



Vigilantly and resourcefully serving those who serve others

2018 COMPREHENSIVE ANNUAL FINANCIAL REPORT

2018 Comprehensive Annual Financial Report

A Component Unit of the State of Mississippi Fiscal Year Ended June 30

PREPARED BY:

The Office of Administrative Services Public Employees' Retirement System of Mississippi

> PERS Building 429 Mississippi Street Jackson, Mississippi 39201-1005





WATCHFULNESS *Tyto alba* (Barn Owl)

ILLUSTRATIONS BY MISSISSIPPI ARTIST SAM BEIBERS

For all living things, life is more than merely learning to survive. To 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.

Often nesting in the rafters of Mississippi barn lofts, the wizened barn owl uses its highly sensitive low-light vision to be a watchful hunter after the sun sets. The discerning eastern cottontail rabbit mostly hides during daylight hours then uses its keen sight, smell, and hearing to forage under the protective cover of twilight and night. In our salt marshes and estuaries, the diamondback terrapin has developed endurance for a long lifespan despite prolific nest predation from racoons, feral hogs, snakes, and other animals. Silently and deftly navigating the backwoods, the white-tailed deer is the epitome of prudence by continually using the same pathways when foraging for food and carefully hiding its offspring from predators. And adapting to a wide range of habitats—including forest, tundra, prairie, desert, mountains, farmlands, and urban sprawl-the red fox is a study in perseverance.

Like the barn owl, the eastern cottontail rabbit, the diamondback terrapin, the white-tailed deer, and the red fox, the Public Employees' Retirement System of Mississippi has developed its watchfulness, discernment, endurance, prudence, 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. This page intentionally left blank.

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Providing Benefits for Life

Board of Trustees Public Employees' Retirement System 429 Mississippi Street Jackson, MS 39201-1005

December 14, 2018

Dear Board Members:

It is my pleasure to present the 2018 *Comprehensive Annual Financial Report* (CAFR) of the Public Employees' Retirement System (PERS). 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 CAFR is a presentation of the financial results of the System as of June 30, 2018. We believe this information is useful for transparency and perspective over the long term. We trust you and other members will find this CAFR helpful in understanding your retirement system.

PROFILE OF THE SYSTEM

The System was established to provide retirement benefits for all state and public education employees, officers of the Mississippi Highway Safety Patrol, elected members of the state Legislature, the President of the Senate, and other public employees of participating employers. Plans administered by the System include: The Public Employees' Retirement System of Mississippi (PERS), which was established by legislation in 1952; the Mississippi Highway Safety Patrol Retirement System (MHSPRS), established in 1958; the Supplemental Legislative Retirement Plan (SLRP), established in 1989; and the Municipal Retirement Systems (MRS), which came under the System's administration in 1987. As of June 30, 2018, the System's defined benefit plans served a total of 220,827 members and 107,599 retirees and beneficiaries. There are 877 participating employers from across the state. Primary sources of funding for the System include employer contributions, member contributions, and investment income. Retirement benefits paid during the fiscal year totaled \$2.7 billion. Employers contributed \$1.1 billion during the fiscal year, while members of the System contributed a total of \$573 million. As of June 30, 2018, net position restricted for pension benefits totaled \$28.3 billion.

The System is administered by a 10-member Board of Trustees that includes: The state Treasurer; one gubernatorial appointee who is a member of PERS; two state employees; two PERS retirees; and one representative each from public schools and community colleges, state universities, municipalities, and counties. Apart from the State Treasurer and the gubernatorial appointee, all members are elected to staggered six-year terms by the constituents they represent. The Board of Trustees is responsible for the general administration and proper operation of the System. The executive director is designated by the Board to lead and conduct all business for the System. The Public Employees' Retirement System of Mississippi operates under legislative mandate with respect to administrative budgets, human resources, and purchasing guidelines. The System is considered a component unit of the state of Mississippi for financial reporting

H. Ray Higgins, Jr. Executive Director	Board of Trustees:	Kelly Breland State Employees Chair	Brian Rutledge Institutions of Higher Learning Vice Chair	Bill Benson County Employees	Lee Childress Public Schools, Community/Jr. Colleges	George Dale <i>Retirees</i>
		Lynn Fitch State Treasurer	Chris Howard <i>State Employees</i>	Kimberly Hanna <i>Municipal</i> Employees	Randy D. McCoy <i>Retirees</i>	Drew Snyder Gubernatorial Appointee

429 Mississippi Street, Jackson, MS 39201-1005 601.359.3589 800.444.PERS

www.pers.ms.gov

purposes and, as such, the financial statements contained in this report are included in the state of Mississippi's Comprehensive Annual Financial Report.

Annual budgets are legally adopted for the administrative expenditure portion of the System's operations and are funded by earnings of the System. A budget request is approved by the Board of Trustees and submitted to the state Legislature, which legally enacts the budget in the form of an appropriation bill during the subsequent legislative session. Changes may be made in budget categories—consistent with legislative authority—with approval of the Mississippi Department of Finance and Administration. A more detailed discussion of the budgetary process is presented in the Financial Section of this CAFR on page 38.

FINANCIAL INFORMATION

Our staff issues a CAFR within six months of the close of each fiscal year. The report contains basic financial statements presented in conformity with generally accepted accounting principles and audited in accordance with generally accepted auditing standards, as well as standards applicable to financial audits contained in government auditing standards. The 2018 independent audit was conducted by Eide Bailly LLP, a firm of licensed certified public accountants. The Independent Auditors' Report is presented in the Financial Section on pages 19 through 21.

This CAFR consists of management's representations concerning the finances of the System. Consequently, management assumes full responsibility for the completeness and reliability of all information presented in this report. A framework of internal controls is designed to establish reasonable assurance that assets are safeguarded, transactions are accurately executed, and financial statements are fairly presented in accordance with generally accepted accounting principles. The concept of reasonable assurance recognizes that the cost of a control should not appreciably exceed the benefits likely to be derived and that the analysis of costs and benefits requires estimates and professional judgments by management. The System maintains written policies and procedures and its Internal Audit Department that provides reports to the Board of Trustees. The Internal Audit Department makes recommendations for improvements in controls and operating efficiency. Management's Discussion and Analysis (MD&A) immediately follows the Independent Auditor's Report and provides a narrative introduction, overview, and analysis of the basic financial statements. MD&A complements, and should be read in conjunction with, this letter of transmittal.

INVESTMENT INFORMATION

The Board of Trustees continues to focus on an investing approach that emphasizes a diversified portfolio of securities invested over a long time horizon, which moderates the effects of a changing economic environment. The portfolio is broadly diversified among cash equivalents, equities, debt securities, real estate, and private equity with additional variation through domestic and international investing. Our asset allocation policy is tactically balanced to provide an expected level of return while incurring minimal risk, which over time will fund the liabilities of the System, given an adequate contribution rate expressed as a percent of payroll. This year the System posted a 9.48 percent rate of return on investments measured on June 30, 2018.

Callan LLC is employed by the Board of Trustees as the System's investment consultant. Services include calculating investment returns for both the total fund and for each of the investment managers retained to invest the System's assets. All returns are calculated using a time-weighted rate of return methodology based on portfolio fair values determined by the System's custodial bank. Additional information regarding the System's investment holdings and performance may be found in the Financial and Investment sections of this report.

FUNDING INFORMATION

At its June 2018 meeting, the Board of Trustees adopted a revised and more comprehensive funding policy that added additional metrics for decision-making. The policy is based on a signal light approach with green signifying the metric passes; yellow signifying the metric passes, but a negative experience could lead to concern; and red, the metric fails. Funded ratio, cash flow as a percentage of assets, and the actuarially determined contribution ratio are metrics used within the policy.

Along with the revised funding policy, an increase in the PERS employer contribution rate was approved, moving from 15.75 percent to 17.40 percent. This increase, coupled with the new funding policy, is projected to improve the financial status of the plan. In addition, the Mississippi Highway Safety Patrol Retirement System Advisory Board previously approved a MHSPRS increase in the employer contribution rate from 37.00 percent to 49.08 percent. The contribution rate for PERS is effective July 1, 2019, while the contribution rate for MHSPRS was effective for July 1, 2018.

AWARDS

The Government Finance Officers Association of the United States and Canada (GFOA) awarded a Certificate of Achievement for Excellence in Financial Reporting to the System for its comprehensive annual financial report for the fiscal year ended June 30, 2017. The Certificate of Achievement is a prestigious national award, recognizing conformance with the highest standards for preparation of state and local government financial reports.

To be awarded a Certificate of Achievement, a governmental unit must publish an easily readable and efficiently organized comprehensive annual financial report with contents that conform to program standards. Such financial reports must satisfy both generally accepted accounting principles and applicable legal requirements. A Certificate of Achievement is valid for a period of only one year. The System has received a Certificate of Achievement for the last 31 consecutive years. We believe our current report continues to conform to the Certificate of Achievement Program's requirements, and we are submitting it to GFOA for evaluation.

The Public Employees' Retirement System of Mississippi's submission of a Popular Annual Financial Report to the GFOA resulted in an Award for Outstanding Achievement in Popular Annual Financial Reporting for the fiscal year ended June 30, 2017. 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 one year. The Public Employees' Retirement System of Mississippi has received a Popular Award certificate 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 for consideration this year.

The Public Employees' Retirement System received the Public Pension Coordinating Council's (PPCC) Public Pension Standards 2018 Award in recognition of meeting professional standards for plan design and administration. The PPCC is a national confederation of state retirement associations whose standards are widely recognized benchmarks for public pension systems in the areas of plan design, funding, actuarial, and financial audits, as well as member communications.

The Public Employees' Retirement System received the Certificate of Transparency Award from the National Conference on Public Employee Retirement Systems (NCPERS). This certificate was awarded in recognition of the System's participation in the NCPERS Retirement Systems Study, which seeks to further open disclosure of data collection and encourage the public's understanding of retirement systems.

CONCLUSION

This report is a product of the combined efforts of the System's staff and advisors functioning under your leadership and is intended to provide extensive and reliable information as a basis for making management decisions, determining compliance with legal provisions, and determining responsible stewardship for the assets contributed by the System's members and their employers. This report is available to the Governor, members of the Mississippi Legislature, state auditor, and all member agencies via our website, www.pers.ms.gov. These agencies form the link between the System and its members, whose cooperation contributes significantly to our success. I hope all stakeholders of the System will find this report informative and useful. My deepest thanks go to you, our team of staff professionals, the advisors, and others who have worked so diligently to provide a smooth transition as your new executive director and for the opportunity to partner with you in the enduring commitment to serve the members and retirees of the Public Employees' Retirement System.

I am humbled and honored to serve as your executive director and I look forward to future organizational successes and opportunities, as well as the reality of challenges and thoughtful well-planned responses, to move the System forward.



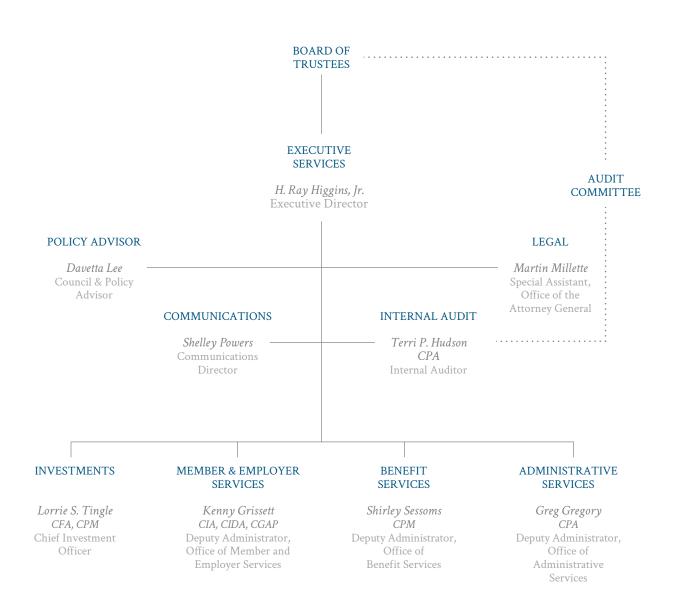
Respectfully submitted,

N. Ray Carl

H. Ray Higgins, Jr. Executive Director

Public Employees' Retirement System of Mississippi 429 Mississippi Street, Jackson, MS 39201-1005 601.359.3589 800.444.PERS www.pers.ms.gov

Organizational Chart



2018 Board of Trustees

The Board of Trustees of the Public Employees' Retirement System of Mississippi (PERS) is responsible for designating the System's executive director and for establishing the policies for administration of the trust. The Board also works to carry out the intent and purposes of the state Legislature by establishing rules and regulations for the administration of PERS and the transaction of its business.

CHAIR LYNN FITCH State Treasurer TERM OF SERVICE: JAN. 2016-JAN. 2020

VICE CHAIR KELLY BRELAND Elected by State Employees TERM OF SERVICE: JAN. 2013-DEC. 2018









2018 Board of Trustees (Continued)

BILL BENSON Elected by County Employees TERM OF SERVICE: JAN. 2016 - DEC. 2021

STEPHEN BENSON Elected by Municipal Employees TERM OF SERVICE: JAN. 2015 - DEC. 2020 (SERVED THROUGH APRIL 2018; ELECTION TO FILL UNEXPIRED TERM))

EDWARD LEE CHILDRESS, ED.D. Elected by Public School and Community/Junior College Employees TERM OF SERVICE: MAY 2016- APR. 2022

GEORGE DALE *Elected by Retirees* TERM OF SERVICE: MAY 2017 - APR. 2023

CHRIS HOWARD Elected by State Employees TERM OF SERVICE: JUL. 2014 - JUN. 2020

RANDY MCCOY, ED.D. Elected by Retirees TERM OF SERVICE: JUL. 2013-JUN. 2019

BRIAN RUTLEDGE, PH.D. Elected by Institutions of Higher Learning Employees TERM OF SERVICE: DEC. 2016 - DEC. 2022

DREW SNYDER *Appointed by Governor* TERM OF SERVICE: APR. 2016 - APR. 2020













Outside A

Professional Services

ACTUARY

Cavanaugh Macdonald Consulting, LLC 3550 Busbee Parkway, Suite 250 Kennesaw, Georgia 30144 Telephone: (678) 388-1700

AUDITOR

Eide Bailly LLP 877 W. Main Street, Suite 800 Boise, Idaho 83702 Telephone: (208) 344-7150

CUSTODIAN INVESTMENT FUNDS

Bank of New York Mellon 225 Liberty Street New York, New York 10286 Telephone: (212) 495-1784

FUNDS EVALUATION SERVICES & ASSET ALLOCATION/INVESTMENT POLICY STUDY

Callan Associates, Inc. 600 Montgomery Street, Suite 800 San Francisco, California 94111 Telephone: (415) 974-5060

INVESTMENT MANAGERS

EQUITY MANAGERS

Acadian Asset Management, LLC 260 Franklin Street, 20th Floor Boston, Massachusetts 02110 Telephone: (617) 850-3501

Arrowstreet Capital, LP 200 Clarendon Street, 30th Floor Boston, Massachusetts 02116 Telephone: (617) 919-0000

Artisan Partners, LP 875 East Wisconsin Avenue, Suite 800 Milwaukee, Wisconsin 53202-5402 Telephone: (414) 390-6100

Baillie Gifford & Company Calton Square, 1 Greenside Row, Edinburgh, EH1 3AN, Scotland Telephone: +44 (0) 131-275-2000

BlackRock Institutional Trust Company, NA 55 East 52nd Street New York, New York 10022 Telephone: (212) 810-5300

Dimensional Fund Advisors, Inc. 6300 Bee Cave Road, Building One Austin, Texas 78746 Telephone: (512) 306-7400

Eagle Capital Management, LLC 499 Park Avenue, 17th Floor New York, New York 10022 Telephone: (212) 293-4040 Epoch Investment Partners, Inc. 399 Park Avenue, 31st Floor New York, New York 10022 Telephone: (212) 303-7200

Fidelity Institutional Asset Management, LLC 900 Salem Street Smithfield, Rhode Island 02917 Telephone: (401) 292-7816

Fisher Investments 5525 NW Fisher Creek Drive Camas, Washington 98607 Telephone: (800) 851-8845

Harding Loevner, LP 400 Crossing Boulevard, 4th Floor Bridgewater, New Jersey 08807 Telephone: (908) 218-7900

Lazard Asset Management 30 Rockefeller Plaza New York, New York 10112 Telephone: (212) 632-6439

Longview Partners Ltd. PO Box 559, Mill Court, La Charroterie St Peter Port, Guernsey GYI GJG Channel Islands Telephone: +44 (0) 148-171-2414

Marathon Asset Management, LLP Orion House 5 Upper St. Martin's Lane London WC2H 9EA Telephone: +44 (0) 207-497-2399

Mondrian Investment Partners, Inc. 10 Gresham Street, 5th Floor London, EC2V ZJD United Kingdom Telephone: +44-207-477-7000

Northern Trust Global Investment 50 South LaSalle Street Chicago, Illinois 60675 Telephone: (312) 444-4977

Riverbridge Partners, LLC 80 South Eighth Street, Suite 1200 Minneapolis, Minnesota 55402 Telephone: (612) 904-6250

State Street Global Advisors State Street Financial Center One Lincoln Street Boston, Massachusetts 02111-2999 Telephone: (617) 664-4739

The Boston Company Asset Management, LLC One Boston Place, Suite 024-0051 Boston, Massachusetts 02108 Telephone: (617) 722-7000

Additional information on the above-mentioned investment professional fees can be found on pages 73 and 98. Information on commissions is found on page 99.

Outside Professional Services

Wedgewood Partners, Inc. 9909 Clayton Road, Suite 103 St. Louis, Missouri 63124 Telephone: (314) 567-6407

Wellington Management Company, LLP 280 Congress Street Boston, Massachusetts 02210 Telephone: (617) 951-5000

FIXED INCOME MANAGERS

AllianceBernstein, LP 1345 Avenue of the Americas New York, New York 10105 Telephone: (212) 969-1168

BlackRock Institutional Trust Company, NA 55 East 52nd Street New York, New York 10022 Telephone: (212) 810-5300

Loomis Sayles & Company, LP One Financial Center, 25th Floor Boston, Massachusetts 02111 Telephone: (617) 482-2450

Manulife Asset Management 197 Clarendon Street Boston, MA 02116 Telephone: (617) 375-1500

Northern Trust Global Investment 50 South LaSalle Street Chicago, Illinois 60675 Telephone: (312) 444-4977

Pacific Investment Management Company 650 Newport Center Drive Newport Beach, California 92660 Telephone: (949) 720-6000

Prudential Investment Management, Inc. 655 Broad Street, 8th Floor Newark, New Jersey 07102 Telephone: (973) 802-4316

Wellington Management Company, LLP 280 Congress Street Boston, Massachusetts 02210 Telephone: (617) 951-5000

PRIVATE EQUITY MANAGERS

GCM Grosvenor Diversified Partners, LP 767 Fifth Avenue, 14th Floor New York, New York 10153 Telephone: (646) 362-3700

Pathway Capital Management, LP 18575 Jamboree Road, 7th Floor Irvine, CA 92612 Telephone: (949) 622-1000

REAL ESTATE MANAGERS

AEW Capital Management, LP Two Seaport Lane, Suite 1600 Boston, Massachusetts 02210 Telephone: (627) 261-9000 Angelo, Gordon & Company 245 Park Avenue, 26th Floor New York, New York 10167 Telephone: (212) 692-9328

Center Square Investment Management 630 W. Germantown Pike, Suite 300 Plymouth Meeting, PA 19462 Telephone: (610) 834-9500

Cohen & Steers Capital Management, Inc. 280 Park Avenue, 10th Floor New York, New York 10017-1216 Telephone: (212) 832-3232

Hancock Natural Resource Group 197 Clarendon Street, C-08-99 Boston, Massachusetts 02116-5010 Telephone: (617) 747-1600

Heitman, LLC 191 North Wacker Drive, Suite 2500 Chicago, Illinois 60606 Telephone: (312) 855-5700

Invesco 1166 Avenue of the Americas, 27th Floor New York, New York 10036 Telephone: (212) 278-9108

J.P. Morgan Investment Management, Inc. 270 Park Avenue, 7th Floor New York, New York 10017 Telephone: (212) 648-2122

Principal Global Investors, LLC 801 Grand Avenue Des Moines, Iowa 50392-0490 Telephone: (800) 533-1390

T.A. Associates Realty 28 State Street, 10th Floor Boston, Massachusetts 02109 Telephone: (617) 476-2700

UBS Realty Investors, LLC 10 State House Square, 15th Floor Hartford, Connecticut 06103-3604 Telephone: (860) 616-9000

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LEGAL COUNSEL

Office of the Attorney General Martin Millette, Special Assistant 550 High Street Jackson, Mississippi 39201 Telephone: (601) 359-3680



Government Finance Officers Association

Certificate of Achievement for Excellence in Financial Reporting

Presented to

Public Employees' Retirement System

of Mississippi

For its Comprehensive Annual Financial Report for the Fiscal Year Ended

June 30, 2017

Christophen P. Morrill

Executive Director/CEO



Public Pension Coordinating Council

Public Pension Standards Award For Funding and Administration 2018

Presented to

Public Employees' Retirement System of Mississippi

In recognition of meeting professional standards for plan funding and administration as set forth in the Public Pension Standards.

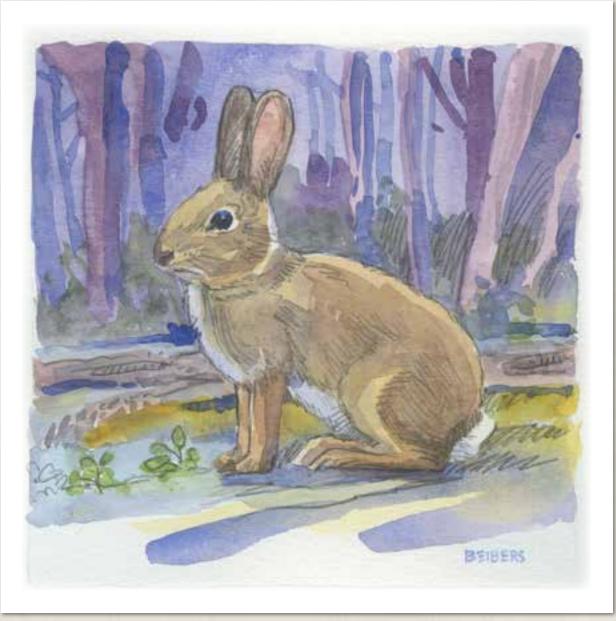
Presented by the Public Pension Coordinating Council, a confederation of

National Association of State Retirement Administrators (NASRA) National Conference on Public Employee Retirement Systems (NCPERS) National Council on Teacher Retirement (NCTR)

alan Helinple

Alan H. Winkle Program Administrator

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DISCERNMENT Sylvilagus floridanus (Eastern Cottontail Rabbit)





CPA's & BUSINESS ADVISORS

Independent Auditor's Report

To the Board of Trustees Public Employees' Retirement System of Mississippi Jackson, Mississippi

Report on the Financial Statements

We have audited the accompanying financial statements of the Public Employees' Retirement System of Mississippi (the System), which comprise the statement of fiduciary net position as of June 30, 2018, and the related statement of changes in fiduciary net position, for the year then ended, and the related notes to the financial statements.

Management's Responsibility for the Financial Statements

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

Auditor's Responsibility

Our responsibility is to express an opinion on these financial statements based on our audit. We conducted our audit 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*, issued by the Comptroller General of the United States. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditor's judgment, including the assessment of the risks of material misstatement of the financial statements, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation and fair presentation of the financial statements 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 the entity's internal control. Accordingly, we express no such opinion. An audit also includes evaluating 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 financial statements.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

What inspires you, inspires us. Let's talk. | eidebailly.com

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Opinions

In our opinion, the financial statements referred to above present fairly, in all material respects, the respective statement of the fiduciary net position of the Public Employees' Retirement System of Mississippi, as of June 30, 2018, and the respective statement of changes in fiduciary net position for the year then ended in accordance with accounting principles generally accepted in the United States of America.

Other Matters

Required Supplementary Information

Accounting principles generally accepted in the United States of America require that the management's discussion and analysis on pages 22-29 and the required supplementary information on pages 62-68 be presented to supplement the basic financial statements. Such information, although not a part of the basic financial statements, is required by the Governmental Accounting Standards Board, who considers it to be an essential part of financial reporting for placing the basic financial statements in an appropriate operational, economic, or historical context. We have applied certain limited procedures to the required supplementary information in accordance with auditing standards generally accepted in the United States of America, which consisted of inquiries of management about the methods of preparing the information and comparing the information for consistency with management's responses to our inquiries, the basic financial statements, and other knowledge we obtained during our audit of the basic financial statements. We do not express an opinion or provide any assurance.

Other Information

Our audit was conducted for the purpose of forming an opinion on the financial statements that collectively comprise the System's basic financial statements as a whole. The introductory, investment, actuarial, statistical and supplementary sections are presented for purposes of additional analysis and are not a required part of the financial statements.

The additional supplementary information accompanying financial information including the Schedule of Administrative Expenses and Depreciation, Schedule of Investment Managers' Fees, Investment Global Out-of-Pocket Fees, and Professional Service Fees, Schedule of Investment Dues to MRS from PERS and Schedule for the Public Employees' Retirement System of Mississippi Statement of Changes in Assets and Liabilities – Agency Fund are the responsibility of management and were derived from and relate directly to the underlying accounting and other records used to prepare the basic financial statements. Such information has been subjected to the auditing procedures applied in the audit of the basic financial statements and certain additional procedures, including comparing and reconciling such information directly to the underlying accounting and other records used to prepare the basic financial statements themselves, and other additional procedures in accordance with auditing standards generally accepted in the United States of America. In our opinion, the accompanying financial information listed as supplemental schedules are fairly stated, in all material respects, in relation to the basic financial statements as a whole.

The introductory, investment, actuarial and statistical sections have not been subjected to the auditing procedures applied in the audit of the basic financial statements and, accordingly, we do not express an opinion or provide any assurance on them.

Other Reporting Required by Government Auditing Standards

In accordance with *Government Auditing Standards*, we have also issued our report dated November 27, 2018, on our consideration of the System's internal control over financial reporting and on our tests of its compliance with certain provisions of laws, regulations, contracts, and grant agreements and other matters. That report will be issued separately under its own cover. The purpose of that report is solely to describe the scope of our testing of internal control over financial reporting and the results of that testing, and not to provide an opinion on the effectiveness of the System's internal control over financial reporting or on compliance. That report is an integral part of an audit performed in accordance with *Government Auditing Standards* in considering System's internal control over financial reporting and compliance.

Ende Bailly LLP

Boise, Idaho November 27, 2018

Management's Discussion & Analysis [unaudited]

This section presents management's discussion and analysis of the Public Employees' Retirement System of Mississippi's (System) financial position and performance for the year ended June 30, 2018. This section is presented as a narrative overview and analysis in conjunction with the Letter of Transmittal—included in the Introductory Section—the financial statements, and other information presented in the Financial Section of this *Comprehensive Annual Financial Report*.

The System is responsible for administering retirement benefits for all state and public education employees, sworn officers of the Mississippi Highway Safety Patrol, other public employees whose employers have elected to participate, and elected members of the state Legislature, as well as the President of the Senate. The System is comprised of five funds, including four defined benefit pension plans: the Public Employees' Retirement System of Mississippi (PERS), the Mississippi Highway Safety Patrol Retirement System (MHSPRS), the Municipal Retirement Systems (MRS), and the Supplemental Legislative Retirement Plan (SLRP). The remaining fund is the Flexible Benefits Cafeteria Plan (FBCP), which is an agency fund.

The System also oversees two other plans: the Mississippi Government Employees' Deferred Compensation Plan & Trust (MDC), which is a voluntary supplemental retirement savings plan, and the Optional Retirement Plan (ORP), which is offered as an alternative to PERS to certain employees of the state's institutions of higher learning. As explained in Note 2 to the basic financial statements, MDC and ORP are not part of the System's reporting entity. The System's funds, with the exception of MDC and ORP, are defined as pension (and other employee benefit) trust funds, which are fiduciary in nature. Throughout this discussion and analysis, units of measure (i.e., billions, millions, and thousands) are approximate, being rounded up or down to the nearest tenth of the respective unit value.

Overview of the Financial Statements

This discussion and analysis is intended to serve as an introduction to the System's financial
 reporting, which is comprised of the following components:

- 1. Basic financial statements
- 2. Notes to the basic financial statements
- 3. Required supplementary information
- 4. Other supplementary schedules

Collectively, this information presents the net position restricted for pension benefits for each of the funds administered by the System as of June 30, 2018. This financial information also summarizes changes in net position restricted for pension benefits for the year then ended. The information in each of these components is briefly summarized as follows:

1. BASIC FINANCIAL STATEMENTS

The June 30, 2018, financial statements are presented for the fiduciary funds administered by the System. Fiduciary funds are used to account for resources held for the benefit of parties outside of the System. Fiduciary funds include pension trust funds such as PERS, MHSPRS, MRS, and SLRP, as well as an agency fund, the FBCP. A Statement of Fiduciary Net Position and a Statement of Changes in Fiduciary Net Position are presented for the fiduciary funds as of and for the year ended June 30, 2018. These financial statements reflect the resources available to pay benefits to members, including retirees and beneficiaries, as of year end, as well as the changes in those resources during the year.

Financial Highlights

The combined net position of the defined benefit plans administered by the System increased by \$1.2 billion, or 4.5 percent. This increase was primarily the result of investment performance for 2018.

The 2018 rate of return on investments for the defined benefit plans was 9.48 percent, compared with fiscal year 2017's rate of return of 14.96 percent. Domestic, international, and global equity portfolios returned 14.8 percent, 7.0 percent, and 13.3 percent, respectively, for the year, while the return on debt securities was 0.8 percent. The rate of return on real estate investments was 8.9 percent, and the return on the private equity portfolio was 16.7 percent. The PERS, MHSPRS, and SLRP defined benefit plans administered by the System had a Net Pension Liability of \$16.6 billion, \$173.3 million, and \$3.3 million, respectively. The ratio of fiduciary net position to total pension liability was 62.5 percent, 67.2 percent, and 84.7 percent, respectively.

2. NOTES TO THE BASIC FINANCIAL STATEMENTS

The notes to the financial statements provide additional information essential to a full understanding of the data provided in the basic financial statements. Information in the notes to the basic financial statements is described as follows:

- » Note 1 provides a general description of the System, as well as a concise description of each of the funds administered by the System. Information regarding employer and member participation in the pension plans administered by the System also is provided.
- » Note 2 provides a summary of significant accounting policies, including the basis of accounting for each fund type, management's use of estimates, and other significant accounting policies.
- » Note 3 describes investments, including investing authority and policies, investment risk discussion and additional information about cash, securities lending, fair value measurement, and derivatives.
- » Note 4 provides a summary of the capital assets of the System, including depreciation and net holding amounts.
- » Note 5 provides information about the net pension liability of employers in the defined benefit plans administered by the System.
- » Note 6 provides information about contributions to the defined benefit plans administered by the System.
- » Note 7 provides information about System employees as members of PERS.
- » Note 8 provides information regarding GASB Statement 75, *Accounting and Financial Reporting for Postemployment Benefits Other Than Pensions.*

3. REQUIRED SUPPLEMENTARY INFORMATION

The required supplementary information consists of the schedule of changes in the net pension liability and related ratios, schedules of employer contributions, the schedule of investment returns, and related notes concerning accounting and financial reporting information for the defined benefit pension plans administered by the System.

4. OTHER SUPPLEMENTARY SCHEDULES

Other schedules include detailed information on administrative expenses incurred by the System, investment and other professional service expenses incurred, as well as the balances due to individual municipal retirement plans. Also included is the statement of changes for the FBCP.

Financial Analysis of the Systems: Defined Benefit Plans

INVESTMENTS

The investment assets of the defined benefit plans administered by the System are combined in a commingled investment pool as authorized by state statute. Each plan owns an equity position in the pool and receives a proportionate investment allocation of income or loss from the pool in accordance with its respective ownership percentage. Each plan's allocated share of each type of investment in the pool is shown in the Statement of Fiduciary Net Position. Investment gains or losses are reported in the Statement of Changes in Fiduciary Net Position. The rate of return on investments is therefore approximately the same for each of the plans.

TOTAL SYSTEM INVESTMENTS

At June 30, 2018, the System's total investments, before securities lending activities, approximated \$28.3 billion, an increase of \$1.7 billion from fiscal year 2017. The combined investment portfolio experienced a return of 9.48 percent compared with a median large public plan, which is Callan Associates Public Funds > \$10 billion median, return of 8.9 percent. Investment results over time compared with the System's benchmarks are presented on page 89 in the Investment Section.

SHORT-TERM SECURITIES

At June 30, 2018, the System held \$860 million in short-term investments, which is an increase of \$557 million from 2017 holdings. Short-term investments returned 1.4 percent for the year.

DEBT SECURITIES

At June 30, 2018, the System held \$5.6 billion in debt securities, an increase of \$602 million over fiscal year 2017. Debt securities returned 0.8 percent compared with the System's custom benchmark return of 0.0 percent.

EQUITY SECURITIES

At June 30, 2018, the System held \$16.9 billion in US, international, and global equity securities, an increase of \$72 million from fiscal year 2017. US, international, and global equity securities had returns of 14.8 percent, 7.0 percent, and 13.3 percent, respectively. The System's custom benchmark return for domestic equity securities was 15.0 percent, while the international securities custom benchmark returned 8.4 percent. The global securities custom benchmark used by the System posted a return of 11.1 percent.

PRIVATE EQUITY

The private equity asset class, totaling \$2.1 billion, posted a return of 16.7 percent. Private equities are investments in operating companies, typically accessed through limited partnerships, which provide a differentiated return stream and diversification. This asset class is generally managed for long-term gains, where returns and asset value take time to develop. The System's benchmark return was 17.4 percent. The System began investing in private equities in fiscal year 2008.

REAL ESTATE

The real estate portfolio is divided between core commingled and value-added fund investments that directly invest in properties. The System also invests in managed portfolios of Real Estate Investment Trusts (REITs), which are exchange-traded securities that provide indirect exposure to real estate properties and real estate management companies. At June 30, 2018, combined holdings totaled \$2.8 billion, an increase of \$204 million over 2017. The System's real estate portfolio experienced a return of 8.9 percent on the total real estate portfolio. The System's benchmark saw a return of 7.2 percent for the year ended June 30, 2018.

SECURITIES LENDING

The System earns additional investment income by lending investment securities to broker-dealers. This is done on a pooled basis by the System's custodial bank, Bank of New York Mellon (BNYM). The broker-dealers provide collateral to BNYM and generally use the borrowed securities to cover short sales and failed trades for their clients. BNYM invests cash collateral to earn interest. For the 2018 fiscal year, net securities lending income to the System amounted to \$17.2 million, a decrease of \$5.2 million from fiscal year 2017.

DEFINED BENEFIT PLANS INVESTMENT RATES OF RETURN BY INVESTMENT TYPE - FISCAL YEAR 2018 -



Analysis of Individual Systems



PUBLIC EMPLOYEES' RETIREMENT SYSTEM

PERS is a defined benefit cost-sharing plan that provides retirement benefits to all eligible state of Mississippi public employees, public education employees, other public employees whose employers have elected to participate, and elected members of the state Legislature and President of the Senate. Benefits of the plan are funded by member and employer contributions and by earnings on investments. Net position restricted for pension benefits at June 30, 2018, amounted to \$27.8 billion, an increase of \$1.2 billion (4.6 percent) compared to June 30, 2017.

Additions to PERS' net position restricted for benefits include employer and member contributions and investment income. For the 2018 fiscal year, employer and member contributions were \$1.6 billion and were consistent with the prior year. PERS recognized net investment income of \$2.4 billion for the 2018 fiscal year, compared with net investment income of \$3.4 billion for the 2017 fiscal year.

Deductions from PERS' net position restricted for pension benefits primarily include retirement and beneficiary benefits, as well as administrative expenses. For the 2018 fiscal year, benefit payments amounted to \$2.6 billion, an increase of \$132.0 million (5.3 percent) over the 2017 fiscal year. The increase in benefit payments was due to an increase in the number of benefit recipients. For the 2018 fiscal year, the cost of administering the System amounted to \$16.9 million.

At June 30, 2018, PERS employers' total pension liability was \$44.4 billion. The plan fiduciary net position was \$27.8 billion, resulting in a net pension liability of \$16.6 billion. The plan fiduciary net position as a percentage of the total pension liability was 62.5 percent using Governmental Accounting Standards Board (GASB) Statement No. 67, *Financial Reporting for Pension Plans*, measurements.

MISSISSIPPI HIGHWAY SAFETY PATROL RETIREMENT SYSTEM

MHSPRS provides retirement benefits to sworn officers of the Mississippi Highway Safety Patrol. Benefits of the plan are funded by member and employer contributions and by earnings on investments. MHSPRS' net position restricted for pension benefits at June 30, 2018, amounted to \$354.2 million, an increase of \$12.5 million (3.6 percent) from \$341.7 million at June 30, 2017.

Additions to MHSPRS' net position restricted for pension benefits include employer and member contributions and investment income. For the 2018 fiscal year, employer and member contributions were \$17.4 million, an increase of \$443 thousand (2.6 percent) over 2017. Motor vehicle fees of \$2.9 million and driver's license reinstatement fees of \$634 thousand were added to 2018 employer contributions. MHSPRS recognized net investment income of \$27.7 million for the 2018 fiscal year compared with net investment income of \$44.5 million for 2017.

Deductions from MHSPRS' net position restricted for pension benefits primarily include retirement and beneficiary benefits and administrative fees. For the 2018 fiscal year, benefit payments amounted to \$32.3 million, an increase of \$1.3 million (4.2 percent) over the 2017 fiscal year. Although the number of retirees remained relatively constant, some newly retired members had higher benefits than those who were deceased during the period. For the 2018 fiscal year, MHSPRS transferred \$250 thousand to PERS to offset the cost of administration, an increase of \$47 thousand (23.2 percent) over 2017.

At June 30, 2018, MHSPRS employers' total pension liability was \$527.4 million. The plan fiduciary net position was \$354.2 million, resulting in a net pension liability of \$173.3 million. The plan fiduciary net position as a percentage of the total pension liability was 67.2 percent using GASB Statement No. 67 measurements.

