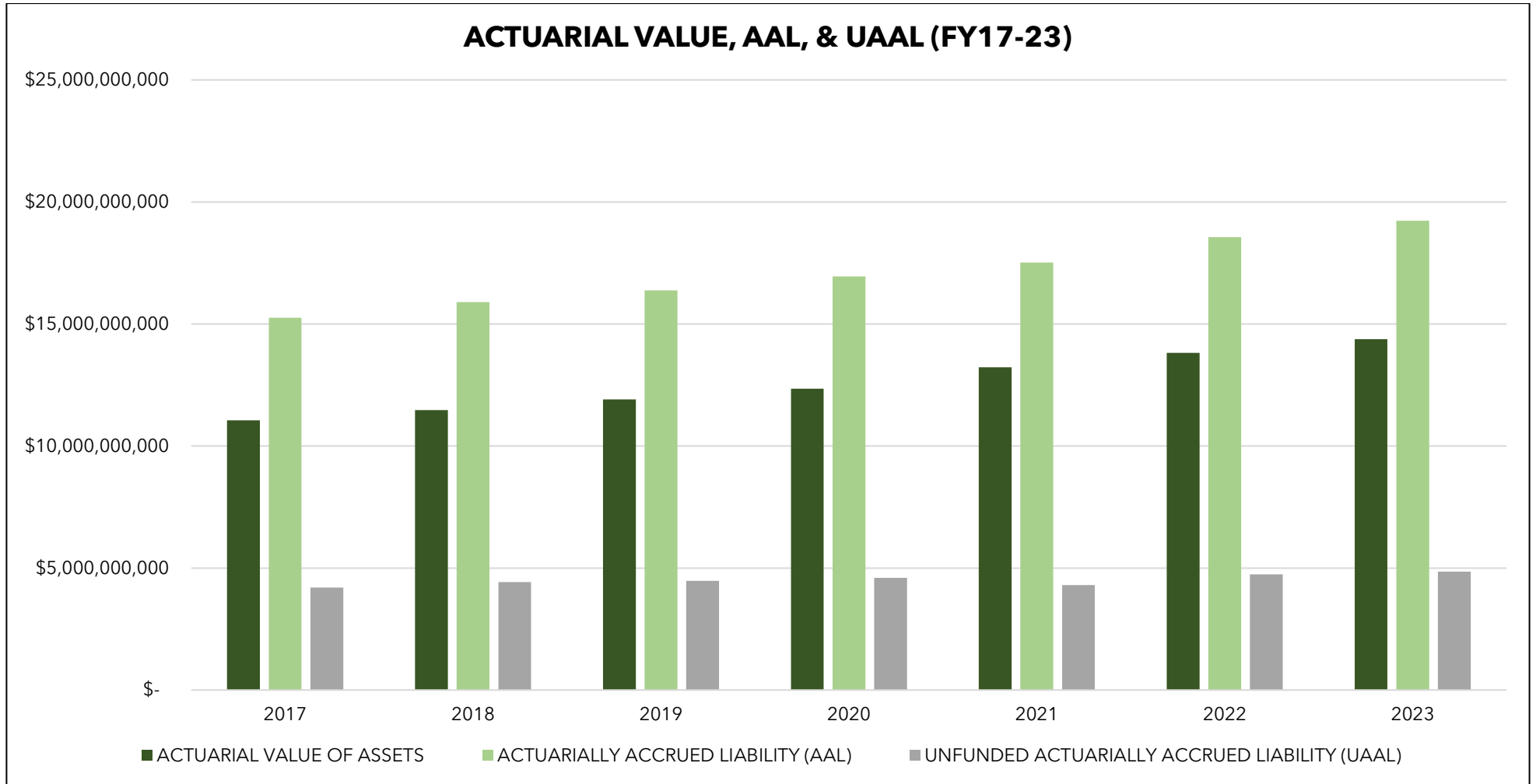
**TABLE 15: ACTUARIAL VALUE OF ASSETS (FY17-23)**

SYSTEM	FY 2017	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023
<b>ACTUARIAL VALUE OF ASSETS</b>							
TRS	\$3,973,519,000	\$4,094,393,000	\$4,219,515,000	\$4,344,045,000	\$4,616,374,000	\$4,799,597,000	\$4,971,905,000
PERS-DB	\$5,514,026,586	\$5,705,235,727	\$5,903,190,959	\$6,099,398,162	\$6,514,976,330	\$6,770,813,514	\$6,999,338,415
SRS	\$332,169,329	\$353,904,349	\$377,386,901	\$400,719,971	\$438,035,779	\$469,548,805	\$499,906,211
MPORS	\$386,259,339	\$413,608,005	\$441,565,469	\$471,328,235	\$516,143,647	\$555,005,479	\$594,019,190
GWORS	\$176,310,592	\$190,849,036	\$206,503,838	\$221,948,510	\$247,392,056	\$266,067,351	\$284,542,535
FURS	\$397,632,831	\$429,094,690	\$463,085,081	\$499,180,209	\$555,517,311	\$603,173,541	\$652,590,498
HPORS	\$141,235,730	\$147,143,742	\$152,850,886	\$158,658,054	\$168,056,413	\$179,360,586	\$188,715,871
JRS	\$97,065,992	\$101,192,093	\$104,918,001	\$110,638,941	\$120,864,685	\$126,814,789	\$132,393,655
VFCA	\$36,954,642	\$38,321,273	\$40,008,887	\$41,716,780	\$45,130,521	\$48,077,791	\$51,535,670
<b>TOTAL BY FY</b>	<b>\$11,055,174,041</b>	<b>\$11,473,741,915</b>	<b>\$11,909,025,022</b>	<b>\$12,347,633,862</b>	<b>\$13,222,490,742</b>	<b>\$13,818,458,856</b>	<b>\$14,374,947,045</b>

