

## POPULAR ANNUAL FINANCIAL REPORT

For the Fiscal Year Ending June 30, 2018

## LIVING MISSISSIPPI

Vigilantly and resourcefully serving those who serve others



A Letter from Executive Director H. Ray Higgins, Jr. December 15, 2018

Dear Members and Retirees:

I am pleased to present the 2018 Popular Annual Financial Report (PAFR) of the Public Employees' Retirement System of Mississippi (PERS or the System).

We take our role to heart as a fiduciary

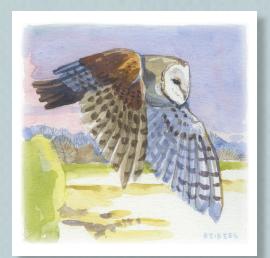
for this System and remain vigilant and resourceful in honoring the commitment to our membership. I join with the PERS team as we dedicate ourselves to serving our teachers, law enforcement officers, healthcare workers, and the many others who make up the membership of our System.

This report is a summary of our services, organization, financial results, and investments, which are reported in detail in the PERS Comprehensive Annual Financial Report (CAFR) for 2018. The CAFR is prepared and presented in conformity with generally accepted accounting principles. The Flexible

Benefit Cafeteria Plan, an agency fund related to the System's employee health benefits, has been omitted from our summary due to its immateriality. The summary report also contains abbreviated note disclosures.

Detailed information about the System can be found in the CAFR located at www.pers.ms.gov. For questions concerning any of the information presented in this report, contact PERS, 429 Mississippi Street, Jackson, Mississippi 39201-1005 or visit us online.

7. Ray Karl



# For all living things, life is more than merely learning to survive. $T_0$ truly live means learning to thrive.

Being our strongest and best leads us to soar higher, run faster, and tread cautiously when needed. Whether human or animal, developing and using our strongest characteristics to their full advantage keeps order and balance across an ecosystem. Like the barn owl, the white-tailed deer, the eastern cottontail rabbit, the diamondback terrapin, and the red fox, the Public Employees' Retirement System of Mississippi has developed its watchfulness, prudence, discernment, endurance, and perseverance. We take to heart our role as fiduciary to this system that provides benefits to our members and pumps income back into the economy. Because of this role, we remain vigilant and resourceful and strive to be both wise and strong. We provide benefits for life. This is our daily challenge and reward as we serve those who give their careers to the service of others.

## **MEMBERSHIP**



Prudence
Odocoileus virginianus (White-tailed Deer)

The System administers four defined benefit retirement plans that guarantee a specified retirement payment beginning at a certain age and after a specified period of service according to each plan's provisions. The plans included in the System are the Public Employees' Retirement System of Mississippi (PERS), the Mississippi Highway Safety Patrol Retirement System (MHSPRS), the Municipal Retirement Systems and Fire and Police Disability and Relief Funds (MRS), and the Supplemental Legislative Retirement Plan (SLRP). These plans serve members from state and local government, public schools, community and junior colleges, universities, and other governmental units across the state. The total number of active members has changed from 162,044 in fiscal year 2014 to a current count of 151,376 with a total of 877 participating employers.

The System seeks innovative ways to serve its members and strives to provide quality assistance to each member and employer.

We are proud of our contribution to helping provide retirement security for our retirees. Since 2014, the total number of inactive and retired members has decreased from 228,968 to 177,050, with a current annual retirement benefit payroll of \$2.7 billion. The overall reduction reflects an increase in retirees and a decrease in inactive members. A combination of advances in technology, staff training, and improved vehicles of communication enables the System to assure that its participants are well informed and well served. The charts on page 3 illustrate active members, retirees and beneficiaries, and inactive members participating in the plans. Total membership in the System is 328,426. This is a 16.0 percent decrease since fiscal year 2014.

Currently eligible for retirement are an estimated 18,593 PERS, MHSPRS, and SLRP members.

Membership in the System is a condition of covered public employment in Mississippi. Membership in MRS was closed as of July 1, 1976. Two fire and police plans elected to extend the eligibility period for membership to July 1, 1987.

Eligible employees hired after MRS closing periods automatically become members of PERS. SLRP is a supplemental plan to the provisions of PERS for members of the state Legislature. Those elected after July 1, 1989, automatically become members.