MUNICIPAL RETIREMENT SYSTEMS

Two municipal retirement plans and 17 fire and police disability and relief plans comprise MRS, all of which are closed to new members. Seventeen of these separate plans provide retirement benefits to municipal employees, fire fighters, and police officers who were not already members of PERS and who were hired prior to July 1, 1976. Membership in the other two plans was extended until July 1, 1987. All active employees have retired from 14 of the municipal plans. The financial positions of MRS plans have been aggregated for financial reporting purposes. Individual plan information is included with the specific municipality's annual financial report. Benefits of MRS are funded by employer and member contributions and by earnings on investments. The aggregated plan's net position restricted for pension benefits at June 30, 2018, amounted to \$154.3 million, a decrease of \$4.3 million (2.7 percent) from \$158.6 million at June 30, 2017.

Additions to MRS' net position restricted for pension benefits consist of employer and member contributions and investment income. For the 2018 fiscal year, employer and member contributions of \$17.6 million were \$128 thousand (0.1 percent) less than contributions of \$17.8 million received in fiscal year 2017. MRS employer contributions are funded through taxes levied on assessed properties. In a closed plan, the number of active members decreases as they retire and the number of retirees decreases due to mortality. These factors lead to both lower total contributions and lower total benefits. MRS recognized net investment income of \$12.0 million for the 2018 fiscal year compared with net investment income of \$20.6 million for the 2017 fiscal year.

Deductions from MRS' net position restricted for pension benefits include retirement and beneficiary benefits and administrative fees. For the 2018 fiscal year, benefit payments amounted to \$33.6 million, a decrease of \$466 thousand (1.4 percent) from the 2017 fiscal year. For the 2018 fiscal year, MRS transferred \$353 thousand to PERS to offset the cost of administration, compared to \$355 thousand transferred for fiscal year 2017.

Under the provisions of GASB Statement No. 67, agent multiple employer plans such as MRS apply the measurements and recognition of net pension liability at the individual plan level for each municipal and fire and police retirement plan administered. Therefore, aggregate information for MRS related to the net pension liability has not been presented.

SUPPLEMENTAL LEGISLATIVE RETIREMENT PLAN

SLRP provides supplemental retirement benefits to all elected members of the state Legislature and President of the Senate. Benefits of the plan are funded by member and employer contributions and by earnings on investments. The plan's net position restricted for pension benefits at June 30, 2018, amounted to \$18.0 million, an increase of \$694 thousand (4.0 percent) from June 30, 2017.

Additions to SLRP's net position restricted for pension benefits include employer and member contributions and investment income. For the 2018 fiscal year, employer and member contributions were \$720 thousand, a decrease of \$14 thousand (1.9 percent) from those of fiscal year 2017. SLRP recognized net investment income of \$1.4 million for the 2018 fiscal year, compared with a net investment income of \$2.3 million for the 2017 fiscal year.

Deductions from SLRP's net position restricted for pension benefits primarily include retirement and beneficiary benefits, as well as administrative fees. For the 2018 fiscal year, benefit payments amounted to \$1.4 million and were consistent with the prior year. For the 2018 fiscal year, SLRP transferred \$10 thousand to PERS to offset the cost of administration, the same amount as for fiscal year 2017.

At June 30, 2018, the SLRP employers' total pension liability was \$21.3 million. The plan fiduciary net position was \$18.0 million, resulting in a net pension liability of \$3.3 million. The plan fiduciary net position as a percentage of the total pension liability was 84.7 percent using GASB Statement No. 67 measurements.

NET POSITION—DEFINED BENEFIT PLANS - JUNE 30, 2018 -

[in thousands]

	PERS		MH	MHSPRS MRS		IRS	
Assets:	2018	2017	2018	2017	2018	2017	
CASH, CASH EQUIVALENTS, & RECEIVABLES	\$1,344,483	\$1,367,302	\$16,108	\$16,715	\$7,459	\$8,072	
INVESTMENTS AT FAIR VALUE	27,752,380	26,081,868	355,406	337,000	154,394	156,040	
INVESTED SECURITIES LENDING COLLATERAL	3,467,997	2,902,799	40,382	37,590	17,542	17,405	
CAPITAL ASSETS	22,455	26,865	-	-	-	-	
TOTAL ASSETS	32,587,315	30,378,834	411,896	391,305	179,395	181,517	
Liabilities:							
INVESTMENT ACCOUNTS & OTHER PAYABLES	1,428,953	937,471	18,194	12,054	7,931	5,569	
SECURITIES LENDING LIABILITY	3,395,172	2,898,266	39,533	37,532	17,174	17,378	
TOTAL LIABILITIES	4,824,125	3,835,737	57,727	49,586	25,105	22,947	
TOTAL NET POSITION	\$27,763,190	\$26,543,097	\$354,169	\$341,719	\$154,290	\$158,570	

CHANGES IN NET POSITION—DEFINED BENEFIT PLANS - YEAR ENDED JUNE 30, 2018 -

[in thousands]

	PE	RS	MHS	SPRS	MF	RS
Additions:	2018	2017	2018	2017	2018	2017
CONTRIBUTIONS	\$1,588,970	\$1,589,150	\$17,399	\$16,956	\$17,635	\$17,763
INVESTMENT INCOME	2,385,913	3,436,144	27,719	44,499	12,042	20,605
OTHER ADDITIONS	664	604	-	-	-	-
TOTAL ADDITIONS	3,975,547	5,025,898	45,118	61,455	29,677	38,368
Deductions:						
PENSION BENEFITS	2,609,415	2,477,914	32,315	31,001	33,604	34,070
REFUNDS	124,306	113,707	103	144	-	-
ADMINISTRATIVE & OTHER DEDUCTIONS	21,733	26,196	250	203	353	355
TOTAL DEDUCTIONS	2,755,454	2,617,817	32,668	31,348	33,957	34,425
INCREASE/(DECREASE) IN NET POSITION	\$1,220,093	\$2,408,081	\$12,450	\$30,107	\$(4,280)	\$3,943

NET POSITION—DEFINED BENEFIT PLANS (CONTINUED) - JUNE 30, 2018 -

[in thousands]

	SLRP		ELIMINA	rions	TOTAL DEFIN PENSION		TOTAL PERCENT CHANGE
Assets:	2018	2017	2018	2017	2018	2017	
CASH, CASH EQUIVALENTS, & RECEIVABLES	\$798	\$819	\$-	\$-	\$1,368,848	\$1,392,908	(1.73)%
INVESTMENTS AT FAIR VALUE	18,123	17,140	-	-	28,280,303	26,592,048	6.35
INVESTED SECURITIES LENDING COLLATERAL	2,059	1,912	-	-	3,527,980	2,959,706	19.20
CAPITAL ASSETS	-	-	-	-	22,455	26,865	(16.42)
TOTAL ASSETS	20,980	19,871	-	-	33,199,586	30,971,527	7.19
Liabilities:							
INVESTMENT ACCOUNTS & OTHER PAYABLES	928	620	-	-	1,456,006	955,714	52.35
SECURITIES LENDING LIABILITY	2,016	1,909	-	-	3,453,895	2,955,085	16.88
TOTAL LIABILITIES	2,944	2,529	-	-	4,909,901	3,910,799	25.55
TOTAL NET POSITION	\$18,036	\$17,342	\$-	\$-	\$28,289,685	\$27,060,728	4.54%

CHANGES IN NET POSITION—DEFINED BENEFIT PLANS (CONTINUED) - YEAR ENDED JUNE 30, 2018 -

[i	n thousands]					
	SLRP		ELIMIN	IATIONS		NED BENEFIT N PLANS	TOTAL PERCENT CHANGE
Additions:	2018	2017	2018	2017	2018	2017	
CONTRIBUTIONS	\$720	\$734	\$-	\$-	\$1,624,724	\$1,624,603	0.01%
INVESTMENT INCOME	1,412	2,264	-	-	2,427,086	3,503,512	(30.72)
OTHER ADDITIONS	-	-	(613)	(568)	51	36	41.67
TOTAL ADDITIONS	2,132	2,998	(613)	(568)	4,051,861	5,128,151	(20.99)
Deductions:							
PENSION BENEFITS	1,410	1,397	-	-	2,676,744	2,544,382	5.20
REFUNDS	18	17	-	-	124,427	113,868	9.27
ADMINISTRATIVE & OTHER DEDUCTIONS	10	10	(613)	(568)	21,733	26,196	(17.04)
TOTAL DEDUCTIONS	1,438	1,424	(613)	(568)	2,822,904	2,684,446	5.16
INCREASE/(DECREASE) IN NET POSITION	\$694	\$1,574	\$-	\$-	\$1,228,957	\$2,443,705	(49.71)%

REQUESTS FOR INFORMATION

This financial report is designed to provide a general overview of the finances of the System. Questions concerning any of the information provided in this report or requests for additional financial information should be addressed to:

Public Employees' Retirement System of Mississippi Accounting Department 429 Mississippi Street Jackson, MS 39201-1005

PUBLIC EMPLOYEES' RETIREMENT SYSTEM OF MISSISSIPPI STATEMENT OF FIDUCIARY NET POSITION - JUNE 30, 2018 -

[in thousands]

	PERS	MHSPRS	MRS	SLRP	
ASSETS					
CASH & CASH EQUIVALENTS	\$715,266	\$9,094	\$4,260	\$457	
Receivables:					
EMPLOYER	67,419	317	267	-	
MEMBER	37,710	-	2	-	
INVESTMENT PROCEEDS	427,821	5,479	2,380	279	
INTEREST & DIVIDENDS	95,148	1,218	529	62	
OTHER RECEIVABLES	1,119	-	21	-	
TOTAL RECEIVABLES	629,217	7,014	3,199	341	
Investments, at Fair Value:					
SHORT-TERM INVESTMENTS	843,728	10,805	4,694	551	
LONG-TERM DEBT SECURITIES	5,512,291	70,592	30,666	3,600	
EQUITY SECURITIES	16,604,151	212,638	92,373	10,843	
PRIVATE EQUITY	2,015,491	25,811	11,213	1,316	
REAL ESTATE INVESTMENTS	2,776,719	35,560	15,448	1,813	
TOTAL INVESTMENTS BEFORE LENDING ACTIVITIES	27,752,380	355,406	154,394	18,123	
Securities Lending:					
SHORT-TERM INVESTMENTS	1,049,175	12,217	5,307	623	
LONG-TERM DEBT SECURITIES	2,418,822	28,165	12,235	1,436	
TOTAL SECURITIES LENDING	3,467,997	40,382	17,542	2,059	
TOTAL INVESTMENTS	31,220,377	395,788	171,936	20,182	
CAPITAL ASSETS, AT COST, NET OF ACCUMULATED DEPRECIATION	22,455	-	-	-	
TOTAL ASSETS	32,587,315	411,896	179,395	20,980	
LIABILITIES					
ACCOUNTS PAYABLE & ACCRUED EXPENSES	1,428,953	18,194	7,931	928	
OBLIGATIONS UNDER SECURITIES LENDING	3,395,172	39,533	17,174	2,016	
FUNDS HELD FOR OTHERS	-	-	-	-	
TOTAL LIABILITIES			25.105	2044	
TO THE EIRDIETTIES	4,824,125	57,727	25,105	2,944	

The accompanying notes are an integral part of these basic financial statements.

PUBLIC EMPLOYEES' RETIREMENT SYSTEM OF MISSISSIPPI STATEMENT OF FIDUCIARY NET POSITION (CONTINUED) - JUNE 30, 2018 -

[in thousands]

ASSETS	TOTAL DEFINED BENEFIT PENSION PLANS	AGENCY FUNDS	TOTAL 2018
CASH & CASH EQUIVALENTS	\$729,077	\$23	\$729,100
Receivables:			
EMPLOYER	68,003	-	68,003
MEMBER	37,712	-	37,712
INVESTMENT PROCEEDS	435,959	-	435,959
INTEREST & DIVIDENDS	96,957	-	96,957
OTHER RECEIVABLES	1,140	-	1,140
TOTAL RECEIVABLES	639,771	-	639,771
Investments, at Fair Value:			
SHORT-TERM INVESTMENTS	859,778	-	859,778
LONG-TERM DEBT SECURITIES	5,617,149	-	5,617,149
EQUITY SECURITIES	16,920,005	-	16,920,005
PRIVATE EQUITY	2,053,831	-	2,053,831
REAL ESTATE INVESTMENTS	2,829,540	-	2,829,540
TOTAL INVESTMENTS BEFORE LENDING ACTIVITIES	28,280,303	-	28,280,303
Securities Lending:			
SHORT-TERM INVESTMENTS	1,067,322	-	1,067,322
LONG-TERM DEBT SECURITIES	2,460,658	-	2,460,658
TOTAL SECURITIES LENDING	3,527,980	-	3,527,980
TOTAL INVESTMENTS	31,808,283	-	31,808,283
CAPITAL ASSETS, AT COST, NET OF ACCUMULATED DEPRECIATION	22,455	-	22,455
TOTAL ASSETS	33,199,586	23	33,199,609
LIABILITIES			
ACCOUNTS PAYABLE & ACCRUED EXPENSES	1,456,006	15	1,456,021
OBLIGATIONS UNDER SECURITIES LENDING	3,453,895	-	3,453,895
FUNDS HELD FOR OTHERS	-	8	8
TOTAL LIABILITIES	4,909,901	23	4,909,924
NET POSITION RESTRICTED FOR PENSION BENEFITS	\$28,289,685	\$-	\$28,289,685

The accompanying notes are an integral part of these basic financial statements.

PUBLIC EMPLOYEES' RETIREMENT SYSTEM OF MISSISSIPPI STATEMENT OF CHANGES IN FIDUCIARY NET POSITION - FOR THE YEAR ENDED JUNE 30, 2018-

[in thousands]

	PERS	MHSPRS	MRS	SLRP	ELIMINATIONS	
A D D I T I O N S Contributions:						
EMPLOYER	\$1,018,163	\$15,128	\$17,610	\$513	\$-	
MEMBER	570,807	2,271	25	207	-	
TOTAL CONTRIBUTIONS	1,588,970	17,399	17,635	720	-	
Net Investment Income:						
NET APPRECIATION IN FAIR VALUE	1,912,575	22,269	9,674	1,136	-	
INTEREST & DIVIDENDS	560,148	6,460	2,806	329	-	
TOTAL BEFORE LENDING ACTIVITIES	2,472,723	28,729	12,480	1,465	-	
Securities Lending:						
NET DEPRECIATION IN FAIR VALUE	(2,839)	(33)	(14)	(2)	-	
INTEREST	64,549	752	327	38	-	
PROGRAM FEES	(44,851)	(522)	(227)	(27)	-	
NET INCOME FROM SECURITIES LENDING	16,859	197	86	9	-	
MANAGERS' FEES & TRADING COSTS	(103,669)	(1,207)	(524)	(62)	-	
NET INVESTMENT INCOME	2,385,913	27,719	12,042	1,412	-	
Other Additions:						
ADMINISTRATIVE FEES	613	-	-	-	(613)	
OTHER	51	-	-	-	-	
TOTAL OTHER ADDITIONS	664	-	-	-	(613)	
TOTAL ADDITIONS	3,975,547	45,118	29,677	2,132	(613)	
	3,975,547	45,118	29,677	2,132	(613)	
DEDUCTIONS					(613)	
	2,609,415	32,315	29,677 33,604	1,410	(613) - -	
D E D U C T I O N S RETIREMENT ANNUITIES	2,609,415 124,306	32,315 103	33,604	1,410 18	-	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES	2,609,415	32,315	33,604	1,410	-	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES TOTALS Administrative Expenses: PERSONAL SERVICES:	2,609,415 124,306	32,315 103	33,604	1,410 18	-	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES TOTALS Administrative Expenses: PERSONAL SERVICES: SALARIES, WAGES, & FRINGE BENEFITS PERSONAL SERVICES:	2,609,415 124,306 2,733,721	32,315 103	33,604	1,410 18	-	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES TOTALS Administrative Expenses: PERSONAL SERVICES: SALARIES, WAGES, & FRINGE BENEFITS	2,609,415 124,306 2,733,721 9,737	32,315 103	33,604	1,410 18	-	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES TOTALS Administrative Expenses: PERSONAL SERVICES: SALARIES, WAGES, & FRINGE BENEFITS PERSONAL SERVICES: TRAVEL & SUBSISTENCE	2,609,415 124,306 2,733,721 9,737 65	32,315 103	33,604	1,410 18	-	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES TOTALS Administrative Expenses: PERSONAL SERVICES: SALARIES, WAGES, & FRINGE BENEFITS PERSONAL SERVICES: TRAVEL & SUBSISTENCE CONTRACTUAL SERVICES	2,609,415 124,306 2,733,721 9,737 65 6,792	32,315 103	33,604	1,410 18	-	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES DOTALS Administrative Expenses: PERSONAL SERVICES: SALARIES, WAGES, & FRINGE BENEFITS PERSONAL SERVICES: TRAVEL & SUBSISTENCE CONTRACTUAL SERVICES	2,609,415 124,306 2,733,721 9,737 65 6,792 283	32,315 103 32,418 - - - - - -	33,604 - 33,604 - - - - -	1,410 18 1,428 - - - - -	- - - - - - - - -	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES TOTALS Administrative Expenses: PERSONAL SERVICES: SALARIES, WAGES, & FRINGE BENEFITS PERSONAL SERVICES: TRAVEL & SUBSISTENCE CONTRACTUAL SERVICES COMMODITIES	2,609,415 124,306 2,733,721 9,737 65 6,792 283 16,877	32,315 103 32,418 - - - - - - -	33,604 - 33,604 - - - - -	1,410 18 1,428 - - - - - -	- - - - - - - - -	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES DATALS Administrative Expenses: PERSONAL SERVICES: SALARIES, WAGES, & FRINGE BENEFITS PERSONAL SERVICES: TRAVEL & SUBSISTENCE CONTRACTUAL SERVICES COMMODITIES TOTAL ADMINISTRATIVE EXPENSES DEPRECIATION	2,609,415 124,306 2,733,721 9,737 65 6,792 283 16,877 4,856	32,315 103 32,418 - - - - - - - - - - - -	33,604 - 33,604 - - - - - - - - - - - - - - - - - - -	1,410 18 1,428 - - - - - - - - - -		
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES TOTALS Administrative Expenses: PERSONAL SERVICES: SALARIES, WAGES, & FRINGE BENEFITS PERSONAL SERVICES: TRAVEL & SUBSISTENCE CONTRACTUAL SERVICES COMMODITIES TOTAL ADMINISTRATIVE EXPENSES DEPRECIATION ADMINISTRATIVE FEES	2,609,415 124,306 2,733,721 9,737 65 6,792 283 16,877 4,856	32,315 103 32,418 - - - - - - - - - 250	33,604 - 33,604 - - - - - - - - - - 353	1,410 18 1,428 - - - - - - - 10	- - - - - - - - - - - - - - - - - - -	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES TOTALS Administrative Expenses: PERSONAL SERVICES: SALARIES, WAGES, & FRINGE BENEFITS PERSONAL SERVICES: TRAVEL & SUBSISTENCE CONTRACTUAL SERVICES COMMODITIES TOTAL ADMINISTRATIVE EXPENSES DEPRECIATION ADMINISTRATIVE FEES	2,609,415 124,306 2,733,721 9,737 65 6,792 283 16,877 4,856 2,755,454	32,315 103 32,418 - - - - - - 250 32,668	33,604 - 33,604 - - - - - - - 353 33,957	1,410 18 1,428 - - - - - - - 10 10 1,438	- - - - - - - - - - - - - - - - - - -	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES TOTALS Administrative Expenses: PERSONAL SERVICES: SALARIES, WAGES, & FRINGE BENEFITS PERSONAL SERVICES: TRAVEL & SUBSISTENCE CONTRACTUAL SERVICES COMMODITIES TOTAL ADMINISTRATIVE EXPENSES DEPRECIATION ADMINISTRATIVE FEES TOTAL DEDUCTIONS NET INCREASE/(DECREASE)	2,609,415 124,306 2,733,721 9,737 65 6,792 283 16,877 4,856 2,755,454	32,315 103 32,418 - - - - - - 250 32,668	33,604 - 33,604 - - - - - - - 353 33,957	1,410 18 1,428 - - - - - - - 10 10 1,438	- - - - - - - - - - - - - - - - - - -	
DEDUCTIONS RETIREMENT ANNUITIES REFUNDS TO TERMINATED EMPLOYEES TOTALS Administrative Expenses: PERSONAL SERVICES: SALARIES, WAGES, & FRINGE BENEFITS PERSONAL SERVICES: TRAVEL & SUBSISTENCE CONTRACTUAL SERVICES COMMODITIES TOTAL ADMINISTRATIVE EXPENSES DEPRECIATION ADMINISTRATIVE FEES TOTAL DEDUCTIONS NET INCREASE/(DECREASE) NET POSITION RESTRICTED FOR PENSION BENEFITS	2,609,415 124,306 2,733,721 9,737 65 6,792 283 16,877 4,856 2,755,454 1,220,093	32,315 103 32,418 - - - - - 250 32,668 12,450	33,604 - 33,604 - - - - 353 33,957 (4,280)	1,410 18 1,428 - - - - - 10 1,438 694	- - - - - - - - (613) (613) -	

The accompanying notes are an integral part of these basic financial statements.

PUBLIC EMPLOYEES' RETIREMENT SYSTEM OF MISSISSIPPI STATEMENT OF CHANGES IN FIDUCIARY NET POSITION (CONTINUED) - FOR THE YEAR ENDED JUNE 30, 2018-

[in thousands]

TOTAL DEFINED BENEFIT PENSION PLANS 2018

ADDITIONS

	Contributions:
\$1,051,414	EMPLOYER
573,310	MEMBER
1,624,724	TOTAL CONTRIBUTIONS
	Net Investment Income:
1,945,654	NET APPRECIATION IN FAIR VALUE
569,743	INTEREST & DIVIDENDS
2,515,397	TOTAL BEFORE LENDING ACTIVITIES
	Securities Lending:
(2,888)	NET DEPRECIATION IN FAIR VALUE
65,666	INTEREST
(45,627)	PROGRAM FEES
17,151	NET INCOME FROM SECURITIES LENDING
(105,462)	MANAGERS' FEES & TRADING COSTS
2,427,086	NET INVESTMENT INCOME
	Other Additions:
-	ADMINISTRATIVE FEES
51	OTHER
51	TOTAL OTHER ADDITIONS
4,051,861	TOTAL ADDITIONS
	DEDUCTIONS
2,676,744	RETIREMENT ANNUITIES
124,427	REFUNDS TO TERMINATED EMPLOYEES
2,801,171	TOTALS
	Administrative Expenses: PERSONAL SERVICES:
9,737	SALARIES, WAGES, & FRINGE BENEFITS
65	PERSONAL SERVICES: TRAVEL & SUBSISTENCE
6,792	CONTRACTUAL SERVICES
6,792 283	CONTRACTUAL SERVICES COMMODITIES
283	COMMODITIES
283 16,877	COMMODITIES TOTAL ADMINISTRATIVE EXPENSES
283 16,877	COMMODITIES TOTAL ADMINISTRATIVE EXPENSES DEPRECIATION
283 16,877 4,856	COMMODITIES TOTAL ADMINISTRATIVE EXPENSES DEPRECIATION ADMINISTRATIVE FEES
283 16,877 4,856 - 2,822,904	COMMODITIES TOTAL ADMINISTRATIVE EXPENSES DEPRECIATION ADMINISTRATIVE FEES TOTAL DEDUCTIONS
283 16,877 4,856 - 2,822,904	COMMODITIES TOTAL ADMINISTRATIVE EXPENSES DEPRECIATION ADMINISTRATIVE FEES TOTAL DEDUCTIONS NET INCREASE/(DECREASE) NET POSITION RESTRICTED
283 16,877 4,856 - 2,822,904 1,228,957	COMMODITIES TOTAL ADMINISTRATIVE EXPENSES DEPRECIATION ADMINISTRATIVE FEES TOTAL DEDUCTIONS NET INCREASE/(DECREASE) NET POSITION RESTRICTED FOR PENSION BENEFITS

The accompanying notes are an integral part of these basic financial statements.

Public Employees' Retirement System of Mississippi Notes to Basic Financial Statements JUNE 30, 2018

Note 1: Plan Description

GENERAL

The Public Employees' Retirement System of Mississippi (System) is the administrator of five fiduciary funds, of which four are pension trust funds and one an agency fund, as listed below. The System also oversees the Mississippi Deferred Compensation Plan & Trust and the Optional Retirement Plan, but as explained in Note 2, these plans are not part of the System's reporting entity.

PLAN NAME

PUBLIC EMPLOYEES' RETIREMENT SYSTEM OF MISSISSIPPI (PERS) MISSISSIPPI HIGHWAY SAFETY PATROL RETIREMENT SYSTEM (MHSPRS) MUNICIPAL RETIREMENT SYSTEMS AND FIRE AND POLICE DISABILITY AND RELIEF FUND (MRS)* SUPPLEMENTAL LEGISLATIVE RETIREMENT PLAN (SLRP) FLEXIBLE BENEFITS CAFETERIA PLAN (FBCP)

Cost-sharing multiple-employer defined benefit pension plan Single-employer defined benefit pension plan Agent multiple-employer defined benefit pension plan Single-employer defined benefit pension plan Agency

TYPE OF PLAN

*Closed to new members

The System's purpose is to provide pension benefits for all state and public education employees, sworn officers of the Mississippi Highway Safety Patrol, other public employees whose employers have elected to participate in the System, and elected members of the state Legislature and the President of the Senate. The System is administered by a 10-member Board of Trustees that includes the state Treasurer; one gubernatorial appointee who is a member of PERS; two state employees; two PERS retirees; and one representative each from public schools and community colleges, state universities, municipalities, and counties. With the exception of the state Treasurer and the gubernatorial appointee, all members are elected to staggered six-year terms by the constitutents they represent. A summary of participating employers and members follows:

SUMMARY OF PARTICIPATING EMPLOYERS AND MEMBERS

Employers:	PERS	MHSPRS*	MRS	SLRP**	TOTAL
STATE AGENCIES	107	1	-	1	109
STATE UNIVERSITIES	9	-	-	-	9
PUBLIC SCHOOLS	143	-	-	-	143
COMMUNITY/JUNIOR COLLEGES	15	-	-	-	15
COUNTIES	82	-	-	-	82
MUNICIPALITIES	242	-	17	-	259
OTHER POLITICAL SUBDIVISIONS	260	-	-	-	260
TOTAL EMPLOYERS	858	1	17	1	877
Members:					
ACTIVE VESTED	78,715	406	4	113	79,238
ACTIVE NONVESTED	71,972	105	-	61	72,138
TOTAL ACTIVE MEMBERS	150,687	511	4	174	151,376
INACTIVE VESTED	16,578	40	-	38	16,656
INACTIVE NONVESTED	52,763	15	-	17	52,795
TOTAL INACTIVE MEMBERS	69,341	55	-	55	69,451
RETIREES & BENEFICIARIES	104,973	725	1,694	207	107,599
TOTAL RETIRED/INACTIVE MEMBERS	174,314	780	1,694	262	177,050
TOTAL MEMBERS	325,001	1,291	1,698	436	328,426
Active Members by Employer:					
STATE AGENCIES	27,383	511	-	174	28,068
STATE UNIVERSITIES	17,599	-	-	-	17,599
PUBLIC SCHOOLS	60,952	-	-	-	60,952
COMMUNITY/JUNIOR COLLEGES	6,076	-	-	-	6,076
COUNTIES	13,741	-	-	-	13,741
MUNICIPALITIES	16,168	-	4	-	16,172
OTHER POLITICAL SUBDIVISIONS	8,768	-	-	-	8,768
TOTAL ACTIVE MEMBERS	150,687	511	4	174	151,376

*MHSPRS has two reporting entities. **SLRP has five reporting entities.

MEMBERSHIP AND BENEFIT PROVISIONS

(1) Public Employees' Retirement System of Mississippi

Membership in PERS is a condition of employment granted upon hiring for qualifying employees and officials of the state of Mississippi (the State), state universities, community and junior colleges, and teachers and employees of the public school districts. For those persons employed by political subdivisions and instrumentalities of the State, membership is contingent upon approval of the entity's participation in PERS by the System's Board of Trustees. If approved, membership for the entity's employees is a condition of employment and eligibility is granted to those who qualify upon hiring. Members and employers are statutorily required to contribute certain percentages of salaries and wages as specified by the Board of Trustees. A member who terminates employment from all covered employers and who is not eligible to receive monthly retirement benefits may request a full refund of his or her accumulated member contributions plus interest. Upon withdrawal of contributions, a member forfeits service credit represented by those contributions.

Participating members who are vested and retire at or after age 60 or those who retire regardless of age with at least 30 years of creditable service (25 years of creditable service for employees who became members of PERS before July 1, 2011) are entitled, upon application, to an annual retirement allowance payable monthly for life in an amount equal to 2.0 percent of their average compensation for each year of creditable service up to and including 30 years (25 years for those who became members of PERS before July 1, 2011), plus 2.5 percent for each additional year of creditable service with an actuarial reduction in the benefit for each year of creditable service below 30 years or the number of years in age that the member is below 65, whichever is less. Average compensation is the average of the employee's earnings during the four highest compensated years of creditable service. A member may elect a reduced retirement allowance payable for life with the provision that, after death, a beneficiary receives benefits for life or for a specified number of years. Benefits vest upon completion of eight years of membership service (four years of membership service for those who became members of PERS before July 1, 2007). PERS also provides certain death and disability benefits. In the event of death prior to retirement of any member whose spouse and/or children are not entitled to a retirement allowance, the deceased member's accumulated contributions and interest are paid to the designated beneficiary.

A Cost-of-Living Adjustment (COLA) payment is made to eligible retirees and beneficiaries. The COLA is equal to 3.0 percent of the annual retirement allowance for each full fiscal year of retirement up to the year in which the retired member reaches age 60 (55 for those who became members of PERS before July 1, 2011), with 3.0 percent compounded for each fiscal year thereafter. For the year ended June 30, 2018, the total COLA payments for PERS were \$650,465,578.

Plan provisions and the Board of Trustees' authority to determine contribution rates are established by Miss. Code Ann. § 25-11-1 et seq., (1972, as amended) and may be amended only by the Mississippi Legislature.

(2) Mississippi Highway Safety Patrol Retirement System

Membership in MHSPRS is a condition of employment granted upon hiring for all officers of the Mississippi Highway Safety Patrol who have completed a course of instruction in an authorized highway patrol training school on general law enforcement and who serve as sworn officers of the highway patrol in the enforcement of the laws of the state of Mississippi. Members and employers are statutorily required to contribute certain percentages of salaries and wages as specified by the Administrative Board of MHSPRS. Participating members who withdraw from service at or after age 55 with at least five years of membership service, or after reaching age 45 with at least 20 years of creditable service, or with 25 years of service at any age, are entitled, upon application, to an annual retirement allowance payable monthly for life in an amount equal to 2.5 percent of average compensation during the four highest consecutive years of earnings, with an actuarial reduction in the benefit for each year below age 55 or for

each year under 25 years of service, whichever is less. MHSPRS also provides certain death and disability benefits. In the event of death prior to retirement of any member whose spouse and/ or children are not entitled to a retirement allowance, the deceased member's accumulated contributions and interest are paid to the designated beneficiary. A member who terminates employment from the highway patrol and who is not eligible to receive monthly retirement benefits may request a full refund of his or her accumulated employee contributions plus interest. Upon withdrawal of contributions, a member forfeits service credit represented by those contributions.

A COLA payment is made to eligible retirees and beneficiaries. The COLA is equal to 3.0 percent of the annual retirement allowance for each full fiscal year of retirement up to the year in which the retired member reaches age 60, with 3.0 percent compounded for each fiscal year thereafter. For the year ended June 30, 2018, the total COLA payments for MHSPRS were \$9,979,884.

Plan provisions and the Administrative Board's authority to determine contribution rates for MHSPRS are established by Miss. Code Ann. § 25-13-1 et seq., (1972, as amended) and may be amended only by the Mississippi Legislature.

(3) Municipal Retirement Systems

Membership in the two general municipal employee plans and the 17 fire and police disability and relief systems under MRS was granted to all municipal employees, fire fighters, and police officers who were not already members of PERS and who were hired prior to July 1, 1976. Two fire and police plans elected to extend the eligibility period for membership to July 1, 1987. All MRS plans were closed to new members by July 1, 1987. Eligible employees hired after July 1, 1987, automatically become members of PERS. Members covered by MRS are required to contribute varying amounts of their salary, depending on the actuarial soundness of their respective plans. Each employee contributes the remaining amounts necessary to finance participation of its own employees in MRS.

Regardless of age, participating employees who retire with at least 20 years of membership service are entitled to an annual retirement allowance payable monthly for life in an amount equal to 50.0 percent of their average monthly compensation and to an additional 1.7 percent for each year of creditable service beyond 20 years, not to exceed 66.67 percent of average monthly compensation, except as may otherwise be provided through local and private legislation. Average monthly compensation for the MRS plans is the monthly average for the last six months of service. Certain participating employers provide a minimum monthly retirement allowance. Benefits vest upon reaching 20 years of membership service. MRS plans also provide certain death and disability benefits. Members who terminate employment from all covered employers and are not eligible to receive monthly retirement benefits may request a full refund of employee contributions. Members covered by MRS do not receive interest on their accumulated contributions. Upon withdrawal of contributions, a member forfeits service credit represented by those contributions.

The retirees and beneficiaries of MRS plans with provisions for COLAs who are receiving a retirement allowance on July 1 of each fiscal year may be entitled to a COLA. This payment is equal to the annual percentage change of the Consumer Price Index (CPI) but not to exceed 2.5 percent of the annual retirement allowance for each full fiscal year of retirement. Certain MRS plans may adopt a COLA other than one linked to the change in the CPI. These additional payments will be made only when funded by the employers. For the year ended June 30, 2018, the total COLAs for MRS plans were \$5,522,317.

Plan provisions are established by Miss. Code Ann. § 21-29-1 et seq., Articles 1, 3, 5, and 7, (1972, as amended), and annual local and private legislation. Statutes may be amended only by the Mississippi Legislature.

(4) Supplemental Legislative Retirement Plan

Membership in SLRP is composed of all elected members of the state Legislature and the President of the Senate. This plan is designed to supplement the provisions of PERS. Those serving when SLRP became effective July 1, 1989, had 30 days to waive membership in SLRP. Those elected after July 1, 1989, automatically become members of SLRP. Members and employers are statutorily required to contribute certain percentages of salaries and wages as specified by the Board of Trustees.

The retirement allowance is 50.0 percent of an amount equal to the retirement allowance payable by PERS, determined by creditable service as an elected senator or representative in the state Legislature or as President of the Senate. Benefits vest upon completion of the requisite number of membership service years in PERS. SLRP also provides certain death and disability benefits. In the event of death prior to retirement of any member whose spouse and/or children are not entitled to a retirement allowance, the deceased member's accumulated contributions and interest are paid to the designated beneficiary. A member who terminates legislative employment and who is not eligible to receive monthly retirement benefits may request a full refund of his or her accumulated employee contributions plus interest. Upon withdrawal of contributions, a member forfeits service credit represented by those contributions.

Retirees and beneficiaries of SLRP may receive COLAs calculated identically to PERS retirees and beneficiaries. For the year ended June 30, 2018, the total COLAs for SLRP were \$322,893.

Plan provisions and the Board of Trustees' authority to determine contribution rates for SLRP are established by Miss. Code Ann. § 25-11-301 et seq., (1972, as amended) and may be amended only by the Mississippi Legislature.

(5) Flexible Benefits Cafeteria Plan—Agency Fund

Miss. Code Ann. § 25-17-3 (1972, as amended) authorizes any state agency to adopt a benefit plan that meets the requirements of a cafeteria plan as defined in § 1-25 et seq. of the Internal Revenue Code of 1954, and regulations there under, for the benefit of eligible employees and their dependents. The FBCP was established as an agency fund to account for transactions related to those employees of the System who participate in the cafeteria plan.

(6) Annual Budget

Annual budgets are legally adopted for the administrative expenditure portion of the System's operations and are funded by earnings of the System. Our operating budget request for the upcoming fiscal year is prepared in conjunction with a review of our strategic long-range plan. A budget request is approved by the Board of Trustees and submitted to the state Legislature, which legally enacts the budget in the form of an appropriation bill during the subsequent legislative session. Changes may be made in budget categories, consistent with legislative authority, with approval of the Mississippi Department of Finance and Administration.

Note 2: Summary of Significant Accounting Policies

FINANCIAL REPORTING ENTITY

The reporting entity for the System consists of four defined benefit pension trust funds and one agency fund. The defined benefit pension trust funds are PERS, MHSPRS, MRS, and SLRP. These financial statements are included in the financial statements of the state of Mississippi. The agency fund is the FBCP. Defined benefit pension trust fund plans of the System are included in the System's reporting entity due to their financial relationships. Although the plans are legally separate within the System, they are reported as if they were part of the System because the governing boards of each are substantially identical. The System is considered a component unit of the state of Mississippi reporting entity in accordance with Governmental Accounting Standards Board (GASB) 14, *The Financial Reporting Entity*, as amended by GASB 39 and GASB 61.

MDC is a savings plan organized in accordance with IRC § 457 and is established or may be amended under Miss. Code Ann. § 25-14-1 et seq. Eligible participants are any persons – whether appointed, elected, or under contract – providing services for the state, state agencies, counties, municipalities, or other political subdivisions for which compensation is paid. The plan permits participants to defer a portion of their income. Participants self-direct investment of their savings through selections from a group of funds managed by professional investment managers. In 2014, the System contracted with Great West Life and Annuity Insurance Company - Empower, a third-party administrator for MDC. Because of the change in administration, MDC is no longer considered part of the System's financial reporting entity.

Membership of ORP is composed of teachers and administrators of institutions of higher learning appointed or employed on or after July 1, 1990, who elect to participate in ORP and reject membership in PERS. Title 25, Article 11 of the Mississippi Code states that the Board of Trustees of the System will provide for administration of the ORP program. ORP is not considered part of the System's financial reporting entity.