**TABLE 16: ACTUARIALLY ACCRUED LIABILITY & UNFUNDED ACTUARIALLY ACCRUED LIABILITY (FY17-23)**

SYSTEM	FY 2017	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023
<b>ACTUARIALLY ACCRUED LIABILITY (AAL)</b>							
TRS	\$5,636,842,000	\$6,004,434,000	\$6,148,556,000	\$6,310,005,000	\$6,463,247,000	\$6,691,275,000	\$6,858,306,000
PERS-DB	\$7,578,384,779	\$7,730,084,077	\$7,957,037,808	\$8,234,002,983	\$8,534,628,711	\$9,026,784,090	\$9,361,215,642
SRS	\$411,386,604	\$436,715,156	\$462,697,753	\$493,241,768	\$525,238,823	\$597,118,496	\$641,662,416
MPORS	\$562,570,270	\$611,055,584	\$637,865,852	\$666,098,580	\$694,610,661	\$778,865,103	\$817,699,290
GWPORS	\$217,642,368	\$230,077,307	\$245,129,744	\$264,744,609	\$290,855,880	\$320,475,204	\$348,304,075
FURS	\$522,287,639	\$548,240,945	\$579,103,280	\$612,294,224	\$646,173,296	\$748,060,423	\$794,682,254
HPORS	\$219,469,619	\$229,821,775	\$236,805,027	\$245,915,150	\$252,081,574	\$273,240,808	\$283,434,819
JRS	\$58,103,656	\$62,740,689	\$65,075,477	\$67,934,098	\$68,460,454	\$72,922,865	\$73,135,389
VFCA	\$45,871,379	\$46,305,640	\$47,200,070	\$47,868,436	\$45,137,677	\$52,604,373	\$52,490,470
<b>TOTAL BY FY</b>	<b>\$15,252,558,314</b>	<b>\$15,899,475,173</b>	<b>\$16,379,471,011</b>	<b>\$16,942,104,848</b>	<b>\$17,520,434,076</b>	<b>\$18,561,346,362</b>	<b>\$19,230,930,355</b>
<b>UNFUNDED ACTUARIALLY ACCRUED LIABILITY (UAAL)</b>							
TRS	\$1,663,323,000	\$1,910,042,000	\$1,929,041,000	\$1,965,960,000	\$1,846,873,000	\$1,891,678,000	\$1,886,401,000
PERS-DB	\$2,064,358,193	\$2,024,848,350	\$2,053,846,849	\$2,134,604,821	\$2,019,652,381	\$2,255,970,576	\$2,361,877,227
SRS	\$79,217,275	\$82,810,807	\$85,310,852	\$92,521,797	\$87,203,044	\$127,569,691	\$141,756,205
MPORS	\$176,310,931	\$197,447,579	\$196,300,383	\$194,770,345	\$178,467,014	\$223,859,624	\$223,680,100
GWPORS	\$41,331,776	\$39,228,271	\$38,625,906	\$42,796,099	\$43,463,824	\$54,407,853	\$63,761,540
FURS	\$124,654,808	\$119,146,255	\$116,018,199	\$113,114,015	\$90,655,985	\$144,886,882	\$142,091,756
HPORS	\$78,233,889	\$82,678,033	\$83,954,141	\$87,257,096	\$84,025,161	\$93,880,222	\$94,718,948
JRS	(\$38,962,336)	(\$38,451,404)	(\$39,842,524)	(\$42,704,098)	(\$52,404,231)	(\$53,891,924)	(\$59,258,266)
VFCA	\$8,916,737	\$7,984,367	\$7,191,183	\$6,151,656	\$7,156	\$4,526,582	\$954,800
<b>TOTAL BY FY</b>	<b>\$4,197,384,273</b>	<b>\$4,425,734,258</b>	<b>\$4,470,445,989</b>	<b>\$4,594,471,731</b>	<b>\$4,297,943,334</b>	<b>\$4,742,887,506</b>	<b>\$4,855,983,310</b>

**GRAPH 5: ACTUARIAL VALUE OF ASSETS, ACTUARIALY ACCRUED LIABILITY, AND UNFUNDED ACTUARIALY ACCRUED LIABILITY (FY17-23)**



# PART SEVEN

## OTHER STATEWIDE RETIREMENT SYSTEMS

### **PART SEVEN - OTHER STATEWIDE RETIREMENT SYSTEMS**

Table 17: PERS Defined Contribution (DC) Plan	Page 32
Table 17A: PERS-DC Average Account Balance by Age	Page 33
Table 18: Deferred Compensation (457) Plan	Page 34
Table 19: Montana University System Retirement Plan	Page 35