## **Summary of Participating Members**

Fiscal Years Ending June 30

PERS Members	2014	2015	2016	2017	2018
Active vested	89,256	83,583	82,370	81,151	78,715
Active nonvested	72,104	73,632	71,734	71,231	71,972
Sub-total	161,360	157,215	154,104	152,382	150,687
Retirees/beneficiaries	93,504	96,338	99,483	102,260	104,973
Inactive members	132,553	137,026	142,635	66,852	69,341
Sub-total	226,057	233,364	242,118	169,112	174,314
Total	387,417	390,579	396,222	321,494	325,001
MHSPRS Members	2014	2015	2016	2017	2018
Active vested	443	418	393	424	406
Active nonvested	52	100	91	46	105
Sub-total	495	518	484	470	511
Retirees/beneficiaries	720	724	724	726	725
Inactive members	58	59	80	59	55
Sub-total	778	783	804	785	780
Total	1,273	1,301	1,288	1,255	1,291
MRS Members	2014	2015	2016	2017	2018
MRS Members Active vested	<b>2014</b> 14	<b>2015</b> 11	<b>2016</b>	<b>2017</b> 6	<b>2018</b> 4
Active vested					
Active vested Active nonvested	14	11 -	8	6	4
Active vested Active nonvested Sub-total	14 - 14	11 - 11	8 - 8	6 - 6	4 - 4
Active vested Active nonvested Sub-total Retirees/beneficiaries	14 - 14	11 - 11	8 - 8	6 - 6	4 - 4
Active vested Active nonvested Sub-total Retirees/beneficiaries Inactive members	14 - 14 1,890	11 - 11 1,849	8 - 8 1,798	6 - 6 1,754 -	4 - 4 1,694
Active vested Active nonvested Sub-total Retirees/beneficiaries Inactive members Sub-total	14 - 14 1,890 - 1,890	11 - 11 1,849 - 1,849	8 - 8 1,798 - 1,798	6 - 6 1,754 - 1,754	4 - 4 1,694 - 1,694
Active vested Active nonvested Sub-total Retirees/beneficiaries Inactive members Sub-total Total	14 - 14 1,890 - 1,890 <b>1,904</b>	11 - 11 1,849 - 1,849 <b>1,860</b>	8 - 8 1,798 - 1,798 <b>1,806</b>	6 - 6 1,754 - 1,754 <b>1,760</b>	4 - 4 1,694 - 1,694 <b>1,698</b>
Active vested Active nonvested Sub-total Retirees/beneficiaries Inactive members Sub-total Total SLRP Members	14 - 14 1,890 - 1,890 1,904	11 - 11 1,849 - 1,849 <b>1,860</b>	8 - 8 1,798 - 1,798 1,806 2016	6 - 6 1,754 - 1,754 <b>1,760</b>	4 - 4 1,694 - 1,694 <b>1,698</b>
Active vested Active nonvested Sub-total Retirees/beneficiaries Inactive members Sub-total Total SLRP Members Active vested	14 - 14 1,890 - 1,890 1,904 2014	11 - 11 1,849 - 1,849 1,860 2015	8 - 8 1,798 - 1,798 1,806 2016	6 - 6 1,754 - 1,754 1,760 2017	4 - 4 1,694 - 1,698 2018
Active vested Active nonvested Sub-total Retirees/beneficiaries Inactive members Sub-total Total SLRP Members Active vested Active nonvested	14 - 14 1,890 - 1,890 1,904 2014 104 71	11 - 11 1,849 - 1,849 <b>1,860</b> <b>2015</b> 103 71	8 1,798 - 1,798 1,806 2016 109 62	6 - 6 1,754 - 1,754 <b>1,760</b> <b>2017</b> 112 62	4 - 4 1,694 - 1,698 2018 113 61
Active vested Active nonvested Sub-total Retirees/beneficiaries Inactive members Sub-total Total SLRP Members Active vested Active nonvested Sub-total	14 14 1,890 1,890 1,904 2014 104 71 175	11 11 1,849 1,849 1,860 2015 103 71 174	8 - 8 1,798 - 1,798 1,806 2016 109 62 171	6 - 6 1,754 - 1,754 1,760 2017 112 62 174	4 - 4 1,694 - 1,698 2018 113 61 174
Active vested Active nonvested Sub-total Retirees/beneficiaries Inactive members Sub-total Total SLRP Members Active vested Active nonvested Sub-total Retirees/beneficiaries	14 - 14 1,890 - 1,890 1,904 2014 104 71 175 187	11 - 11 1,849 - 1,849 1,860 2015 103 71 174 185	8 1,798 - 1,798 1,806 2016 109 62 171 207	6 - 6 1,754 - 1,754 <b>1,760</b> <b>2017</b> 112 62 174 205	4 - 4 1,694 - 1,698 2018 113 61 174 207