MDC and ORP participants direct the investment of their funds among investment managers and vendors. Benefits payable to participants of MDC and ORP are not obligations of the state of Mississippi. Such benefits and other rights of participants or their beneficiaries are the liability of the managers and vendors and are governed solely by the terms of the agreements issued by them.

BASIS OF PRESENTATION — FUND ACCOUNTING

Fiduciary funds are used to account for assets held by the System in a trustee capacity or as an agent. Fiduciary funds include PERS, MHSPRS, MRS, and SLRP pension trust funds. Agency funds are custodial in nature and do not involve measurement of results of operations. FBCP is accounted for as an agency fund.

BASIS OF ACCOUNTING

PERS, MHSPRS, MRS, and SLRP use the accrual basis of accounting and the economic resources measurement focus. Member and employer contributions are recognized as revenue when due pursuant to legal requirements; investment income is recognized when earned. Benefits and refunds are recognized when due and payable in accordance with the terms of the plan. Other expenses are recognized when incurred.

INVESTMENTS

Investments are reported at fair value. Securities traded on a national or international exchange are valued at the last reported sales price at current exchange rates. Corporate bonds are valued based on yields currently available on comparable securities from issuers of similar credit ratings. Mortgage securities are valued on the basis of future principal and interest payments and are discounted at prevailing interest rates for similar instruments. Short-term investments are reported at fair value when published prices are available or at cost plus accrued interest, which approximates fair value. The fair value of commingled real estate funds is based on independent appraisals, while REITs traded on a national or international exchange are valued at the last reported sales price at current exchange rates. For individual investments where no readily ascertainable fair value exists, the System, in consultation with its investment advisors and custodial bank, has determined the fair values based on cash flows and prices for similar investments. Security transactions are accounted for on a trade-date basis.

CAPITAL ASSETS

Capital assets used for administering the plans are carried at historical cost (see Note 4). Depreciation is provided using the straight-line method. The System's policy is to capitalize all acquisitions of furniture and equipment with a unit cost of \$5,000 or more. The following schedule summarizes estimated useful lives by asset classification:

ASSET CLASSIFICATION	ESTIMATED USEFUL LIFE
BUILDING	40 years
IMPROVEMENTS	20 years
FURNITURE, EQUIPMENT & SOFTWARE	5-15 years
COMPUTER EQUIPMENT	3 years
VEHICLES	3-10 years

ACCUMULATED PERSONAL LEAVE AND MAJOR MEDICAL LEAVE

Miss. Code Ann. § 25-3-97, (1972, as amended) authorizes a lump sum payment for a maximum of 30 days of accrued personal leave upon termination of employment. No payment is authorized for accrued major medical leave unless the member presents medical evidence that his or her physical condition is such that he or she no longer has the capacity to work in state government. Accumulated personal leave (including fringe benefits) of employees directly related to the administration of the System is paid from the pension trust funds and is accrued in the financial statements when earned, up to a maximum of 30 days per member. The System does not accrue accumulated major medical leave since it is not probable that the compensation will be paid and since the leave vests only upon termination for medical disability.

USE OF ESTIMATES IN THE PREPARATION OF FINANCIAL STATEMENTS

The preparation of financial statements in conformity with US generally accepted accounting principles requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities at June 30, 2018, and the reported amounts of additions to and deductions from net position during the year then ended. Actual results could differ from those estimates.

Note 3: Cash, Cash Equivalents, and Investments

LEGAL PROVISIONS

The System is authorized by Miss. Code Ann. § 25-11-121, (1972, as amended) to invest in the following:

- » Bonds, notes, certificates, and other valid general obligations of the State, or of any county, city, or supervisor's district of any county of the State;
- » School district bonds of the State;
- » Notes or certificates of indebtedness issued by the Veterans' Home Purchase Board of Mississippi;
- » Highway bonds of the State;
- » Corporate bonds rated by Standard & Poor's Corporation (S&P) or Moody's Investors Service;
- » Short-term obligations of corporations or of wholly-owned subsidiaries of corporations, whose short-term obligations are rated A-3 or better by S&P or rated P-3 or better by Moody's. The Board of Trustees has established a policy that further limits investments of this type to only those corporations whose short-term obligations are rated A-2 or P-2 by S&P or Moody's, respectively;
- » Bonds of the Tennessee Valley Authority;
- » Bonds, notes, certificates, and other valid obligations of the United States of America, or any federal instrumentality that issues securities under authority of an act of Congress and are exempt from registration with the US Securities and Exchange Commission;
- » Bonds, notes, debentures, and other securities issued by any federal instrumentality and fully guaranteed by the United States of America;
- » Bonds, stocks, and convertible securities of established foreign companies that are listed on primary national stock exchanges of foreign nations and in foreign government securities. The System is authorized to hedge such transactions through foreign banks and generally deal in foreign exchange through the use of foreign currency, interbank forward contracts, futures contracts, options contracts, swaps, and other related derivative instruments;
- Interest-bearing bonds or notes that are general obligations of any other state in the United States of America or any city or county therein, provided such city or county had a population as shown by the most recent federal census of not less than 25,000 inhabitants, and provided that such state, city, or county has not defaulted for a period longer than 30 days in the payment of principal or interest on any of its general obligation indebtedness over a period of 10 calendar years immediately preceding such investment;
- » Shares of common and/or preferred stock of corporations created by or existing under the laws of the United States of America or any state, district, or territory thereof;
- » Covered call and put options on securities traded on one or more of the regulated exchanges;
- » Pooled or commingled funds managed by a corporate trustee or by a US Securities and Exchange Commission-registered investment advisory firm and shares of investment companies and unit investment trusts registered under the Investment Company Act of 1940. Such pooled or commingled funds or shares are comprised of common or preferred stocks, bonds, money market instruments, or other authorized investments;

- » Pooled or commingled real estate funds or real estate securities managed by a corporate trustee or by a US Securities and Exchange Commission-registered investment advisory firm retained as an investment manager by the Board of Trustees of the System; and
- » Up to 10.0 percent of the total book value of investments can be types of investments not specifically authorized by this section, if the investments are in the form of a separate account managed by a US Securities and Exchange Commission-registered investment advisory firm retained as an investment manager by the Board; or a limited partnership or commingled fund.

The System also is authorized by its Board of Trustees to operate a securities lending program and has contracted with its custodian to reinvest cash collateral received from the transfer of securities in any investment instrument authorized by Miss. Code Ann. § 25-11-121, (1972, as amended).

Miss. Code Ann. § 25-11-121 (1972, as amended) requires the System's Board of Trustees to determine the degree of collateralization necessary for both foreign and domestic demand deposits in addition to that which is guaranteed by federal insurance programs. These statutes also require that, when possible, the types of collateral securing deposits be limited to securities in which the System itself may invest. The Board of Trustees has established a policy to require collateral equal to at least 100.0 percent of the amount on deposit in excess of that which is guaranteed by federal insurance programs to the credit of the System for domestic demand deposit accounts. No collateral is required for foreign demand deposit accounts, and at June 30, 2018, the System had no deposits in foreign demand deposit accounts.

In accordance with the System's investment policy, the System's investment consultant conducts periodic asset/liability allocation studies that include consideration of projected future liabilities of the System, expected risk, return and correlations for various asset classes, and the System's statutory investment restrictions. Asset allocation studies are performed every five years, or more frequently should significant liability changes occur. A strategic long-term asset allocation is adopted by the Board of Trustees in conjunction with the study. The Investment Committee of the Board of Trustees evaluates the actual investment allocation quarterly and may propose periodic adjustments to the System's strategic long-term asset allocation based on the investment consultant's recommendations, market conditions, and internal investment analysis. The following table shows the Board's asset allocation policy applicable for fiscal year 2018:

TARGET ALLOCATION ASSET CLASS EQUITIES: DOMESTIC 27.0% EQUITIES: GLOBAL 12.0 EQUITIES: INTERNATIONAL 22.0 TOTAL OF ALL EQUITIES 61.0% DEBT SECURITIES 20.0 REAL ESTATE 10.0 PRIVATE EQUITY 8.0

CASH & EQUIVALENTS

1.0

CASH AND CASH EQUIVALENTS

For cash deposits and cash equivalents, which includes the highly liquid BNYM Government Short-Term Investment Fund (STIF) and Deposit Reserve Account, custodial credit risk is the risk that, in the event of a bank failure, the government's deposits may not be returned to it. Miss. Code Ann. § 25-11-121 (1972, as amended) provides that the deposits of the System in any US bank shall, where possible, be safeguarded and guaranteed by the posting of bonds, notes, and other securities as security by the depository. The System's Board of Trustees has formally adopted a short-term investment policy that requires that the fair value of securities guaranteeing the deposits shall at all times be equal to 100.0 percent of the amount of funds on deposit.

The amount of the System's total cash and cash equivalents at June 30, 2018, was \$729,077,000. Cash deposits in bank accounts totaled \$30,300,000, which were covered by federal deposit insurance. At June 30, 2018, the System held \$698,777,000 in cash equivalents. Cash equivalents are created through daily sweeps of excess cash by the System's custodial bank into a bank-sponsored STIF. This fund is a custodial bank-sponsored commingled fund that is invested in short-term US government securities and repurchase agreements. The average S&P short-term quality rating of the fund was A-1 at June 30, 2018.

INVESTMENTS

All of the investment assets are pooled and invested in short-term and long-term debt securities, public equity securities, private equity, and real estate. These investments are accounted for as part of the PERS pension trust fund and are allocated to MHSPRS, MRS, and SLRP based on their equitable interest in the PERS fund.

All investments are governed by the Board's policy of the prudent person rule. The prudent person rule establishes a standard for all fiduciaries to act as a prudent person would be expected to act, with discretion and intelligence, while investing for income and preservation of principal.

Miss. Code Ann. § 25-11-121 (1972, as amended) allows the System to invest up to 10.0 percent of the total portfolio in real estate only via real estate securities and commingled funds. Direct ownership of real estate assets is prohibited. The portfolio is divided between core commingled and value-added real estate fund investments, which directly invest in properties, and in managed portfolios of Real Estate Investment Trusts (REITs). REITs are exchange-traded securities that provide indirect exposure to real estate properties and real estate management companies. Fair values of commingled fund properties are based on the most recent independent appraisal values. Independent appraisal firms, which are Members of Appraisal Institute (MAI), are required to conduct valuations at least annually.

The annual money-weighted rate of return on the System's investments is 9.17 percent. A money-weighted rate of return expresses investment performance, which is net of investment expense and is adjusted for the changing amounts actually invested. Investment expense is measured on the accrual basis of accounting, with inputs to the internal rate of return calculation determined monthly.

The System had no investments in any one organization that represents 5.0 percent or more of the System's fiduciary net position. Investments issued or explicitly guaranteed by the US government are excluded from the measurement.

INVESTMENT TYPE	FAIR VALUE
INTERNATIONAL CURRENCY	\$356,902
REPURCHASE AGREEMENTS	672,392
COMMERCIAL PAPER	476,455
SHORT-TERM ASSET BACKED SECURITIES	650
SHORT-TERM US CORPORATE BONDS	168,774
SHORT-TERM US GOVERNMENT AGENCY OBLIGATIONS	39,570
SHORT-TERM US TREASURY OBLIGATIONS	189,150
SHORT-TERM SOVEREIGN GOVERNMENT DEBT	23,207
US GOVERNMENT AGENCY OBLIGATIONS	20,853
US TREASURY OBLIGATIONS	960,289
COLLATERALIZED MORTGAGE OBLIGATIONS	549,328
US CORPORATE BONDS	1,780,096
NON-US CORPORATE BONDS	1,252,857
MORTGAGE PASS-THROUGHS	828,119
STATE & LOCAL OBLIGATIONS	47,322
ASSET-BACKED SECURITIES	1,501,462
YANKEE/GLOBAL BONDS	31,000
SOVEREIGN GOVERNMENTS DEBT	1,106,481
DOMESTIC EQUITY SECURITIES	9,483,660
INTERNATIONAL EQUITY SECURITIES	7,436,345
REAL ESTATE	2,829,540
PRIVATE EQUITY	2,053,831
TOTAL	\$31,808,283

CUSTODIAL CREDIT RISK

For an investment, custodial credit risk is the risk that, in the event of the failure of the counterparty, the pension trust fund will not be able to recover the value of its investment or collateral securities that are in the possession of an outside party. Investment securities are exposed to custodial credit risk if the securities are uninsured, are not registered in the name of the government, and are held by either (a) the counterparty or (b) the counterparty's trust department or agent but not in the government's name. Miss. Code Ann. § 25-11-121 (1972, as amended) requires that all investments be clearly marked as to ownership, and to the extent possible, shall be registered in the name of the System.

Of the defined benefit pension funds' \$31.8 billion in investments, including securities lending, at June 30, 2018, \$4.9 billion were exposed to custodial credit risk. These are cash collateral reinvestment securities held in the name of the custodian who acquired them as the lending agent/counterparty, and the securities on loan for securities collateral that is held in the name of the lending agent. This is consistent with the System's securities lending agreement in place with the custodian.

The fair value of cash collateral securities purchased and the underlying securities on non-cash loans as of June 30, 2018, are presented by type below (in thousands):

CASH COLLATERAL SECURITIES	FAIR VALUE
COMMERCIAL PAPER	\$470,956
REPURCHASE AGREEMENTS	429,716
CORPORATE BONDS	1,450,083
ASSET-BACKED SECURITIES	1,177,225
SUBTOTAL	3,527,980
UNDERLYING SECURITIES ON NON-CASH LOANS	
DEBT SECURITIES	213,388
EQUITIES	1,122,295
REITS	12,010
SUBTOTAL	1,347,693
TOTAL	\$4,875,673

INTEREST RATE RISK

Interest rate risk is the risk that changes in interest rates on securities will adversely affect the fair value of an investment. As of June 30, 2018, the System had the following debt security investments and maturities:

	FAIR VALUE		INVESTMENT MATU	JRITIES (IN YEARS)	
INVESTMENT TYPE	(IN THOUSANDS)	LESS THAN 1	1-5	6-10	MORE THAN 10
ASSET-BACKED SECURITIES	\$1,502,112	\$1,304,424	\$126,940	\$35,138	\$35,610
COLLATERALIZED MORTGAGE OBLIGATIONS	549,328	208,886	15,541	21,945	302,956
COMMERCIAL PAPER	476,455	476,455	-	-	-
CORPORATE BONDS	3,201,727	1,084,549	1,282,845	432,534	401,799
MORTGAGE PASS-THROUGHS	828,119	73	2,824	6,334	818,888
REPURCHASE AGREEMENTS	672,392	672,392	-	-	-
SOVEREIGN GOVERNMENTS DEBT	1,129,688	38,814	389,328	446,038	255,508
STATE & LOCAL OBLIGATIONS	47,322	154	14,641	6,459	26,068
US GOVERNMENT AGENCY OBLIGATIONS	60,423	43,263	6,697	394	10,069
US TREASURY OBLIGATIONS	1,149,439	219,931	286,502	323,535	319,471
YANKEE/GLOBAL BONDS	31,000	-	21,646	6,868	2,486
TOTALS	\$9,648,005	\$4,048,941	\$2,146,964	\$1,279,245	\$2,172,855

The System's investment policy does not limit investment maturities as a means of managing its exposure to potential fair value losses arising from future changes in interest rates. Market or interest rate risk is the greatest risk faced by an investor in the debt securities market. The price of a debt security typically moves in the opposite direction of the change in interest rates. Derivative securities, variable rate investments with coupon multipliers greater than one, and securities with long terms to maturity are examples of investments whose fair values may be highly sensitive to interest rate changes. These securities are reported at fair value in the Statement of Fiduciary Net Position. Inverse floaters and variable rate investments with coupon multipliers greater than one are prohibited under the System's derivatives policy.

Miss. Code Ann. § 25-11-121 (1972, as amended) provides for the acquisition of derivative instruments by the System. The System adopted a formal derivatives policy in February 1996 with updates adopted in June 2005. During fiscal year 2018, the investments in derivative securities by the System were exclusively in asset/liability-based derivatives such as interest-only (IO) strips, collateralized mortgage obligations, and asset-backed securities. The System reviews fair values of all securities on a monthly basis and prices are obtained from recognized pricing sources. Derivative securities are held, in part, to maximize yields.

Interest-Only (IO)s and Principal-Only (PO)s are transactions that involve the separation of the interest and principal components of a security. They are highly sensitive to prepayments by mortgagors, which may result from a decline in interest rates. The System held IOs valued at \$20.1 million at fiscal year-end. The System's derivatives policy limits IO and PO strips to 3.0 percent of the investment portfolio.

Collateralized mortgage obligations (CMO) are bonds that are collateralized by whole-loan mortgages, mortgage pass-through securities, or stripped mortgage-backed securities. Income is derived from payments and prepayments of principal and interest generated from collateral mortgages. Cash flows are distributed to different investment classes or tranches in accordance with the CMO's established payment order. Some CMO tranches have more stable cash flows relative to changes in interest rates while others are significantly more sensitive to interest rate fluctuations. In a declining interest rate environment, some CMOs may be subject to a reduction in interest payments as a result of prepayments of mortgages that make up the collateral pool. A reduction in interest payments causes a decline in cash flows and, thus, a decline in the fair value of the CMO security. Rising interest rates may cause an increase in interest payments and, thus, an increase in the fair value of the security. The System held \$549.3 million in CMOs at fiscal year end. Of this amount, \$49.5 million were tranches that are highly sensitive to future changes in interest rates. CMO residuals are prohibited under the System's derivatives policy.

Asset-backed securities (ABS) are bonds or notes backed by loan paper or accounts receivable and are originated by banks, credit card companies, or other credit providers. The originator of the loan or accounts receivable paper sells it to a specially created trust, which repackages it as securities. Similar to CMOs, asset-backed securities have been structured as pass-throughs and as structures with multiple bond classes. Of the \$1.5 billion in ABS that the System held at fiscal year end, \$79.6 million are highly sensitive to changes in interest rates. ABS, which are leveraged structures or residual interests, are prohibited by the System's derivatives policy.

At June 30, 2018, the System had invested \$828.1 million in mortgage pass-through securities issued by the Federal National Mortgage Association, Federal Home Loan Mortgage Corporation, and Government National Mortgage Association. These investments are moderately sensitive to changes in interest rates because they are backed by mortgage loans in which the borrowers have the option of prepaying.

FOREIGN CURRENCY RISK

The System's exposure to foreign currency risk at June 30, 2018, was as follows (in thousands):

CURRENCY	CASH & EQUIVALENTS	EQUITIES & REITS	DEBT SECURITIES	TOTAL FAIR VALUE	PERCENT
ARGENTINA PESO	\$(1,422)	\$-	\$2,964	\$1,542	0.02%
AUSTRALIAN DOLLAR	(13,944)	300,971	8,016	295,043	4.44
BRAZIL REAL	(10,249)	99,474	10,130	99,355	1.50
CANADIAN DOLLAR	(48,943)	204,552	49,835	205,444	3.09
CHILEAN PESO	-	6,606	-	6,606	0.10
CHINESE YUAN RENMINBI	18,130	-	-	18,130	0.27
COLOMBIAN PESO	(3,853)	1,190	2,178	(485)	(0.01)
CZECH KORUNA	-	4,128	-	4,128	0.06
DANISH KRONE	(15,606)	110,387	18,104	112,885	1.70
EGYPTIAN POUND	923	-	-	923	0.01
EURO CURRENCY UNIT	(364,652)	1,562,104	358,985	1,556,437	23.44
HONG KONG DOLLAR	992	516,037	-	517,029	7.79
HUNGARIAN FORINT	-	17,443	-	17,443	0.26
INDIAN RUPEE	6,871	105,516	-	112,387	1.69
INDONESIAN RUPIAH	79	51,424	1,226	52,729	0.79
ISRAELI SHEKEL	(4,450)	14,597	-	10,147	0.15
JAPANESE YEN	(78,564)	1,149,752	85,892	1,157,080	17.43
KENYAN SHILLING	-	578	-	578	0.01
MALAYSIAN RINGGIT	249	33,519	8,715	42,483	0.64
MEXICAN NEW PESO	6,298	58,402	42,360	107,060	1.61
NEW TAIWAN DOLLAR	(21,810)	162,878	-	141,068	2.12
NEW ZEALAND DOLLAR	(44,344)	22,141	25,600	3,397	0.05
NORWEGIAN KRONE	1,533	43,847	-	45,380	0.68
PAKISTAN RUPEE	53	9,222	-	9,275	0.14
PERUVIAN NUEVO SOL	(23)	-	1,292	1,269	0.02
PHILIPPINES PESO	-	15,119	-	15,119	0.23
POLISH ZLOTY	(1,291)	21,461	1,369	21,539	0.32
POUND STERLING	(53,471)	951,577	54,083	952,189	14.34
QATARI RIYAL	4	2,093	-	2,097	0.03
ROMANIAN LEU	(3,647)	-	-	(3,647)	(0.05)
RUSSIAN RUBLE (NEW)	7,560	4,984	4,588	17,132	0.26
SINGAPORE DOLLAR	(13,815)	78,551	-	64,736	0.99
SOUTH AFRICAN RAND	(17,858)	146,259	17,871	146,272	2.20
SOUTH KOREAN WON	(5,484)	355,055	-	349,571	5.28
SWEDISH KRONA	(33,732)	144,316	33,760	144,344	2.18
SWISS FRANC	7,941	305,531	-	313,472	4.72
THAILAND BAHT	-	54,735	-	54,735	0.83
TURKISH LIRA	78	40,108	-	40,186	0.61
UAE DIRHAM	5	49	-	54	-
URUGUAYAN PESO	-	-	4,055	4,055	0.06
TOTALS	\$(686,442)	\$6,594,606	\$731,023	\$6,639,187	100.00%

The System's current investment asset allocation policy was adopted by the Board in April 2013 and became effective in fiscal year 2014. The System's allocation policy does not limit foreign currency-denominated investments of the System. The Investment Committee of the Board of Trustees evaluates the actual investment asset allocation quarterly, in accordance with the adopted phase-in policy. Based on current market conditions, the Board adjusts the allocation as necessary.

CREDIT RISK

The System's exposure to credit risk as of June 30, 2018, was as follows:

EXPOSURE TO CREDIT RISK

- JUNE 30, 2018 -

[in thousands]

	QUALITY RATINGS AT FAIR VALUE								
INVESTMENT TYPE	AAA	AA	А	BAA	BA	BBB	BB	В	CA
ASSET-BACKED SECURITIES	\$1,369,201	\$42,774	\$46,396	\$9,079	\$1,190	\$12,142	\$9,507	\$3,554	\$3
COLLATERALIZED MORTGAGE OBLIGATIONS	267,889	163,982	37,498	16,448	4,294	7,918	8,018	12,947	2,900
COMMERCIAL PAPER	-	45,300	382,914	-	-	2,904	-	-	-
CORPORATE BONDS	107,149	719,579	1,165,117	587,876	160,803	259,219	102,101	83,699	-
MORTGAGE PASS-THROUGHS	-	748,152	-	-	-	-	-	-	-
REPURCHASE AGREEMENTS	18,200	477,318	-	-	-	-	-	-	-
SOVEREIGN GOVERNMENTS DEBT	160,639	167,499	182,092	108,880	109,837	100,666	62,309	176,155	-
STATE & LOCAL OBLIGATIONS	3,375	29,987	10,705	2,734	304	217	-	-	-
US GOVERNMENT AGENCY OBLIGATIONS	-	60,423	-	-	-	-	-	-	-
YANKEE/GLOBAL BONDS	17,163	11,153	456	2,079	-	149	-	-	-
TOTALS*	\$1,943,616	\$2,466,167	\$1,825,178	\$727,096	\$276,428	\$383,215	\$181,935	\$276,355	\$2,903

State law requires a minimum quality rating of A-3 by S&P or P-3 by Moody's for corporate short-term obligations. This law also requires corporate and taxable municipal bonds to be of investment grade as rated by S&P or Moody's. The PERS Board of Trustees has adopted a short-term investment policy that further restricts commercial paper to be of corporations with long-term debt to be rated A or better by S&P or Moody's, and whose short-term obligations are of A-2 or P-2 or better ratings by S&P and Moody's, respectively. This applies to all short-term investments of the System.

EXPOSURE TO CREDIT RISK (CONTINUED) - JUNE 30, 2018 -

[in thousands]

_	QUALITY RATINGS AT FAIR VALUE						
	CAA	CCC	СС	С	D	NR**	TOTAL
ASSET-BACKED SECURITIES	\$-	\$1,284	\$-	\$14	\$-	\$6,968	\$1,502,112
COLLATERALIZED MORTGAGE OBLIGATIONS	6,171	1,987	112	-	-	19,164	549,328
COMMERCIAL PAPER	-	-	-	-	-	45,337	476,455
CORPORATE BONDS	7,778	2,198	534	-	2,480	3,194	3,201,727
MORTGAGE PASS-THROUGHS	-	-	-	-	-	-	748,152
REPURCHASE AGREEMENTS	-	-	-	-	-	176,874	672,392
SOVEREIGN GOVERNMENTS DEBT	8,446	1,121	-	-	2,088	49,956	1,129,688
STATE & LOCAL OBLIGATIONS	-	-	-	-	-	-	47,322
US GOVERNMENT AGENCY OBLIGATIONS	-	-	-	-	-	-	60,423
YANKEE/GLOBAL BONDS	-	-	-	-	-	-	31,000
TOTALS*	\$22,395	\$6,590	\$646	\$14	\$4,568	\$301,493	\$8,418,599

*In accordance with GASB guidelines, totals exclude US Treasury obligations and GNMA mortgage pass-throughs due to their explicit guarantee by the US Government:

Short-term US Treasury obligations	\$189,150
US Treasury obligations	960,289
GNMA mortgage pass-throughs	79,967
TOTAL	\$1,229,406

**Not publicly rated

In addition to the short-term investment policy, a policy adopted for the internally managed short-term account requires that for any amount above the established core of \$30.0 million, no more than 25.0 percent should be invested in any issue having a rating lower than AA or A1/P1.

Credit risk for derivative securities held by the System results from the same considerations as other counterparty risk assumed by the System, which is the risk that a borrower will be unable to meet its obligation. The System's policy requires that the credit quality of the underlying asset must be rated A or better by Moody's or S&P. The System's lending agent is permitted to purchase asset-backed securities for the cash collateral fund that are only AAA rated.

INVESTMENT DERIVATIVES

The System has adopted GASB Statement No. 53, *Accounting and Financial Reporting for Derivative Instruments*. Derivative instruments are financial arrangements used by governments to manage specific risks or to make investments.

The following table presents the investment derivative instruments outstanding as of June 30, 2018 (in thousands), as reported in the System's Statement of Fiduciary Net Position:

CHANGES IN FAIR	VALUE	FAIR VALUE AT JU	NE 30, 2018		
CLASSIFICATION	AMOUNT	CLASSIFICATION	AMOUNT	NOTIONAL UNITS	CURRENCY
FOREIGN CURRENCY FO	DRWARDS				
Investment Income	\$316	Investment	\$(316)	\$(43,170)	ARS
Investment Income	302	Investment	(302)	(18,529)	AUD
Investment Income	638	Investment	(638)	(44,780)	BRL
Investment Income	712	Investment	(712)	(66,564)	CAD
Investment Income	3	Investment	(3)	(869)	CHF
Investment Income	(716)	Investment	716	120,641	CNY
Investment Income	83	Investment	(83)	(11,332,400)	COP
Investment Income	1,137	Investment	(1,137)	(114,630)	DKK
Investment Income	(387)	Investment	387	(316,917)	EUR
Investment Income	521	Investment	(521)	(41,507)	GBP
Investment Income	(5)	Investment	5	394,393	IDR
Investment Income	460	Investment	(460)	(17,016)	ILS
Investment Income	(102)	Investment	102	384,564	INR
Investment Income	1,214	Investment	(1,214)	(12,030,654)	JPY
Investment Income	(156)	Investment	156	(8,118,202)	KRW
Investment Income	(526)	Investment	526	116,665	MXN
Investment Income	77	Investment	(77)	11,323	NOK
Investment Income	1,318	Investment	(1,318)	(66,264)	NZD
Investment Income	-	Investment	-	(74)	PEN
Investment Income	137	Investment	(137)	(5,043)	PLN
Investment Income	36	Investment	(36)	(14,604)	RON
Investment Income	282	Investment	(282)	460,118	RUB
Investment Income	396	Investment	(396)	(302,500)	SEK
Investment Income	347	Investment	(347)	(19,431)	SGD
Investment Income	(325)	Investment	325	609	TRY
Investment Income	641	Investment	(641)	(676,800)	TWD
Investment Income	1,361	Investment	(1,361)	(93,994)	ZAR
TBA SECURITIES					
Investment Income	\$1,623	Debt Securities	\$389,515	\$389,099	

The System's derivatives policy limits foreign currency forwards to no more than 100.0 percent of the aggregate value of the portfolio securities denominated in the hedged currency.

INVESTMENT DERIVATIVES CREDIT RISK

At June 30, 2018, the counterparties of the foreign currency forwards primarily had shortterm credit ratings of A as rated by the nationally recognized statistical rating organizations. PERS' general policy requires that the counterparty has a long-term credit rating of A or better and a short-term credit rating of A1/P1 at a minimum. More specifically, the System's policy requires that all over-the-counter derivatives be rated AA or better by the nationally recognized statistical rating organizations. The counterparties of the to-be-announced securities (TBAs) were primarily rated A by the nationally recognized statistical rating organizations.

INVESTMENT DERIVATIVES FOREIGN CURRENCY RISK

The foreign currency forwards are also presented in the foreign currency risk table on page 47.

INVESTMENT DERIVATIVES INTEREST RATE RISK

TBAs are included on page 45 in the interest rate risk table by years to maturity.

COMMITMENTS

As of June 30, 2018, the System had real estate and private equity investments legally structured as limited partnerships. The System was one of the limited partners within each fund, with the investment managers serving as the general partners. As part of the limited partnership agreements, PERS agrees to potentially invest up to the committed amounts during the stated fund investment period.

Within its Alternative Investment Program, the System has investments that, due to their longterm nature, do not provide immediate liquidity. The commingled real estate fund investments allow for quarterly liquidity. As of June 30, 2018, the total fair value of the commingled real estate portfolio was approximately \$2.02 billion. The closed-end real estate funds, timber fund, and private equity fund investments are all 10- to 12-year commitments. These funds have limited liquidity due to their long investment time horizon, but will make periodic distributions throughout the term of the investment as assets are sold. As of June 30, 2018, the fair value of these investments totaled \$2.43 billion. Real Estate Investment Trusts (REITs) are excluded from the Alternative Investment Program.

As of June 30, 2018, PERS had the following outstanding investment commitments (in thousands):

	COMMITTED CAPITAL	CAPITAL CONTRIBUTED NET OF RECALLABLE DISTRIBUTIONS AND RELEASED COMMITMENTS	OUTSTANDING
REAL ESTATE	\$925,000	\$603,778	\$321,222
PRIVATE EQUITY	4,456,000	2,188,525	2,267,475
TOTALS	\$5,381,000	\$2,792,303	\$2,588,697

FAIR VALUE MEASUREMENTS

The System categorizes its fair value measurements within the fair value hierarchy established by GASB Statement 72, *Fair Value Measurement and Application*. Fair value is the price that would be received to sell an asset or paid to transfer a liability in an orderly transaction between market participants at the measurement date. GASB Statement No. 72 focuses on the exit price in the principal or most advantageous market for the asset or liability in an orderly transaction between market participants. GASB establishes a fair value reporting hierarchy to maximize the use of observable inputs when measuring fair value and defines the three levels of inputs as noted below:

- » Level 1 Assets or liabilities for which the identical item is traded on an active exchange, such as publicly-traded instruments or futures contracts.
- » Level 2 Assets and liabilities are valued based on quoted prices in active markets for similar instruments, quoted prices for identical or similar instruments in markets that are not active, and model-derived valuations in which all significant inputs are observable.
- » Level 3 Assets or liabilities, for which significant valuation assumptions are not readily observable in the market and instruments, are valued based on the best available data. Fair value is estimated using unobservable inputs that are significant to the fair value of the assets or liabilities. Level 3 assets may include instruments for which the determination of fair value requires significant management judgment or estimation.

The hierarchy is based on the valuation inputs used to measure the fair value of the asset. Level 1 inputs are quoted prices in active markets for identical assets; Level 2 inputs are significant other observable inputs; Level 3 inputs are significant unobservable inputs. Investments that are measured at fair value using the net asset value (NAV) per share (or its equivalent) as a practical expedient are not classified in the fair value hierarchy.

In instances where inputs used to measure fair value fall into different levels in the fair value hierarchy, fair value measurements in their entirety are categorized based on the lowest level input that is significant to the valuation. The System's assessment of the significance of particular inputs to these fair value measurements requires judgment and considers factors specific to each asset or liability. The System performed a detailed analysis of the assets and liabilities that are subject to GASB Statement 72 and has the following recurring fair value measurements as of June 30, 2018:

		QUOTED PRICES IN ACTIVE MARKETS FOR IDENTICAL ASSETS	SIGNIFICANT OTHER OBSERVABLE INPUTS	SIGNIFICANT UNOBSERVABLE INPUTS
INVESTMENTS BY FAIR VALUE LEVEL Debt Securities:		(LEVEL 1)	(LEVEL 2)	(LEVEL 3)
COMMERCIAL PAPER	\$476,455	\$-	\$476,455	\$-
REPURCHASE AGREEMENTS	672,392	-	672,392	-
SHORT-TERM ASSET BACKED SECURITIES	650	-	650	-
SHORT-TERM US CORPORATE BONDS	168,774	-	168,774	-
SHORT-TERM US GOVERNMENT AGENCY OBLIGATIONS	39,570	-	39,570	-
SHORT-TERM US TREASURY OBLIGATIONS	189,150	189,150	-	-
SHORT-TERM SOVEREIGN GOVERNMENTS DEBT	23,207	-	23,207	-
US GOVERNMENT AGENCY OBLIGATIONS	20,853	-	20,853	-
US TREASURY OBLIGATIONS	960,289	960,289	-	-
COLLATERALIZED MORTGAGE OBLIGATIONS	549,328	-	549,328	-
US CORPORATE BONDS	1,780,096	21,006	1,723,978	35,112
NON-US CORPORATE BONDS	1,252,857	3,925	1,248,932	-
MORTGAGE PASS-THROUGHS	828,119	-	828,119	-
STATE & LOCAL OBLIGATIONS	47,322	-	47,322	-
ASSET-BACKED SECURITIES	1,501,462	-	1,501,462	-
YANKEE/GLOBAL BONDS	31,000	-	31,000	-
SOVEREIGN GOVERNMENTS DEBT	1,106,481	-	1,106,481	-
TOTAL DEBT SECURITIES	9,648,005	1,174,370	8,438,523	35,112
Equity Securities:				
BASIC MATERIALS	749,922	749,922	-	-
COMMUNICATIONS	2,020,470	2,020,470	-	-
CONSUMER, CYCLICAL	1,771,658	1,771,658	-	-
CONSUMER, NON-CYCLICAL	3,574,787	3,574,787	-	-
DIVERSIFIED	55,858	55,858	-	-
ENERGY	1,096,158	1,096,158	-	-
FINANCIAL	3,909,567	3,909,567	-	-
INDUSTRIAL	1,816,153	1,816,153	-	-
TECHNOLOGY	2,066,989	2,066,557	-	432
UTILITIES	294,616	294,616	-	-
TOTAL EQUITY SECURITIES	17,356,178	17,355,746	-	432
TOTAL INVESTMENTS BY FAIR VALUE LEVEL	\$27,004,183	\$18,530,116	\$8,438,523	\$35,544
Investments Measured at NAV:	2 202 2/7			
TOTAL REAL ESTATE*	2,393,367			
	2,053,831			
	4,447,198			
	31,451,381			
	356,902			
TOTAL INVESTMENTS**	\$31,808,283			nents, are reported in equity REITs totaled \$436.2 million.
Investment Derivative Instruments: FOREIGN EXCHANGE CONTRACTS (LIABILITIES)	1,059,494			
TOTAL INVESTMENT DERIVATIVE INSTRUMENTS	\$1,059,494		ler securities lending totalin	

DEBT AND EQUITY

The System's debt and equity securities in Level 1 of the fair value hierarchy are valued using prices quoted in active markets for those securities. Securities classified in Level 2 of the fair value hierarchy are valued using a proprietary pricing source. The primary proprietary source uses continuous evaluations throughout the trading day based on factors such as dealer quotes and trades, trade execution data, and transaction reporting services. Along with market sources, relative credit information, observed market movements, and sector news are integrated and incorporated into evaluation pricing applications and models. Commercial and residential mortgage-backed securities classified in Level 3 are valued using discounted cash flow techniques. Collateralized debt obligations classified in Level 3 are valued using a proprietary model that monitors structured product markets, interest rate movements, new issue information, and other pertinent data. Evaluations of tranches (non-volatile and volatile) are based on market modeling, trading, and pricing conventions. New issue features are analyzed on data such as pricing speed, spread, and volatility. Information is also solicited from outside sources including secondary dealers, portfolio managers, and research analysts.

DERIVATIVE INSTRUMENTS

The System held derivative instruments in the form of US Treasury strips, collateralized mortgage obligations, asset-backed securities, and currency conversions as of June 30, 2018.

REAL ESTATE

The System's real estate funds include open-end funds and closed—end limited partnerships that invest primarily in US commercial real estate. The fair values of these investments have been determined using the NAV per share (or its equivalent) of the System's ownership interest in the fund or partners' capital, as applicable. The governing document for each open-end real estate fund provides investors the ability to request the redemption of all or part of their fund investments. The funds resulting from an investor's redemption request are raised by the sale of underlying real estate investments held by the open-end fund. Closed-end real estate funds, governed by limited partnership agreements, do not contain provisions for limited partner redemptions on demand. Closed-end funds have a finite life or term, which is defined in the limited partnership agreement. Typically, real estate investments must be made within the first three to four years of the partnership's lifespan, and liquidated by the end of the 10th year. As underlying real estate investments are sold over the life of the closed-end fund, pro-rata distributions of the proceeds are made to each partner in the fund partnership. The standard liquidation period of 10 years with the option of two one-year extensions applies to the one percent of the total portfolio invested in closed-end funds.