## **TABLE 17: PERS DEFINED CONTRIBUTION (DC) PLAN**

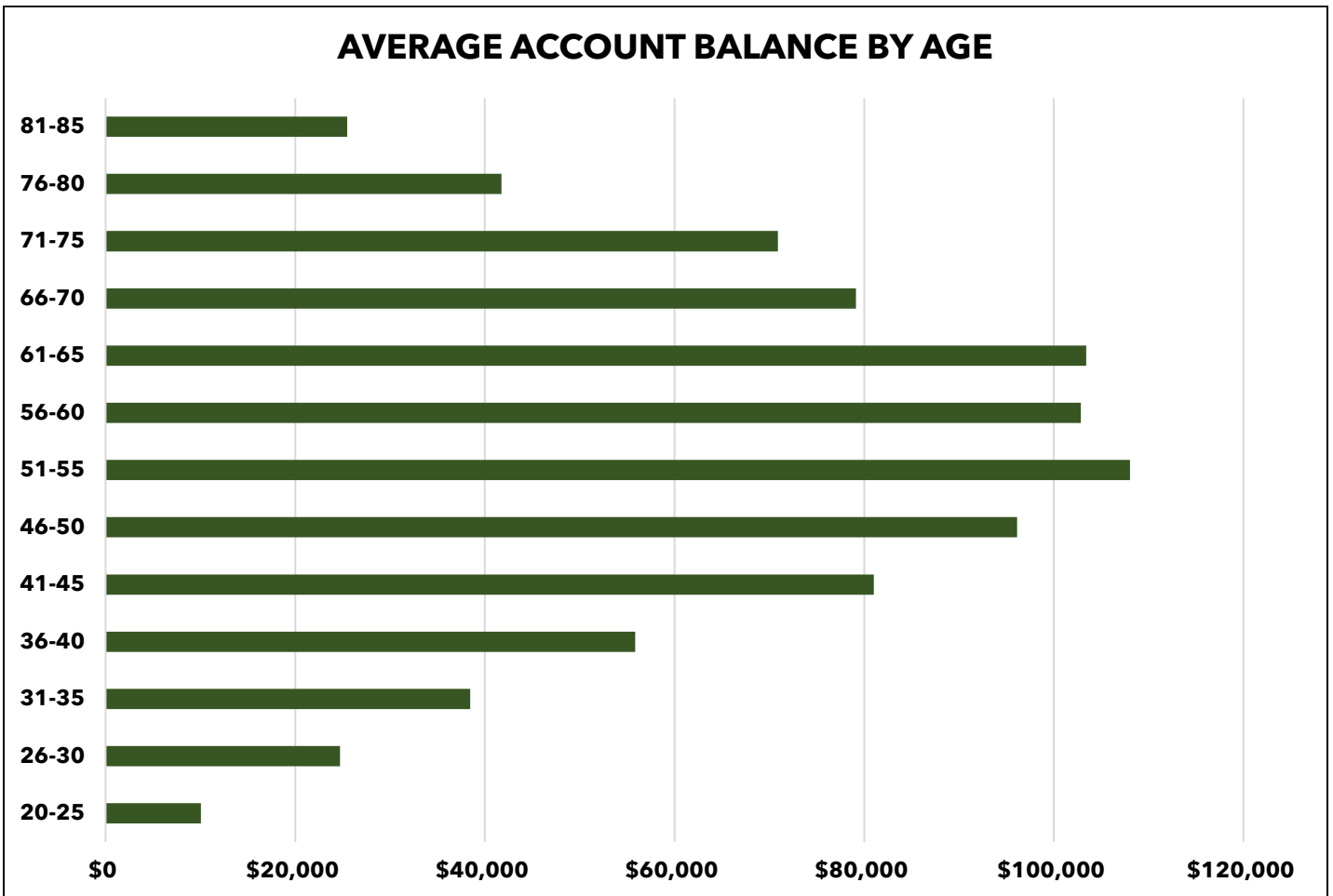
<b>MEMBERSHIP</b>	New hires have 12 months to make a one-time, irrevocable election between DB and DC plans – default plan is DB plan.
<b>CONTRIBUTING MEMBERS</b>	5,335
<b>EMPLOYEE/MEMBER CONTRIBUTIONS FY22</b>	7.9% of salary – all allocated to individual member accounts (reduced to 6.9% when PERS-DB plan amortization period is less than 25 years without supplemental employee and employer contributions)
<b>EMPLOYER AND STATE GENERAL FUND CONTRIBUTIONS FY22</b>	8.97% of salary (reduced to 6.9% when PERS-DB amortization period is less than 25 years)  Contributions allocated as follows: <ul style="list-style-type: none"> <li>• 8.63% to member accounts</li> <li>• 0.04% to educational fund</li> <li>• 0.30% to disability trust fund</li> </ul>
<b>TOTAL MEMBER CONTRIBUTIONS</b>	16.63%
<b>TOTAL AMOUNT INVESTED</b>	\$407 Million
<b>AVERAGE ACCOUNT BALANCE BY AGE</b>	See table and graph on next page
<b>INVESTMENT CHOICES</b>	20 funds (3 main categories) evaluated quarterly. Options range from aggressive to conservative and include mutual funds, bond funds, and target date funds.  Allocations: <ul style="list-style-type: none"> <li>• 31.11% Target Date Funds</li> <li>• 36.61% Passive</li> <li>• 32.22% Active</li> </ul>
<b>VESTING</b>	5 years for employer contributions and investment earnings
<b>BENEFITS</b>	Contributions plus investment earnings, minus administrative expenses; payable at any time after termination, with a possible federal tax penalty for withdrawal before age 59.5.
<b>DISABILITY BENEFIT</b>	A defined disability benefit based on a $1/56 \times \text{HAC} \times \text{years of service}$ formula, same as provided in the PERS-DB plan.
<b>DEATH/SURVIVORSHIP BENEFIT</b>	Member's account balance
<b>PLAN ADMINISTRATION</b>	<ul style="list-style-type: none"> <li>• Public Employees' Retirement Board – Plan's Board of Trustees</li> <li>• Empower Retirement Services – Plan's Record Keeper</li> </ul>



**TABLE 17A: PERS-DC AVERAGE ACCOUNT BALANCE BY AGE**

AGE RANGE	AVERAGE ACCOUNT BALANCE
20-25	\$10,059
26-30	\$24,732
31-35	\$38,437
36-40	\$55,841
41-45	\$81,020
46-50	\$96,137
51-55	\$108,021
56-60	\$102,847
61-65	\$103,422
66-70	\$79,141
71-75	\$70,892
76-80	\$41,738
81-85	\$25,479

**GRAPH 6: PERS-DC AVERAGE ACCOUNT BALANCE BY AGE**



## **TABLE 18: DEFERRED COMPENSATION (457) PLAN**

<b>MEMBERSHIP</b>	Voluntary supplemental retirement savings plan available to all employees of the State, Montana University System, and contracting political subdivisions.
<b>CONTRIBUTING MEMBERS</b>	9,879
<b>EMPLOYEE/MEMBER CONTRIBUTIONS</b>	Voluntary, pre-tax deferral or designated ROTH deferral
<b>EMPLOYER CONTRIBUTIONS</b>	None, unless specified in an employer contract.
<b>TOTAL AMOUNT INVESTED</b>	\$592 Million
<b>NUMBER OF INVESTMENT CHOICES</b>	21 (3 main categories) evaluated quarterly. Options range from aggressive to conservative.
<b>VESTING</b>	Participants are fully vested in their accounts immediately.
<b>BENEFIT ELIGIBILITY</b>	Not available to distribute until separation from service, retirement, death, or upon an unforeseeable emergency while still employed, provided IRS-specified criteria are met.
<b>BENEFIT AMOUNT</b>	Lump sum or periodic benefit payment, at the option of the participant. Based on individual account balance and plan provisions. IRS permitted rollovers are also possible.
<b>DEATH/SURVIVORSHIP BENEFIT</b>	Member's account balance
<b>PLAN ADMINISTRATION</b>	<ul style="list-style-type: none"> <li>• Public Employees' Retirement Board – Plan's Board of Trustees</li> <li>• Empower Retirement Services – Plan's Record Keeper</li> </ul>