## **Active Members by Plan**

Total	100.00%	151,376
SLRP	0.11%	174
MRS	0.01%	4
MHSPRS	0.34%	511
PERS	99.54%	150,687

#### **Retired and Inactive Members by Plan**

100.00%	177,050
0.15%	262
.96%	1,694
0.44%	780
98.45%	174,314
	0.44%

## **Participating Employers**

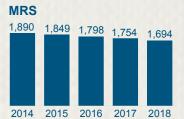
Fiscal Years Ending June 30



## Retiree Growth by Plan - Fiscal Years Ending June 30









<sup>\*</sup> Number of retirees in thousands

## **FINANCIAL**



Discernment
Sylvilagus floridanus (Eastern Cottontail Rabbit)

The summaries of assets and liabilities show how much the System holds in resources and how much is owed. Total fiscal year 2018 assets and liabilities were \$33.2 billion and \$4.9 billion, respectively, as displayed on page 5. Net position of the defined benefit pension plans for 2018 totaled \$28.3 billion while 2017 net position totaled \$27.1 billion. Investments make up the largest portion of net position restricted for pension benefits. Net position results from the difference between total assets and total liabilities. The chart below illustrates the overall trend in net position over a five-year period. Net position represents the net assets accumulated to pay the present and future benefits of members and retirees.

The three primary sources of System funding are employer contributions, member contributions, and net investment income. Employer contributions totaled \$1.1 billion for fiscal year 2018 and were consistent with the prior year. Member contributions totaled \$573.3 million and also remained consistent with the prior year. The System posted net investment income of \$2.4 billion for 2018, compared to \$3.5 billion for 2017. The decrease was primarily due to investment performance with a 9.48 percent rate of return for fiscal year 2018 compared to 14.96 percent for fiscal year 2017.

The System's primary expenses include benefit payments, refunds of contributions to former members, and the cost of administering the System. As shown on page 5 in the bottom table, the majority of 2018 expenses were benefit payments, which totaled \$2.7 billion, an increase of \$132.4 million from 2017 due primarily to an increase in benefit recipients. Contribution refunds were \$124.4 million for fiscal year 2018, compared to \$113.9 million for fiscal year 2017. The cost to administer the System for fiscal year 2018 was \$16.9 million net of depreciation, which is \$747.0 thousand less than fiscal year 2017. Expenses for administration of the System are funded from the trust.

GASB Statement 67 requires presentation of components of the net pension liability of the employers to plan members for benefits provided through cost-sharing and single employers. GASB Statement 67 is an accounting measure of liability and does not correspond to funding measures.

**Net Position** 

Fiscal Years Ending June 30 (in billions) \$28.3 \$25.4 \$25.4 \$24.6

## **Net Pension Liability for Employers** *(in millions)*

	PERS	MHSPRS	SLRP
Total Pension Liability	\$44,396	\$527	\$21
Less: Fiduciary Net Position	27,763	354	18
Net Pension Liability	\$16,633	\$173	\$3

	Assets - Fiscal Years Ending June 30 (in thousands)	2018	2017	2016
,	Cash, cash equivalents & receivables 4.12% Investments, fair value 85.18%	\$1,368,848 28,280,303	\$1,392,908 26,592,048	\$1,472,475 23,938,414
	Securities lending * 10.63%	3,527,980	2,959,706	3,320,112
	Capital assets 0.07%	22,455	26,865	35,140
	Total	\$33,199,586	\$30,971,527	\$28,766,141
	Liabilities - Fiscal Years Ending June 30			
	(in thousands)	2018	2017	2016
	Payables 29.65%	\$1,456,006	\$955,714	\$830,412
	■ Securities lending liability* 70.35%	3,453,895	2,955,085	3,318,706
	Total	\$4,909,901	\$3,910,799	\$4,149,118
	Revenues - Fiscal Years Ending June 30 (in thousands)  Employers 25.94%  Members 14.15% Investment income 59.90%	2018 \$1,051,414 573,310 2,427,086	<b>2017</b> \$1,052,147 572,456 3,503,512	<b>2016</b> \$1,055,072 574,963 133,536
	Other 0.01%	51	36	35
	Total	\$4,051,861	\$5,128,151	\$1,763,606
	Expenses - Fiscal Years Ending June 30			
	(in thousands)	2018	2017	2016
	Benefits 94.82%	\$2,676,744	\$2,544,382	\$2,433,505
	Refunds 4.41%	124,427	113,868	113,010
	Administrative 0.77%	21,733	26,196	16,273
	Total	\$2,822,904	\$2,684,446	\$2,562,788

<sup>\*</sup> PERS makes short-term loans of securities to broker-dealers to generate incremental revenues from its portfolios.