PRIVATE EQUITY

The System's private equity investments consist of two fund-of-funds (FOF) limited partnerships that invest in multiple private equity funds on behalf of the System. Private equity funds invest primarily in non-public companies whose prices are not quoted on a stock exchange; therefore, these investments are typically illiquid in nature. The System's ownership in the underlying private equity funds consists of limited partnership interests. Because these partnership interests are illiquid, the System's investments cannot be redeemed on demand. Instead pro-rata distributions are received through the liquidation of the assets of the underlying partnership. Based on the terms of each limited partnership within the System's FOFs, all partnership assets should be liquidated over the 10-to-12-year life of the individual partnership.

As of June 30, 2018, it is probable that all of the System's private equity underlying investments will be sold at an amount different from the NAV per share (or its equivalent) of the System's ownership interest in partners' capital. Therefore, the fair values of these underlying investments have been determined using recent observable transaction information for similar investments and non-binding bids received from potential buyers of the investments of each partnership. As of June 30, 2018, a buyer (or buyers) for these investments has not yet been identified. Each underlying private equity fund's general partner has full discretion for the disposition of each partnership investment. The general partner is solely responsible for determining the most appropriate timing for the sale of each investment and the best exit strategy to use. In addition, the general partner is responsible for identifying all buyers and approving all sale transactions of partnership investments.

Real Estate Funds:	FAIR VALUE	UNFUNDED COMMITMENTS	REDEMPTION FREQUENCY (IF CURRENTLY ELIGIBLE)	REDEMPTION NOTICE PERIOD
CORE - OPEN END	\$2,015,751	\$-	Quarterly	45-90 days
VALUE ADDED - CLOSED END	274,931	321,222	N/A	10-12 years
TIMBER	102,685	-	Various*	Various*
TOTAL REAL ESTATE	2,393,367	321,222		
Private Equity Funds:				
DIVERSIFIED	2,053,831	2,267,475	10-12 years	N/A
TOTAL PRIVATE EQUITY	2,053,831	2,267,475		
TOTAL INVESTMENTS MEASURED AT NAV	\$4,447,198	\$2,588,697		

*Based on partnership agreement terms.

SECURITIES LENDING TRANSACTIONS

The System accounts for securities lending transactions in accordance with GASB Statement No. 28, *Accounting and Financial Reporting for Securities Lending Transactions*, which established standards of accounting and financial reporting for securities lending transactions.

The Board of Trustees has authorized the System to lend its securities to broker-dealers with a simultaneous agreement to return the collateral for the same securities in the future. The System's custodian, pursuant to a written agreement, is permitted to lend all long-term securities to authorized broker-dealers subject to the receipt of acceptable collateral. The System lends securities for collateral in the form of either cash or other securities. The types of securities on loan at June 30, 2018, are long-term US government and agency obligations, corporate bonds, REITs, and domestic and international equities. The contractual agreement with the System's custodian provides indemnification in the event the borrower fails to return the securities lent or fails to pay the System income distributions by the securities' issuers while the securities are on loan. There have been no significant violations of the provisions of the agreement during the period of these financial statements.

At the initiation of a cash loan, borrowers are required to provide collateral amounts of 102.0 percent on US securities and international securities denominated in the same currency of the loaned security. When the System's international securities are loaned, if they are denominated in a currency other than the currency of the loaned security, 105.0 percent collateral is required at the initiation of the loan. In the event the collateral fair value on US securities and sovereign debt falls to less than 100.0 percent of the respective fair value of the securities lent, the borrower is required to provide additional collateral by the end of the next business day to the 102.0 percent level. In the event the collateral fair value falls below 102.0 percent for international same-currency transactions or 105.0 percent for cross-currency transactions, the borrower is required to provide additional collateral.

Effective October 1, 2013, 110.0 percent collateral is required from the borrowers for non-cash loans. The System cannot pledge, lend, or sell securities received as collateral unless the borrower defaults. As such, these securities are not presented on the Statement of Fiduciary Net Position. Authorized securities' collateral includes US and non-US government debt obligations and securities, supranational debt obligations, US and non-US equity securities listed on specified indices, US and non-US corporate bonds, and convertible securities. Equities were held as collateral on the non-cash loans as of June 30, 2018. As with cash loans, the borrower must provide additional collateral to correct any deficiency.

The maturities of the investments made with cash collateral generally do not match the maturities of the securities loans. All securities loans can be terminated on demand by either the System or the borrower, although the average term of these loans was three days at June 30, 2018. Cash collateral was invested in repurchase agreements, corporate bonds, and asset-backed securities at June 30, 2018. The weighted average effective duration and the weighted average maturity of cash collateral investments at June 30, 2018, were 26 days.

Effective October 1, 2014, PERS amended the custodial bank securities lending agreement to allow for the purchase of equity repurchase agreements. Repurchase agreements collateralized by equity securities require a minimum of 107.0 percent collateralization level. The amendment also provides indemnification on all repurchase agreements by the custodial bank lending agent.

Securities lent at year-end for cash and non-cash collateral are presented by type. There were \$1,347,693,000 securities lent for securities collateral as of June 30, 2018. The investments purchased with the cash collateral are presented in the discussion of custodial credit risk, since the custodian, as agent, is the counterparty in acquiring these securities in a separate account for the System. The securities lent for securities collateral are also presented for exposure to custodial credit risk since the related collateral is acquired and held by the agent, not in the System's name.

	PERS	MHSPRS	MRS	SLRP	TOTAL
INTEREST INCOME	\$64,549	\$752	\$327	\$38	\$65,666
NET DEPRECIATION	(2,839)	(33)	(14)	(2)	(2,888)
INCOME FROM SECURITIES LENDING	61,710	719	313	36	62,778
Less:					
INTEREST EXPENSE	41,472	482	211	25	42,190
BANK FEES	3,379	40	16	2	3,437
EXPENSES FROM SECURITIES LENDING	44,851	522	227	27	45,627
NET INCOME FROM SECURITIES LENDING	\$16,859	\$197	\$86	\$9	\$17,151

The following table details the net income from securities lending for the year ended June 30, 2018 (in thousands):

At year end, the System had no credit risk exposure to borrowers because the amount the System owed the borrowers exceeded the amount the borrowers owed the System.

Securities lending total assets with related accrued interest are \$3,535,405,000, and total liabilities with accrued expenses are \$3,531,439,000. These two amounts do not equal at June 30, 2018. The difference of \$3,966,000 is due to the collateral investment fund's market appreciation, agent lender fees, and earnings receivable until the final distribution takes place the following month.

The following table presents the fair values of the underlying securities and the value of the collateral pledges at June 30, 2018 (in thousands):

SECURITIES LENT Lent for Cash Collateral:	FAIR VALUE*	COLLATERAL RECEIVED
DEBT SECURITIES	\$865,136	\$884,342
EQUITIES	2,382,487	2,437,724
REITS	128,912	131,829
SUBTOTAL	3,376,535	3,453,895
Lent for Securities Collateral:		
DEBT SECURITIES	213,388	234,141
EQUITIES	1,122,295	1,258,502
REITS	12,010	13,817
SUBTOTAL	1,347,693	1,506,460
TOTAL SECURITIES LENT	\$4,724,228	\$4,960,355

*The fair values of the underlying securities loaned for cash and securities collateral include accrued income and expenses.

COMMISSION RECAPTURE PROGRAM

The Board of Trustees has authorized the System to enter into a commission recapture program. This program allows the System to recapture a portion of the commissions paid to brokerdealers with which the System has entered into an agreement. Recaptures for the fiscal year ended June 30, 2018, were \$250,205.

Note 4: Capital Assets

The following table shows amounts for capital assets as of June 30, 2018 (in thousands):

DESCRIPTION	AMOUNT
LAND	\$508
BUILDING	18,778
FURNITURE, EQUIPMENT & SOFTWARE	23,534
CONSTRUCTION IN PROGRESS	1,026
TOTAL CAPITAL ASSETS	43,846
Less Accumulated Depreciation:	
BUILDING	6,599
FURNITURE, EQUIPMENT & SOFTWARE	14,792
TOTAL ACCUMULATED DEPRECIATION	21,391
NET CAPITAL ASSETS	\$22,455

Note 5: Net Pension Liability of Employers

The following tables present the components of the liability of the employers, or net pension liability, to plan members for benefits provided through the System's cost-sharing and single employer defined benefit pension plans at June 30, 2018 (in thousands).

	PERS	MHSPRS	SLRP
TOTAL PENSION LIABILITY	\$44,396,161	\$527,428	\$21,301
PLAN FIDUCIARY NET POSITION	\$(27,763,190)	\$(354,169)	\$(18,036)
PLAN NET PENSION LIABILITY	\$16,632,971	\$173,259	\$3,265
RATIO OF FIDUCIARY NET POSITION TO TOTAL PENSION LIABILITY	62.54%	67.15%	84.67%

SIGNIFICANT ASSUMPTIONS AND OTHER INPUTS

The total pension liability was determined by an actuarial valuation as of June 30, 2018, using the following actuarial assumptions applied to all periods included in the measurement:

	PERS	MHSPRS	SLRP
INVESTMENT RATE OF RETURN*	7.75%	7.75%	7.75%
PRICE INFLATION	3.00%	3.00%	3.00%
SALARY INCREASES	3.25-18.50%	3.25-8.81%	3.25%
MOST RECENT EXPERIENCE STUDY	6/30/16	6/30/16	6/30/16

*Net of investment expense, including inflation

An actuarial survey of the mortality, service, withdrawals, compensation experience of members, and valuation of assets and liabilities is performed annually to determine the actuarial soundness of the System. To validate that the assumptions recommended by the actuary are, in aggregate, reasonably related to actual experience, the System requests the actuary to conduct an experience investigation every other year. The actuarial assumptions used in the June 30, 2018, valuation were based on the results of an actuarial experience study for the four-year period ending June 30, 2016. The experience report is dated April 18, 2017.

The long-term expected rate of return on the PERS, MHSPRS, and SLRP investments was determined using a log-normal distribution analysis in which best-estimate ranges of expected future real rates of return (expected nominal returns, net of the plans' investment expense and the assumed rate of inflation) were developed for each major asset class. These ranges are combined to produce the long-term expected rate of return by weighting the expected future real rate of return by the target asset allocation percentage and by adding expected inflation. The target asset allocation and best estimates of arithmetic real rates of return for each major asset class are summarized in the following table:

ASSET CLASS	TARGET ALLOCATION	LONG-TERM EXPECTED REAL RATE OF RETURN
US BROAD	27.00%	4.60%
INTERNATIONAL EQUITY	18.00	4.50
EMERGING MARKETS EQUITY	4.00	4.75
GLOBAL	12.00	4.75
FIXED INCOME	18.00	0.75
REAL ASSETS	10.00	3.50
PRIVATE EQUITY	8.00	5.10
EMERGING DEBT	2.00	2.25
CASH	1.00	-
TOTAL	100.00%	N/A

DISCOUNT RATE

The discount rate used to measure the total pension liabilities for PERS, MHSPRS, and SLRP was 7.75 percent. The projection of cash flows used to determine the discount rate assumed that plan member contributions will be made at current contribution rates and that employer contributions for PERS, MHSPRS, and SLRP will be made at rates set in the Board's Funding Policy. Based on those assumptions, each plan's fiduciary net position was projected to be available to make all projected future benefit payments of current plan members. Therefore, the long-term expected rate of return on investments was applied to all periods of projected benefit payments to determine each plan's total pension liability.

SENSITIVITY OF THE NET PENSION LIABILITY TO CHANGES IN THE DISCOUNT RATE

The following table presents the net pension liability of PERS, MHSPRS, and SLRP, calculated using the discount rate of 7.75 percent, as well as what the plans' net pension liability would be if it were calculated using a discount rate that is one percentage point lower (6.75 percent) or one percentage point higher (8.75 percent) than the current rate (in thousands):

NET PENSION LIABILITY	1% DECREASE (6.75%)	CURRENT DISCOUNT RATE (7.75%)	1% INCREASE (8.75%)
PERS	\$21,900,850	\$16,632,971	\$12,254,668
MHSPRS	\$237,420	\$173,259	\$120,079
SLRP	\$5,337	\$3,265	\$1,482

Note 6: Contributions Required and Contributions Made Policies for PERS, MHSPRS, and SLRP provide for employer and member contributions at actuarially determined rates that, expressed as percentages of annual covered payroll, are adequate to accumulate sufficient assets to pay benefits when due. Contribution rates for PERS, MHSPRS, and SLRP are established in accordance with actuarial contribution requirements determined through actuarial valuations and adopted by the Board of Trustees with respect to PERS and SLRP or the MHSPRS Administrative Board. Employer contribution rates consist of an amount for service cost; the amount estimated to finance benefits earned by current members during the year; and an amount for amortization of the unfunded actuarial accrued liability. For determining employer contribution rates, the actuary evaluates the assets of the plans based on a five-year smoothed expected return with 20.0 percent of a year's excess or shortfall of expected return recognized each year for five years. Contribution rates are determined using the entry age actuarial cost method and include provisions for an annual 3.0 percent cost-of-living increase calculated according to the terms of the respective plan.

Contribution policies for MRS provide for a property tax to be levied within each municipality and deductions from salaries of members at rates sufficient to make the plans actuarially sound. An actuarial valuation is performed annually, as of June 30, to determine the necessary rates. Mississippi statutes limit any increase in the property tax levy for employer pension contributions to one-half mill per year. Given this constraint on employer contribution increases and depending upon future experience, one or more of the closed plans under MRS will possibly be exhausted at some point in the future. Such an event would lead to at least a temporary reduction in benefits paid until the affected plan's cash flow position improved. Members covered by MRS are required to contribute varying amounts of their salary, depending on the actuarial soundness of their respective plans.

CONTRIBUTION RATES

CONTRIBUTION RATES AS A PERCENT OF COVERED PAYROLL

	MEMBER	EMPLOYER	OTHER
PERS	9.00%	15.75%	-
MHSPRS	7.25%	37.00%	11.82%*
MRS	7.00-10.00%	0.80-5.82 mills**	-
SLRP	3.00%	7.40%	-

*Additional fees

**Based on assessed property values.

The Board of Trustees adopted a new funding policy for PERS at the June 2018 meeting. Enhanced metrics for decision making include a signal light approach with green meaning the metric passes, yellow signals the metric passes, but a negative experience could lead to concern, and red indicating the metric fails. Metrics to be measured include funded ratio, cash flow as a percentage of assets, and the actuarily determined contribution ratio. Measures for determining the employer contribution rates for MHSPRS and SLRP remain the same.

Employer contributions for MHSPRS are augmented by certain additional fees. These amounts vary annually based on the level of activity. The amount collected as of June 30, 2018, was \$2,859,893 for motor vehicle fees and \$634,025 for driver's license reinstatement fees. An estimated \$3,500,000, or 11.82 percent of payroll, was used to calculate the actuarially determined contributions for MHSPRS.

	Administration of the System is financed from investment earnings. In addition, employers of MHSPRS, MRS, and SLRP contribute an administrative fee to the System equal to 2.0 percent of the plan's respective employer contributions. As of June 30, 2018, administrative fees were \$250,291 from MHSPRS, \$352,205 from MRS, and \$10,245 from SLRP. ORP contributes administrative fees of 2.6 percent of covered wages for a total of \$11,083,126.
	LEGALLY REQUIRED RESERVES Provisions for reserves, in which all assets of the System are to be credited according to their purpose, are established by Miss. Code Ann. § 25-11-123, Article 3, (1972, as amended) and may be amended only by the state Legislature. The annuity savings account accumulates the contributions made by members and accumulated interest. The annuity reserve represents the actuarial value of all annuities in force. The reserve account that accumulates contributions made by the employers, and where all retirement allowances and other benefits are recorded, is referred to as the employer's accumulation account.
Note 7: Retirement Plan of System Employees	PERS employees are members of the System. The payroll for PERS employees for the year ended June 30, 2018, was \$7,338,000; the PERS total payroll expense was \$9,737,000. System contributions for the years ended June 30, 2018, 2017, and 2016, were \$1,159,000, \$1,143,000, and \$1,122,000, respectively. The contributions for 2018, 2017, and 2016 were each 100.0 percent of required contributions. Refer to Note 6 of the basic financial statements for more information regarding contributions made for fiscal year 2018. PERS contributions represent less than 1.0 percent of total contributions required for all participating employers.
Note 8: GASB Statement Implementation	The requirements of GASB Statement No. 75, <i>Accounting and Financial Reporting for</i> <i>Postemployment Benefits Other Than Pensions</i> , are effective for the reporting period ending June 30, 2018. The System has chosen to delay implementation of this statement for fiscal year 2018 due to the unavailability of audited data related to the State and School Employees Health Insurance Trust at the time of PERS' CAFR production. In addition, the System has estimated its proportionate share of the liability for Other Post-Employment Benefits based on unaudited information and determined that the amount is not material to its financial statements. The requirements of GASB Statement No. 75 will be presented in the System's Comprehensive Annual Financial Report for fiscal year 2019.

REQUIRED SUPPLEMENTARY INFORMATION SCHEDULE OF CHANGES IN THE NET PENSION LIABILITY & RELATED RATIOS - YEAR ENDED JUNE 30, 2018 -

[in thousands] [unaudited]

CHANGES IN THE NET PENSION LIABILITY			PERS		
_	2018	2017	2016	2015	2014
Total pension liability					
SERVICE COST	\$702,559	\$754,552	\$734,545	\$673,626	\$681,778
INTEREST	3,239,471	3,154,382	3,032,131	2,867,679	2,754,573
CHANGES OF BENEFIT TERMS	-	-	-	-	-
DIFFERENCE BETWEEN ACTUAL AND EXPECTED EXPERIENCE	21,361	(172,476)	413,494	325,351	257,464
ASSUMPTION CHANGES	-	24,141	(66,606)	1,821,236	-
BENEFIT PAYMENTS	(2,609,415)	(2,477,914)	(2,367,709)	(2,219,240)	(2,099,843)
REFUNDS	(124,306)	(113,707)	(112,926)	(119,356)	(121,532)
NET CHANGE IN TOTAL PENSION LIABILITY	1,229,670	1,168,978	1,632,929	3,349,296	1,472,440
TOTAL PENSION LIABILITY - BEGINNING	43,166,491	41,997,513	40,364,584	37,015,288	35,542,848
TOTAL PENSION LIABILITY - ENDING (A)	\$44,396,161	\$43,166,491	\$41,997,513	\$40,364,584	\$37,015,288
Plan fiduciary net position					
CONTRIBUTIONS - EMPLOYER	\$1,018,163	\$1,019,084	\$1,021,261	\$996,478	\$969,674
CONTRIBUTIONS - MEMBER	570,807	570,066	572,574	557,909	549,528
NET INVESTMENT INCOME	2,385,913	3,436,144	130,900	827,666	3,905,728
BENEFIT PAYMENTS	(2,609,415)	(2,477,914)	(2,367,709)	(2,219,240)	(2,099,843)
REFUNDS	(124,306)	(113,707)	(112,926)	(119,356)	(121,532)
ADMINISTRATIVE EXPENSE	(16,264)	(17,056)	(15,166)	(13,523)	(12,837)
OTHER	(4,805)	(8,536)	(474)	(497)	(510)
NET CHANGE IN FIDUCIARY NET POSITION	1,220,093	2,408,081	(771,540)	29,437	3,190,208
PLAN FIDUCIARY NET POSITION - BEGINNING	26,543,097	24,135,016	24,906,556	24,877,119	21,686,911
PLAN FIDUCIARY NET POSITION - ENDING (B)	27,763,190	26,543,097	24,135,016	24,906,556	24,877,119
NET PENSION LIABILITY - ENDING (A-B)	\$16,632,971	\$16,623,394	\$17,862,497	\$15,458,028	\$12,138,169
PLAN FIDUCIARY NET POSITION AS A PERCENTAGE OF THE TOTAL PENSION LIABILITY	62.54%	61.49%	57.47%	61.70%	67.21%
COVERED PAYROLL	\$5,999,231	\$6,038,229	\$6,022,533	\$5,904,827	\$5,834,687
NET PENSION LIABILITY AS A PERCENTAGE OF COVERED PAYROLL	277.25%	275.30%	296.59%	261.79%	208.03%

Schedule is intended to show information for 10 years. Additional years will be displayed as they become available. See notes to Required Supplementary Information.

REQUIRED SUPPLEMENTARY INFORMATION SCHEDULE OF CHANGES IN THE NET PENSION LIABILITY & RELATED RATIOS (CONTINUED) - YEAR ENDED JUNE 30, 2018 -

[in thousands] [unaudited]

CHANGES IN THE NET PENSION LIABILITY			MHSPRS		
-	2018	2017	2016	2015	2014
Total pension liability					
SERVICE COST	\$7,205	\$7,328	\$6,858	\$6,361	\$6,461
INTEREST	37,338	37,086	35,869	34,503	33,396
CHANGES OF BENEFIT TERMS	-	-	-	-	-
DIFFERENCE BETWEEN ACTUAL AND EXPECTED EXPERIENCE	17,311	(5,780)	3,536	1,013	2,652
ASSUMPTION CHANGES	-	(3,598)	-	19,176	-
BENEFIT PAYMENTS	(32,315)	(31,001)	(29,913)	(28,909)	(28,220)
REFUNDS	(103)	(144)	(52)	(163)	(42)
NET CHANGE IN TOTAL PENSION LIABILITY	29,436	3,891	16,298	31,981	14,247
TOTAL PENSION LIABILITY - BEGINNING	497,992	494,101	477,803	445,822	431,575
TOTAL PENSION LIABILITY - ENDING (A)	\$527,428	\$497,992	\$494,101	\$477,803	\$445,822
Plan fiduciary net position					
CONTRIBUTIONS - EMPLOYER	\$15,128	\$14,809	\$14,755	\$13,695	\$13,500
CONTRIBUTIONS - MEMBER	2,271	2,147	2,128	1,938	1,963
NET INVESTMENT INCOME	27,719	44,499	1,704	10,812	51,575
BENEFIT PAYMENTS	(32,315)	(31,001)	(29,913)	(28,909)	(28,220)
REFUNDS	(103)	(144)	(52)	(163)	(42)
ADMINISTRATIVE EXPENSE	(250)	(203)	(217)	(198)	(200)
OTHER	-	-	-	-	-
NET CHANGE IN FIDUCIARY NET POSITION	12,450	30,107	(11,595)	(2,825)	38,576
PLAN FIDUCIARY NET POSITION - BEGINNING	341,719	311,612	323,207	326,032	287,456
PLAN FIDUCIARY NET POSITION - ENDING (B)	354,169	341,719	311,612	323,207	326,032
NET PENSION LIABILITY - ENDING (A-B)	\$173,259	\$156,273	\$182,489	\$154,596	\$119,790
PLAN FIDUCIARY NET POSITION AS A PERCENTAGE OF THE TOTAL PENSION LIABILITY	67.15%	68.62%	63.07%	67.64%	73.13%
COVERED PAYROLL	\$29,555	\$28,845	\$27,380	\$25,505	\$25,554
NET PENSION LIABILITY AS A PERCENTAGE OF COVERED PAYROLL	586.23%	541.77%	666.50%	606.14%	468.77%

Schedule is intended to show information for 10 years. Additional years will be displayed as they become available. See notes to Required Supplementary Information.

REQUIRED SUPPLEMENTARY INFORMATION SCHEDULE OF CHANGES IN THE NET PENSION LIABILITY & RELATED RATIOS (CONTINUED) - YEAR ENDED JUNE 30, 2018 -

[in thousands] [unaudited]

CHANGES IN THE NET PENSION LIABILITY			SLRP		
	2018	2017	2016	2015	2014
Total pension liability					
SERVICE COST	\$431	\$433	\$420	\$406	\$404
INTEREST	1,557	1,593	1,586	1,569	1,549
CHANGES OF BENEFIT TERMS	-	-	-	-	-
DIFFERENCE BETWEEN ACTUAL AND EXPECTED EXPERIENCE	(58)	(204)	(468)	(333)	(453)
ASSUMPTION CHANGES	-	(868)	(6)	588	-
BENEFIT PAYMENTS	(1,410)	(1,397)	(1,454)	(1,220)	(1,216)
REFUNDS	(18)	(17)	(32)	(37)	(22)
NET CHANGE IN TOTAL PENSION LIABILITY	502	(460)	46	973	262
TOTAL PENSION LIABILITY - BEGINNING	20,799	21,259	21,213	20,240	19,978
TOTAL PENSION LIABILITY - ENDING (A)	\$21,301	\$20,799	\$21,259	\$21,213	\$20,240
Plan fiduciary net position					
CONTRIBUTIONS - EMPLOYER	\$513	\$522	\$514	\$511	\$514
CONTRIBUTIONS - MEMBER	207	212	208	207	208
NET INVESTMENT INCOME	1,412	2,264	86	552	2,605
BENEFIT PAYMENTS	(1,410)	(1,397)	(1,454)	(1,220)	(1,216)
REFUNDS	(18)	(17)	(32)	(37)	(22)
ADMINISTRATIVE EXPENSE	(10)	(10)	(10)	(10)	(10)
OTHER	-	-	-	-	-
NET CHANGE IN FIDUCIARY NET POSITION	694	1,574	(688)	3	2,079
PLAN FIDUCIARY NET POSITION - BEGINNING	17,342	15,768	16,456	16,453	14,374
PLAN FIDUCIARY NET POSITION - ENDING (B)	18,036	17,342	15,768	16,456	16,453
NET PENSION LIABILITY - ENDING (A-B)	\$3,265	\$3,457	\$5,491	\$4,757	\$3,787
PLAN FIDUCIARY NET POSITION AS A PERCENTAGE OF THE TOTAL PENSION LIABILITY	84.67%	83.38%	74.17%	77.58%	81.29%
COVERED PAYROLL	\$6,833	\$6,928	\$6,862	\$6,861	\$6,918
NET PENSION LIABILITY AS A PERCENTAGE OF COVERED PAYROLL	47.78%	49.90%	80.02%	69.33%	54.74%

Schedule is intended to show information for 10 years. Additional years will be displayed as they become available. See notes to Required Supplementary Information. This page intentionally left blank.

REQUIRED SUPPLEMENTARY INFORMATION SCHEDULE OF EMPLOYER CONTRIBUTIONS - LAST 10 FISCAL YEARS -

[in thousands] [unaudited]

Public Employees' Retirement System	2018	2017	2016	2015	2014
CONTRACTUALLY REQUIRED EMPLOYER CONTRIBUTION	\$944,879	\$951,021	\$948,549	\$930,010	\$921,872
ACTUAL EMPLOYER CONTRIBUTION	1,018,163	1,019,084	1,021,261	996,478	969,674
ANNUAL CONTRIBUTION DEFICIENCY (EXCESS)	\$(73,284)	\$(68,063)	\$(72,712)	\$(66,468)	\$(47,802)
COVERED PAYROLL	\$5,999,231	\$6,038,229	\$6,022,533	\$5,904,827	\$5,834,687
ACTUAL CONTRIBUTIONS AS A PERCENTAGE OF COVERED PAYROLL	16.97%	16.88%	16.96%	16.88%	16.62%
Mississippi Highway Safety Patrol Retirement System					
CONTRACTUALLY REQUIRED EMPLOYER CONTRIBUTION	\$14,430	\$14,431	\$14,025	\$13,226	\$13,595
ACTUAL EMPLOYER CONTRIBUTION	15,128	14,809	14,755	13,695	13,500
ANNUAL CONTRIBUTION DEFICIENCY (EXCESS)	\$(698)	\$(378)	\$(730)	\$(469)	\$95
COVERED PAYROLL	\$29,555	\$28,845	\$27,380	\$25,505	\$25,554
ACTUAL CONTRIBUTIONS AS A PERCENTAGE OF COVERED PAYROLL	51.19%	51.34%	53.89%	53.70%	52.83%
Supplemental Legislative Retirement System					
CONTRACTUALLY REQUIRED EMPLOYER CONTRIBUTION	\$506	\$513	\$508	\$508	\$519
ACTUAL EMPLOYER CONTRIBUTION	513	522	514	511	514
ANNUAL CONTRIBUTION DEFICIENCY (EXCESS)	\$(7)	\$(9)	\$(6)	\$(3)	\$5
COVERED PAYROLL	\$6,833	\$6,928	\$6,862	\$6,861	\$6,918
ACTUAL CONTRIBUTIONS AS A PERCENTAGE OF COVERED PAYROLL	7.51%	7.53%	7.49%	7.45%	7.43%

There are no nonemployer contributing entities in the plan reporting entity. See notes to Required Supplementary Information.

REQUIRED SUPPLEMENTARY INFORMATION SCHEDULE OF EMPLOYER CONTRIBUTIONS (CONTINUED) - LAST 10 FISCAL YEARS -

[in thousands] [unaudited]

Public Employees' Retirement System	2013	2012	2011	2010	2009
CONTRACTUALLY REQUIRED EMPLOYER CONTRIBUTION	\$835,321	\$735,022	\$687,016	\$699,824	\$657,048
ACTUAL EMPLOYER CONTRIBUTION	881,847	768,914	723,836	731,544	713,569
ANNUAL CONTRIBUTION DEFICIENCY (EXCESS)	\$(46,526)	\$(33,892)	\$(36,820)	\$(31,720)	\$(56,521)
COVERED PAYROLL	\$5,823,578	\$5,857,789	\$5,684,624	\$5,763,556	\$5,831,864
ACTUAL CONTRIBUTIONS AS A PERCENTAGE OF COVERED PAYROLL	15.14%	13.13%	12.73%	12.69%	12.24%
Mississippi Highway Safety Patrol Retirement System					
CONTRACTUALLY REQUIRED EMPLOYER CONTRIBUTION	\$13,098	\$12,257	\$11,385	\$11,096	\$11,668
ACTUAL EMPLOYER CONTRIBUTION	13,366	12,044	11,494	12,598	12,274
ANNUAL CONTRIBUTION DEFICIENCY (EXCESS)	\$(268)	\$213	\$(109)	\$(1,502)	\$(606)
COVERED PAYROLL	\$25,816	\$25,670	\$24,872	\$26,353	\$26,390
ACTUAL CONTRIBUTIONS AS A PERCENTAGE OF COVERED PAYROLL	51.77%	46.92%	46.21%	47.80%	46.51%
Supplemental Legislative Retirement System					
CONTRACTUALLY REQUIRED EMPLOYER CONTRIBUTION	\$509	\$504	\$464	\$452	\$449
ACTUAL EMPLOYER CONTRIBUTION	503	490	457	446	458
ANNUAL CONTRIBUTION DEFICIENCY (EXCESS)	\$6	\$14	\$7	\$6	\$(9)
COVERED PAYROLL	\$6,695	\$6,872	\$6,810	\$6,605	\$6,803
ACTUAL CONTRIBUTIONS AS A PERCENTAGE OF COVERED PAYROLL	7.51%	7.13%	6.71%	6.75%	6.73%

There are no nonemployer contributing entities in the plan reporting entity. See notes to Required Supplementary Information.

REQUIRED SUPPLEMENTARY INFORMATION SCHEDULE OF INVESTMENT RETURNS - LAST 10 FISCAL YEARS -

[unaudited] 2018 2017 2016 2015 2014 ANNUAL MONEY-WEIGHTED RATE OF RETURN, NET OF INVESTMENT EXPENSE 9.17% 14.53% 0.69% 3.05% 18.37%

Schedule is intended to show information for 10 years. Additional years will be displayed as they become available. See notes to RSI.

Notes to Required Supplementary Schedules JUNE 30, 2018

Note 1: Schedule of Changes in the Net Pension Liability & Related Ratios

> Note 2: Schedule of Employer Contributions

The total pension liabilities presented in these schedules were provided by the System's actuarial consultants, Cavanaugh Macdonald Consulting, LLC. The net pension liability is measured as the total pension liability less the amount of the fiduciary net position for PERS, MHSPRS, and SLRP.

The required employer contributions and amount of those contributions actually made are presented in this 10-year schedule.

PERS

A slight increase in the employer contribution rate was implemented in fiscal year 2010, from 11.85 percent to 12.00 percent. In fiscal year 2010, the actuary's recommended employer contribution rate was to increase from 12.00 percent to a projected 13.56 percent for fiscal year 2011. In lieu of the employer contribution rate increase, the member contribution rate was increased to 9.00 percent for fiscal year 2011 where it remains, which produced a decrease in employer normal cost. The reduction in normal cost, coupled with favorable investment experience, resulted in a revised recommended employer contribution rate from 13.56 percent to 12.93 percent, which became effective January 1, 2012. The employer contribution rate increased in fiscal year 2013 to 14.26 percent and in fiscal year 2014, the Board implemented a revised funding policy aimed at stabilizing the employer contribution rate, which was set at 15.75 percent. At its June 26, 2018 meeting, the Board of Trustees voted to increased the employer contribution rate from 15.75 percent to 17.40 percent effective July 1, 2019. Along with this increase, the Board revised its funding policy described in greater detail on page 60 of the Financial Section.

MHSPRS

The employer contribution rate was 30.30 percent in fiscal year 2009. The employee contribution rate was raised from 6.50 percent to 7.25 percent for fiscal year 2009, where it has remained. On January 1, 2012, the employer contribution rate increased to 35.21 percent and was raised to 37.00 percent effective July 1, 2012. Effective July 1, 2018, the employer contribution rate was increased by the MHSPRS Administrative Board from 37.00 percent to 49.08 percent. Motor vehicle and driver's license reinstatement fees augment employer contributions. The amount varies each year depending on activity, with \$3.5 million collected for fiscal year 2018. An actuarial contribution rate. The change took place January 1, 2012, bringing the contribution rate from 30.30 percent to 35.21 percent and causing a deficiency of \$213 thousand in actual contributions compared with the contractually required employer contribution. In 2014, a deficiency occurred due to actual contributions of motor vehicle fees, which amounted to \$2.6 million, being lower than anticipated while estimated contributions were \$3.6 million. From 2015 forward, employer contributions have been in excess of contractually required contributions.

SLRP

The employer contribution rate, which was 6.33 percent, changed to 6.65 percent effective July 1, 2006. The contribution rate remained constant until January 1, 2012, when it was increased to 7.40. The employee contribution rate has remained at 3.00 percent. Small annual contribution deficiencies occurred yearly from 2010 to 2014. An excess of actual employer contributions over contractually required contributions has existed since 2015. SLRP is a small plan with a relatively fixed number of members.

Note 3: Schedule of Investment Returns	The annual money-weighted rate of return on investments is calculated as the internal rate of return on plan investments, net of plan investment expense. A money-weighted rate of return expresses investment performance, net of plan investment expense, adjusted for the changing amounts actually invested. The investment assets of the defined benefit plans administered by the System are combined in a comingled investment pool. Each plan owns an equity position in the pool in accordance with its ownership percentage. The annual money-weighted rate of return is, therefore, approximately the same for PERS, MHSPRS, and SLRP.
Note 4: Actuarial Assumptions	The information presented in the required supplementary schedules was used in the actuarial valuation for purposes of determining the contractually required employer contribution rates. The assumptions and methods used for the June 30, 2018, actuarial valuation were recommended by the actuary and adopted by the Board.

EFFECTS OF CURRENT YEAR CHANGES IN PLAN REQUIREMENTS

Plan requirements may be affected by changes in actuarial assumptions, benefit provisions, plan provisions, actuarial funding methods, or other significant factors.

The following amendments were incorporated into the actuarial valuations:

- » PERS
 - » The employer contribution rate, or Fixed Contribution Rate (FCR), of 17.40 percent of annual compensation for the fiscal year ending June 30, 2020, was approved by the PERS Board of Trustees at the June, 2018 Board meeting. The new funding policy for the System was adopted by the Board at the same meeting. The funding policy sets the funding goals, objectives, and metrics for possible changes to the FCR for prospective fiscal years.
 - » There have been no changes in actuarial assumptions and methods since the last valuation.
 - » There have been no changes to benefit or plan provisions since the last valuation.
- » MHSPRS
 - » Based on the funding policy adopted by the PERS Board of Trustees, the PERS Board and the MHSPRS Administrative Board adopted an employer contribution rate of 49.08 percent of annual compensation effective July 1, 2018, and the amortization period is to be calculated on an open basis.
 - » There have been no changes in actuarial assumptions and methods since the last valuation.
 - » There have been no changes to benefit or plan provisions since last valuation.
 - » Due to Senate Bill No. 2659 enacted in 2004 and House Bill No. 1015 enacted on April 25, 2013, additional contributions are being made to the System and are expected to continue in the future. In the June 30, 2018 valuation report, the actuary decreased the expected contributions from these sources from \$3,800,000 to \$3,500,000 based on actual monies received and the expectation from these sources in the future.
- » SLRP
 - » The valuation results are developed based upon the employer contribution rate of 7.40 percent of payroll, in effect since January 1, 2012.
 - » There have been no changes in actuarial assumptions and methods since the last valuation.
 - » There have been no changes to benefit or plan provisions since last valuation.

The contractually required employer contribution rates in the Schedules of Employer Contributions are calculated as of June 30 2016, two years prior to the end of the fiscal year in which contributions are reported. The following actuarial methods and assumptions were used to determine contribution rates reported in that schedule:

	PERS	MHSPRS	SLRP
ACTUARIAL COST METHOD	Entry age	Entry age	Entry age
AMORTIZATION METHOD	Level percentage of payroll, open	Level percentage of payroll, open	Level percentage of payroll, open
REMAINING AMORTIZATION PERIOD	36.6 years	42.9 years	22.6 years
ASSET VALUATION METHOD	5-year Smoothed Market	5-year Smoothed Market	5-year Smoothed Market
Actuarial Assumptions:			
INVESTMENT RATE OF RETURN*	7.75%	7.75%	7.75%
SALARY INCREASE	3.75-19.00%	4.25-9.31%	3.75%
PRICE INFLATION	3.00%	3.00%	3.00%

*Net of pension plan investment expense, including inflation.