# TABLE 19: MONTANA UNIVERSITY SYSTEM RETIREMENT PLAN

<b>MEMBERSHIP</b>	<p>All administrative, scientific, and instructional staff of the University System and classified staff that elected MUS-RP rather than a PERS plan.</p> <ul style="list-style-type: none"> <li>Contributing (Active): 4,100</li> <li>Non-Contributing (Inactive, Retired, etc.): 11,184</li> <li>Avg. Age: 60 yrs.</li> <li>Avg. Yrs. of Membership: 13.0 yrs.</li> </ul>												
<b>RETIREMENT ELIGIBILITY</b>	A plan member may “retire” (i.e., access the MUS-RP account) once the member has terminated from service and completed the break-in-service requirement. There may be federal tax penalties for withdrawal prior to age 59½.												
<b>BENEFIT</b>	<p>A MUS-RP member’s benefit depends on total contributions to the member’s individual account, plus investment earnings, minus administrative expenses. The MUS-RP is administered by TIAA (Teachers’ Insurance and Annuity Association).</p> <ul style="list-style-type: none"> <li>Avg. account balance: \$87,704.47</li> </ul>												
<b>DEATH AND SURVIVOR BENEFITS</b>	The full account value in the member’s account is payable to the beneficiary. If the member has annuity investments, the benefit can be paid in a single sum, as an annuity to the beneficiary for life, or as an annuity for a fixed period of years. The annuity may also be deferred as federal law permits.												
<b>TOTAL AMOUNT INVESTED</b>	\$964,763,369.45												
<b>INVESTMENT CHOICES</b>	34 choices (12 target date bands) – 6 asset classes												
<b>NUMBER OF INVESTMENT CHOICES</b>	<p>34 funds (6 categories) evaluated quarterly. Options range from aggressive to conservative and include mutual funds, bond funds, annuity investments, and target date funds.</p> <p style="text-align: center;"><u>Allocations (Totals)</u></p> <table style="margin-left: auto; margin-right: auto;"> <tr> <td>36.90%</td> <td>Equities</td> </tr> <tr> <td>6.26%</td> <td>Fixed Income</td> </tr> <tr> <td>15.97%</td> <td>Guaranteed</td> </tr> <tr> <td>1.83%</td> <td>Money Market</td> </tr> <tr> <td>36.47%</td> <td>Multi-Asset</td> </tr> <tr> <td>2.56%</td> <td>Other (Real Estate)</td> </tr> </table>	36.90%	Equities	6.26%	Fixed Income	15.97%	Guaranteed	1.83%	Money Market	36.47%	Multi-Asset	2.56%	Other (Real Estate)
36.90%	Equities												
6.26%	Fixed Income												
15.97%	Guaranteed												
1.83%	Money Market												
36.47%	Multi-Asset												
2.56%	Other (Real Estate)												
<b>TOTAL MUS-RP PAYROLL COVERED</b>	<i>Amount not available as of 10/25/23</i>												
<b>CONTRIBUTIONS TO MEMBER ACCOUNTS AS A PERCENTAGE OF PAYROLL</b>	<table style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 50%;"><b>Contract and Professional Staff:</b></td> <td style="width: 50%;"><b>Classified Staff:</b></td> </tr> <tr> <td>Employer: 5.956%</td> <td>Employer: 9.13%</td> </tr> <tr> <td>Employee: 7.044%</td> <td>Employee: 7.90%</td> </tr> <tr> <td><b>TOTAL: 13.000%</b></td> <td><b>TOTAL: 17.03%</b></td> </tr> </table>	<b>Contract and Professional Staff:</b>	<b>Classified Staff:</b>	Employer: 5.956%	Employer: 9.13%	Employee: 7.044%	Employee: 7.90%	<b>TOTAL: 13.000%</b>	<b>TOTAL: 17.03%</b>				
<b>Contract and Professional Staff:</b>	<b>Classified Staff:</b>												
Employer: 5.956%	Employer: 9.13%												
Employee: 7.044%	Employee: 7.90%												
<b>TOTAL: 13.000%</b>	<b>TOTAL: 17.03%</b>												
<b>STATE GENERAL FUND CONTRIBUTION FY23</b>	\$1.89 Million												
<b>SUPPLEMENTAL EMPLOYER CONTRIBUTIONS TO TRS FOR UNFUNDED LIABILITY</b>	<table style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 50%;"><b>Contract and Professional Staff:</b></td> <td style="width: 50%;"><b>Classified Staff:</b></td> </tr> <tr> <td>to TRS for unfunded liability: 4.72%</td> <td>to PERS for education: 0.04%</td> </tr> </table>	<b>Contract and Professional Staff:</b>	<b>Classified Staff:</b>	to TRS for unfunded liability: 4.72%	to PERS for education: 0.04%								
<b>Contract and Professional Staff:</b>	<b>Classified Staff:</b>												
to TRS for unfunded liability: 4.72%	to PERS for education: 0.04%												
<b>INCREASE REQUIRED IN SUPPLEMENTAL CONTRIBUTION RATE TO AMORTIZE UNFUNDED LIABILITY BY 2033 AS REQUIRED UNDER 19-20-621, MCA</b>	<p>8.81% increase needed to the current 4.72% to reach a total supplemental of 13.53%</p> <p><u>Note:</u> As of June 30, 2022, valuation. This increase is needed if the legislature wishes to continue to have the unfunded liability created in TRS when the MUS-RP was established paid by the MUS and not subsidized by the TRS pension fund. This would not cover GABA.</p>												
<b>PLAN ADMINISTRATION</b>	Board of Regents & Office of the Commissioner of Higher Education												

# PART EIGHT

## ADDITIONAL RESOURCES

### **PART EIGHT - ADDITIONAL RESOURCES**

Pension Acronyms	Page 37
Pension Terms	Page 38
FY23 Pension System Actuarial Valuation Reports ( <i>links</i> )	Page 42
Individual Plan Handbooks ( <i>links</i> )	Page 42
MCA Chapters - Title 19 ( <i>links</i> )	Page 42

## **PENSION ACRONYMS**

- **457**: Deferred Compensation (457) Plan
- **AAL**: Actuarially Accrued Liability
- **ADEC**: Actuarially Determined Employer Contribution
- **ARC**: Annual Required Contribution
- **ASOP**: Actuarial Standard of Practice
- **COLA**: Cost of Living Adjustment
- **ERISA**: Employee Retirement Income Security Act of 1974
- **FAC**: Final Average Compensation
- **FURS**: Firefighters' Unified Retirement System
- **GABA**: Guaranteed Annual Benefit Adjustment
- **GASB**: Governmental Accounting Standards Board
- **GWORS**: Game Wardens' and Peace Officers' Retirement System
- **HAC**: Highest Average Compensation
- **HPORS**: Highway Patrol Officers' Retirement System
- **IRA**: Individual Retirement Account
- **IRC**: Internal Revenue Code
- **JRS**: Judges' Retirement System
- **MBOI/BOI**: Montana Board of Investments or Board of Investments
- **MPERA**: Montana Public Employee Retirement Administration
- **MPORS**: Municipal Police Officers' Retirement System
- **MUS-RP**: Montana University System Retirement Program
- **PERS**: Public Employees' Retirement System
- **PERS-DB**: PERS Defined Benefit Retirement Plan
- **PERS-DC**: PERS Defined Contribution Retirement Plan
- **PER Board/PERB**: Public Employees' Retirement Board
- **SAVA**: State Administration and Veterans' Affairs Interim Committee
- **SRS**: Sheriffs' Retirement System
- **TRS**: Teachers' Retirement System
- **UAAL**: Unfunded Actuarially Accrued Liability
- **VFCA**: Volunteer Firefighters' Compensation Act