## **FUNDING**



Endurance
Malaclemys terrapin pileate
(Mississippi Diamondback Terrapin)

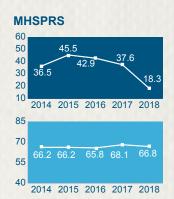
**Employer Contribution Percentage Rates** 

 Fiscal Year
 2013
 2014
 2015
 2016
 2017
 2018

 PERS
 14.26
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.75
 15.7

**UAAL Period Graphs** Fiscal Years Ending June 30

■ UAAL Period (in years) ■ Percent Funded





Actuarial valuations are performed on an annual basis for all defined benefit plans administered by the System. Valuations are based on information as of June 30, 2018.

Funds are accumulated to meet future benefit payments to retirees and beneficiaries. This accumulated balance is referred to as the "net position restricted for pensions." The unfunded actuarial accrued liability (UAAL) amortization period graphs shown below (dark blue) depict the anticipated UAAL period for each plan within the System. In general terms, the UAAL is the difference between benefit payments owed to current and future retirees and beneficiaries and the amount of assets held by the System. The UAAL amortization period is the number of years it would take to fully fund the System's projected benefit obligation. The funded ratio (as shown in the light blue charts below) represents the amount of the System's actuarial accrued liability that is covered by the actuarial value of assets, expressed as a percentage.

The charts below show each plan's UAAL period and funded ratio for the last five fiscal years. The charts indicate an increase in the percent funded for 2018 for PERS, MRS, and SLRP, while MHSPRS experienced a decrease. Variations are primarily due to changes in the individual plan's actuarial assumptions and are also affected by actuarial gains and losses from prior years. Investment gains and losses relative to the assumed rate of return of 7.75 percent are recognized, or smoothed, in equal increments in the current year and each of the succeeding four years. PERS investments are also diversified to help mitigate the effects of a volatile financial market.

Based on the Board's funding policy, employer contribution rates of 15.75 percent for PERS, 37.0 percent for MHSPRS, and 7.4 percent for SLRP continue in effect until July 1, 2018, when the rate for MHSPRS will increase to 49.08 percent and July 1, 2019, when the rate for PERS will increase to 17.40 percent. Employee contributions remain constant at 9.0 percent for PERS, 7.25 percent for MHSPRS, and 3.0 percent for SLRP.

Member and employer contribution rates, as well as other information, varies among the individual municipalities of MRS, an agent multi-employer plan.

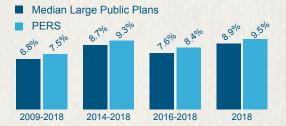
## **INVESTMENTS**

#### **Defined Benefit Plans Total Rates of Return**

Fiscal Years Ending June 30



#### Large Public Plans: Annualized Rates of Return



#### **Performance Benchmark**

	reno	illiance benchmark		
<u>-</u> ω	MS PERS Combined Return	9.48%		
	Tota Plan	MS PERS Policy Target Return	9.05%	
		Public Funds >\$10 Billion Median	8.89%	
	es	Debt Securities Managers Composite	0.75%	
	Debt Securiti	Bloomberg Barclays Aggregate Index	(0.40)%	
	Š	Fixed Income Custom Benchmark	(0.00)%	
	, tic	Domestic Equity Managers Composite	14.84%	
	mes equity	Russell 3000 Index	14.78%	
		Domestic Equity Custom Benchmark	14.97%	
	nal	International Equity Managers Composite	6.99%	
	rnatic Equity	International Equity Benchmark	7.75%	
	Inter	International Equity Custom Benchmark	8.36%	
	al Global ate Equity	Global Equity Managers Composite	13.34%	
		Global Equity Benchmark	11.14%	
		Commingled Funds and Reits Composite	8.92%	
	Est	Real Estate Benchmark	7.19%	
	ate	Private Equity Composite	16.66%	
	Priv	Private Equity Benchmark	17.39%	

The System manages investments with prudent care, constant attention, specialized expertise, and a concern for the financial security of its membership. By maintaining a broadly diversified portfolio designed to minimize risk and maximize return over the long term, the System's investment program is designed to help provide funding for current and future pension obligations.