SCHEDULE 1 SCHEDULE OF ADMINISTRATIVE EXPENSES AND DEPRECIATION - FOR THE YEAR ENDED JUNE 30, 2018 -

[in thousands]

SALARIES & WAGES\$7,370EMPLOYEE BENEFITS2,367TRAVEL & SUBSISTENCE65TOTAL PERSONAL SERVICES9,802
TRAVEL & SUBSISTENCE 65 TOTAL PERSONAL SERVICES 9,802
TOTAL PERSONAL SERVICES 9,802
Contractual Services:
PROFESSIONAL SERVICES (SEE SCHEDULE 2) 1,921
NEW INFORMATION SYSTEM 3,189
DATA PROCESSING, COMMUNICATIONS, TRAINING, & LICENSING 744
UTILITIES 213
REPAIR & MAINTENANCE OF BUILDING & EQUIPMENT
OTHER CONTRACTUAL SERVICES 191
RENT OF BUILDING SPACE & OFFICE EQUIPMENT
BANK CHARGES 151
TOTAL CONTRACTUAL SERVICES 6,792
Commodities:
OFFICE SUPPLIES & EXPENDABLE
REPAIR PARTS
REPAIR PARTS PRINTING, BINDING, & PADDING 97
REPAIR PARTS
PRINTING, BINDING, & PADDING 97
PRINTING, BINDING, & PADDING 97 OFFICE EQUIPMENT (NOT CAPITALIZED) 54
PRINTING, BINDING, & PADDING OFFICE EQUIPMENT (NOT CAPITALIZED) BUSINESS MEETING SUPPLIES
REPAIR PARTS PRINTING, BINDING, & PADDING OFFICE EQUIPMENT (NOT CAPITALIZED) BUSINESS MEETING SUPPLIES FUEL
REPAIR PARTS PRINTING, BINDING, & PADDING OFFICE EQUIPMENT (NOT CAPITALIZED) 54 BUSINESS MEETING SUPPLIES 13 FUEL 44 TOTAL COMMODITIES 283
REPAIR PARTS REPAIR PARTS PRINTING, BINDING, & PADDING 97 OFFICE EQUIPMENT (NOT CAPITALIZED) 54 BUSINESS MEETING SUPPLIES 13 FUEL 44 TOTAL COMMODITIES 283 TOTAL ADMINISTRATIVE EXPENSES 16,877
REPAIR PARTS PRINTING, BINDING, & PADDING OFFICE EQUIPMENT (NOT CAPITALIZED) BUSINESS MEETING SUPPLIES FUEL FUEL TOTAL COMMODITIES Depreciation:
REPAIR PARTS REPAIR PARTS PRINTING, BINDING, & PADDING 97 OFFICE EQUIPMENT (NOT CAPITALIZED) 54 BUSINESS MEETING SUPPLIES 13 FUEL 44 TOTAL COMMODITIES 16,877 Depreciation: 4,483

SCHEDULE 2 SCHEDULE OF INVESTMENT MANAGERS' FEES, INVESTMENT GLOBAL OUT-OF-POCKET FEES, AND PROFESSIONAL SERVICE FEES - FOR THE YEAR ENDED JUNE 30, 2018 -

Investment Managers' Fees:	AMOUNT	Investment Managers' Fees (Continued):	AMOUNT
EAGLE CAPITAL MANAGEMENT LLC	\$6,380	WESTBROOK PARTNERS - FUND X	\$499
PRINCIPAL GLOBAL INVESTORS LLC	5,064	INVESCO LLC - FUND IV	453
J.P. MORGAN INVESTMENT MANAGEMENT, INC.	4,814	AEW CAPITAL MANAGEMENT, LP - FUND VIII	400
EPOCH INVESTMENT PARTNERS, INC.	4,392	ANGELO GORDON & COMPANY - FUND IV	375
LONGVIEW PARTNERS LIMITED	4,018	HEITMAN LLC - FUND III	355
FISHER INVESTMENTS	3,982	BLACKROCK INSTITUTIONAL TRUST COMPANY, NA - EAFE	298
MARATHON - LONDON ORION HOUSE	3,621	AEW CAPITAL MANAGEMENT, LP - FUND VII	237
ARROWSTREET CAPITAL, LP	3,423	AEW CAPITAL MANAGEMENT, LP - FUND VI	212
HARDING LOE VNER LP	3,420	NORTHERN TRUST GLOBAL INVESTMENT	198
UBS REALTY INVESTORS, LLC - CORE REAL ESTATE	3,265	ANGELO GORDON & COMPANY - FUND III	151
ACADIAN ASSET MANAGEMENT LLC	3,176	NORTHERN TRUST GLOBAL INVESTMENT - EAFE	113
WELLINGTON MANAGEMENT COMPANY, LLP - SMALL CAP EQUITY	2,871	BLACKROCK INSTITUTIONAL TRUST COMPANY, NA - DEBT INVESTMENTS	91
BAILLIE GIFFORD & COMPANY	2,854	STATE STREET GLOBAL ADVISORS	63
RIVERBRIDGE PARTNERS, LLC	2,745	NORTHERN TRUST GLOBAL INVESTMENT - BB.AGG	58
THE BOSTON COMPANY ASSET MANAGEMENT, LLC	2,532	ANGELO GORDON & COMPANY - FUND II	29
WELLINGTON MANAGEMENT COMPANY, LLP - EMERGING MARKETS DEBT INVESTMENTS	2,524	NORTHERN TRUST GLOBAL INVESTMENT - RUSSELL 1000	23
LAZARD ASSET MANAGEMENT	2,381		8
ARTISAN PARTNERS LP - MID CAP EQUITY	2,348	PRIVATE EQUITY MANAGERS: GCM GROSVENOR & PATHWAY CAPITAL MANAGEMENT	13,090
WELLINGTON MANAGEMENT COMPANY, LLP - MID CAP EQUITY	2,276	TOTAL INVESTMENT MANAGERS' FEES*	\$104,777
WEDGEWOOD PARTNERS, INC.	2,208	Investment Global Out-Of-Pocket Fees:	
MONDRIAN INVESTMENT PARTNERS, INC.	2,192	BANK OF NEW YORK MELLON	\$685
FIDELITY INSTITUTIONAL ASSET MANAGEMENT LLC	2,163	TOTAL INVESTMENT MANAGERS' FEES AND INVESTMENT GLOBAL OUT-OF-POCKET FEES*	\$105,462
UBS REALTY INVESTORS, LLC - VALUE ADDED REAL ESTATE	1,769	Securities Lending Fees:	
LOOMIS SAYLES & COMPANY, LP	1,684	BANK OF NEW YORK MELLON	\$3,437
PACIFIC INVESTMENT MANAGEMENT COMPANY - GLOBAL	1,616	Professional Service Fees:	
ALLIANCEBERNSTEIN L.P.	1,570	INVESTMENT MANAGEMENT CONSULTANT- CALLAN ASSOCIATES, INC., FACTSET RESEARCH	\$672
DIMENSIONAL FUND ADVISORS, INC SMALL CAP EQUITY	1,534	SYSTEMS, INC., AND KLARITYFX AUDIT–EIDE BAILLY LLC; GABRIEL ROEDER SMITH & CO.	358
PRUDENTIAL INVESTMENT MANAGEMENT, INC.	1,342	ACTUARY–CAVANAUGH MACDONALD CONSULTING, LLC	262
COHEN & STEERS CAPITAL MANAGEMENT, INC.	1,237	MEDICAL FEES–CLINICS, LABS	241
HANCOCK NATURAL RESOURCE GROUP	1,126	MAILING SERVICES-POSTAGE SAVERS, INC.; RR DONNELLEY	240
CENTERSQUARE INVESTMENT MANAGEMENT	873	LEGAL-OUTSIDE–CHAPMAN & CUTLER, LLP; ICE MILLER, LLP	58
PACIFIC INVESTMENT MANAGEMENT COMPANY	789	EXECUTIVE SEARCH-KORN FERRY	50
MANULIFE ASSET MANAGEMENT	788	GRAPHIC DESIGN-COMMUNICATION ARTS	29
T.A. ASSOCIATES REALTY - FUND X	597	VOTING SERVICES-ELECTION AMERICA	11
T.A. ASSOCIATES REALTY - FUND XI	550	TOTAL PROFESSIONAL SERVICE FEES	\$1,921

*Fees are subject to estimation.

SCHEDULE 3 SCHEDULE OF INVESTMENTS DUE TO MRS FROM PERS - JUNE 30, 2018 -

[in thousands]

Due To MRS:	AMOUNT
BILOXI MUNICIPAL	\$6,351
BILOXI FIRE & POLICE	2,535
CLARKSDALE FIRE & POLICE	1,453
CLINTON FIRE & POLICE	8,886
COLUMBUS FIRE & POLICE	975
GREENVILLE FIRE & POLICE	3,015
GREENWOOD FIRE & POLICE	2,923
GULFPORT FIRE & POLICE	9,207
HATTIESBURG FIRE & POLICE	21,026
JACKSON FIRE & POLICE	53,817
LAUREL FIRE & POLICE	4,242
MCCOMB FIRE & POLICE	917
MERIDIAN MUNICIPAL	3,316
MERIDIAN FIRE & POLICE	9,413
NATCHEZ FIRE & POLICE	1,870
PASCAGOULA FIRE & POLICE	7,402
TUPELO FIRE & POLICE	5,506
VICKSBURG FIRE & POLICE	10,544
YAZOO CITY FIRE & POLICE	418
TOTAL INVESTMENTS DUE TO MRS	\$153,816

Excludes certain accrued amounts.

SCHEDULE 4 PUBLIC EMPLOYEES' RETIREMENT SYSTEM OF MISSISSIPPI STATEMENT OF CHANGES IN ASSETS AND LIABILITIES—AGENCY FUND - FOR THE YEAR ENDED JUNE 30, 2018 -

[in thousands]

FLEXIBLE BENEFITS CAFETERIA PLAN Assets:	BALANCE JUNE 30, 2017	ADDITIONS	DEDUCTIONS	BALANCE JUNE 30, 2018
CASH	\$18	\$53	\$48	\$23
TOTAL ASSETS	\$18	\$53	\$48	\$23
Liabilities:				
ACCOUNTS PAYABLE	\$15	\$-	\$-	\$15
FUNDS HELD FOR OTHERS	3	53	48	8
TOTAL LIABILITIES	\$18	\$53	\$48	\$23

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ENDURANCE

Malaclemys terrapin pileate (Mississippi Diamondback Terrapin)

Investment



Providing Benefits for Life

October 4, 2018

Dear Members,

As the books close on another successful fiscal year for the System, I would like to take this opportunity to highlight for you the FY 2018 investment results and provide a brief overview of the events and activities that influenced financial markets throughout the year.

Investment Results:

- For the year ending June 30, 2018, the portfolio returned 9.48%, topping the System's 7.75% return target;
- Longer term, the portfolio had 3-, 5-, and 10-year returns of 8.38%, 9.32% and 7.45%, respectively;
- The 1-year return of 9.48% exceeded the returns of 72% of the System's peer group comprised of public pension plans with assets greater than \$10 billion;
- Assets of the System totaled \$28.4 billion as of June 30, an increase of \$1.76 billion over the previous years' portfolio value;
- System ranked as the 68th largest pension and retirement savings plan in the country; and
- FY 2018 investment fees and expenses paid totaled 0.375% of assets, which equates to \$0.375 paid for every \$100 of assets managed. The 1-year return net of fees was 9.06%.

As of June 30, 2018, the System's portfolio was positioned to match its strategic target asset allocation of 61% US and non-US public equities, 8% private equity, 20% fixed income, 10% real estate, and 1% dedicated cash equivalent investments.

FY2018 Financial Market Highlights:

As the fiscal year began, US inflation growth was benign, while gross domestic product (GDP) numbers showed slow but steady improvement driven primarily by increased consumer spending. Although unemployment levels were near historic lows, the lack of broad-based wage growth helped keep a lid on US inflation. Eight years into a bull equity market, strong investor appetite for riskier assets continued with most of the attention centering on the "FAANG" companies of Facebook, Amazon, Apple, Netflix, and Google. Investor focus on this concentrated group of US technology companies helped push the S&P 500 Index to a record high. As the first quarter progressed expectations of US tax cuts gained momentum, investors shifted their attention toward smaller, more US-focused companies. This move resulted in small cap returns outpacing those of larger cap names for the period. Political calm and positive economic growth in both Europe and China helped international equity markets outperform the US as the first quarter came to a close.

H. Ray Higgins, Jr. Board of Trustees: Executive Director	Kelly Breland State Employees Chair	Brian Rutledge Institutions of Higher Learning Vice Chair	Bill Benson County Employees	Lee Childress Public Schools, Community/Jr. Colleges	George Dale <i>Retirees</i>	
		Lynn Fitch <i>State Treasurer</i>	Chris Howard <i>State Employees</i>	Kimberly Hanna <i>Municipal</i> <i>Employees</i>	Randy D. McCoy <i>Retirees</i>	Drew Snyder Gubernatorial Appointee

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Though recovering to 2.33% by the end of the period, the 10-year treasury yield dropped to 2.0% during the first quarter as tensions escalated between the US and North Korea. In addition, the period saw the US Federal Reserve (Fed) announce the end of its bond purchasing program, signaling the start of an eventual withdrawal of the Quantitative Easing (QE) program that had helped stabilize the US financial markets after the 2008 crisis.

During the second quarter, Congress passed tax reform legislation that promised to financially benefit both corporations and their shareholders. In equity markets, the dominance of the technology companies continued to be felt. By quarterend, the sector represented 24% of the market value of the S&P 500 Index. The impact of the tech sector on equity markets was not limited to the US. Strong returns posted by Chinese and South Korean technology companies drove emerging market performance, which outpaced other global regions during the quarter. During the period the European Central Bank (ECB) announced the start of the rollback of their bond purchasing activities, signaling the eventual end of their version of QE. Meanwhile the Fed moved ahead on the path of interest rate normalization, raising rates 25 basis points in December. This resulted in a flattening of the yield curve, with the benchmark 10-year Treasury yield ending the quarter at 2.50%.

As the fiscal year moved ahead, US equity market returns, still driven by strong performance from the FAANG stocks, reached new highs. In early February, however, things changed when the Dow Jones Industrial Average dropped 1,100 points in one day, signaling the return of volatility to the markets. This was followed by news of customer data breaches at both Facebook and Google. As calls for greater regulatory scrutiny of these firms rose, investors began reducing exposure to the companies. As the tech sector sold off, equity market returns declined, and US investors experienced their first negative quarter since 2015. On the international front, trade tensions escalated, resulting in negative returns across developed markets. For the quarter, only emerging market equities managed to post a positive return. Continued GDP growth, stronger employment levels during the quarter, and signs of upward wage pressure set the stage for another 25-basis point interest rate hike by the Fed late in the period. This action coupled with the tech sector slide and global trade war fears, made the third quarter of FY 2018 a challenging period for investors.

With the fiscal year nearing its close, the positive effect of the US tax cuts began to move through the economy, resulting in stronger consumer confidence. US export growth surged ahead of the implementation of \$50 billion worth of tariffs on Chinese goods scheduled for late June. All this activity worked to push US GDP growth to its highest level since 2014 and drove US equity market returns to positive territory by the end of the fiscal year. Though tariff threats proved positive for US equity markets, the opposite effect was felt throughout the rest of the world. The prospect of slower growth in China weighed heavily on both the developed and emerging equity markets, resulting in negative returns for the quarter.

At the close of the fiscal year, few indications of a significant rise in inflation were present; however, signs of upward pressures on wages continued to surface resulting from historically low US unemployment levels. In an effort to preempt a noticeable rise in inflation, the Fed raised rates in June, resulting in the 10-year treasury yield closing the year at 3.0%. The yield curve remained flat with only a 33 basis point spread between 2-year and 10-year treasuries.

FY2018 Summary

Over the course of the 2018 fiscal year, the System's investment returns were affected by US tax cuts, tech stocks, threats of trade wars, and actions taken by the Fed (including the wind-down QE and interest rates increase totaling 0.75%, but through it all, the portfolio experienced positive returns in all four quarters of the year. Because both equity and bond markets appeared to be fully valued for most of the year, PERS focused its efforts on positioning the portfolio in line with the System's strategic asset allocation targets. This well-diversified portfolio structuring made it possible for the System to not only meet, but to exceed its 7.75% target return by 1.75% for the year.

While the System's investments have posted strong returns over the last two fiscal years, the investment environment ahead will likely be a difficult one in which to achieve such levels of performance. With this in mind, the focus is on evaluating how best to position the portfolio to successfully overcome the investment challenges ahead. Together with the PERS Board of Trustees, I will continue to work diligently to insure the assets of the System are managed in a prudent manner so as to assure the portfolio achieves its target return over the long term. You may rest assure the effect of the

investment returns on the financial stability of the System is at the forefront of every decision made with respect to the System's assets.

Walt Disney once said, "Times and conditions change so rapidly that we must keep our aim constantly on the future." This statement certainly rings true with respect to managing the System's portfolio, and while I am proud of the investment results achieved in FY 2018, they are yesterday's news. Our focus is now on the investment horizon and on working to prepare for the investment challenges ahead in order to insure the System is both sound and secure for all current and future members. It has truly been my privilege to work with the PERS Board of Trustees and to serve the membership of the System during FY 2018.

Respectfully,

Louis Strigle

Chief Investment Officer

Public Employees' Retirement System of Mississippi 429 Mississippi Street, Jackson, MS 39201-1005 601.359.3589 800.444.PERS www.pers.ms.gov

Callan

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September 21, 2018

Members of the Board:

Callan LLC is pleased to present the Public Employees' Retirement System of Mississippi (PERS) results for fiscal year ended June 30, 2018. During the fiscal year, most markets continued their positive performance as the recovery from the Global Financial Crisis continued. Domestic equities continued positive performance, with the broad market returning 14.78%, and smaller capitalization companies leading versus larger companies overall. Growth sectors fueled this performance with select names in the information technology sector seeing significant increases. International equity markets also produced positive returns albeit at a lower level than domestic markets with a return of 11.43% as a stronger dollar detracted from returns for U.S. investors. Domestic fixed income ended the fiscal year slightly negative, down 0.40%, as the Fed continued to raise the fed funds rate over the time period due to positive returns. Private Equity and Real Estate continued to add return to investors as well.

As of June 30, 2018, the Fund's market value totaled \$28.4 billion, an increase in assets during the fiscal year. During the past twelve month period:

- Domestic equity markets advanced. The Russell 3000 Index, an index of domestic stocks covering capitalizations, increased 14.78%.
- International equity markets reversed from the prior year and increased 11.14%, as measured by the MSCI ACWI ex US IMI Index (All Country World Index ex United States).
- The domestic fixed income market produced a return of -0.40%, as measured by the Bloomberg Aggregate Bond Index.
- Private real estate as measured by the NCREIF Property Index returned 7.19%.

Within this environment, the Fund returned 9.48% during the twelve month period ended June 30, 2018, outperforming its benchmark by 0.43%. Over the trailing three-year period, the Fund outperformed its benchmark by 0.54% with an annualized return of 8.38%, and by 0.28% over the trailing five-year period with an annualized return of 9.32%.

The Fund continues to evolve through an ongoing review of the asset allocation and asset class components. An Asset-Liability Study and Real Assets Structure Review were completed during the 2018 fiscal year, resulting in an elimination of a strategic allocation to Timber. A Fixed Income Structure Study is scheduled for the upcoming year.

The Public Employees' Retirement System of Mississippi (PERS) maintains an appropriately diversified strategy, designed to maximize return with an acceptable risk level. Callan supports the Fund's ongoing efforts to enhance investment and its continued due diligence activities.

Sincerely,

Un P. Jacken

John P. Jackson, CFA Senior Vice President Callan LLC

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Defined Benefit Plans— Report on Investments Fiscal Year 2018 The Public Employees' Retirement System of Mississippi is committed to insuring secure retirement benefits are available for its current and future retirees through the prudent investment of its assets.

The Board of Trustees serves as the ultimate decision-making body for the Public Employees' Retirement System of Mississippi. As fiduciaries, the trustees rely on the following principles to guide them in making investment-related decisions.

- » ensure adequate liquidity is available when needed;
- » preserve the long-term corpus of the fund;
- » maximize total return within prudent levels of risk; and
- » to always act in the exclusive interest of the members of the System.

Facing each year's unique investment challenges and opportunities, the PERS Board and investment staff remain clearly focused on the fundamental principle that investing for the future of our membership is a long-term commitment, and the prudent management of the System's assets demands constant attention and specialized expertise. The PERS Board is committed to maintaining a well-diversified portfolio designed to minimize risks and maximize returns over the long term. The goal of the investment program is to ensure adequate funding is available to meet all current and future pension obligations.

Investment Policy Summary

INVESTMENT OBJECTIVES

The primary objective of the investment program is to ensure that PERS meets its financial responsibility to provide stable benefits for its members. As such the investment program strives to:

- » achieve an annual real rate of return of at least 4.75 percent and a nominal return that meets or exceeds the actuarial assumed rate of return on investments. Currently that rate is 7.75 percent
- » protect the investment portfolio from severe extended declines in asset value during periods of adverse market conditions, by prudent diversification of assets
- » ensure adequate liquidity is available to meet all benefit payments and other cash requirements
- » ensure total portfolio risk is controlled through diversification by asset class, investment approach and by individual investments within each asset class

INVESTMENT CONSTRAINTS

- » Legal-The specific types of investments in which the System is authorized to invest are enumerated in Section 25-11-121 of the Mississippi Code, Annotated (1972, as amended).
- » Time Horizon-Acknowledging the impact of annual investment returns on the actuarial evaluation, PERS views the appropriate investment time horizon for a public pension plan to be thirty (30) years.
- » Liquidity-Annual liquidity requirements must be considered when designing the portfolio structure.

RISK CONTROLS

PERS' greatest risk is that plan assets will not support liabilities over the long term. To help mitigate this concern the PERS Board conducts annual actuarial valuations to evaluate the funded status of the System. Additionally, at least every six years, an independent external audit of the actuary is conducted to ensure the assumptions and calculation methods used are appropriate for properly computing the liabilities of the System.

PORTFOLIO REVIEW AND EVALUATION

Quarterly, the Board reviews and evaluates reports on the investment performance of the PERS' portfolio. These reviews also include the performance of each investment manager portfolio. Performance reports are generated by the investment consultant and include performance data, asset allocation and peer group comparison information. The Board places greater emphasis on long-term rather than short-term results.

The Board recognizes the fact that investments are subject to short-term volatility, so it is critical that a long-term investment focus be maintained. This perspective prevents ad hoc revisions to investment philosophy and policies in reaction to either speculation or short-term market fluctuations. In order to maintain this long-term view the Board utilizes the following formal review schedule:

FORMAL REVIEW AGENDA ITEM	REVIEW SCHEDULE
Total Fund Performance	Quarterly
Broad Asset Allocation	At least every five years
Manager Structure	At least every three years
Investment Policy	Annually

Strategic Asset Allocation Policy

The primary method utilized in achieving the investment return objectives is the allocation of assets. The Board adopts an asset allocation policy as the framework to insure the assets are invested in a prudently managed and well diversified portfolio designed to meet the established return targets. The strategic target allocation below is intended to accomplish the Board's objectives over time. In addition to the target allocations the Board has established target ranges for each asset class. These ranges provide the Board and staff the latitude to exercise management discretion in a tactical manner as appropriate.

STRATEGIC ASSET ALLOCATION	TARGET	REBALANCING RANGES
Public Equity	61%	±5%
Private Equity	8%	±5%
Real Estate	10%	±5%
Fixed Income	20%	±5%
Cash Equivalents	1%*	±1%

*Cash equivalents will consist of the assets in the Short-Term account used for benefit payments.

The current long-term performance measurement for each asset class is as follows:

ASSET CLASS	BENCHMARK
Public Equities	MSCI ACWI IMI Index
Private Equity	S&P 500 Index + 3%
Fixed Income	Bloomberg Barclays US Aggregate Index
Real Estate	NCREIF Property Index
Cash Equivalents	30-day U.S. T-bills

ROLES AND RESPONSIBILITIES

Board of Trustees

PERS' investment activities are governed by a ten-member Board of Trustees which is responsible for directing the investment program in accordance with the laws of the State of Mississippi. As fiduciaries of a public pension fund the PERS trustees rely heavily on internal staff, consultants, actuaries and other contracted service providers to assist them in this process.

The Board is responsible for:

- » approval of long-term risk tolerance and asset allocation decisions
- » approval of all formal investment policies
- » approval of the investment structure within the asset allocation policy structure
- » the retention and termination of external managers, consultants and custodial banks
- » annually approving the PERS Investment Policy Statement

Executive Director

The Board employs the Executive Director who is responsible for ensuring PERS has in place the appropriate resources, training opportunities, and compensation structures to attract and retain a competent and qualified investment staff.

Chief Investment Officer

The Chief Investment Officer (CIO), as head of the investment staff, is charged with maintaining the integrity of the investment program. This responsibility includes working directly with the Board on the development of investment policy, asset allocation decisions, portfolio structure, investment manager/consultant selection and termination, and custodian selection.

Investment Staff

The investment staff is responsible for insuring the Board's investment policies are implemented, and for oversight of the external investment managers. The staff's primary responsibilities include:

- » monitoring investment manager's compliance to the guidelines established in their Investment Management Agreements (IMA) with PERS
- » meeting and/or communicating with external managers quarterly to review investment strategies and results
- » managing the short-term account assets to ensure monthly benefit payrolls are funded

	Investment Consultant The investment consultant is charged with assisting staff in providing advice and recommendations to the Board on all investment matters, and to discharge their investment duties solely in the interest of the PERS members and benefit recipients. The consultant's responsibility is to work with the Board and staff to assist in the prudent management of the investment process.
	The consultant will attend all investment related meetings of the Board and will provide an independent perspective on PERS' investment goals, structure performance and managers. The consultant will review asset allocation, manager structure and performance and make recommendations to the Board as appropriate. The consultant assists in the manager search process. The consultant will also assist in keeping the Board informed as to changes within the pension and investment communities that could affect PERS.
	<i>Investment Managers</i> External investment managers are retained for their skill and expertise in managing a specific segment of the PERS total portfolio. Investment managers are responsible for managing PERS' assets in compliance with the policies, guidelines and objectives included in their Investment Management Agreement with PERS.
	Investment managers will construct and manage investment portfolios which are consistent with the investment philosophy and disciplines for which they were hired. All investment managers provide periodic reporting as directed by the investment staff.
Investment Summary	As of June 30, 2018, the System's portfolio value totaled \$28.4 billion. The increase in value relative to the previous year's closing value of \$26.6 billion was driven by strong returns from both public and private equity investment returns. As is common in mature pension plans, the System's annual distributions again surpassed contributions made by employees and employers. For fiscal year 2018, contributions totaled \$1.6 billion, while the System paid out approximately \$2.8 billion to members and beneficiaries.
	ASSET ALLOCATION One of the most important decisions made by the Board of Trustees is that of determining the long-term asset allocation policy for the investment portfolio. The System's investment consultant conducts periodic asset/liability allocation studies that include consideration of projected future liabilities, expected risk, return, and correlations for various asset classes, and the System's statutory investment restrictions. The strategic asset allocation targets currently consist of 61.0 percent for public equities, a 20.0 percent target allocation for debt investments and a 1.0 percent allocation to cash equivalents. Real estate investments are targeted at 10.0 percent, while the target allocation for private equity is 8.0 percent.
	The asset allocation at year end, excluding investments purchased with securities lending cash collateral, was 61.0 percent public equities; 20.3 percent debt securities; 10.1 percent public and private real estate investments; 7.6 percent private equity, and 1.0 percent cash equivalents.

It is important to note that the asset allocation decision for a public pension is unique to the individual plan and is based on that plan's specific liability requirements, as well as any statutory investment restrictions under which the investment program must operate. As a result, the System's allocation could be somewhat different than that of other public pension plans. From time to time, these differences can result in significant differences in investment returns.

SECURITIES LENDING

The System's securities lending program is managed by its custodial bank, BNY Mellon. This program generates ancillary income by lending securities from the System's portfolio to securities dealers in return for a premium payment on loans collateralized by securities and earnings generated by the investment of cash collateral. All cash loans are secured by the receipt of collateral valued at 102.00 or 105.00 percent of the value of the loaned security, while non-cash loans are collateralized at 110.00 percent. In fiscal year 2018, the securities lending program generated approximately \$19.6 million* in additional revenue for the investment program.

*\$19.6 million were the earnings distributed for the fiscal year; \$17.1 million was the reported net income as required by Governmental Accounting Standards Board Statement No. 28.

Portfolio Performance Callan LLC is employed by the Board of Trustees as the System's investment consultant. Their services include calculating investment returns both for the total fund and for each of the investment managers retained to invest the System's assets. All returns are calculated by Callan using a time-weighted rate of return methodology based on portfolio market values determined by the System's custodial bank.

In a year of consistently strong equity market returns the PERS portfolio was well positioned to achieve success. The total portfolio gross return of 9.48 percent exceeded not only the 7.75 percent actuarial assumed rate of return but also topped the System's customized Target Policy benchmark's 9.05 percent return, and exceeded the returns of 72.00 percent of the funds in the Callan public funds >\$10 billion universe. The System's three-year total return of 8.38 percent beat the peer-universe median return of 7.56 percent, and the five-year return of 9.32 percent outpaced its policy benchmark and the returns of 86.00 percent of the funds in the peer universe. For the 10 years ended June 30, 2018, the portfolio returned 7.45 percent, outperforming the Target Policy benchmark return of 6.87 percent and the peer-universe median return of 6.82 percent.

The System's portfolio structure is designed to achieve success over the long term. While challenging events in the global financial markets often impact the portfolio's shorter term returns, over longer periods the System has been successful in achieving its assumed target return of 7.75 percent. This is evidenced by the 25- and 30-year returns of 7.84 and 8.55 percent, respectively.

PUBLIC EQUITY PORTFOLIO

The System's domestic equity portfolio returned 14.84 percent for the fiscal year, outperforming the benchmark Russell 3000 Index return of 14.78 percent and ranking in the 43rd percentile of the Callan Public Plan domestic equity universe. The developed international equity portfolio saw returns of 6.88 percent, which essentially matched the benchmark MSCI EAFE Index return of 6.84 percent for the year. Global equities posted returns of 13.34 percent, exceeding the custom benchmark return of 11.14 percent. The only area within the equity portfolio to underperform its benchmark index was the emerging markets portfolio which returned 4.09 percent, underperforming the MSCI Emerging Markets Index return of 8.20 percent for the year.

Combining all segments of the public equity portfolio, the program returned 11.58 percent for the fiscal year outperforming the 11.14 percent return of the benchmark MSCI All Country World Index - Investable Markets Index (ACWI-IMI). The total public equity portfolio return for the three-year period ended June 30 was 9.13 percent, with the five-year return coming in at 10.49 percent. These gains also exceeded the benchmark ACWI-IMI returns of 8.34 and 9.60 percent for the three- and five-year periods respectively. For the 10 years ended June 30, the public equity portfolio's return of 7.93 percent exceeded the benchmark index return of 6.14 percent.

As of June 30, the System had allocated 27.32 percent of the total portfolio to domestic equities; 17.11 percent to international developed markets; 4.45 percent to emerging markets; and 12.14 percent to global equities. Within the domestic equity portfolio 67.72 percent was invested in large; 18.30 percent in mid-, and 13.98 percent in small-capitalization securities.

DEBT PORTFOLIO

At the close of the year the debt portfolio included both active and passive core US portfolios; core-plus strategies that incorporate allocations to both high-yield and non-US debt into US core debt exposures; global bond portfolios; and a dedicated emerging market debt portfolio.

The total debt portfolio's 0.75 percent return for the year exceeded the benchmark Bloomberg Aggregate Index's performance of negative 0.40 percent. For the three- and five-year periods ended June 30, debt portfolio returns were 3.30 and 3.62 percent, also topping the Index's 1.72 and 2.27 percent returns for the same periods. The 10-year performance for the portfolio was 5.04 percent, while the Index returned 3.72 percent.

The System ended the year with 20.32 percent of the total portfolio invested in debt securities. The debt portfolio allocations consisted of 29.86 percent active and passive, core US mandates, 34.92 percent core-plus, and 25.50 percent hedged global bond strategies. The remaining 9.72 percent was invested in emerging market debt.

REAL ESTATE PORTFOLIO

At June 30, the real estate investment program consisting of investments in core and value-added real estate funds, timber, and public REITs was the System's best returning asset class. The total real estate portfolio returned 8.92 percent for the fiscal year, led by the timber and value-added fund returns. The portfolio beat its custom benchmark return of 7.19 percent. The longer term three-year return of 9.63 percent also exceeded the benchmark return of 8.25 percent, while the five-year portfolio return of 10.40 percent beat the benchmark's 9.77 percent return. The 10-year return of 5.61 percent topped the benchmark return of 4.97 percent.

The core real estate portfolio returned 7.56 percent for the year, slightly underperforming the benchmark NFI-ODCE equal weighted Index return of 7.68 percent. Core real estate saw a three-year return of 8.30 percent, while the Index returned 8.70 for the same period. For the five years ended June 2018, the core real estate portfolio's return of 9.67 percent lagged the 10.21 percent return of the Index.

The System's value-added real estate portfolio consisting of thirteen limited partnerships, posted a strong 14.27 percent return for the year to beat the benchmark NCREIF Total Index returns of 7.19 percent. For longer periods the program also saw strong returns posting three- and five-year gains of 14.02 and 14.12 percent. For the same periods the Index had returns of 8.25 and 9.77 percent.

The System's timber portfolio, comprised of both US and non-US timber investments, returned 14.43 percent, benefiting from increased demand derived from slight increases in the number of US housing starts. NCREIF Timberland Index returns for the same period were 3.57 percent. Longer term, the portfolio three-year return of 11.11 percent compared favorably to the 3.43 return of the NCREIF Timberlands Index, while the portfolio's five-year return of 9.97 percent topped the Index return of 6.00 percent.

The public REIT portfolio, comprised of both US and non-US REIT investments returned 6.35 percent for the year and 8.05 percent for three-year period ended June 30. The custom REIT portfolio benchmark returned 5.51 and 7.24 percent for the same periods. The five-year return of 8.34 percent outpaced the 7.64 percent return of the benchmark, but the portfolio's ten-year return of 6.37 percent lagged the benchmark return of 6.82 percent. The fiscal year ended with the combined public and private real estate portfolios representing 10.11 percent of the System's total investments.

PRIVATE EQUITY PORTFOLIO

The System's private equity program consists of five separate fund-of-funds limited partnership commitment series. The private equity portfolio was invested in 211 partnerships, comprised of buyouts, venture capital/growth, distressed opportunity, and special situation opportunities. On a time-weighted basis, the System's private equity investments returned 16.66 percent for the fiscal year, slightly underperforming the S&P 500 Index+ 3 percent return benchmark's 17.39 percent results. The private equity program saw returns of 15.73 and 16.39 percent for the three- and five-year periods, while the benchmark returns were 14.96 and 16.45* percent for the same periods. As of June 30, private equity comprised approximately 7.64 percent of the System's total portfolio.

*prior to 2013 the private equity benchmark was the S&P 500 Index+5%

SHORT-TERM PORTFOLIO

Cash flows generated by employee and employer contributions to the System and from ancillary income-generating activities, including securities lending and the System's commission recapture program, are invested by the System's investment staff. These assets are used to fund monthly benefits, refunds, and annual Cost-of-Living-Adjustment (COLA) payments. As interest rates at the short end of the yield curve remained near zero throughout the fiscal year, the return on the short-term investment program was a modest 1.37 percent. The cash portion of the accounts managed by external investment managers is invested in interest-earning cash equivalents. All short-term investments are made in accordance with state law and policies set by the Board of Trustees.

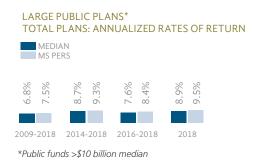


Defined Benefit Plans:

PERFORMANCE SUMMARY - FOR FISCAL YEAR ENDED JUNE 30, 2018 -

			LIZED
Total Plans:	CURRENT YEAR	3-YEAR	5-YEAR
MS PERS COMBINED RETURN*	9.5%**	8.4%	9.3%
MS PERS POLICY TARGET RETURN	9.1	7.8	9.0
PUBLIC FUNDS >\$10 BILLION MEDIAN	8.9	7.6	8.7
Debt Securities:			
DEBT SECURITIES MANAGERS COMPOSITE*	0.8	3.3	3.6
BLOOMBERG BARCLAYS AGGREGATE INDEX	(0.4)	1.7	2.3
FIXED INCOME CUSTOM BENCHMARK	-	2.2	2.7
Domestic Equity:			
DOMESTIC EQUITY MANAGERS COMPOSITE*	14.8	10.9	12.7
RUSSELL 3000 INDEX	14.8	11.6	13.3
DOMESTIC EQUITY CUSTOM BENCHMARK	15.0	11.4	13.1
International Equity:			
INTERNATIONAL EQUITY MANAGERS COMPOSITE*	7.0	6.4	6.9
INTERNATIONAL EQUITY BENCHMARK	7.8	5.5	6.4
INTERNATIONAL EQUITY CUSTOM BENCHMARK	8.4	6.2	6.8
Global Equity:			
GLOBAL EQUITY MANAGERS COMPOSITE*	13.3	9.6	11.1
GLOBAL EQUITY BENCHMARK	11.1	8.4	9.5
Real Estate:			
COMMINGLED FUNDS AND REITS COMPOSITE*	8.9	9.6	10.4
REAL ESTATE BENCHMARK	7.2	8.3	9.8
Private Equity:			
PRIVATE EQUITY COMPOSITE*	16.7	15.7	16.4
PRIVATE EQUITY BENCHMARK	17.4	15.0	16.5

*Calculations for the System are prepared using a time-weighted rate of return methodology based upon fair values. **The unrounded MS PERS Combined Return is 9.48%.