## **PENSION TERMS**

- **401(k) Plan:** A defined contribution plan governed by section 401(k) of the Internal Revenue Code (IRC) that is offered to employees in the private sector. Employees voluntarily participate on an individual basis. A 401(k) allows an employee to set aside tax-deferred income for retirement purposes. In some 401(k) plans, the employer will match an employee's contributions dollar-for-dollar.
- **403(b) Plan:** A retirement plan governed by section 403(b) of the IRC that is similar but not identical to a 401(k) plan and is offered by nonprofit organizations, such as schools, universities, and some charitable organizations.
- **457 Plan:** A tax-exempt deferred compensation program governed by section 457 of the IRC that is made available to employees of state and federal governments and agencies. A 457 plan is similar to a 401(k) plan, except there are never employer matching contributions and the IRS does not consider it a qualified retirement plan.
- **Accrued Benefit:** A retirement, pension, or disability benefit that an employee has earned based on years of service. Accrued benefits are often calculated in relation to the employee's salary and years of service.
- **Accumulated Contributions:** The sum of all the regular and any additional contributions made by a member in a defined benefit plan, together with the regular interest on the contributions.
- **Active Member:** A member who is a paid employee making the required contributions and is properly reported for the most current reporting period.
- **Actuarial Assumption:** An assumption applied by an actuary for the purposes of estimating benefit costs. Assumptions are demographic and economic and include variables such as life expectancy, return on investments, interest rates, and compensation.
- **Actuarial Cost:** The cost determined by an actuarial analysis to represent the present value of benefits.
- **Actuarially Accrued Liabilities (AAL):** The portion of liabilities that exceed of the present value of all benefits payable under a defined benefit retirement plan compared to the present value of future normal costs.
- **Actuarially Determined Employer Contribution (ADEC):** The amount actuarially calculated each year that is required to be contributed by an employer to a pension plan's pool of assets to ensure there will be enough funds to pay promised pension benefits. The contribution rate can be reported either in dollars or a percent of salary. Actuaries annually determine how much should be paid by employers in a given year in order to properly fund a pension plan. This amount is a combination of the employer's share of normal cost plus the unfunded liability amortization payment.
- **Actuarial Valuation:** An analysis conducted by an actuary that helps estimate future costs or liabilities using economic and demographic assumptions. The assumptions are based on professional actuarial standards and involve a mix of statistical studies and experienced judgment.
- **Actuary:** An accredited professional with expertise in applying statistics, mathematics, and financial theory to quantify risk and uncertainty to determine liabilities and costs.
- **Additional Contributions:** A member's payments to purchase various types of optional service credit.

- **Annual Required Contribution (ARC):** Annual Required Contribution rate necessary to amortize unfunded liabilities in a DB plan over the number of years set by the retirement board's amortization policy (e.g., 30 years) as determined by the system's actuary.
- **Annuity:** In the case of a defined benefit plan, equal and fixed payments for life that are the actuarial equivalent of a lump-sum payment under a retirement plan and as such are not benefits paid by a retirement plan and are not subject to periodic or one-time increases. In the case of the defined contribution plan, an annuity is a payment of a fixed sum of money at regular intervals, which may or may not be for life.
- **Amortization Period:** The amount of time required to pay off a retirement system's unfunded actuarial accrued liabilities, or UAAL, calculated by the retirement system's actuary based on projected contributions and investment earnings.
- **Benefit Recipient:** A retired member, a joint annuitant, or a beneficiary who is receiving a retirement allowance.
- **Closed Amortization:** Under this approach, the unfunded liability is amortized over a set number of years (ex: 30 years). Each year the unfunded liability is re-determined, reflecting any gains and losses that have occurred, and amortized in 1 fewer year (ex: 29 years, 28 years, etc.). Every year the amortization period gets shorter, until it reaches one year, at which point the unfunded liability has been paid off and the plan is fully funded.
- **Cost of Living Adjustment (COLA):** Increases in a retirement benefit amount, usually a percentage and based on national economic data, e.g., consumer price index.
- **Deferred Compensation:** An arrangement, subject to IRC conditions and requirements, in which a portion of an employee's income is paid out at a date after which that income is actually earned. The primary benefit of most deferred compensation is that any taxes due on the income are deferred until funds are withdrawn under the arrangement. A 457 plan is a deferred compensation plan.
- **Defined Benefit Plan (DB):** A pension plan in which a retired employee is entitled to receive upon retirement a regular, periodic, specific amount based on the retiree's salary history and years of service.
- **Defined Contribution Plan (DC):** A retirement plan in which the employee is required to or elects to contribute some amount of salary into an individual account over which the employee has some control for investing the assets and options when making withdrawals at retirement.
- **Designated Beneficiary:** the person a member names to receive any survivorship benefits or lump-sum payments upon the member's death. Designated beneficiaries are either primary or contingent.
- **Direct Rollover:** A distribution from a qualified pension plan, 401(k) plan, 403(b) plan, and so forth, that is remitted directly to the trustee, custodian, or issuer of the receiving retirement plan or IRA and is reported to the IRS as a rollover.
- **Disability:** Total physical or mental incapacity of a member to do the essential functions of the member's job even with reasonable accommodations required by the ADA, for a permanent or extended and uncertain duration.
- **Early Retirement:** A retirement plan provision that allows an employee to retire before the normal retirement age or required years of service for a full retirement.
- **Employee:** A person employed in any capacity by a PERS employer who pays the person's salary.

- **Employee Retirement Income Security Act (ERISA):** The federal law enacted in 1974 that established legal guidelines for private pension plan administration and investment practices. Public retirement plans generally are not subject to ERISA.
- **Employer:** The state, its university system, or political subdivisions that contract with the Board to cover their employees under PERS.
- **Experience Study:** A regular study of the economic and demographic experience of a retirement system, typically administered every five years. The purpose is to assess the reasonability of the actuarial assumptions of a retirement system in order to make judgments about future experience and assumptions.
- **Fiduciary:** A person or institution legally responsible for the management, investment and distribution of a fund. The trustees and administrators who are responsible for the oversight of employee benefit trust funds are considered fiduciaries. Fiduciaries are any person who (1) exercises any discretionary authority or control over the management of a plan or the management or disposition of its assets; (2) renders investment advice for a fee or other compensation with respect to the funds or property of a plan or has the authority to do so; or (3) has any discretionary authority or responsibility in the administration of a plan.
- **Funded Ratio:** The value of a pension plan's assets in proportion to the pension liability. When a plan is 100% funded, it means current assets are sufficient to pay 100% of benefits due now, as well as the benefits that active and inactive members have accrued to date.
- **Government Accounting Standards Board (GASB):** An independent, private-sector organization based in Norwalk, Connecticut, that establishes accounting and financial reporting standards for U.S. state and local governments that follow generally accepted accounting principles.
- **Guaranteed Annual Benefit Adjustment (GABA):** An annual increase in the prior year's benefit amount, usually as a percentage of the benefit, similar to a cost-of-living adjustment.
- **Highest Average Compensation (HAC):** A member's highest average monthly compensation during a set period of consecutive months of membership service.
- **Inactive Member:** A member who terminates service and does not retire or take a refund of the member's accumulated contributions.
- **Individual Retirement Account (IRA):** A tax-deferred retirement account for an individual that permits the individual to set aside money each year, with earnings tax-deferred until withdrawals begin.
- **Internal Revenue Code (IRC):** Title 26 of the United States Code. It is also known as the federal tax code.
- **Layered Amortization:** This approach is considered a hybrid of open and closed amortization approaches. Similar to closed amortization, the initial unfunded liability is amortized over a set amount of time (ex: 30 years). Any gains or losses that arise in future years will be amortized over new amortization periods, which is similar to the open amortization approach. With each valuation, a new closed layer gets added to the amortization schedule. The amortization of the original unfunded liability and gains and losses from prior years remain unchanged, providing the expectation that the plan will become fully funded over the original amortization period if there are no significant gains or losses.
- **Member:** Any person with contributions and service on account with the PERS. Persons receiving retirement benefits based on previous service credit are also members.