Investments before securities lending activities for 2018 were \$28.3 billion, an increase of \$1.7 billion from fiscal year 2017. Net investment income was \$2.4 billion, compared to \$3.5 billion at fiscal year end 2017.

One of the most critical decisions made by the System is that of the long-term asset allocation policy for the investment portfolio. In fiscal year 2018, the target asset allocation was 61.0 percent equities, 20.0 percent debt securities, and 10.0 percent real estate investments. Private equity was 8.0 percent. Cash and equivalents were 1.0 percent. The System's asset allocation decisions are based on liability requirements and guidelines established by the Mississippi Code of 1972. At year end, 40 investment firms were managing 58 portfolios for defined benefit pension plans. Portfolio performance is carefully monitored by the Board of Trustees with the assistance of an investment management consulting firm and the System's chief investment officer.

The System experienced a 9.48 percent investment return this year, which was more than the plan's benchmark return of 9.05 percent. The System operates on a long-term investment strategy resulting in a five-year rate of return of 9.32 percent, 10-year rate of 7.45 percent, and a 30-year rate of 8.55 percent.

#### **Asset Allocation at Fair Value**

2013.....\$25,577,062

Asset Allocati	on at Fair value				
Equities			61.0%		
Debt securities			20.3%		
Real estate			10.1%		
Private equity			7.6%		
Cash and equival	ents		1.0%		
Long-Term Ta	rget Asset Allocat	tion			
Equities			61.0%		
Debt securities			20.0%		
Real estate			10.0%		
Private equity			8.0%		
Cash and Equiva	lents		1.0%		
Total Investments: Past 10 Fiscal Years (in thousands)					
2009	\$17,911,472	2014	\$28,322,291		
2010	\$20,845,217	2015	\$27,493,738		
2011	\$23,537,833	2016	\$27,258,526		
2012	\$23,176,162	2017	\$29,551,754		

2018.....\$31,808,283

## RESOURCES



Perseverance
Vulpes vulpes (Red Fox)

#### **Website and Call Center**

Our website, **www.pers.ms.gov**, provides an array of information and services to members, retirees, and the public.

**PERS' Customer Service Center** analysts assist callers with questions and concerns in a prompt, courteous manner. The center, 800-444-7377 or 601-359-3589, is open from 8 a.m. to 5 p.m. every weekday with the exception of state holidays.

#### **Education Opportunities**

Pre-Retirement Full Day Seminars are held throughout the state to assist members with retirement planning. Topics include Social Security, Mississippi Deferred Compensation (MDC), and PERS. Schedules and registration are available online.

Small group **Focus Sessions** assist members with retirement planning by providing each individual with an estimate of benefits and detailed information on retirement options.

Schedules and registration are available online.

Hosted by employers, **PERS on the Move** presentations are held during or after office hours to provide members with information regarding PERS and MDC. Visit us online to request a seminar.

Annual **agency training seminars** provide information to personnel responsible for benefits administration and reporting. Schedules, topics, and registration are posted online.

#### **Printed Materials**

Active and inactive members are mailed **annual statements** with account balances, designated beneficiaries, and unaudited estimates of benefits and years of service.

Our member, retiree, and employer **newsletters** provide pertinent information to constituents about their retirement plans and System. Electronic versions of the newsletters are available online. Audio versions are available through the National Federation of the Blind of Mississippi.

**Member handbooks and guides** include information about PERS, its administered programs, retirement benefits, retirement options, and important contact information. Handbooks and guides are available by request or from www.pers.ms.gov.

#### **Award-Winning Report**

The Government Finance Officers Association of the United States and Canada (GFOA) has given an Award for Outstanding Achievement in Popular Annual Financial Reporting to PERS for its Popular Annual Financial Report for the fiscal year that ended June 30, 2017. The Award for Outstanding Achievement in Popular Annual Financial Reporting is a prestigious national award recognizing conformance with the highest standards for preparation of state and local government popular reports.

In order to receive an Award for Outstanding Achievement in Popular Annual Financial Reporting, a government unit must publish a popular annual financial report with contents that

conform to program standards of creativity, presentation, understandability, and reader appeal.

An Award for Outstanding Achievement in Popular Annual Financial Reporting is valid for a period of only one year. PERS has received a Popular Award for the last 15 consecutive fiscal years. We believe our current report continues to conform to the Popular Annual Financial Reporting requirements, and we are submitting it to GFOA.