Defined Benefit Plans: NON-US INVESTMENTS BY COUNTRY - FAIR VALUE AT JUNE 30, 2018 -

ANGOLA	0.04%	GREECE	0.13%	PANAMA	0.10%
ARGENTINA	0.43%	GUERNSEY CI	0.09%	PARAGUAY	0.05%
ARMENIA	0.03%	HONDURAS	0.01%	PERU	0.07%
AUSTRALIA	6.27%	HONG KONG	2.44%	PHILIPPINES	0.18%
AUSTRIA	0.23%	HUNGARY	0.49%	POLAND	0.21%
AZERBAIJAN	0.20%	INDIA	1.50%	PORTUGAL	0.20%
BAHAMAS	0.01%	INDONESIA	0.81%	PUERTO RICO	0.04%
BELGIUM	0.40%	IRELAND	1.94%	QATAR	0.33%
BERMUDA	0.97%	ISLE OF MAN	0.05%	ROMANIA	0.09%
BRAZIL	1.76%	ISRAEL	0.41%	RUSSIA	1.08%
BRITISH VIRGIN ISLANDS	0.21%	ITALY	1.25%	SAUDI ARABIA	0.49%
BULGARIA	0.01%	JAMAICA	0.03%	SENEGAL	0.09%
CANADA	8.07%	JAPAN	11.69%	SERBIA	0.03%
CAYMAN ISLANDS	2.10%	JERSEY CI	0.22%	SINGAPORE	1.09%
CHILE	0.18%	JORDAN	0.04%	SOUTH AFRICA	1.59%
CHINA	2.49%	KAZAKHSTAN	0.13%	SOUTH KOREA	3.35%
COLOMBIA	0.12%	KENYA	0.03%	SPAIN	1.78%
COSTA RICA	0.04%	KUWAIT	0.10%	SRI LANKA	0.19%
COTE D'IVOIRE	0.16%	LEBANON	0.03%	SUPRANATIONAL GEOGRAPHIC	0.25%
CROATIA	0.27%	LIBERIA	0.03%	SWEDEN	1.73%
CURACAO	0.60%	LUXEMBOURG	0.74%	SWITZERLAND	4.38%
CYPRUS	0.02%	MACAU	0.13%	TAIWAN	1.64%
CZECH REPUBLIC	0.04%	MALAYSIA	0.39%	TAJIKISTAN	0.01%
DENMARK	1.24%	MALTA	0.01%	THAILAND	0.60%
DOMINICAN REPUBLIC	0.22%	MARSHALL ISLANDS	0.02%	TUNISIA	0.04%
ECUADOR	0.07%	MAURITIUS	0.04%	TURKEY	0.53%
EGYPT	0.17%	MEXICO	1.66%	UKRAINE	0.10%
EL SALVADOR	0.01%	MONGOLIA	0.02%	UNITED ARAB EMIRATES	0.27%
ETHIOPIA	0.01%	MOROCCO	0.11%	UNITED KINGDOM	11.61%
FINLAND	0.70%	NETHERLANDS	3.40%	URUGUAY	0.08%
FRANCE	5.25%	NEW ZEALAND	0.44%	VENEZUELA	0.04%
GABON	0.01%	NIGERIA	0.10%	ZAMBIA	0.02%
GEORGIA	0.01%	NORWAY	0.93%		
GERMANY	5.65%	OMAN	0.18%		
GHANA	0.07%	PAKISTAN	0.09%		

Defined Benefit Plans:	EQUITY PORTFOLIO	SUMMARY		
Equity Portfolio	Total Equity Securities: \$16,920,005,2	Total Number o of Equity Securi 86 1,250,819	ities Held: of Equ	Number of Issues uity Securities Held: 4,129
EQUITY INVESTMENT - FAIR VALUE AT			TEN LARGEST EQUI	TY HOLDINGS
21.1	29/		SHARES	FAIR VALUE
		MICROSOFT CORPORATION	2,509,560	\$247,467,712
CONSUMER NO	DN-CYCLICAL	APPLE INC.	1,163,924	215,453,972
20.5	7%	BERKSHIRE HATHAWAY, INC	1,022,148	190,783,924
FINANCIAL	SERVICES	AMAZON.COM INC.	93,783	159,412,343
		UNITEDHEALTH GROUP INC.	570,048	139,855,576
12.2 TECHNO		FACEBOOK INC	702,731	136,554,688
		ALPHABET INC-CL C	113,212	126,304,968
11.9 COMMUN		JPMORGAN CHASE & CO.	1,114,485	116,129,337
		WELLS FARGO & CO	2,022,947	112,152,182
10.7		VISA INC	832,027	110,201,976
INDUS	TRIAL	TOTALS	10,144,865	\$1,554,316,678
10.4 CONSUMER			A complete list of portfi is available upon writte	
6.48 ENEF				
4.43 BASIC IND				
• 1.74 UTILI	4%			

Defined Benefit Plans: Private Equity Portfolio

0.33% DIVERSIFIED

PRIVATE EQUITY PORTFOLIO SUMMARY

Total Private Equity Investments: \$2,053,831,251

PRIVATE EQUITY INVESTMENTS BY STRATEGY - JUNE 30, 2018 -





Defined Benefit Plans: Bond Portfolio Total Bond Investments: \$8,077,806,893

4.18% INDUSTRIAL

2.99% UTILITIES

0.05% MISCELLANEOUS

CORPORATE BOND INVESTMENTS BY INDUSTRY TYPE*		TEN LARGEST LONG-TERM CORPORATE BOND HOLDINGS*		
- FAIR VALUE AT JUNE 30, 2018 -		PAR	FAIR VALUE	
	ROYAL BANK OF CANADA	\$59,570,000	\$59,688,937	
52.91%	IBM CREDIT LLC	51,800,000	51,875,168	
	CHEVRON CORPORATION	47,380,000	47,418,625	
FINANCIAL	CITIBANK NA	46,350,000	46,387,712	
	US BANK NA CINCINNATI	45,800,000	45,826,417	
17.73%	PEPSICO INC	44,737,000	44,740,838	
CONSUMER	AUSTRALIA & NEW ZEALAND BANKING GROUP	44,300,000	44,307,796	
10.05%	AUSTRALIA & NEW ZEALAND BANKING GROUP	44,100,000	44,100,000	
ENERGY	UBS AG LONDON	41,900,000	41,944,749	
•	NATIONAL AUSTRALIA BANK	41,800,000	41,842,938	
6.60% COMMUNICATIONS	TOTALS	\$467,737,000	\$468,133,180	
5.49% TECHNOLOGY		A complete list of portfolio is available upon written red	5	

\$42,081,454,446

*Includes investments purchased with cash collateral received in the securities lending program.

Defined Benefit Plans: Real Estate Investment Portfolio

REAL ESTATE INVESTMENT PORTFOLIO SUMMARY

Total Real Estate \$2,829,539,914

Total Number of Shares* of Real Estate Investments Held: 402,576,061

of REITs Held:

*Includes units of commingled funds and shares of REITs.

PORTFOLIO DISTRIBUTION TEN LARGEST REIT HOLDINGS BY PROPERTY TYPE - FAIR VALUE AT JUNE 30, 2018 -SHARES FAIR VALUE SIMON PROPERTY GROUP, INC. 121,082 \$20,606,946 PROLOGIS, INC. 246,805 16,212,620 EQUINIX, INC. 36,035 15,491,086 OFFICE AVALONBAY COMMUNITIES, INC. 67,444 11,592,949 KILROY REALTY CORP 143,201 10,831,724 APARTMENTS EXTRA SPACE STORAGE, INC. 103,372 10,317,559 UDR INC. 267,442 10,039,773 SUN COMMUNITIES, INC. 93,216 9,123,982 RETAIL BOSTON PROPERTIES, INC. 72,450 9,086,679 13 12% VEREIT, INC. 1,098,552 8,173,227 INDUSTRIAL TOTALS 2,249,599 \$121,476,545 A complete list of portfolio holdings RESIDENTIAL is available upon written request. ullet4.42% OTHER PORTFOLIO DISTRIBUTION BY • 3.63% **GEOGRAPHIC LOCATION** TIMBER - FAIR VALUE AT JUNE 30, 2018 -. 2.31% HOTELS 1.50% SELF-STORAGE 1.00% HEALTH CARE MIDEAST: 9.40% NORTHEAST: 17.40% SOUTHWEST: 12.17% EAST NORTH CENTRAL: 6.437% SOUTHEAST: 10.30% PACIFIC: 33.48%

FOREIGN: 2.34%

MIDWEST: 1.35%

Defined Benefit Plans:

NET INVESTMENT INCOME BY SOURCE - LAST 10 FISCAL YEARS -

[in thousands]

FISCAL YEAR	BOND INTEREST INCOME	DIVIDEND INCOME	SHORT-TERM INCOME	REALIZED GAIN (LOSS) ON INVESTMENTS	APPRECIATION (DEPRECIATION) IN FAIR VALUE OF INVESTMENTS
2009	\$224,605	\$296,492	\$14,528	\$(1,710,303)	\$(2,639,433)
2010	184,923	273,687	12,169	542,100	1,180,636
2011	185,818	326,174	14,001	1,200,877	2,560,115
2012	186,038	323,610	9,460	585,346	(1,016,522)
2013	184,775	339,386	12,390	920,422	1,198,511
2014	176,286	392,423	8,627	1,264,402	2,213,619
2015	183,456	365,567	8,045	1,450,502	(1,087,742)
2016	177,516	346,655	14,723	574,260	(909,931)
2017	173,692	351,444	14,411	1,136,714	1,900,834
2018	181,409	368,696	19,638	1,907,081	38,573

TEN-YEAR TOTAL PENSION INVESTMENT RATES OF RETURN

[fair value in millions]

FISCAL YEAR	TOTAL INVESTMENT PORTFOLIO FAIR VALUE	SMOOTHED RATE OF RETURN	FAIR VALUE RATE OF RETURN	ACTUARIAL ASSUMED RATE OF RETURN
2009	\$15,512	(11.00)%	(19.40)%	8.00%
2010	16,767	0.20	14.10	8.00
2011	20,314	4.00	25.40	8.00
2012	19,578	1.90	0.59	8.00
2013	21,947	6.10	13.37	8.00
2014	24,600	14.20	18.58	8.00
2015	24,735	12.30	3.40	8.00
2016	23,938	7.21	1.15	7.75
2017	26,592	9.31	14.96	7.75
2018	28,280	9.16	9.48	7.75

Defined Benefit Plans:

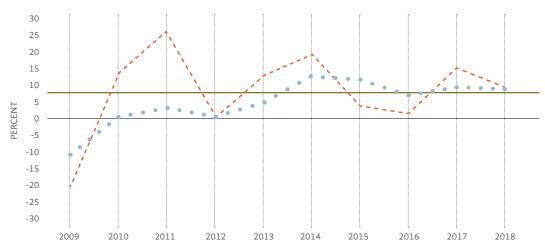
NET INVESTMENT INCOME BY SOURCE (CONTINUED) - LAST 10 FISCAL YEARS -

[in thousands]

FISCAL YEAR	NET INCOME (LOSS) FROM SECURITIES LENDING	TOTAL INCOME (LOSS)	MANAGER* AND TRADING FEES	NET INCOME (LOSS) FROM INVESTMENTS
2009	\$32,433	\$(3,781,678)	\$(26,574)	\$(3,808,252)
2010	39,881	2,233,396	(33,904)	2,199,492
2011	18,107	4,305,092	(42,765)	4,262,327
2012	17,293	105,225	(44,299)	60,926
2013	14,645	2,670,129	(50,210)	2,619,919
2014	16,453	4,071,810	(83,449)	3,988,361
2015	13,778	933,606	(88,884)	844,722
2016	19,429	222,652	(89,116)	133,536
2017	22,333	3,599,428	(95,916)	3,503,512
2018	17,151	2,532,547	(105,462)	2,427,086

*Manager fees are subject to estimation.

TEN-YEAR TOTAL PENSION INVESTMENT RATES OF RETURN



Smoothed Rate of Return consists of investment income in a surplus or deficit of the assumed 7.75 percent on fair value smoothed over a five-year period with 20.0 percent of a year's surplus or deficit being recognized each year beginning with the current year. PERS, MHSPRS, and SLRP smoothed rates have been averaged. In fiscal year 2006, PERS, MHSPRS, and SLRP actuarial assets were set equal to fair value of assets. Therefore, there was no smoothed difference between actuarial and investment asset amounts. In fiscal year 2007, smoothing resumed with the additional constraint that actuarial value of assets cannot be less than 80.0 percent nor more than 120.0 percent of fair value. In fiscal year 2009, the 80/120 percent corridor was eliminated for the purpose of determining actuarial value of assets. In 2015, the assumed rate of return was changed from 8.0 percent to 7.75 percent. MRS is excluded as an agent multi-employer plan.

---- Fair Value Rate of Return consists of cash income plus gains and losses due to changes in fair value, whether realized or unrealized (before deduction of investment fees).

• Actuarial Assumed Rate is the assumed rate of return on the fair value of assets and is used in establishing retirement contribution rates and in determining current benefit reserve requirements.

Defined Benefit Plans: PORTFOLIO DETAIL ILLUSTRATED BY ADVISOR

NORTHERN TRUST GLOBAL INVESTMENTPassive (S&P 500 index) large capJuly 1985Jul, 298NORTHERN TRUST GLOBAL INVESTMENTEAFE (index)December 20177.45EAGLE CAPITAL MANAGEMENTActive - all capJanuary 20053.58HARDING LOVVER, IPGlobal equityFebruary 20123.00CONSVIEW PARTNERS, ILCGlobal equityFebruary 20123.00ACADIAN ASSET MANAGEMENT, ILCGlobal equityJuly 20053.00ACADIAN ASSET MANAGEMENT, ILCMSCI ACWI ex-ULSJuly 20053.00BALLIE GIPORD & COMPANYMSCI ACWI ex-ULSJuly 20053.00MARCINSTRET CAPITAL, IPMSCI ACWI ex-ULSJuly 20053.00MARTHON ASSET MANAGEMENT, ILPMSCI ACWI ex-ULSMay 20162.26MARATHON ASSET MANAGEMENT, ILPMSCI ACWI ex-ULSMay 20162.26MARATHON ASSET MANAGEMENT, ILPMSCI ACWI ex-ULSMay 20162.06MARTATHON ASSET MANAGEMENT, ILPActive - Inid cap growthSeptember 20021.070THE BOSTON COMPANY ASSET MANAGEMENT, ILPActive - Inid cap growthSeptember 20021.061WELLINGTON MANAGEMENT CAMPANY, ILPActive-small Cap growthNoweber 20111.106MURINDRIAN INVESTMENT PATTNERS, INCSmall capMay 20101.016IDEMTSION COMPANY, ILPActive-small Cap growthNoweber 20131.010MURINDRIAN INVESTMENT PATTNERS, INCSmall capJuly 20021.061IDEMTSION AL FUND ADVISORS, INCActive-small Cap growthNoweber 20131.010IDEMTSI	ADVISOR Equities:	TYPE	DATE INITIATED	FAIR VALUE PERCENT OF TOTAL PORTFOLIO*
EAGLE CAPITAL MANAGEMENTActive - all capJanuary 20053.58HARDING LOEVINER, IPGlobal equityFebruary 20123.09LONGVIEW PARTNERS, INC.Global equityFebruary 20123.09LONGVIEW PARTNERS, LLCGlobal equityAugust 20153.00ACADIAN ASSET MANAGEMENT, LLCGlobal equityJuly 20053.00ARROWSTREET CAPITAL, IPMSCI ACWI ex-U.S.June 20132.65BAILLIE GIFFORD & COMPANYMSCI ACWI ex-U.S.August 20142.65BAILLIE GIFFORD & COMPANYMSCI ACWI ex-U.S.August 20142.65BAILLIE GIFFORD & COMPANYMSCI ACWI ex-U.S.May 20162.31WEDGEWOOD PARTNERSActive - large cap growthDecember 20142.26MARATHON ASSET MANAGEMENTPassive (Russell 1000 index)December 20172.06LAZARD ASSET MANAGEMENTPassive (Russell 1000 index)December 20172.06MARATHON ASSET MANAGEMENT, LLPActive - mid cap growthSeptember 20021.70THE BOSTON COMPANY ASSET MANAGEMENT, LLPActive - mid cap growthOctober 20011.66MONDRIAN INVESTMENT PARTNERS, INCSmall capMay 20111.16MONDRIAN INVESTMENT PARTNERS, INCSmall capMay 20111.16MONDRIAN INVESTMENT PARTNERS, INCActive-small cap growthNorember 20131.10IDIMENSIONAL FUND ADVISORS, INCActive-small cap growthNorember 20143.58MONDRIAN INVESTMENT PARTNERS, INCAugust 20093.583.58IDIDELITY INSTITUTIONAL ASSET	NORTHERN TRUST GLOBAL INVESTMENT	Passive (S&P 500 index) large cap	July 1985	10.82%
HARDING LOEVNER, IP Global equity February 2012 3.16 EPOCH INVESTMENT PARTNERS, INC. Global equity February 2012 3.09 LONGVIEW PARTNERS, INC. Global equity August 2015 3.02 ACADIAN ASSET MANAGEMENT, LLC Global equity JUly 2005 3.00 ARROWSTREET CAPITAL, IP MSCI ACW lex-U.S. June 2013 2.65 BAILLIE GIFFORD & COMPANY MSCI ACW lex-U.S. August 2014 2.26 INMERT PARTNERS Emerging markets April 2016 2.31 WEDGEWOOD PARTNERS Active - large cap growth December 2014 2.26 MARATHON ASSET MANAGEMENT, LLP MSCI ACW lex-U.S. May 2016 2.26 MARATHON ASSET MANAGEMENT, LLP MSCI ACW lex-U.S. May 2016 2.26 MARATHON ASSET MANAGEMENT, LLC Active - mid cap growth September 2002 1.00 MORTHERN TRUST GLOBAL INVESTMENT Passive (Russell 1000 index) December 2011 1.66 WELLINGTON MANAGEMENT COMPANY, LLP Active - mid cap value Muy 2010 1.66 MONDRIAN INVESTMENT PARTNERS, INC Active- small cap growth	NORTHERN TRUST GLOBAL INVESTMENT	EAFE (index)	December 2017	7.45
EPOCH INVESTMENT PARTNERS, INC.Global equityFebruary 20123.09LONGVIEW PARTNERS, LICGlobal equityAugust 20153.02ACADIAN ASSET MANAGEMENT, LICGlobal equityJuly 20053.00ARROWSTREET CAPITAL, IPMSCI ACWI ex-U.S.June 20132.65BAILLIE GIFFORD & COMPANYMSCI ACWI ex-U.S.August 20142.65BAILLIE GIFFORD & COMPANYMSCI ACWI ex-U.S.August 20142.65BAILLIE GIFFORD & COMPANYMSCI ACWI ex-U.S.May 20162.31WEDGEWOOD PARTNERSActive - large cap growthDecember 20142.26MARATHON ASSET MANAGEMENT, LIPMSCI ACWI ex-U.S.May 20162.26MARATHON ASSET MANAGEMENT, LIPMSCI ACWI ex-U.S.May 20162.18NORTHERN TRUST GLOBAL INVESTMENTPassive (Russell 1000 index)December 20172.06ARTISAN PARTNERS IPActive - mid cap growthSeptember 20021.69WELLINGTON MANAGEMENT COMPANY, LIPActive - mid cap growthNovember 20131.16MONDRIAN INVESTMENT PARTNERS, INC.Small cap growthNovember 20131.10RIVERBRIDGE PARTNERS, LICActive-small cap growthNovember 20131.10DIMENSIONAL FUND ADVISORS, INCActive-small cap growthNovember 20131.10RIVERBRIDGE PARTNERS, LICCore plusJanuary 20123.58PRUDENTIAL FIXED INCOMCore plusJanuary 20123.56PRUDENTIAL FIXED INCOMCore plusJanuary 20123.56PRUDENTIAL FIXED INCOMGlobal fixed incom <td>EAGLE CAPITAL MANAGEMENT</td> <td>Active - all cap</td> <td>January 2005</td> <td>3.58</td>	EAGLE CAPITAL MANAGEMENT	Active - all cap	January 2005	3.58
LONGVIEW PARTNERS, LCGlobal equityAugust 20153.02ACADIAN ASSET MANAGGMENT, LCGlobal equityJuly 20053.00ARROWSTREET CAPITAL, LPMSCI ACWI ex-U.S.June 20132.65BAILLIE GFROB & COMPANYMSCI ACWI ex-U.S.August 20142.65BAILLIE GFROB & COMPANYEmerging marketsApril 20162.31WEDGEWOOD PARTNERSActive - large cap growthDecember 20142.26MARATHON ASSET MANAGEMENT, LLPMSCI ACWI ex-U.S.May 20162.26LAZARD ASSET MANAGEMENT, LLPMSCI ACWI ex-U.S.May 20162.26NORTHERN TRUST GLOBAL INVESTMENTPassive (Russell 1000 index)December 20172.06NORTHERN TRUST GLOBAL INVESTMENTPassive (Russell 1000 index)December 20021.70THE BOSTON COMPANY ASSET MANAGEMENT, LLCActive - mid cap growthSeptember 20021.69WELLINGTON MANAGEMENT COMPANY, LPActive-small cap coreJuly 20021.69WELLINGTON MANAGEMENT COMPANY, LPActive-small cap growthNovember 20131.10DIMENSIONAL FUND ADVISORS, INCActive-small cap growthNovember 20131.05FIDELITY INSTACES & COMPANY, EPCore plusAugust 20093.58PRUDENTIAL FIXED INCOMECore plusAugust 20093.58PRUDENTIAL FIXED INCOMEGlobal fixed incomeFebruary 20132.60PACIFIC INVESTMENT MANAGEMENT COMPANY, EPGlobal fixed incomeFebruary 20132.61PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20133	HARDING LOEVNER, LP	Global equity	February 2012	3.16
ACADIAN ASSET MANAGEMENT, LICGlobal equityJuly 20053.00ARROWSTREET CAPITAL, IPMSCI ACWI ex-U.S.June 20132.65BAILLIE GIFFORD & COMPANYMSCI ACWI ex-U.S.August 20142.65FIGHER INVESTMENTSEmerging marketsApril 20162.31WEDGEWOOD PARTNERSActive - large cap growthDecember 20142.26MARATHON ASSET MANAGEMENT, LIPMSCI ACWI ex-U.S.May 20162.26LAZARD ASSET MANAGEMENT, LIPPASSIVE (Russell 1000 index)December 20172.06NORTHERN TRUST GLOBAL INVESTMENTPassive (Russell 1000 index)December 20171.06ARTISAN PARTNERSPACtive - mid cap growthSeptember 20021.07THE BOSTON COMPANY ASSET MANAGEMENT, LIPActive - mid cap growthOctober 20011.66WELLINGTON MANAGEMENT COMPANY, LIPActive - small cap coreJuly 20021.06WELLINGTON MANAGEMENT COMPANY, LIPActive - small cap growthNovember 20131.10DIMENSIONAL FUND ADVISORS, INCActive-small cap growthNovember 20131.07FIDELITY INSTITUTIONAL ASSET MANAGEMENT, LICESmall capAugust 20093.58CLOOMIS SAVLES & COMPANY, LIPCore plusAugust 20143.56PRUDENTAL FIXED INCOMECore plusJanuary 20123.56IDDIMENSIONAL FUND ADVISORS, INCGlobal fixed incomeFebruary 20133.61PACIFIC INVERSTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20133.58PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed income	EPOCH INVESTMENT PARTNERS, INC.	Global equity	February 2012	3.09
ARROWSTREET CAPITAL, LPMSCI ACWI ex-U.S.June 20132.65BAILLIE GIFFORD & COMPANYMSCI ACWI ex-U.S.August 20142.65FISHER INVESTMENTSEmerging marketsApril 20162.31WEDGEWOOD PARTINERSActive - large cap growthDecember 20142.26MARATHON ASSET MANAGEMENT, LPMSCI ACWI ex-U.S.May 20162.26LAZARD ASSET MANAGEMENT, LPMSCI ACWI ex-U.S.May 20162.26NORTHERN TRUST GLOBAL INVESTMENTPassive (Russell 1000 index)December 20172.06NORTHERN TRUST GLOBAL INVESTMENTPassive (Russell 1000 index)September 20021.70THE BOSTON COMPANY ASSET MANAGEMENT, LLCActive - mid cap valueOctober 20011.69WELLINGTON MANAGEMENT COMPANY, LLPActive-small cap valueOctober 20011.66MONDRIAN INVESTMENT PARTNERS, INCActive-small cap growthNovember 20131.10DIMENSIONAL FUND ADVISORS, INCActive-small cap growthNovember 20131.00FIDELITY INSTITUTIONAL ASSETSmall capJuly 20021.07FIDELITY INSTITUTIONAL ASSETSmall capJuly 20021.07FIDELITY INSTITUTIONAL ASSETCore plusAugust 20093.58PRUDENTIAL FIXED INCOMECore plusJanuary 20123.56ALLIANCEBERNSTEIN, PASSINENGlobal fixed incomeFebruary 20132.61PACIFIC INVESTMENT MANAGEMENT COMPANY, LPGlobal fixed incomeFebruary 20132.60PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.6	LONGVIEW PARTNERS, LLC	Global equity	August 2015	3.02
BAILLIE GIFFORD & COMPANYMSCI ACWI ex-U.S.August 20142.65FISHER INVESTMENTSEmerging marketsApril 20162.31WEDGEWOOD PARTNERSActive - large cap growthDecember 20142.26MARATHON ASSET MANAGEMENT, LLPMSCI ACWI ex-U.S.May 20162.26LAZARD ASSET MANAGEMENT, LLPMSCI ACWI ex-U.S.May 20162.26NORTHERN TRUST GLOBAL INVESTMENTPassive (Russell 1000 index)December 20172.06ARTISAN PARTNERS IPActive - mid cap growthSeptember 20021.70THE BOSTON COMPANY ASSET MANAGEMENT, LLCActive - mid cap growthSeptember 20021.69WELLINGTON MANAGEMENT COMPANY, LLPActive - mid cap valueOctober 20011.66MONDRIAN INVESTMENT PARTNERS, INCActive-small cap coreJuly 20021.07IDIMENSIONAL FUND ADVISIONS, INCActive-small cap growthNovember 20131.10DIMENSIONAL FUND ADVISIONS, INCActive-small cap valueJuly 20021.07FIDELITY INSTITUTIONAL ASSETSmall capApril 20111.05JUSUBTOLLJUSUBTOLLSmall capApril 20111.05JUSUBTOLLGlobal fixed incomeFebruary 20133.58PRUDENTIAL FIXED INCOMECore plusJanuary 20123.56PRUDENTIAL FIXED INCOMEGlobal fixed incomeFebruary 20132.60PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.60PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.60	ACADIAN ASSET MANAGEMENT, LLC	Global equity	July 2005	3.00
Instruction of a constraint of the instruction of a constraint of a constrai	ARROWSTREET CAPITAL, LP	MSCI ACWI ex-U.S.	June 2013	2.65
WEDGEWOOD PARTNERSActive - large cap growthDecember 20142.26MARATHON ASSET MANAGEMENT, LLPMSCI ACWI ex-U.S.May 20162.26LAZARD ASSET MANAGEMENTEmerging marketsApril 19982.18NORTHERN TRUST GLOBAL INVESTMENTPassive (Russell 1000 index)December 20172.06ARTISAN PARTNERS LPActive - mid cap growthSeptember 20021.70THE BOSTON COMPANY ASSET MANAGEMENT, LLCActive - mid cap valueOctober 20011.69WELLINGTON MANAGEMENT COMPANY, LLPActive - mid cap valueOctober 20011.66MONDRIAN INVESTMENT PARTNERS, INCSmall cap valueOctober 20011.66MONDRIAN INVESTMENT PARTNERS, INCCActive - small cap valueJuly 20021.07IDIMENSIONAL FUND ADVISORS, INCActive-small cap valueJuly 20021.07IDIMENSIONAL FUND ADVISORS, INCActive-small cap valueJuly 20021.07IDIMENSIONAL FUND ADVISORS, INCSuberoratSuberorat5.61DEVESCUITIVINSTITUTIONAL ASSETMANAGEMENT, LLP6.611.05MANAGEMENT, LCDCore plusAugust 20093.58LOOMIS SAYLES & COMPANY, LPGlobal fixed incomeFebruary 20132.60PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.60MANULIFE ASSET MANAGEMENT LCDActive - coreMargust 19832.04PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.61MANULIFE ASSET MANAGEMENT COMPANYCore plusAugust 19832.	BAILLIE GIFFORD & COMPANY	MSCI ACWI ex-U.S.	August 2014	2.65
MARATHON ASSET MANAGEMENT, LIPMSCI ACWI ex-U.S.May 20162.26LAZARD ASSET MANAGEMENTEmerging marketsApril 19982.18NORTHERN TRUST GLOBAL INVESTMENTPassive (Russell 1000 index)December 20172.06ARTISAN PARTNERS IPActive - mid cap growthSeptember 20021.70THE BOSTON COMPANY ASSET MANAGEMENT, LIPActive - mid cap growthSeptember 20021.69WELLINGTON MANAGEMENT COMPANY, LIPActive - mid cap valueOctober 20011.66MONDRIAN INVESTMENT PARTNERS, INCSmall cap valueMay 20111.16RIVERBRIDGE PARTNERS, LIPActive - mid cap valueJuly 20021.07IDELITY INSTITUTIONAL ASSETActive - small cap valueJuly 20021.07IDELITY INSTITUTIONAL ASSETActive - small cap valueJuly 20021.07IDELITY INSTITUTIONAL ASSETSmall cap ValueJuly 20021.07IDELITY INSTITUTIONAL ASSETSmall cap ValueJuly 20021.07IDELITY INSTITUTIONAL ASSETSmall cap ValueJuly 20021.07IDELITY INSTITUTIONAL ASSETCore plusAugust 20093.58PRUDENTIAL FIXED INCOMCore plusJanuary 20123.56PRUDENTIAL FIXED INCOMPANYGlobal fixed incomFebruary 20132.60MANULIFE ASSET MANAGEMENT COMPANYGlobal fixed incomFebruary 20132.60MANULIFE ASSET MANAGEMENT COMPANYActive - coreMarch 20172.04PACIFIC INVESTMENT MANAGEMENT COMPANYCative - coreAugust 19832.04PACIFIC	FISHER INVESTMENTS	Emerging markets	April 2016	2.31
LAZARD ASSET MANAGEMENTEmerging marketsApril 19982.18NORTHERN TRUST GLOBAL INVESTMENTPassive (Russell 1000 index)December 20172.06ARTISAN PARTNERSLPActive - mid cap growthSeptember 20021.70THE BOSTON COMPANY ASSET MANAGEMENT, LLCActive - mid cap valueOctober 20011.69WELLINGTON MANAGEMENT COMPANY, LLPActive - mid cap valueOctober 20011.66MONDRIAN INVESTMENT PARTNERS, INCMay 20111.16RIVERBRIDGE PARTNERS, LLCActive - small cap valueOctober 20131.10DIMENSIONAL FUND ADVISORS, INCActive-small cap valueJuly 20021.07FIDELITY INSTITUTIONAL ASSETSmall capApril 20111.05DIMENSIONAL FUND ADVISORS, INCActive-small cap valueJuly 20021.07FIDELITY INSTITUTIONAL ASSETSmall capApril 20111.05DEbt Securities:Small capApril 20111.05PACIFIC INVESTMENT ALLIANCEBERNSTEIN, LPGlobal fixed incomeFebruary 20123.56ALLIANCEBERNSTEIN, LPGlobal fixed incomeFebruary 20132.61PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.04PACIFIC INVESTMENT MANAGEMENT COMPANYPassive (BB.AGG index)December 20172.03WELLINGTON MANAGEMENT COMPANYPassive (BB.AGG index)December 20172.03WELLINGTON MANAGEMENT COMPANY, LPPassive (BB.AGG index)December 20172.03	WEDGEWOOD PARTNERS	Active - large cap growth	December 2014	2.26
NORTHERN TRUST GLOBAL INVESTMENTPassive (Russell 1000 index)December 20172.06ARTISAN PARTNERS LPActive - mid cap growthSeptember 20021.70THE BOSTON COMPANY ASSET MANAGEMENT, LLCActive - mid cap valueOctober 20011.69WELLINGTON MANAGEMENT COMPANY, LIPActive - mid cap valueOctober 20011.66MONDRIAN INVESTMENT PARTNERS, INC.Small cap coreJuly 20021.61RIVERBRIDGE PARTNERS, INC.Active - mid cap valueOctober 20011.66MONDRIAN INVESTMENT PARTNERS, INC.Active-small cap growthNovember 20131.10DIMENSIONAL FUND ADVISORS, INCActive-small cap growthNovember 20131.07FIDELITY INSTITUTIONAL ASSETSmall capApril 20111.05BUBTOTALDEbt Securities:Small capApril 20111.05PRUE LOOMIS SAYLES & COMPANY, LPCore plusAugust 20093.58PRUDENTIAL FIXED INCOMECore plusJanuary 20123.56PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.60MANULIFE ASSET MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.60MANULIFE ASSET MANAGEMENT COMPANYActive - coreMarch 20172.04PACIFIC INVESTMENT MANAGEMENT COMPANYActive - coreAugust 19832.04NORTHERN TRUST GLOBAL INVESTMENTPassive (BB.AGG index)December 20172.03WELLINGTON MANAGEMENT COMPANY, LPEmerging market debtMay 20102.04	MARATHON ASSET MANAGEMENT, LLP	MSCI ACWI ex-U.S.	May 2016	2.26
ARTISAN PARTNERS LPActive - mid cap growthSeptember 20021.70THE BOSTON COMPANY ASSET MANAGEMENT, LLCActive - mid cap valueOctober 20011.69WELLINGTON MANAGEMENT COMPANY, LLPActive-small cap coreJuly 20021.69WELLINGTON MANAGEMENT COMPANY, LLPActive - mid cap valueOctober 20011.66MONDRIAN INVESTMENT PARTNERS, INC.Small cap growthNovember 20131.10RIVERBRIDGE PARTNERS, LLCActive-small cap growthNovember 20131.00DIMENSIONAL FUND ADVISORS, INCActive-small cap valueJuly 20021.07FIDELITY INSTITUTIONAL ASSETSmall capApril 20111.05DEbt Securities:Small capApril 20111.05LOOMIS SAYLES & COMPANY, LLPCore plusAugust 20093.58PRUDENTIAL FIXED INCOMECore plusJanuary 20123.56ALLIANCEBERNSTEIN, LPGlobal fixed incomeFebruary 20132.61PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.60MANULIFE ASSET MANAGEMENT LUCActive - coreMarch 20172.04PACIFIC INVESTMENT MANAGEMENT COMPANYPassive (BB.AGG index)December 20172.03WELLINGTON MANAGEMENT COMPANY, LLPEmerging market debtMay 20103.58	LAZARD ASSET MANAGEMENT	Emerging markets	April 1998	2.18
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WELLINGTON MANAGEMENT COMPANY, LLPActive - mid cap valueOctober 20011.66MONDRIAN INVESTMENT PARTNERS, INC.Small cap Small cap May 20111.16RIVERBRIDGE PARTNERS, LLCActive-small cap growthNovember 20131.10DIMENSIONAL FUND ADVISORS, INCActive-small cap valueJuly 20021.07FIDELITY INSTITUTIONAL ASSETSmall capApril 20111.05BUBTOTALDebt Securities:PRUDENTIAL FIXED INCOMECore plusAugust 20093.58PRUDENTIAL FIXED INCOMEGlobal fixed incomeFebruary 20132.60MANULIFE ASSET MANAGEMENT LLCGlobal fixed incomeFebruary 20132.60PACIFIC INVESTMENT MANAGEMENT COMPANYCative - coreMarch 20172.04PACIFIC INVESTMENT MANAGEMENT COMPANYPassive (BB.AGG index)December 20172.03WELLINGTON MANAGEMENT COMPANY, LLPEmerging market debtMay 20101.96	THE BOSTON COMPANY ASSET MANAGEMENT, LLC	Active - mid cap value	October 2001	1.69
MONDRIAN INVESTMENT PARTNERS, INC.Small capMay 20111.16RIVERBRIDGE PARTNERS, LLCActive-small cap growthNovember 20131.10DIMENSIONAL FUND ADVISORS, INCActive-small cap valueJuly 20021.07FIDELITY INSTITUTIONAL ASSET MANAGEMENT, LLCSmall capApril 20111.05SUBTOTALDebt Securities:LOOMIS SAYLES & COMPANY, LPCore plusAugust 20093.58PRUDENTIAL FIXED INCOMECore plusJanuary 20123.56PRUDENTIAL FIXED INCOMECore plusJanuary 20132.61PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.60MANULIFE ASSET MANAGEMENT COMPANYActive - coreMarch 20172.04PACIFIC INVESTMENT MANAGEMENT COMPANYPassive (BB.AGG index)December 20172.03WELLINGTON MANAGEMENT COMPANY, LEEmerging market debtMay 20101.96	WELLINGTON MANAGEMENT COMPANY, LLP	Active-small cap core	July 2002	1.69
RIVERBRIDGE PARTNERS, LLCActive-small cap growthNovember 20131.10DIMENSIONAL FUND ADVISORS, INCActive-small cap valueJuly 20021.07FIDELITY INSTITUTIONAL ASSETSmall capApril 20111.05SUBTOTALSUBTOTALCore plusApril 20113.58Debt Securities:Core plusJanuary 20123.56PRUDENTIAL FIXED INCOMEGlobal fixed incomeFebruary 20132.61PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.60MANULIFE ASSET MANAGEMENT COMPANYActive - coreMarch 20172.04NORTHERN TRUST GLOBAL INVESTMENTPassive (BB.AGG index)December 20172.03WELLINGTON MANAGEMENT COMPANY, LLPEmerging market debtMay 20101.96	WELLINGTON MANAGEMENT COMPANY, LLP	Active - mid cap value	October 2001	1.66
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FIDELITY INSTITUTIONAL ASSET MANAGEMENT, LLCSmall capApril 20111.05SUBTOTALSubtotal	RIVERBRIDGE PARTNERS, LLC	Active-small cap growth	November 2013	1.10
MANAGEMENT, LLCSmail capApril 20111.05SUBTOTALSUBTOTAL61.61Debt Securities:61.61LOOMIS SAYLES & COMPANY, LPCore plusAugust 20093.58PRUDENTIAL FIXED INCOMECore plusJanuary 20123.56ALLIANCEBERNSTEIN, LPGlobal fixed incomeFebruary 20132.61PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.60MANULIFE ASSET MANAGEMENT LLCActive - coreMarch 20172.04PACIFIC INVESTMENT MANAGEMENT COMPANYPassive (BB.AGG index)December 20172.03WELLINGTON MANAGEMENT COMPANY, LIPEmerging market debtMay 20101.96	DIMENSIONAL FUND ADVISORS, INC	Active-small cap value	July 2002	1.07
Debt Securities: August 2009 3.58 LOOMIS SAYLES & COMPANY, LP Core plus August 2009 3.58 PRUDENTIAL FIXED INCOME Core plus January 2012 3.56 ALLIANCEBERNSTEIN, LP Global fixed income February 2013 2.61 PACIFIC INVESTMENT MANAGEMENT COMPANY Global fixed income February 2013 2.60 MANULIFE ASSET MANAGEMENT LLC Active - core March 2017 2.04 NORTHERN TRUST GLOBAL INVESTMENT Passive (BB.AGG index) December 2017 2.03 WELLINGTON MANAGEMENT COMPANY, LLP Emerging market debt May 2010 1.96		Small cap	April 2011	1.05
LOOMIS SAYLES & COMPANY, LP Core plus August 2009 3.58 PRUDENTIAL FIXED INCOME ALLIANCEBERNSTEIN, LP Global fixed income February 2013 2.61 PACIFIC INVESTMENT MANAGEMENT COMPANY MANULIFE ASSET MANAGEMENT LLC MANULIFE ASSET MANAGEMENT COMPANY Active - core March 2017 2.04 PACIFIC INVESTMENT MANAGEMENT COMPANY Active - core August 1983 2.04 NORTHERN TRUST GLOBAL INVESTMENT WELLINGTON MANAGEMENT COMPANY, LLP Emerging market debt May 2010 1.96	SUBTOTAL			61.61
PRUDENTIAL FIXED INCOMECore plusJanuary 20123.56ALLIANCEBERNSTEIN, LPGlobal fixed incomeFebruary 20132.61PACIFIC INVESTMENT MANAGEMENT COMPANYGlobal fixed incomeFebruary 20132.60MANULIFE ASSET MANAGEMENT LLCActive - coreMarch 20172.04PACIFIC INVESTMENT MANAGEMENT COMPANYActive - coreAugust 19832.04NORTHERN TRUST GLOBAL INVESTMENTPassive (BB.AGG index)December 20172.03WELLINGTON MANAGEMENT COMPANY, LLPEmerging market debtMay 20101.96	Debt Securities:			
ALLIANCEBERNSTEIN, LP Global fixed income February 2013 2.61 PACIFIC INVESTMENT MANAGEMENT COMPANY Global fixed income February 2013 2.60 MANULIFE ASSET MANAGEMENT LLC Active - core March 2017 2.04 PACIFIC INVESTMENT MANAGEMENT COMPANY Active - core August 1983 2.04 NORTHERN TRUST GLOBAL INVESTMENT Passive (BB.AGG index) December 2017 2.03 WELLINGTON MANAGEMENT COMPANY, LLP Emerging market debt May 2010 1.96	LOOMIS SAYLES & COMPANY, LP	Core plus	August 2009	3.58
PACIFIC INVESTMENT MANAGEMENT COMPANY Global fixed income February 2013 2.60 MANULIFE ASSET MANAGEMENT LLC Active - core March 2017 2.04 PACIFIC INVESTMENT MANAGEMENT COMPANY Active - core August 1983 2.04 NORTHERN TRUST GLOBAL INVESTMENT Passive (BB.AGG index) December 2017 2.03 WELLINGTON MANAGEMENT COMPANY, LLP Emerging market debt May 2010 1.96	PRUDENTIAL FIXED INCOME	Core plus	January 2012	3.56
MANULIFE ASSET MANAGEMENT LLC Active - core March 2017 2.04 PACIFIC INVESTMENT MANAGEMENT COMPANY Active - core August 1983 2.04 NORTHERN TRUST GLOBAL INVESTMENT Passive (BB.AGG index) December 2017 2.03 WELLINGTON MANAGEMENT COMPANY, LLP Emerging market debt May 2010 1.96	ALLIANCEBERNSTEIN, LP	Global fixed income	February 2013	2.61
PACIFIC INVESTMENT MANAGEMENT COMPANY Active - core August 1983 2.04 NORTHERN TRUST GLOBAL INVESTMENT Passive (BB.AGG index) December 2017 2.03 WELLINGTON MANAGEMENT COMPANY, LLP Emerging market debt May 2010 1.96	PACIFIC INVESTMENT MANAGEMENT COMPANY	Global fixed income	February 2013	2.60
NORTHERN TRUST GLOBAL INVESTMENT Passive (BB.AGG index) December 2017 2.03 WELLINGTON MANAGEMENT COMPANY, LLP Emerging market debt May 2010 1.96	MANULIFE ASSET MANAGEMENT LLC	Active - core	March 2017	2.04
WELLINGTON MANAGEMENT COMPANY, LLP Emerging market debt May 2010 1.96	PACIFIC INVESTMENT MANAGEMENT COMPANY	Active - core	August 1983	2.04
	NORTHERN TRUST GLOBAL INVESTMENT	Passive (BB.AGG index)	December 2017	2.03
SUBTOTAL 20.42	WELLINGTON MANAGEMENT COMPANY, LLP	Emerging market debt	May 2010	1.96
	SUBTOTAL			20.42

*Includes cash and cash equivalents.