- **Money Purchase Plan:** A type of defined contribution retirement plan in which the annual contribution amount is in proportion to the employee's wages and is mandatory every year.
- **Normal Cost:** An amount calculated under an actuarial cost method that is the estimated cost of the accruing benefits for members of a defined benefit retirement plan. It is determined for each valuation period. Normal cost does not include any portion of the supplemental costs of a retirement plan. The normal cost rate is the contribution amount necessary, when added to investment income, to pay for benefits earned each year.
- **Normal Retirement Age:** The age at which a member is eligible to immediately receive a retirement benefit based on the member's age, length of service, or both, as specified under the member's retirement system, without disability and without an actuarial or similar reduction in the benefit.
- **Open Amortization:** Under this approach, the unfunded liability is amortized over a set amount of years (ex: 30 years). Each year the unfunded liability is re-calculated and amortized over a new set amount of years (ex: 30 years). This is the approach used in Montana with a 30-year amortization period.
- **Pension:** Steady income given to a person as the result of service (e.g., employee, military) that begins when a specific event (e.g., disability, retirement) occurs. Pensions are typically paid monthly and based on factors such as years of service and prior compensation. The payment may be made by a government, employer, pension fund, or life insurance company.
- **Portability:** The ability of an employee to retain benefits, such as in a pension plan or insurance coverage, when switching employers.
- **Qualified Plan:** A plan that meets the applicable requirements of the Internal Revenue Code and, if applicable, the Employee Retirement Income Security Act. A qualified plan is eligible for favorable tax treatment.
- **Roth IRA:** A type of IRA established under the Taxpayer Relief Act of 1997 that allows taxpayers, subject to certain income limits, to save for retirement while allowing the savings to grow tax-free. Taxes are paid on contributions, but withdrawals, subject to certain rules, are not taxed.
- **Smoothing:** The process of amortizing investment gains and losses over a period of time to help reduce volatility in contribution rates.
- **Stress Testing:** The process of evaluating how pension systems would respond to a variety of potential scenarios, allowing states to gauge the effects of hypothetical adverse market conditions on their retirement systems.
- **Tax Deferred:** The payment of taxes in the future on income earned in the current period.
- **Termination or Termination of Service:** Means the member has left the employment relationship for at least 30 days, has no written or verbal agreement to return, and has been paid all compensation due, including but not limited to payment of accrued annual and sick leave. Upon termination, the member will cease to accrue benefits attributable to that employment.
- **Unfunded Actuarial Accrued Liabilities (UAAL):** The excess of a defined benefit retirement plan's actuarial liabilities at any given point in time over the value of its cash and investments on that same date.
- **Vested:** The status of a plan member who meets the minimum membership service requirement of the system or plan to which the member belongs and who is thus eligible to receive a benefit.

## **FY 2023 PENSION SYSTEM ACTUARIAL VALUATION REPORTS**

- **TRS:** [https://trs.mt.gov/miscellaneous/PdfFiles/Information/ActuarialValuations/2023\\_TRSvaluation.pdf](https://trs.mt.gov/miscellaneous/PdfFiles/Information/ActuarialValuations/2023_TRSvaluation.pdf)
- **PERS-DB:** [https://mpera.mt.gov/docs/actuarial\\_info/2023/Valuations/FYE2023-MTPERSFINAL.pdf](https://mpera.mt.gov/docs/actuarial_info/2023/Valuations/FYE2023-MTPERSFINAL.pdf)
- **SRS:** [https://mpera.mt.gov/docs/actuarial\\_info/2023/Valuations/FYE2023-MTSRSFINAL.pdf](https://mpera.mt.gov/docs/actuarial_info/2023/Valuations/FYE2023-MTSRSFINAL.pdf)
- **MPORS:** [https://mpera.mt.gov/docs/actuarial\\_info/2023/Valuations/2023-MTMPORSFINAL.pdf](https://mpera.mt.gov/docs/actuarial_info/2023/Valuations/2023-MTMPORSFINAL.pdf)
- **GWPORS:** [https://mpera.mt.gov/docs/actuarial\\_info/2023/Valuations/FYE2023-MTGWPORSFINAL.pdf](https://mpera.mt.gov/docs/actuarial_info/2023/Valuations/FYE2023-MTGWPORSFINAL.pdf)
- **FURS:** [https://mpera.mt.gov/docs/actuarial\\_info/2023/Valuations/FYE2023-MTFURSFINAL.pdf](https://mpera.mt.gov/docs/actuarial_info/2023/Valuations/FYE2023-MTFURSFINAL.pdf)
- **HPORS:** [https://mpera.mt.gov/docs/actuarial\\_info/2023/Valuations/2023-MTHPORSFINAL.pdf](https://mpera.mt.gov/docs/actuarial_info/2023/Valuations/2023-MTHPORSFINAL.pdf)
- **JRS:** [https://mpera.mt.gov/docs/actuarial\\_info/2023/Valuations/FYE2023-MTJRFINAL.pdf](https://mpera.mt.gov/docs/actuarial_info/2023/Valuations/FYE2023-MTJRFINAL.pdf)
- **VFCA:** [https://mpera.mt.gov/docs/actuarial\\_info/2023/Valuations/2023-MTVFCFINAL.pdf](https://mpera.mt.gov/docs/actuarial_info/2023/Valuations/2023-MTVFCFINAL.pdf)