Defined Benefit Plans: PORTFOLIO DETAIL ILLUSTRATED BY ADVISOR (CONTINUED)

ADVISOR <i>Real Estate:</i>	ТҮРЕ	DATE INITIATED	FAIR VALUE PERCENT OF TOTAL PORTFOLIO*
PRINCIPAL GLOBAL INVESTORS	Commingled fund - core	June 2003	2.92%
J.P. MORGAN INVESTMENT MANAGEMENT, INC.	Core	July 2012	2.16
UBS REALTY INVESTORS, LLC	TPF - Commingled - core	June 2003	1.47
CENTERSQUARE INVESTMENT MANAGEMENT	REITs	June 2017	0.83
COHEN & STEERS CAPITAL MANAGEMENT	Global REITs	October 2010	0.74
UBS REALTY INVESTORS, LLC	TPG - Value added	January 2011	0.69
HANCOCK TIMBER RESOURCE GROUP	Timber	March 2008	0.37
T.A. ASSOCIATES REALTY	Fund XI - value added	April 2016	0.19
HEITMAN, LLC	Fund III - value added	November 2013	0.13
INVESCO	Fund IV - value added	April 2015	0.13
AEW CAPITAL MANAGEMENT, LP	Fund VII - value added	June 2013	0.13
T.A. ASSOCIATES REALTY	Fund X - value added	January 2013	0.12
ANGELO, GORDON & COMPANY	Fund IV - value added	August 2015	0.11
WESTBROOK PARTNERS	Fund X - value added	March 2016	0.08
AEW CAPITAL MANAGEMENT, LP	Fund VI - value added	April 2010	0.07
ANGELO, GORDON & COMPANY	Fund III - value added	January 2012	0.05
AEW CAPITAL MANAGEMENT, LP	Fund VIII - value added	July 2016	0.03
ANGELO, GORDON & COMPANY	Fund II - value added	August 2007	0.01
SUBTOTAL			10.23
Private Equity:			
PATHWAY CAPITAL MANAGEMENT, LLC	Series 2008 Diversified	December 2008	2.18
PATHWAY CAPITAL MANAGEMENT, LLC	Series 2013 Diversified	April 2013	2.16
GCM GROSVENOR DIVERSIFIED PARTNERS, LP	Series 2009 Diversified	June 2009	1.98
GCM GROSVENOR DIVERSIFIED PARTNERS, LP	Series 2014 Diversified	February 2014	1.05
PATHWAY CAPITAL MANAGEMENT, LLC	Series 2016 Diversified	July 2016	0.37
SUBTOTAL			7.74
TOTAL			100.00%

*Includes cash and cash equivalents.

Note: AEW Capital Management, LP Fund V and Heitman, LLC Fund II are not shown due to small residual balances.

In addition to the cash equivalent portfolio managed in-house, 38 firms managed 55 different investment portfolios for the System at year end.

Defined Benefit Plans: INVESTMENT FEES AND COMMISSIONS - FOR THE YEAR ENDED JUNE 30, 2018 -

TOTALS	\$27,804,532,214	\$104,777,505
PRIVATE EQUITY	2,152,164,110	13,089,623
REAL ESTATE	2,844,196,059	22,013,723
DEBT SECURITIES	5,676,932,663	10,463,124
EQUITIES	\$17,131,239,382	\$59,211,035
Investment Managers:	MANAGEMENT	T LL3
	ASSETS UNDER MANAGEMENT	FEES*

Other Investment Service Fees:		
SECURITIES LENDING AGENT/ CASH MANAGEMENT FEES	\$3,436,545	
INVESTMENT CONSULTANT FEES	672,283	
CUSTODIAL & GLOBAL OUT-OF-POCKET EXPENSES	684,685	
TOTAL INVESTMENT SERVICE FEES	\$4,793,513	

* Management fees are subject to estimation.

Defined Benefit Plans:

BROKERAGE COMMISSIONS PAID* - FOR THE YEAR ENDED JUNE 30, 2018 -

Brokerage Firm, Including Subsidiaries:	NUMBER OF SHARES TRADED	COMMISSIONS	COMMISSIONS PER SHARE
MERRILL LYNCH & COMPANY	90,246,587	\$740,154	\$0.008
JP MORGAN SECURITIES	51,447,324	433,410	0.008
GOLDMAN SACHS & COMPANY	38,704,124	391,425	0.010
CITIGROUP, INC.	88,534,690	321,918	0.004
UBS AG	70,987,659	301,263	0.004
INSTINET	75,680,688	279,543	0.004
MORGAN STANLEY AND COMPANY	59,287,483	269,692	0.005
CREDIT SUISSE	75,548,773	260,409	0.003
INVESTMENT TECHNOLOGY GROUP	47,634,060	257,295	0.005
CAPITAL INSTITUTIONAL SERVICES, INC.	8,772,580	214,537	0.024
SANFORD C. BERNSTEIN CO., LLC	21,977,590	193,171	0.009
DEUTSCHE BANK	29,337,357	186,331	0.006
JEFFERIES & COMPANY, INC.	14,307,937	169,035	0.012
HSBC SECURITIES, INC.	27,849,470	155,066	0.006
LIQUIDNET	8,202,753	134,768	0.016
SG AMERICAS SECURITIES	42,400,487	122,155	0.003
MACQUARIE SECURITIES	28,825,248	103,678	0.004
PERSHING, LLC	3,455,678	98,839	0.029
STIFEL	2,589,490	93,714	0.036
BARCLAYS CAPITAL	4,421,103	78,815	0.018
ROBERT W. BAIRD & COMPANY	2,101,135	76,685	0.036
RBC CAPITAL MARKETS, LLC	4,169,463	61,845	0.015
RAYMOND JAMES & ASSOCIATES, INC.	2,869,096	61,153	0.021
WELLS FARGO SECURITIES	1,917,279	60,513	0.032
OTHERS (LESS THAN \$60,000)	86,966,727	895,867	0.010
COMMISSION RECAPTURE INCOME	-	(250,205)	-
TOTALS	888,234,781	\$5,711,076	\$0.006

*Approximate figures provided by Bank of New York Mellon.

Defined Benefit Plans:

INVESTMENT SUMMARY

- FOR THE YEAR ENDED JUNE 30, 2018-

[in thousands]

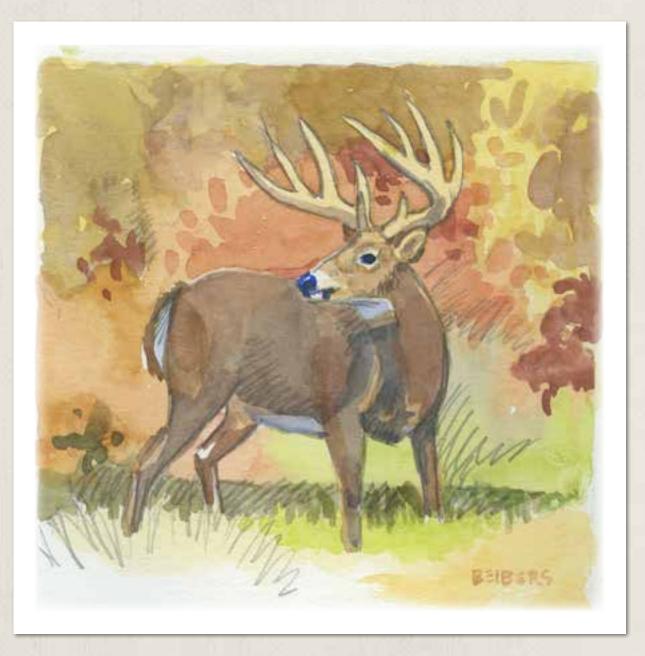
TOTALS	\$29,551,754	\$92,107,159	\$89,886,408	\$35,778	\$31,808,283	100.00%
SHORT-TERM INVESTMENTS	575,632	72,474,670	71,166,586	43,384	1,927,100	6.06
REAL ESTATE	2,625,867	721,558	609,371	91,486	2,829,540	8.90
PRIVATE EQUITY	1,800,240	1,368,127	1,187,904	73,368	2,053,831	6.46
LONG-TERM DEBT SECURITIES	7,702,333	9,137,295	8,597,533	(164,288)	8,077,807	25.39
EQUITIES	\$16,847,682	\$8,405,509	\$8,325,014	\$(8,172)	\$16,920,005	53.19%
	JULY 1, 2017 BEGINNING FAIR VALUE*	PURCHASES	SALES AND MATURITIES	INCREASE (DECREASE) IN FAIR VALUE	JUNE 30, 2018 ENDING FAIR VALUE**	PERCENT OF TOTAL FAIR VALUE

*Includes investment securities on loan to broker-dealers with a fair value of \$3,568,820. It also includes the securities purchased with the cash collateral received in the lending program with a fair value of \$2,959,706. As of June 30, 2017, 12.1 percent of the total fair value of investments were on loan to broker-dealers. To arrive at the net asset value of investments of \$26.9 billion, the fair value total must be adjusted by \$(2.7 billion), which represents the fair value of cash, sweep investments, accrued interest and dividends, net receivables and payables for pending trades, and the securities lending obligations.

**Includes investment securities on loan to broker-dealers with a fair value of \$4,724,228. It also includes the securities purchased with the cash collateral received in the lending program with a fair value of \$3,527,980. As of June 30, 2018, 14.9 percent of the total fair value of investments were on loan to broker-dealers. To arrive at the net asset value of investments of \$28.1 billion, the fair value total must be adjusted by \$(3.7 billion), which represents the fair value of cash, sweep investments, accrued interest and dividends, net receivables and payables for pending trades, and the securities lending obligations.

INVESTMENTS BY TYPE - FAIR VALUE AT JUNE 30, 2018 -





PRUDENCE

Odocoileus virginianus (White-tailed Deer)





October 30, 2018

Board of Trustees Public Employees' Retirement System of Mississippi 429 Mississippi Street Jackson, MS 39201-1005

Dear Board Members:

The basic financial objective of the Public Employees' Retirement System of Mississippi (PERS) is to establish and receive contributions which:

- (1) When expressed in terms of the percents of active member payroll will remain approximately level from generation to generation of Mississippi citizens, and which
- (2) When combined with present assets and future investment return will be sufficient to meet the present and future financial obligations of PERS.

In addition, PERS maintains a funding policy that was revised in 2018. In order to meet the objectives listed above, the System will strive to meet the following funding goals:

- (1) To maintain an increasing trend in the funded ratio over the projection period with an ultimate goal of being approximately 100% funded;
- (2) Require clear reporting and risk analysis of metrics used by the actuary;
- (3) Provide contribution stability as a percentage of payroll.

In order to measure progress toward this fundamental objective and funding policy, PERS has an annual actuarial valuation performed. The valuation (i) measures present financial position, and (ii) establishes contribution requirements that provide for the current cost and level percent of payroll amortization of unfunded actuarial accrued liability over a reasonable period. Since the previous valuation, the PERS Board of Trustees approved an increase in the employer contribution rate from 15.75% to 17.40% for the fiscal year beginning July 1, 2019. The Board also adopted a new funding policy which sets the funding goals, objectives and metrics for possible changes in the contribution rate for future valuations.

The latest completed actuarial valuation was based upon data and assumptions as of June 30, 2018. This valuation indicates that the current contribution rates of 17.40% of payroll for employers and 9.00% of payroll for active members, for benefits then in effect, meet the basic financial objective and the goals of the funding policy as listed above. There are 150,687 active members as of June 30, 2018.

3550 Busbee Pkwy, Suite 250, Kennesaw, GA 30144 Phone (678) 388-1700 • Fax (678) 388-1730 www.CavMacConsulting.com Offices in Kennesaw, GA • Bellevue, NE



Board of Trustees October 30, 2018 Page 2

The actuarial valuation is based upon financial and participant data which is prepared by the retirement system staff, assumptions regarding future rates of investment return and inflation, and rates of retirement, turnover, death and disability among PERS members and their beneficiaries. The data are reviewed by us for internal and year to year consistency as well as general reasonableness prior to its use in the actuarial valuation. It is also summarized and tabulated for the purpose of analyzing trends. The assumptions were adopted by the Board of Trustees and were based upon actual experience of PERS during the years 2012 to 2016. Assets are valued according to a market related method that recognizes 20% of the previously unrecognized and unanticipated gains and losses. The assumptions and methods utilized in this valuation, in our opinion, meet the parameters established by the Actuarial Standards of Practice.

The current benefit structure is outlined in the Actuarial Section. There were no changes in the benefit structure since the last valuation.

The following supporting schedules in the Actuarial Section are prepared by Cavanaugh Macdonald Consulting, LLC:

- Summary of Actuarial Assumptions & Methods
- Summary of Main System Provisions as Interpreted for Valuation Purposes
- Valuation Assets & Funding Progress
- Schedules of Funding Progress Last 10 Fiscal Years
- Solvency Tests
- Analysis of Financial Experience
- Schedule of Active Member Valuation Data
- Schedule of Retirants Added To and Removed from Rolls

We also provided the Schedule of Changes in Net Pension Liability and related ratios, as well as the Schedule of Employer Contributions in the Financial Section.

Based upon the valuation results, annual projection forecasting and the presumption that future contributions will be made at the necessary level to ensure adequate funding and to meet accounting standards, it is our opinion that the Public Employees' Retirement System of Mississippi continues in sound condition in accordance with the actuarial principles of level percent of payroll financing.

Respectfully submitted,

Edward & Kochel

Edward J. Koebel, FCA, EA, MAAA Principal and Consulting Actuary

EJK:ep

S:\2018\Mississippi PERS\Correspondence\2018 PERS CAFR letter.doc



October 30, 2018

Board of Trustees Public Employees' Retirement System of Mississippi 429 Mississippi Street Jackson, MS 39201-1005

Dear Board Members:

The basic financial objective of the Mississippi Highway Safety Patrol Retirement System (MHSPRS) is to establish and receive contributions which:

- (1) When expressed in terms of the percents of active member payroll will remain approximately level from generation to generation of Mississippi citizens, and which
- (2) When combined with present assets and future investment return will be sufficient to meet the present and future financial obligations of MHSPRS.

In addition, MHSPRS maintains a funding policy that was revised in 2012. In order to meet the objectives listed above, the System will strive to meet the following funding goals:

- (1) To maintain an increasing ratio of system assets to accrued liabilities and reach an 80 percent minimum funded ratio in 2042;
- (2) To maintain adequate asset levels to finance the benefits promised to members;
- (3) To develop a pattern of stable contribution rates when expressed as a percentage of member payroll as measured by valuations prepared in accordance with the principles of practice prescribed by the Actuarial Standards Board, with a minimum employer contribution equal to the normal cost determined under the Entry Age Normal funding method.

In order to measure progress toward this fundamental objective, MHSPRS has an annual actuarial valuation performed. The valuation (i) measures present financial position, and (ii) establishes contribution requirements that provide for the current cost and level percent of payroll amortization of unfunded actuarial accrued liability over a reasonable period. Since the previous valuation, the PERS Board and the MHSPRS Administrative Board adopted an employer contribution rate of 49.08% of annual compensation effective July 1, 2018 and the amortization period is to be calculated on an open basis.

The latest completed actuarial valuation was based upon data and assumptions as of June 30, 2018. This valuation indicates that contribution rates of 49.08% of payroll for employers and 7.25% of payroll for active members, along with anticipated contributions as provided by Senate Bill No. 2659 (effective July 1, 2004) and House Bill No. 1015 (effective July 1, 2013), for benefits then in effect, meet the basic financial objective. There are 511 active members as of June 30, 2018.

3550 Busbee Pkwy, Suite 250, Kennesaw, GA 30144 Phone (678) 388-1700 • Fax (678) 388-1730 www.CavMacConsulting.com Offices in Kennesaw, GA • Bellevue, NE



Board of Trustees October 30, 2018 Page 2

The actuarial valuation is based upon financial and participant data which is prepared by the retirement system staff, assumptions regarding future rates of investment return and inflation, and rates of retirement, turnover, death and disability among MHSPRS members and their beneficiaries. The data is reviewed by us for internal and year to year consistency as well as general reasonableness prior to its use in the actuarial valuation. It is also summarized and tabulated for the purpose of analyzing trends. The assumptions were adopted by the Board of Trustees and were based upon actual experience of MHSPRS during the years 2012 to 2016. Assets are valued according to a market related method that recognizes 20% of the previously unrecognized and unanticipated gains and losses. The assumptions and methods utilized in this valuation, in our opinion, meet the parameters established by the Actuarial Standards of Practice.

The current benefit structure is outlined in the Actuarial Section. There were no changes in the benefit structure since the last valuation.

The following supporting schedules in the Actuarial Section are prepared by Cavanaugh Macdonald Consulting, LLC:

- Summary of Actuarial Assumptions & Methods
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- Schedule of Active Member Valuation Data
- Schedule of Retirants Added To and Removed from Rolls

We also provided the Schedule of Changes in Net Pension Liability and related ratios, as well as the Schedule of Employer Contributions in the Financial Section.

Based upon the valuation results, annual projection forecasting and the presumption that future contributions will be made at the necessary level to ensure adequate funding and to meet accounting standards, it is our opinion that the Mississippi Highway Safety Patrol Retirement System continues in sound condition in accordance with the actuarial principles of level percent of payroll financing.

Respectfully submitted,

Edward J. Hockel

Edward J. Koebel, FCA, EA, MAAA Principal and Consulting Actuary

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October 30, 2018

Board of Trustees Public Employees' Retirement System of Mississippi 429 Mississippi Street Jackson, MS 39201-1005

Dear Board Members:

The basic financial objective of the Municipal Retirement System of Mississippi (MRS) is to establish and receive contributions (expressed as a tax on assessed property valuations) which:

- (1) Will be in amounts sufficient, but not more than necessary, to maintain the actuarially soundness of the Funds for all future years (the tax may be increased but not by more than one-half mill per year), and which
- (2) When combined with present assets and future investment return will be sufficient to meet the present and future financial obligations of MRS.

In addition, MRS maintains a funding policy that was revised in 2011. In this new funding policy, contributions are extended past 2020 and an employer contribution rate, expressed as a millage rate tax applied to assessed property values, is established beginning in the 2011-2012 fiscal year that will generate an ultimate reserve level equal to a reasonable percentage (initially 100% - 150%) of the next year's projected benefit payment. At that point, employer contributions will be set equal to the fiscal year's projected benefit payments and adjusted as necessary to maintain the assets at the established reserve level.

In order to measure progress toward this fundamental objective, MRS has an annual actuarial valuation performed. The valuation (i) measures present financial position, and (ii) establishes contribution rates that provide for the amortization of unfunded total actuarial liabilities over a closed period. The latest completed actuarial valuation was based upon data and assumptions as of June 30, 2018. These valuations indicate that the current contribution rates, for benefits then in effect, meet the basic financial objective. The employee contribution rates vary by participating City and are 7% - 10% of payroll for active members. There were 4 active members as of June 30, 2018.

The actuarial valuation is based upon financial and participant data which is prepared by the retirement system staff, assumptions regarding future rates of investment return and inflation, and rates of retirement, death and disability among MRS members and their beneficiaries. The data is reviewed by us for internal and year to year consistency as well as general reasonableness prior to its use in the actuarial valuation. It is also summarized and tabulated for the purpose of analyzing trends. The assumptions were adopted by the Board of Trustees and were based upon actual experience of MRS during the years 2012 to 2016. Assets are valued according to a market related method that recognizes 20% of the previously unrecognized and unanticipated gains and losses. The assumptions and methods utilized in this valuation, in our opinion, meet the parameters established by the Actuarial Standards of Practice.

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Board of Trustees October 19, 2017 Page 2

The current benefit structure is outlined in the Actuarial Section. Since the last valuation, a 3% ad-hoc benefit increase was granted to Tupelo retirees and beneficiaries retired at least one full fiscal year as of September 30, 2015. In addition, the City of Vicksburg increased the minimum monthly allowance from \$1,415 to \$1,515.

The following supporting schedules in the Actuarial Section are prepared by Cavanaugh Macdonald Consulting, LLC:

- Summary of Actuarial Assumptions & Methods
- Summary of Main System Provisions as Interpreted for Valuation Purposes
- Valuation Assets & Funding Progress
- Schedules of Funding Progress Last 10 Fiscal Years
- Solvency Tests
- Analysis of Financial Experience
- Schedule of Active Member Valuation Data
- Schedule of Retirants Added To and Removed from Rolls

We also pronounced the Schedule of Changes in Net Pension Liability and related ratios, as well as the Schedule of Employer Contributions in the Financial Section.

Based upon the valuation results annual projection forecasting and the presumption that future contributions will be made at the necessary level to ensure adequate funding and to meet accounting standards, it is our opinion that the Municipal Retirement Systems of Mississippi continue in sound condition in accordance with the actuarial principles and requirements of State law.

Respectfully submitted,

Edward & Vichel

Edward J. Koebel, FCA, EA, MAAA Principal and Consulting Actuary

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October 30, 2018

Board of Trustees Public Employees' Retirement System of Mississippi 429 Mississippi Street Jackson, MS 39201-1005

Dear Board Members:

The basic financial objective of the Mississippi Supplemental Legislative Retirement Plan (SLRP) is to establish and receive contributions which:

- (1) When expressed in terms of the percents of active member payroll will remain approximately level from generation to generation of Mississippi citizens, and which
- (2) When combined with present assets and future investment return will be sufficient to meet the present and future financial obligations of SLRP.

In addition, SLRP maintains a funding policy that was revised in 2012. In order to meet the objectives listed above, the System will strive to meet the following funding goals:

- (1) To maintain an increasing ratio of system assets to accrued liabilities and reach an 80 percent minimum funded ratio in 2042;
- (2) To maintain adequate asset levels to finance the benefits promised to members;
- (3) To develop a pattern of stable contribution rates when expressed as a percentage of member payroll as measured by valuations prepared in accordance with the principles of practice prescribed by the Actuarial Standards Board, with a minimum employer contribution equal to the normal cost determined under the Entry Age Normal funding method.

In order to measure progress toward this fundamental objective and funding policy, SLRP has an annual actuarial valuation performed. The valuation (i) measures present financial position, and (ii) establishes contribution rates that provide for the current cost and level percent of payroll amortization of unfunded actuarial accrued liability over a reasonable period. The latest completed actuarial valuation was based upon data and assumptions as of June 30, 2018. This valuation indicates that contribution rates of 7.40% of payroll for employers and 3.00% of payroll for active members, for benefits then in effect, meet the basic financial objective and the goals of the funding policy as listed above. There are 174 active members as of June 30, 2018.

The actuarial valuation is based upon financial and participant data which is prepared by the retirement system staff, assumptions regarding future rates of investment return and inflation, and rates of retirement, turnover, death and disability among SLRP members and their beneficiaries. The data is reviewed by us for internal and year to year consistency as well as general reasonableness prior to its use in the actuarial valuation. It is also summarized and tabulated for the purpose of analyzing trends. The assumptions were adopted by the Board of Trustees and were based upon actual experience of SLRP during the years 2012 to 2016. Assets are valued according to a market related method that recognizes 20% of the previously unrecognized and unanticipated gains and losses.

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Board of Trustees October 30, 2018 Page 2

The assumptions and methods utilized in this valuation, in our opinion, meet the parameters established by the Actuarial Standards of Practice.

The current benefit structure is outlined in the Actuarial Section. There were no changes in the benefit structure since the last valuation.

The following supporting schedules in the Actuarial Section are prepared by Cavanaugh Macdonald Consulting, LLC:

- Summary of Actuarial Assumptions & Methods
- Summary of Main System Provisions as Interpreted for Valuation Purposes
- Valuation Assets & Funding Progress
- Schedules of Funding Progress Last 10 Fiscal Years
- Solvency Tests
- Analysis of Financial Experience
- Schedule of Active Member Valuation Data
- Schedule of Retirants Added To and Removed from Rolls

We also provided the Schedule of Changes in Net Pension Liability and related ratios, as well as the Schedule of Employer Contributions in the Financial Section.

Based upon the valuation results, annual projection forecasting and the presumption that future contributions will be made at the necessary level to ensure adequate funding and to meet accounting standards, it is our opinion that the Mississippi Supplemental Legislative Retirement Plan continues in sound condition in accordance with the actuarial principles of level percent of payroll financing.

Respectfully submitted,

Edward & Vichel

Edward J. Koebel, FCA, EA, MAAA Principal and Consulting Actuary

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Summary of Actuarial Assumptions & Methods

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An actuarial experience study of the mortality, service, withdrawals, compensation experience of members, and valuation of assets and liabilities is performed annually to determine the actuarial soundness of the plans within the System. To validate that the assumptions recommended by the actuary are, in aggregate, reasonably related to experience, the System requests the actuary to conduct an experience investigation every other year on a rolling four-year period. The actuarial assumptions used in the June 30, 2018, valuations were based on the results of an actuarial experience study for the fiscal period 2013-2016.

Significant actuarial assumptions used to present the results for the 2018 actuarial valuation are as follows:

	PERS	MHSPRS	MRS	SLRP
VALUATION DATE	June 30, 2018	June 30, 2018	June 30, 2018	June 30, 2018
ACTUARIAL COST METHOD	Entry age	Entry age	Entry age	Entry age
AMORTIZATION METHOD	Level percent open	Level percent open	Level dollar closed	Level percent open
REMAINING AMORTIZATION PERIOD	30.9 years	18.3 years	16.0 years	20.1 years
ASSET VALUATION METHOD	5-year Smoothed Market	5-year Smoothed Market	5-year Smoothed Market	5-year Smoothed Market
Actuarial Assumptions:				
INVESTMENT RATE OF RETURN	7.75%	7.75%	7.75%	7.75%
SALARY INCREASES	3.25-18.50%	3.25-8.81%	0.50-1.50%	3.25%
WAGE INFLATION RATES	3.25%	3.25%	3.25%	3.25%
INCREASE IN BENEFITS AFTER RETIREMENT	3.00%*	3.00%**	Various**	* 3.00%*

*Calculated 3.0 percent simple interest to age 55, compounded each year thereafter.

**Calculated 3.0 percent simple interest to age 60, compounded each year thereafter.

***Varies depending on municipality.

Public Employees' Retirement System of Mississippi: Statement of Actuarial Assumptions & Methods

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All assumptions used in the actuarial valuation were adopted by the PERS Board of Trustees when the *Experience Investigation for the Four-Year Period Ending June 30, 2016*, was adopted April 25, 2017. Following are the assumptions adopted by the PERS Board for this program.

INTEREST RATE: 7.75 percent per annum, compounded annually (net of investment expense only). The expected return on assets consists of 3.0 percent price inflation and 4.75 percent real rate of return.

SEPARATIONS FROM ACTIVE SERVICE: Representative values of the assumed rates of separation from active service are as follows:

			ANNUAL RA	ATES OF		
	WITHDRAWAL	& VESTING*	DEATH	***	DISABILITY**	
AGE	MALE	FEMALE	MALE	FEMALE	MALE	FEMALE
20	25.00%	30.00%	0.0256%	0.0080%	0.010%	0.009%
25	18.00	18.25	0.0306	0.0085	0.012	0.011
30	11.50	12.00	0.0286	0.0107	0.017	0.014
35	8.50	8.75	0.0330	0.0141	0.036	0.017
40	6.75	7.00	0.0397	0.0195	0.110	0.070
45	6.25	6.00	0.0615	0.0324	0.230	0.140
50	6.25	6.00	0.1065	0.0543	0.290	0.220
55	6.25	6.00	0.1761	0.0811	0.500	0.380
60	6.25	6.00	0.2868	0.1137	0.530	0.410
65	6.25	6.00	0.4862	0.1694	0.200	0.150
70	6.25	6.00	0.7656	0.2850	0.200	0.150
74	6.25	6.00	1.1226	0.4322	0.200	0.150

*For all ages, rates of 32.5 percent for first year of employment and 23.5 percent for second year. **93.0 percent are presumed to be non-duty related, and 7.0 percent are assumed to be duty related. ***94.0 percent are presumed to be non-duty related, and 6.0 percent are assumed to be duty related.

	ANNUAL RATES OF SERVICE RETIREMENTS						
	MAI	_E	FEMA	LE			
AGE	UNDER 25 YEARS OF SERVICE*	25 YEARS OF SERVICE & OVER*	UNDER 25 YEARS OF SERVICE*	25 YEARS OF SERVICE & OVER*			
45	-%	21.75%	-%	17.50%			
50	-	14.50	-	12.50			
55	-	18.25	-	19.00			
60	10.25	19.50	13.00	22.25			
62	20.25	32.00	18.75	37.50			
65	24.00	29.50	28.75	42.50			
70	20.00	25.00	24.00	25.50			
75	100.00	100.00	100.00	100.00			

*For Tier 4 members, 30 years of service.

	ANNUAL RATES OF SALARY INCREASES					
SERVICE	MERIT & SENIORITY	BASE (ECONOMY)	INCREASE NEXT YEAR			
0	15.25%	3.25%	18.50%			
1	5.25	3.25	8.50			
2	2.75	3.25	6.00			
3	1.75	3.25	5.00			
4	1.25	3.25	4.50			
5-7	0.75	3.25	4.00			
8-27	0.25	3.25	3.50			
28 & OVER	-	3.25	3.25			

SALARY INCREASES: Representative values of the assumed annual rates of salary increases are as follows:

PAYROLL GROWTH: 3.25 percent per annum, compounded annually.

ADMINISTRATIVE EXPENSES: 0.23 percent of payroll.

TIMING OF DECREMENTS AND PAY INCREASES: Middle of year.

DEATH AFTER RETIREMENT: The table for post-retirement mortality used in evaluating allowances to be paid is the RP-2014 Healthy Annuitant Blue Collar Table projected with Scale BB to 2022 with male rates set forward one year and adjusted by 106.0 percent for males at all ages and as follows for females: 90.0 percent for ages less than 76, 95.0 percent for age 76, 105.0 percent for age 78 and 110.0 percent for ages 79 and greater. The RP-2014 Disabled Retiree Table set forward four years for males and three years for females was used for the period after disability retirement. This assumption is used to measure the probabilities of each benefit payment being made after retirement. Mortality improvement is anticipated under this assumption as recent mortality experience shows actual deaths 11.2 percent greater than expected under the selected table for non-disability mortality and 10.5 percent greater than expected under the selected table for disability mortality.

MARRIAGE ASSUMPTION: 85.0 percent married with the husband three years older than wife.

UNUSED SICK LEAVE: 0.5 years at retirement.

MILITARY SERVICE: 0.2 years at retirement.

DEFERRED VESTED: Benefits are assumed to commence at age 60 for Tiers 1, 2, and 3 and at age 65 for Tier 4.

ASSUMED INTEREST RATE ON EMPLOYEE CONTRIBUTIONS: 2.0 percent.

VALUATION METHOD: The valuation is prepared on the projected benefit basis, which is used to determine the present value of each member's expected benefit payable at retirement, disability, or death. The calculations are based on the member's age, years of service, sex, compensation, expected future salary increases, and an assumed future interest earnings rate (currently 7.75 percent). The calculations consider the probability of a member's death or termination of employment prior to becoming eligible for a benefit and the probability of the member terminating with a service, disability, or survivor's benefit. The present value of the expected benefits payable to active members is added to the present value of the expected future payments to current benefit recipients to obtain the present value of all expected benefits payable to the present group of members and survivors.

The employer contributions required to support the benefits of PERS are determined following a level funding approach and consist of a normal contribution and an accrued liability contribution.

The normal contribution is determined using the "entry age normal" method. Under this method, a calculation is made for pension benefits to determine the uniform and constant percentage rate of employer contribution that, if applied to the compensation of the average new member during the entire period of his or her anticipated covered service, would be required in addition to the contributions of the member to meet the cost of all benefits payable on his or her behalf.

The unfunded accrued liability is determined by subtracting the current assets and the present value of prospective employer normal contributions and member contributions from the present value of expected benefits to be paid from PERS. The accrued liability contribution amortizes the balance of the unfunded accrued liability over a period of years from the valuation date.

ASSET VALUATION METHOD: Market value five-year smoothing is the method used for asset valuation. The actuarial value of assets recognizes a portion of the difference between the market value of assets and the expected market value of assets, based on the assumed valuation rate of return. The amount recognized each year is 20.0 percent of the difference between market value and expected market value. Mississippi Highway Safety Patrol Retirement System: Statement of Actuarial Assumptions & Methods Assumptions used in the actuarial valuation were adopted by the MHSPRS Advisory Board when the *Experience Investigation for the Four-Year Period Ending June 30, 2016*, was adopted April 25, 2017. Following are the assumptions adopted by the PERS Board for this program.

INTEREST RATE: 7.75 percent per annum, compounded annually (net of investment expenses only). The expected return on assets consists of 3.0 percent price inflation and 4.75 percent real rate of return.