## **INDIVIDUAL PLAN HANDBOOKS**

- **TRS:** [https://trs.mt.gov/miscellaneous/PdfFiles/Members/2016\\_TRS\\_Active\\_Member\\_Handbook.pdf](https://trs.mt.gov/miscellaneous/PdfFiles/Members/2016_TRS_Active_Member_Handbook.pdf)
- **PERS-DB:** <https://mpera.mt.gov/docs/Handbooks/PERS.pdf>
- **SRS:** <https://mpera.mt.gov/docs/Handbooks/SRS.pdf>
- **MPORS:** <https://mpera.mt.gov/docs/Handbooks/MPORS.pdf>
- **GWPORS:** <https://mpera.mt.gov/docs/Handbooks/GWPORS.pdf>
- **FURS:** <https://mpera.mt.gov/docs/Handbooks/FURS.pdf>
- **HPORS:** <https://mpera.mt.gov/docs/Handbooks/HPORS.pdf>
- **JRS:** <https://mpera.mt.gov/docs/Handbooks/JRS.pdf>
- **VFCA:** <https://mpera.mt.gov/docs/Handbooks/VFCA.pdf>
- **PERS-DC:** <https://mpera.mt.gov/members/PERSdefinedcontribution>
- **Deferred Compensation (457):** <https://mpera.mt.gov/docs/PlanDocuments/457PlanDocument.pdf>
- **MUS-RP:** <https://choices.mus.edu/MUSRPlan.html>

## **MCA CHAPTERS - TITLE 19**

- **TRS - Chapter 20:**
- **PERS-DB - Chapter 3:**
- **SRS - Chapter 7:**
- **MPORS - Chapter 9:**
- **GWPORS - Chapter 8:**
- **FURS - Chapter 13:**
- **HPORS - Chapter 6:**
- **JRS - Chapter 5:**
- **VFCA - Chapter 17:**
- **PERS-DC - Chapter 3, Part 21:**
- **Deferred Compensation - Chapter 50:**
- **MUS-RP - Chapter 21:**

*2023 MCA links not available as of 10/25/23*

# PART NINE

## SOURCES

### PART NINE -SOURCES

Part One - Summary	Page 44
Part Two - FY23 Demographic Data	Page 44
Part Three - Funding & Investment Data	Page 44
Part Four - Contributions	Page 45
Part Five - Plan Details	Page 46
Part Six - Historical Data	Page 47
Part Seven - Other Statewide Systems	Page 47

## **PART ONE - SUMMARY (PG. 3-4)**

### **ASSUMPTIONS**

- TRS - Table A-1 on pg. 41
- PERS - Table B-1 on pg. 37 (*same assumptions are used for all MPERA systems*)

### **SUMMARY OF VALUATION RESULTS AS OF JUNE 30, 2023**

- TRS & MPERA - First summary chart in each actuarial valuation report (pg. 1 in each report)
- SRS, GWPORS, HPORS, JRS - Amortization rate on pg. 3

## **PART TWO - FY23 DEMOGRAPHIC DATA (PG. 5-7)**

### **TABLE 1: ACTIVE MEMBER DATA**

- TRS - Table D-1 (pg. 62) in actuarial valuation report
- MPERA Systems - Table E-1 of each actuarial valuation report:
  - PERS-DB - pg. 61
  - SRS - pg. 60
  - MPORS - pg. 59
  - GWPORS - pg. 57
  - FURS - pg. 56
  - HPORS - pg. 61
  - JRS - pg. 52
  - VFCA - pg. 44
- Ratio of active employees to retirees & beneficiaries calculated by staff

### **TABLE 2: RETIREE AND BENEFIT RECIPIENT DATA**

- TRS -Table 2 (pg. 15) and Table D-2 (pg. 63) in actuarial valuation report
- MPERA Systems -Table 2 and Table E-2 in each actuarial valuation report:
  - PERS-DB - pg. 14 and pg. 62
  - SRS - pg. 12 and pg. 61
  - MPORS - pg. 12 and pg. 60
  - GWPORS - pg. 11 and pg. 58
  - FURS - pg. 12 and pg. 57
  - HPORS - pg. 12 and pg. 62
  - JRS - pg. 11 and pg. 53
  - VFCA - pg. 10 and pg. 45
- "Percent of Income Replacement Provided under the Benefit Formula if Member Attains Full Service Retirement" provided by MPERA & TRS

## **PART THREE - FUNDING & INVESTMENT DATA (PG. 8-13)**

### **TABLE 3: ACTUARIAL FUNDING DATA**

- TRS - Summary table (pg.1) and Table D-3 (pg. 64) in actuarial valuation report
- MPERA Systems - Summary Table (pg. 1) and Table E-3 in each actuarial valuation report
  - PERS-DB -pg. 63
  - SRS -pg. 62
  - MPORS -pg. 61
  - GWPORS -pg. 59
  - FURS -pg. 58
  - HPORS - pg. 63
  - JRS - pg. 53
  - VFCA - pg. 46
- Total contributions provided by the Board of Investments

## **TABLE 4: INVESTMENTS AND RETURNS**

- All information provided by the Board of Investments

## **TABLE 5: CASH FLOW**

- All information provided by the Board of Investments

## **TABLE 6: INVESTMENT EXPENSES**

- All information provided by the Board of Investments

## **TABLE 7: SENSITIVITY TO LOWER INVESTMENT RETURN ASSUMPTIONS**

- All Systems - "Sensitivity to Future Experience" charts in each actuarial valuation report:
  - TRS - pg. 8
  - PERS-DB - pg. 7
  - SRS - pg. 5
  - MPORS - pg. 5
  - GWPORS - pg. 5
  - FURS - pg. 5
  - HPORS - pg. 5
  - JRS - pg. 5
  - VFCA - pg. 5
- "Contribution Increase Needed to Maintain Current Amortization (Percentage)" calculated by actuary

## **PART FOUR - CONTRIBUTIONS (PG. 14-16)**

### **TABLE 8: EMPLOYER, EMPLOYEE, AND STATE CONTRIBUTIONS**

- TRS - Table D-3 (pg. 64) in actuarial valuation report
- MPERA Systems - Summary Table (pg. 1) and Table E-3 in each actuarial valuation report:
  - PERS-DB -pg. 63
  - SRS -pg. 62
  - MPORS -pg. 61
  - GWPORS -pg. 59
  - FURS -pg. 58
  - HPORS - pg. 63
  - JRS - pg. 54
  - VFCA - pg. 46
- SB 175/JRS changes: <https://leg.mt.gov/bills/2021/billpdf/SB0175.pdf>
- State General Fund contribution amounts provided by LFD
- All Systems - MCA references:

<b>SYSTEM</b>	<b>EMPLOYER CONTRIBUTION</b>	<b>MEMBER CONTRIBUTION</b>	<b>GENERAL FUND CONTRIBUTIONS</b>
<b>TRS</b>	19-20-605, MCA 19-20-609, MCA	19-20-602, MCA 19-20-608, MCA	19-20-604, MCA 19-20-607, MCA
<b>PERS-DB</b>	19-3-316, MCA 19-3-319, MCA	19-3-315, MCA	19-3-319, MCA 19-3-320, MCA
<b>SRS</b>	19-7-404, MCA	19-7-403, MCA	N/A
<b>MPORS</b>	19-9-703, MCA	19-9-710, MCA	19-9-702, MCA
<b>GWPORS</b>	19-8-504, MCA	19-8-502, MCA	N/A
<b>FURS</b>	19-13-605, MCA	19-13-601, MCA	19-13-604, MCA
<b>HPORS</b>	19-6-404, MCA	19-6-402, MCA	19-6-404, MCA 19-6-410, MCA
<b>JRS</b>	19-5-404, MCA	19-5-402, MCA	N/A
<b>VFCA</b>	N/A	N/A	19-17-301, MCA

**TABLE 9: EMPLOYER DETAILS AND COVERED PAYROLL**

- All Systems - Summary Table (pg. 1) in each actuarial valuation report & 2020 Green Sheets: Table 6
- Number of participating employers and payroll by type of employer information provided by MPERA & TRS

**PART FIVE - PLAN DETAILS (PG. 17-19)**

**TABLE 10: BENEFIT FORMULA AND ELIGIBILITY**

- All Systems - MCA references and handbook pages:

SYSTEM	SERVICE AND AGE ELIGIBILITY CRITERIA	VESTING	HIGHEST AVERAGE COMPENSATION	SERVICE RETIREMENT MULTIPLIER
TRS	19-20-801, MCA Handbook pg. 34	19-20-101, MCA Handbook pg. 27	19-20-805, MCA Handbook pg. 39	19-20-804, MCA Handbook pg. 34
PERS-DB	19-3-901, MCA Handbook pg. 19	19-3-401, MCA Handbook pg. 13	19-3-108, MCA Handbook pg. 19	19-3-904, MCA Handbook pg. 19
SRS	19-7-501, MCA Handbook pg. 14	19-7-301, MCA Handbook pg. 10	19-7-101, MCA Handbook pg. 15	19-7-503, MCA Handbook pg. 15
MPORS	19-9-801, MCA Handbook pg. 16	19-9-301, MCA Handbook pg. 10	19-9-104, MCA Handbook pg. 16	19-9-804, MCA Handbook pg. 16
GWPORS	19-8-601, MCA Handbook pg. 16	19-8-301, MCA Handbook pg. 10	19-8-101, MCA Handbook pg. 16	19-8-603, MCA Handbook pg. 16
FURS	19-13-701, MCA Handbook pg. 15	19-13-301, MCA Handbook pg. 10	19-13-104, MCA Handbook pg. 15	19-13-704, MCA Handbook pg. 15
HPORS	19-6-501, MCA Handbook pg. 15	19-6-301, MCA Handbook pg. 8	19-6-101, MCA Handbook pg. 15	19-6-502, MCA Handbook pg. 15
JRS	19-5-501, MCA Handbook pg. 15	19-5-301, MCA Handbook pg. 9	19-5-101, MCA Handbook pg. 15	19-5-502, MCA Handbook pg. 15
VFCA	19-17-401 Handbook pg. 9	N/A	N/A	19-17-404 Handbook pg. 11

**TABLE 11: POST-RETIREMENT BENEFIT INCREASES**

- All Systems - MCA references and handbook pages:

SYSTEM	MCA REFERENCE	PLAN HANDBOOK
TRS	19-20-719, MCA	Handbook pg. 41
PERS-DB	19-3-1605, MCA	Handbook pg. 32
SRS	19-7-711, MCA	Handbook pg. 24
MPORS	19-9-1007, MCA 19-9-1009, MCA	Handbook pg. 22
GWPORS	19-8-1105, MCA	Handbook pg. 24
FURS	19-13-1007, MCA 19-13-1010, MCA	Handbook pg. 18
HPORS	19-6-710, MCA 19-6-712, MCA	Handbook pg. 22
JRS	19-5-901, MCA	Handbook pg. 23
VFCA	N/A	N/A

## **PART SIX - HISTORICAL DATA (PG. 20-30)**

### **TABLE 12: FUNDED RATIO AND AMORTIZATION RATE (FY17-23)**

- All Systems - Summary Table in each actuarial valuation
  - TRS: <https://trs.mt.gov/trsinfo/newsannualreports#valuation>
  - MPERA: <https://mpera.mt.gov/about/annualreports1/annualreports>

### **TABLE 13: ACTIVE MEMBERS & RETIREES/BENEFIT RECIPIENTS (FY17-23)**

- All Systems - Summary Table in each actuarial valuation
  - TRS: <https://trs.mt.gov/trsinfo/newsannualreports#valuation>
  - MPERA: <https://mpera.mt.gov/about/annualreports1/annualreports>

### **TABLE 14: GENERAL FUND STATUTORY APPROPRIATIONS (FY17-23)**

- All information provided by the Legislative Fiscal Division
- MCA references for the statutory appropriations:

<b>SYSTEM</b>	<b>MCA REFERENCE(S)</b>
<b>TRS</b>	19-20-604, MCA 19-20-607, MCA
<b>PERS-DB</b>	19-3-319, MCA 19-3-320, MCA 15-35-108(9), MCA
<b>SRS</b>	N/A
<b>MPORS</b>	19-9-702, MCA
<b>GWPORS</b>	N/A
<b>FURS</b>	19-13-604, MCA
<b>HPORS</b>	19-6-404, MCA 19-6-410, MCA
<b>JRS</b>	N/A
<b>VFCA</b>	19-17-301, MCA

### **TABLE 15: ACTUARIAL VALUE OF ASSETS (FY17-23)**

- All Systems - Summary Table in each actuarial valuation
  - TRS: <https://trs.mt.gov/trsinfo/newsannualreports#valuation>
  - MPERA: <https://mpera.mt.gov/about/annualreports1/annualreports>

### **TABLE 16: ACTUARIALLY ACCRUED LIABILITY & UNFUNDED ACTUARIALLY ACCRUED LIABILITY (FY17-23)**

- All Systems - Summary Table in each actuarial valuation
  - TRS: <https://trs.mt.gov/trsinfo/newsannualreports#valuation>
  - MPERA: <https://mpera.mt.gov/about/annualreports1/annualreports>

## **PART SEVEN - OTHER STATEWIDE RETIREMENT SYSTEMS (PG. 31-34)**

### **TABLE 17: PERS DEFINED CONTRIBUTION (DC) PLAN**

- All information provided by MPERA

### **TABLE 18: DEFERRED COMP (457) PLAN**

- All information provided by MPERA

**TABLE 19: MONTANA UNIVERSITY SYSTEM RETIREMENT PLAN (MUS-RP)**

- All information provided by the Office of the Commissioner of Higher Education
- Supplemental contribution increase information provided by TRS
- State general fund contribution amount provided by LFD