SEPARATIONS FROM ACTIVE SERVICE: Representative values of the assumed annual rates of separation from active service are as follows:

	ANNUAL RATES OF						
		DEA	ATH	DISABIL	ITY		
AGE	WITHDRAWAL & VESTING	MALES	FEMALES	NON-DUTY	DUTY	SERVICE	SERVICE RETIREMENT*
25	5.60%	0.03%	0.01%	0.07%	-%	5	5.00%
30	4.00	0.03	0.01	0.09	0.01	10	5.00
35	3.00	0.03	0.01	0.12	0.04	15	5.00
40	2.00	0.04	0.02	0.15	0.05	20	5.00
45	1.00	0.06	0.03	0.22	0.05	25	10.00
50	1.00	0.11	0.05	0.38	0.04	30	25.00
55	-	0.18	0.08	0.68	0.01	35	25.00
60	-	0.29	0.11	1.16	-	40+	100.00

*The annual rate of service retirement is 100.0 percent at age 61.

It is assumed that a member will be granted one and three-quarter years of service credit for unused leave at termination of employment. In addition, it is assumed that, on average, one quarter year of service credit for peace-time military service will be granted to each member.

SALARY INCREASES: Representative values of the assumed annual rates of salary increases are as follows:

		ANNUAL RATES OF	
AGE	MERIT & SENIORITY	BASE (ECONOMY)	INCREASE NEXT YEAR
20	5.56%	3.25%	8.81%
25	2.31	3.25	5.56
30	1.49	3.25	4.74
35	1.49	3.25	4.74
40	1.49	3.25	4.74
45	1.00	3.25	4.25
50	0.50	3.25	3.75
55	0.50	3.25	3.75
60	-	3.25	3.25

PAYROLL GROWTH: 3.25 percent per annum, compounded annually.

ADMINISTRATIVE EXPENSES: 0.23 percent of payroll.

TIMING OF DECREMENT AND PAY INCREASES: Middle of year.

ASSUMED INTEREST RATE ON EMPLOYEE CONTRIBUTIONS: 2.0 percent.

DEATH AFTER RETIREMENT: The table for post-retirement mortality used in evaluating allowances to be paid was the RP-2014 Healthy Annuitant Blue Collar Mortality Table Projected to 2022 by Scale BB (set forward one year for males) and adjusted by 106.0 percent for males at all ages and as follows for females: 90.0 percent for ages less than 76, 95.0 percent for age 76, 105.0 percent for age 78, and 110.0 percent for ages 79 and greater. The RP-2014 Disabled Retiree Mortality Table (set forward four years for males and set forward three years for females) was used for the period after disability retirement. This assumption is used to measure the probabilities of each benefit payment being made after retirement. Mortality improvement is anticipated under this assumption as recent mortality experience shows actual deaths 11.2 percent greater than expected under the selected table for non-disability mortality and 10.5 percent greater than expected under the selected table for disability mortality.

MARRIAGE ASSUMPTION: 100.0 percent married with the husband three years older than wife.

VALUATION METHOD: The valuation is prepared on the projected benefit basis, which is used to determine the present value of each member's expected benefit payable at retirement, disability, or death. The calculations are based on the member's age, years of service, sex, compensation, expected future salary increases, and an assumed future interest earnings rate (currently 7.75 percent). The calculations consider the probability of a member's death or termination of employment prior to becoming eligible for a benefit and the probability of the member terminating with a service, disability, or survivor's benefit. The present value of the expected benefits payable to active members is added to the present value of the expected future payments to current benefit recipients to obtain the present value of all expected benefits payable to the present group of members and survivors.

The employer contributions required to support the benefits of MHSPRS are determined following a level funding approach and consist of a normal contribution and an accrued liability contribution.

The normal contribution is determined using the "entry age normal" method. Under this method, a calculation is made for pension benefits to determine the uniform and constant percentage rate of employer contribution that, if applied to the compensation of the average new member during the entire period of his or her anticipated covered service, would be required in addition to the contributions of the member to meet the cost of all benefits payable on his or her behalf.

The unfunded accrued liability is determined by subtracting the current assets and the present value of prospective employer normal contributions and member contributions from the present value of expected benefits to be paid from the MHSPRS. The accrued liability contribution amortizes the balance of the unfunded accrued liability over a period of years from the valuation date.

ASSET VALUATION METHOD: Market value five-year smoothing is the method used for asset valuation. The actuarial value of assets recognizes a portion of the difference between the market value of assets and the expected market value of assets, based on the assumed valuation rate of return. The amount recognized each year is 20.0 percent of the difference between market value and expected market value. Municipal Retirement Systems: Statement of Actuarial Assumptions & Methods

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Assumptions used in the actuarial valuation were adopted by the PERS Board of Trustees when the *Experience Investigation for the Four-Year Period Ending June 30, 2016*, was adopted on April 25, 2017. Following are the assumptions adopted by the PERS Board for this program.

INTEREST RATE: 7.75 percent per annum, compounded annually (net after investment expenses) for prior funding policy rate determination and GASB disclosure.

6.5 percent per annum, compounded annually (net after investment expenses) for current funding policy rate determination.

SEPARATIONS FROM ACTIVE SERVICE: Representative values of the assumed annual rates of separation from active service are as follows:

	ANNUAL RATES OF					
		DEATI	Η	DISABIL	ITY	
AGE	WITHDRAWAL	NON-DUTY	DUTY	NON-DUTY	DUTY	
20	10.65%	0.04%	0.02%	0.08%	0.06%	
25	8.64	0.05	0.03	0.12	0.12	
30	6.87	0.08	0.04	0.18	0.26	
35	4.86	0.11	0.05	0.24	0.52	
40	2.97	0.15	0.07	0.36	0.60	
45	1.44	0.22	0.09	0.64	0.54	
50	0.24	0.34	0.14	1.10	0.88	
55	-	0.44	0.20	1.58	1.18	
60	-	0.51	0.32	2.20	1.30	
64	-	0.57	0.42	2.86	1.38	

SERVICE RETIREMENT
45.00%
17.50
35.00
20.00
100.00

SALARY INCREASES: 3.25 percent for wage inflation, plus the following chart:

AGES	MERIT & SENIORITY SALARY INCREASE
UNDER 43	1.50%
43-47	1.00
48-52	0.50
53 & OVER	-

DEATH AFTER RETIREMENT: The mortality table, for post-retirement mortality, used in evaluating allowances to be paid was the RP-2014 Healthy Annuitant Blue Collar Table projected with Scale BB to 2022 with male rates set forward one year and adjusted by 106.0 percent for males at all ages and as follows for females: 90.0 percent for ages less the 76, 95.0 percent for age 76, 105.0 percent for age 78, and 110.0 percent for ages 79 and greater. The RP-2014 Disabled Retiree Table set forward four years for males and three years for females was used for the period after disability retirement. This assumption is used to measure the probabilities of each benefit payment being made after retirement. Mortality improvement is anticipated under this assumption as recent mortality experience shows actual deaths 11.2 percent greater than expected under the selected table for non-disability mortality and 10.5 percent greater than expected under the selected table for disability mortality.

MARRIAGE ASSUMPTION: 85.0 percent married with the husband three years older than the wife.

VALUATION METHOD: Unfunded employer liabilities are amortized over a closed 30-year period from September 30, 1990, as a level percent of each municipality's assessed property valuation.

ASSESSED PROPERTY VALUE RATE OF INCREASE: 2.0 percent per annum, compounded annually (used in determining the millage rate under the prior funding policy).

EXPENSE LOAD: 2.0 percent of employer contributions.

ASSET VALUATION METHOD: Market value five-year smoothing is the method used for asset valuation. The actuarial value of assets recognizes a portion of the difference between the market value of assets and the expected market value of assets, based on the assumed valuation rate of return. The amount recognized each year is 20.0 percent of the difference between market value and expected market value. Actuarial assets were allocated to individual cities in the same proportion that their market value of assets was to the total market value of assets for all cities. Supplemental Legislative Retirement Plan: Statement of Actuarial Assumptions & Methods All assumptions used in the actuarial valuation were adopted by the PERS Board of Trustees when the *Experience Investigation for the Four-Year Period Ending June 30, 2016*, was adopted April 25, 2017. Following are the assumptions adopted by the PERS Board for this program.

INTEREST RATE: 7.75 percent per annum, compounded annually (net of investment expenses only). The expected return on assets consists of 3.0 percent price inflation and 4.75 percent rate of return.

SEPARATIONS FROM ACTIVE SERVICE: Representative values of the assumed rates of separation from active service are as follows:

	ANNUAL RATES OF					
AGE	DEAT MALE	FEMALE	DISABILITY*			
20	0.03%	0.01%	0.04%			
25	0.03	0.01	0.05			
30	0.03	0.01	0.07			
35	0.03	0.01	0.11			
40	0.04	0.02	0.17			
45	0.06	0.03	0.23			
50	0.11	0.05	0.30			
55	0.18	0.08	0.35			
60	0.29	0.11	0.40			
65	0.49	0.17	-			
70	0.77	0.29	-			
75	1.24	0.48	-			

^{*93.0} percent are presumed to be non-duty related, and 7.0 percent are assumed to be duty related.

WITHDRAWAL AND VESTING: 20.0 percent in an election year, none in a non-election year.

SERVICE RETIREMENT: 30.0 percent in an election year, none in a non-election year. All members are assumed to retire no later than age 80. It is assumed that a member will be granted two and a half years of service credit for unused leave at termination of employment.

PAYROLL GROWTH: 3.25 percent per annum, compounded annually.

ADMINISTRATIVE EXPENSES: 0.23 percent of payroll.

TIMING OF DECREMENTS AND PAY INCREASES: Middle of year.

SALARY INCREASES: 3.25 percent per annum, for all ages.

DEATH AFTER RETIREMENT: The table for post-retirement mortality used in evaluating allowances to be paid was the RP-2014 Healthy Annuitant Blue Collar Mortality Table Projected to 2022 by Scale BB (set forward one year for males) and adjusted by 106.0 percent for males at all ages and as follows for females: 90.0 percent for ages less than 76, 95.0 percent for age 76, 105.0 percent for age 78, and 110.0 percent for ages 79 and greater. The RP-2014 Disabled Mortality Table (set forward four years for males and set forward three years for females) was used for the period after disability retirement. This assumption is used to measure the probabilities of each benefit payment being made after retirement. Mortality improvement is anticipated under this assumption as recent mortality experience show actual deaths 11.2 percent greater than expected under the selected table for disability mortality.

MARRIAGE ASSUMPTION: 85.0 percent married with the husband three years older than the wife.

ASSUMED INTEREST RATE ON EMPLOYEE CONTRIBUTIONS: 2.0 percent.

VALUATION METHOD: The valuation is prepared on the projected benefit basis, which is used to determine the present value of each member's expected benefit payable at retirement, disability, or death. The calculations are based on the member's age, years of service, sex, compensation, expected future salary increases, and an assumed future interest earnings rate (currently 7.75 percent). The calculations consider the probability of a member's death or termination of employment prior to becoming eligible for a benefit and the probability of the member terminating with a service, disability, or survivor's benefit. The present value of the expected benefits payable to active members is added to the present value of the expected benefits payable to the present group of members and survivors.

The employer contributions required to support the benefits of SLRP are determined following a level funding approach and consist of a normal contribution and an accrued liability contribution.

The normal contribution is determined using the "entry age normal" method. Under this method, a calculation is made for pension benefits to determine the uniform and constant percentage rate of employer contribution that, if applied to the compensation of the average new member during the entire period of his or her anticipated covered service, would be required in addition to the contributions of the member to meet the cost of all benefits payable on his or her behalf.

The unfunded accrued liability is determined by subtracting the current assets and the present value of prospective employer normal contributions and member contributions from the present value of expected benefits to be paid from SLRP. The accrued liability contribution amortizes the balance of the unfunded accrued liability over a period of years from the valuation date.

ASSET VALUATION METHOD: Market value five-year smoothing is the method used for asset valuation. The actuarial value of assets recognizes a portion of the difference between the market value of assets and the expected market value of assets, based on the assumed valuation rate of return. The amount recognized each year is 20.0 percent of the difference between market value and expected market value. Public Employees' Retirement System of Mississippi: Summary of Main System Provisions as Interpreted for Valuation Purposes

SUMMARY OF MAIN BENEFIT AND CONTRIBUTION PROVISIONS

The following summary presents the main benefit and contribution provisions of the plan in effect June 30, 2018, as interpreted in preparing the actuarial valuation. As used in the summary, "average compensation" means the average annual covered earnings of an employee during the four highest years of service. To determine the member's four highest years, PERS considers these scenarios:

- » Four highest fiscal years of earned compensation;
- » Four highest calendar years of earned compensation;
- » Combination of the four highest fiscal and calendar years of earned compensation that do not overlap; or
- » Final 48 months of earned compensation prior to termination of employment.

"Covered earnings" means gross salary not in excess of the maximum amount on which contributions were required. "Fiscal year" means a year commencing July 1 and ending June 30. "Credited service" means service while a contributing member plus additional service as follows. "Unused sick and vacation leave" means service credit is provided at no charge to members for unused sick and vacation time that has accrued at the time of retirement. A payment of up to 240 hours leave may be used in the average compensation definition. "Additional service" means additional service credit may be granted for service prior to February 1, 1953, active-duty military service, out-of-state service, professional leave, and non-covered and retroactive service.

The maximum covered earnings for employers and employees over the years are as follows:

FISCAL DATE FROM	FISCAL DATE TO	EMPLOYER RATE	MAXIMUM COVERED EARNINGS	EMPLOYEE RATE	MAXIMUM COVERED EARNINGS
2/1/53	6/30/58	2.50%	\$6,000	4.00%	\$4,800*
7/1/58	6/30/60	2.50	9,000	4.00	7,800*
7/1/60	6/30/66	2.50	15,000	4.00	13,800*
7/1/66	6/30/68	3.00	15,000	4.50	13,800*
7/1/68	3/31/71	4.50	15,000	4.50	15,000
4/1/71	6/30/73	4.50	35,000	4.50	35,000
7/1/73	6/30/76	5.85	35,000	5.00	35,000
7/1/76	6/30/77	7.00	35,000	5.00	35,000
7/1/77	6/30/78	7.50	35,000	5.50	35,000
7/1/78	6/30/80	8.00	35,000	5.50	35,000
7/1/80	6/30/81	8.00	53,000	5.50	53,000
7/1/81	12/31/83	8.75	53,000	6.00	53,000
1/1/84	6/30/88	8.75	63,000	6.00	63,000
7/1/88	6/30/89	8.75	75,600	6.00	75,600
7/1/89	12/31/89	8.75	75,600	6.50	75,600
1/1/90	6/30/91	9.75	75,600	6.50	75,600
7/1/91	6/30/92	9.75	75,600	7.25	75,600
7/1/92	6/30/02	9.75	125,000	7.25	125,000
7/1/02	6/30/05	9.75	150,000	7.25	150,000
7/1/05	6/30/06	10.75	150,000	7.25	150,000
7/1/06	6/30/07	11.30	150,000	7.25	150,000
7/1/07	6/30/08	11.85	150,000	7.25	150,000
7/1/08	6/30/09	11.85	230,000	7.25	230,000
7/1/09	6/30/10	12.00	245,000	7.25	245,000
7/1/10	6/30/11	12.00	245,000	9.00	245,000
7/1/11	12/31/11	12.00	245,000	9.00	245,000
1/1/12	6/30/12	12.93	245,000	9.00	245,000
7/1/12	6/30/13	14.26	250,000	9.00	250,000
7/1/13	6/30/14	15.75	255,000	9.00	255,000
7/1/14	6/30/15	15.75	260,000	9.00	260,000
7/1/15	6/30/17	15.75	265,000	9.00	265,000
7/1/17	6/30/18	15.75	270,000	9.00	270,000
7/1/18	6/30/19	15.75	275,000	9.00	275,000

*From February 1, 1953, through June 30, 1968, the first \$100 in monthly earnings or \$1,200 in annual earnings were not covered earnings for the employee.

Benefits

ts SUPERANNUATION RETIREMENT

Condition for Retirement

- a) A retirement allowance is paid upon the request of any member who retires and has attained age 60 and completed at least eight years* of membership service. A retirement allowance may also be paid upon the completion of 25 years of creditable service for members hired prior to July 1, 2011, or upon the completion of 30 years of creditable service for members hired on or after July 1, 2011.
- b) Any member who withdraws from service prior to his or her attainment of age 60 and who has completed at least eight years* of membership service is entitled to receive, in lieu of a refund of his or her accumulated contributions, a retirement allowance commencing at age 60.

*Four years for those who entered the System before July 1, 2007.

Amount of Allowance

The annual retirement allowance payable to a member who retires under condition (a) above is equal to:

- 1. A member's annuity that is the actuarial equivalent of the member's accumulated contributions at the time of his or her retirement, plus
- 2. For a member hired prior to July 1, 2011, an employer's annuity that, together with the member's annuity, is equal to 2.0 percent of his or her average compensation for each of the first 25 years of creditable service plus 2.5 percent for each year of creditable service over 25 years.
- 3. For a member hired on or after July 1, 2011, an employer's annuity that, together with the member's annuity, is equal to 2.0 percent of his or her average compensation for each of the first 30 years of creditable service plus 2.5 percent for each year of creditable service over 30 years. An actuarial reduction will be made for each year of creditable service below 30 or for each year of age below 65, whichever is less.

For members hired prior to July 1, 2011, the minimum allowance is \$120 for each year of creditable service.

For members hired on or after July 1, 2011, an actuarially reduced retirement allowance is paid upon the request of any member who retires with less than 30 years of creditable service. The annual actuarially reduced retirement allowance is equal to the benefit in the previous section but reduced for each year of creditable service below 30 or for each year in age below age 65, whichever is less.

Any member who withdraws from service prior to his or her attainment of age 60 and who has completed at least eight years (four years if hired prior to July 1, 2007) of membership service is entitled to receive, in lieu of a refund of his or her accumulated contributions, a retirement allowance.

DISABILITY RETIREMENT

Condition for Retirement

A retirement allowance is paid to a member who is totally and permanently disabled, as determined by the Board of Trustees, and who has accumulated eight or more years* of membership service.

*Four years for those who entered the System before July 1, 2007.

Amount of Allowance

For those who were active members prior to July 1, 1992, and did not elect the benefit structure outlined below, the annual disability retirement allowance payable is equal to a superannuation retirement allowance if the member has attained age 60; otherwise it is equal to a superannuation retirement allowance calculated as follows:

- 1. A member's annuity equal to the actuarial equivalent of his or her accumulated contributions at the time of retirement, plus
- 2. An employer's annuity equal to the amount that would have been payable had the member continued in service to age 60.

For those who become active members after June 30, 1992, and for those who were active members prior to July 1, 1992, who so elected, the following benefits are payable:

 A temporary allowance equal to the greater of (a) 40.0 percent of average compensation plus 10.0 percent for each dependent child up to a maximum of two, or (b) the member's accrued allowance. This temporary allowance is paid for a period of time based on the member's age at disability, as follows:

AGE AT DISABILITY	DURATION
60 & earlier	to age 65
61	to age 66
62	to age 66
63	to age 67
64	to age 67
65	to age 68
66	to age 68
67	to age 69
68	to age 70
69 & later	one year

For members hired prior to July 1, 2011, the minimum allowance is \$120 per year of creditable service.

2. A deferred allowance commencing when the temporary allowance ceases equal to the greater of (a) the allowance the member would have received based on service to the termination age of the temporary allowance, but not more than 40.0 percent of average compensation, or (b) the member's accrued allowance.

For members hired prior to July 1, 2011, the minimum allowance is \$120 per year of creditable service.

Effective July 1, 2004, a temporary benefit can be paid out of a member's accumulated contribution balance while the member is awaiting a determination for eligibility for disability benefits. Future disability payments, if any, would be offset by advanced payments made from the member's accumulated contributions.

ACCIDENTAL DISABILITY RETIREMENT

Condition for Retirement

A retirement allowance is paid to a member who is totally and permanently disabled in the line of performance of duty.

Amount of Allowance

The annual accidental disability retirement allowance is equal to the allowance payable on disability retirement but not less than 50.0 percent of average compensation. There is no minimum benefit.

ACCIDENTAL DEATH BENEFIT

Condition for Benefit

A retirement allowance is paid to a spouse and/or dependent children upon the death of an active member in the line of performance of duty.

Amount of Allowance

The annual retirement allowance is equal to 50.0 percent of average compensation payable to the spouse and 25.0 percent of average compensation payable to one dependent child or 50.0 percent to two or more children until age 19 (23 if a full-time student). There is no minimum benefit.

ORDINARY DEATH BENEFIT

Condition for Benefit

Upon the death of a member who has completed at least eight years* of membership service, a benefit is payable (in lieu of a refund of the member's accumulated contributions) to his or her spouse, if said spouse has been married to the member for not less than one year.

*Four years for those who entered the System before July 1, 2007.

Amount of Allowance

The annual retirement allowance payable to the lawful spouse of a vested member who dies is equal to the greater of:

- The allowance that would have been payable had the member retired and elected Option 2, reduced by an actuarially determined factor based on the number of years the member lacked in qualifying for unreduced retirement benefits, or
- 2. A lifetime benefit equal to 20.0 percent of the deceased member's average compensation, but not less than \$50 per month.

In addition, a benefit is payable to dependent children until age 19 (23 if a full-time student). The benefit is equal to the greater of 10.0 percent of average compensation or \$50 per month for each dependent child up to three.

RETURN OF CONTRIBUTIONS

Upon the withdrawal of a member without a retirement benefit, his or her contributions are returned to him or her, together with accumulated regular interest thereon.

Upon the death of a member before retirement, his or her contributions, together with the full accumulated regular interest thereon, are paid to his or her designated beneficiary, if any, otherwise, to his or her estate provided no other survivor benefits are payable.

Effective July 1, 2016, the interest rate on employee contributions shall be calculated based on the money market rate as published by *The Wall Street Journal* on December 31 of each preceding year with a minimum rate of 1.0 percent and a maximum rate of 5.0 percent.

NORMAL FORM OF BENEFIT

The normal form of benefit (modified cash refund) is an allowance payable during the life of the member with the provision that upon his or her death the excess of his or her total contributions at the time of retirement over the total retirement annuity paid to him or her will be paid to his or her designated beneficiary.

OPTIONAL BENEFITS

A member upon retirement may elect to receive his or her allowance in one of the following forms, which are computed to be actuarially equivalent to the applicable retirement allowance.

- Option 1. Reduced allowance with the provision that if the pensioner dies before he or she receives the value of his or her annuity as it was at the time of retirement, the balance shall be paid to his or her beneficiary.
- Option 2. Upon his or her death, his or her reduced retirement allowance shall be continued throughout the life of, and paid to, his or her beneficiary.
- Option 3. Upon his or her death, 50.0 percent of his or her reduced retirement allowance shall be continued throughout the life of, and paid to, a designated beneficiary and the other 50.0 percent of his or her reduced retirement allowance to some other designated beneficiary.
- Option 4. Upon his or her death, 75.0 percent of his or her reduced retirement allowance shall be continued throughout the life of, and paid to, a designated beneficiary.
- Option 4A. Upon his or her death, 50.0 percent of his or her reduced retirement allowance shall be continued throughout the life of, and paid to, a designated beneficiary.
- Option 4B. A reduced retirement allowance shall be continued throughout the life of the pensioner, but with the further guarantee of payment to the pensioner or his or her beneficiary for a specified number of years certain.
- Option 4C. A member may elect any option with the added provision that he or she shall receive, so far as possible, the same total amount annually (considering both PERS and Social Security benefits) before and after the earliest age at which the member becomes eligible for a Social Security benefit. This option was only available to those who retired prior to July 1, 2004.

A member who elects Option 2, Option 4, or Option 4A at retirement may revert to the normal form of benefit if the designated beneficiary predeceases the retired member or if the retired member divorces the designated beneficiary. A member who elects the normal form of benefit or Option 1 at retirement may select Option 2, Option 4, or Option 4A to provide beneficiary protection to a new spouse if married after retirement.

A member hired prior to July 1, 2011, and who has at least 28 years of creditable service* or a member hired on or after July 1, 2011, who has at least 33 years of creditable service may select the Partial-Lump-Sum Option (PLSO) at retirement. Under this option, the retiree has the option of taking a partial-lump-sum distribution equal to 12, 24, or 36 times the base maximum monthly benefit. With each lump-sum amount, the base maximum monthly benefit will be actuarially reduced. A member selecting the PLSO may also select any of the regular options except Option 1, the prorated single-life annuity, and Option 4C, the Social Security-leveling provision. The benefit is then calculated using the new reduced maximum benefit as a starting point in applying the appropriate option factors for the reduction.

*Or at least age 63 with four years of membership service for those who entered the System before July 1, 2007.

POST-RETIREMENT ADJUSTMENTS IN ALLOWANCES

The allowances of retired members are adjusted annually by an amount equal to:

- a) 3.0 percent of the annual retirement allowance for each full fiscal year of retirement prior to the year in which the member reaches age 55*, plus
- b) 3.0 percent compounded for each year thereafter beginning with the fiscal year in which the member turns age 55*.

*Age 60 for members hired on or after July 1, 2011.

A prorated portion of the annual adjustment will be paid to the member, beneficiary, or estate of any member or beneficiary who is receiving the annual adjustment in a lump sum, but whose benefits are terminated between July 1 and December 1.

CONTRIBUTIONS

Members contribute 9.0 percent of compensation. The Board of Trustees sets employer contribution rates for PERS, as per Mississippi statute. The adequacy of these rates is checked annually by actuarial valuation. Refer to Note 6 of the basic financial statements for additional information.

Mississippi Highway Safety Patrol Retirement System: Summary of Main System Provisions as Interpreted for Valuation Purposes

SUMMARY OF MAIN BENEFIT AND CONTRIBUTION PROVISIONS

The following summary presents the main benefit and contribution provisions of the plan in effect June 30, 2018, as interpreted in preparing the actuarial valuation. As used in the summary, "average compensation" means the average annual covered earnings of an employee during the four highest consecutive years of service. "Covered earnings" means gross salary not in excess of the maximum amount on which contributions were required. "Fiscal year" means a year commencing on July 1 and ending June 30. "Credited service" means service while a contributing member plus additional service as described below. "Unused sick and vacation leave" means service credit is provided at no charge to members for unused sick and vacation time that has accrued at the time of retirement. A payment of up to 240 hours leave may be used in the average compensation definition. "Additional service" means additional service credit may be granted for service prior to July 1, 1958, active-duty military service, and retroactive service.

The maximum covered earnings for employers and members over the years are as follows:

DATE FROM	DATE TO	EMPLOYER RATE	MAXIMUM COVERED EARNINGS*	MEMBER RATE	MAXIMUM COVERED EARNINGS*
7/1/1958	6/30/1968	13.33%	\$-	5.00%	\$-
7/1/1968	6/30/1971	15.33	-	5.00	-
7/1/1971	6/30/1973	18.59	-	5.00	-
7/1/1973	6/30/1975	20.77	-	5.00	-
7/1/1975	6/30/1978	24.65	-	5.00	-
7/1/1978	6/30/1980	26.16	-	6.00	-
7/1/1980	6/30/1989	26.16	-	6.50	-
7/1/1989	6/30/1990	27.97	-	6.50	-
7/1/1990	6/30/2003	26.16	-	6.50	-
7/1/2003	6/30/2006	28.16	-	6.50	-
7/1/2006	6/30/2008	30.30	-	6.50	-
7/1/2008	12/31/2011	30.30	-	7.25	-
1/1/2012	6/30/2012	35.21	-	7.25	-
7/1/2012	6/30/2018	37.00	-	7.25	-
7/1/2018	6/30/2019	49.08	-	7.25	-

*Maximum covered earnings equal wages paid, not to exceed wages paid to the Commissioner of the Department of Public Safety (currently \$146,850).

Effective July 1, 2018, additional contributions from Senate Bill No. 2659 and House Bill No. 1015 are estimated to be \$3,500,000 combined.

Benefits

SUPERANNUATION RETIREMENT Condition for Retirement

a) A retirement allowance is payable to any member who retires and has attained age 55 and completed at least five years of membership service, or has attained age 45 and completed at least 20 years of creditable service, or has completed 25 years of creditable service regardless of age.

Any member who has attained age 63 shall be retired forthwith. Effective July 1, 2011, the Commissioner of Public Safety is authorized to allow a member who has attained age 63 to continue in active service. Such continued service may be authorized annually until the member attains age 65.

b) Any member who withdraws from service prior to his or her attainment of age 55 but after having completed five or more years of creditable service is entitled to receive, in lieu of a refund of his or her accumulated contributions, a retirement allowance commencing at age 55.

Amount of Allowance

The annual retirement allowance payable to a retired member is equal to:

- 1. A member's annuity that is the actuarial equivalent of the member's accumulated contributions at the time of his or her retirement; plus
- 2. An employer's annuity that, together with the member's annuity, is equal to 2.5 percent of his or her average compensation for each year of membership service; plus
- 3. A prior service annuity equal to 2.5 percent of average compensation for each year of prior service.

The aggregate amounts of (2) and (3) above shall not exceed 100.0 percent of average compensation, regardless of service, for retirements on or after January 1, 2000; 85.0 percent for retirements prior to January 1, 2000.

The minimum allowance for both service and disability retirement is based on the following table for each year of creditable service, reduced if necessary as indicated below.

YEARS OF SERVICE	MONTHLY BENEFIT
LESS THAN 10	\$250
10-15	300
15 OR MORE	500

The annual retirement allowance payable to a member who retires under condition (a) above prior to age 55 is computed in accordance with the above formula except that the employer's annuity and prior service annuity are reduced by an actuarially determined rate for each year of age below age 55, or 3.0 percent for each year of service below 25 years of creditable service, whichever is less.

DISABILITY RETIREMENT

Non-duty related disability benefits are available to vested members under the age of 55. Vested members age 55 or older are not eligible for disability benefits but may apply for service retirement benefits. For purposes of disability benefits, average annual compensation is calculated using the last two years of salary before retirement.

If a member becomes permanently disabled due to sickness or injury caused or sustained as a direct result of duty, he or she may be eligible for duty-related disability retirement. He or she is covered for this benefit from the first day of employment if he or she has not reached age 55, regardless of his or her years of service. Duty-related disability retirement benefits are calculated at either 50.0 percent of average compensation of the last two years of salary before retirement (this portion is not taxable) or the non-duty-related disability retirement amount, whichever provides the higher benefit.

DEATH PRIOR TO RETIREMENT

If a member is vested, the spouse and dependent children may be eligible to receive certain statutory benefits. Claims for non-duty-related death benefits are calculated at 2.5 percent of average compensation for each year of service credit, as calculated under Option 9, Maximum Benefit. Under this option, 50.0 percent of the accrued benefit is payable to the spouse until death, with 25.0 percent of the accrued benefit payable to one dependent child and 50.0 percent of the accrued benefit payable for two or more dependent children (under age 19 and never married or under age 23 if a full-time student and never married). Upon application and approval by the Medical Board, benefits to a physically or mentally disabled child may continue as long as the disability exits.

Coverage for duty-related death benefits begins on the first day of employment and is available to the spouse and dependent children regardless of the the member's vesting status. If the member is vested, the spouse and dependent children may be eligible to receive benefits under either non-duty or duty-related death benefit provisions, whichever provided the higher benefit.

Claims for duty-related death benefits are calculated at 50.0 percent of average compensation, payable to the spouse until death, with 25.0 percent of average compensation payable to one dependent child and 50.0 percent of average compensation payable for two or more dependent children (under age 19 and never married or under age 23 if a full-time student and never married). Upon application and approval by the Medical Board, benefits to a physically or mentally disabled child may continue as long as the disability exists.

DEATH AFTER RETIREMENT

Upon the death of a highway patrol officer who has retired for service or disability and who has not elected any other optional form of benefit, his widow or her widower is eligible for a benefit equal to 50.0 percent of his or her retirement allowance and each child (but not more than two) who has not attained age 19 (23 if a full-time student) is eligible for a benefit equal to 25.0 percent of his or her retirement allowance. The benefit to the widow or widower is payable for life and to children until they attain age 19 (23 if a full-time student) or for life if they are totally and permanently disabled.

REFUND OF CONTRIBUTIONS

Upon a member's termination of employment for any reason before retirement, his or her accumulated contributions, together with regular interest thereon, are refunded. Upon the death of a member who is not eligible for any other death benefit, his or her accumulated contributions, together with regular interest thereon, are paid to his or her beneficiary.

Effective July 1, 2016, the interest rate on employee contributions shall be calculated based on the money market rate as published by *The Wall Street Journal* on December 31 of each preceding year with a minimum rate of 1.0 percent and a maximum rate of 5.0 percent.

NORMAL FORM OF BENEFIT

The normal form of benefit is an allowance payable during the life of the member. Upon death the benefits described above are payable.

OPTIONAL BENEFITS

A member upon retirement may elect to receive his or her allowance in one of the following forms, which are computed to be actuarially equivalent to the applicable retirement allowance.

- Option 1. Reduced allowance with the provision that, if the pensioner dies before he or she receives the value of his or her annuity as it was at the time of retirement, the balance shall be paid to his or her beneficiary.
- Option 2. Upon his or her death, his or her reduced retirement allowance shall be continued throughout the life of, and paid to, his or her beneficiary.

- Option 3. Upon his or her death, 50.0 percent of his or her reduced retirement allowance shall be continued throughout the life of, and paid to, a designated beneficiary and the other 50.0 percent of his or her reduced retirement allowance to some other designated beneficiary.
- Option 4. Upon his or her death, 75.0 percent of his or her reduced retirement allowance shall be continued throughout the life of, and paid to, a designated beneficiary.
- Option 4A. Upon his or her death, 50.0 percent of his or her reduced retirement allowance shall be continued throughout the life of, and paid to, a designated beneficiary.
- Option 4B. A reduced retirement allowance shall be continued throughout the life of the pensioner, but with the further guarantee of payment to the pensioner or his or her beneficiary for a specified number of years certain.
- Option 4C. A member may elect any option with the added provision that he or she shall receive, so far as possible, the same total amount annually (considering both MHSPRS and Social Security benefits) before and after the earliest age at which the member becomes eligible for a Social Security benefit. This option was only available to those who retired prior to July 1, 2004.
- Option 9. Upon his or her death, the spouse will receive 50.0 percent of the benefit the member was receiving for life. Each dependent child (under age 19 and never married or under age 23 if a full-time student and never married) will receive 25.0 percent of the benefit the member was receiving with a maximum of 50.0 percent for the support and care of two or more children. Any contribution and interest remaining after the member's death and after all monthly benefits due to the spouse and children have been paid will be refunded to designated beneficiaries. If the member marries after retirement while receiving benefits under this option, he or she may apply to Pop-Down to Option 2 to provide 100.0 percent beneficiary protection to the new spouse, or Pop-Down to Option 4 or Option 4A for other beneficiary protections for the new spouse. PLSO is available with this option, if eligible.

A member who elects Option 2, Option 4, or Option 4A at retirement may revert to the normal form of benefit if the designated beneficiary predeceases the retired member or if the retired member divorces the designated beneficiary. A member who elects the normal form of benefit or Option 1 at retirement may select Option 2, Option 4, or Option 4A to provide beneficiary protection to a new spouse if married after retirement.

A member who qualifies for an unreduced retirement allowance may select the PLSO at retirement. Under this option, the retiree has the option of taking a partial-lump-sum distribution equal to 12, 24, or 36 times the base maximum monthly benefit. With each lump-sum amount, the base maximum monthly benefit will be actuarially reduced. A member selecting this option may also select any of the regular options except Option 1, the prorated single-life annuity, and Option 4C, the Social Security-leveling provision. The benefit is then calculated using the new reduced maximum benefit as a starting point in applying the appropriate option factors for the reduction.

POST-RETIREMENT ADJUSTMENTS IN ALLOWANCES

The allowances of retired members are adjusted annually by an amount equal to:

- a) 3.0 percent of the annual retirement allowance for each full fiscal year of retirement prior to the year in which the member reaches age 60*, plus
- b) 3.0 percent compounded for each year thereafter beginning with the fiscal year in which the member turns age 60*.

A prorated portion of the annual adjustment will be paid to the member, beneficiary, or estate of any member or beneficiary who is receiving the annual adjustment in a lump sum, but whose benefits are terminated between July 1 and December 1.

Those members who retired on or before July 1, 1999, received an ad hoc benefit increase in the amount of \$3.50 per month for each full fiscal year of retirement through June 30, 1999, plus \$1 per month for each year of credited service. The benefits were increased July 1, 1999.

*This age will be reduced in five phases to age 55 if the actuary certifies that reducing the age will not result in the amortization period of the unfunded accrued liability exceeding 20 years.

CONTRIBUTIONS

Members contribute 7.25 percent of compensation and the employer contributes 37.0 percent of compensation. Funds from SB2659 and HB1015 are also provided.

Municipal Retirement Systems: Summary of Main System Provisions as Interpreted for Valuation Purposes

SUMMARY OF BENEFIT PROVISIONS EVALUATED

The following summary presents the main provisions of the plans in effect June 30, 2018, as interpreted in preparing the actuarial valuation. As used in the summary, "average compensation" means the average compensation of a member during the six-month period prior to receipt of an allowance.

Benefits

SERVICE RETIREMENT

Condition for Retirement

A retirement allowance is payable to any member who retires and has completed at least 20 years of creditable service, regardless of age.

Any general employee member who has attained age 70 and any firefighter or police officer who has attained age 65 shall be retired forthwith.

Amount of Allowance

The annual retirement allowance payable to a retired member is equal to:

- 1. 50.0 percent of average compensation, plus
- 2. 1.7 percent of average compensation for each year of credited service over 20.

The aggregate amount of (1) and (2) above shall not exceed 66.67 percent (87.0 percent for the city of Clinton) of average compensation, regardless of service.

DISABILITY RETIREMENT

Condition for Retirement

A retirement allowance is payable to any member who is not eligible for a service retirement benefit but who becomes totally and permanently disabled, either physically or mentally, regardless of creditable service, if the disability is due to causes in the performance of duty. If the disability is not due to causes in the performance of duty, the member must have completed at least five years of creditable service to be eligible for retirement.

Amount of Allowance

The annual disability retirement allowance payable is equal to 50.0 percent of his or her salary at the time of retirement, if the disability is due to causes in the performance of duty.

If the disability is not due to causes in the performance of duty, the allowance is equal to 2.5 percent times credited service, not in excess of 20, times his or her salary at the time of retirement for firefighters and police officers, and average compensation for general employees.

DEATH BENEFIT

Condition for Benefits

A benefit is payable upon the death of a member under the following conditions:

- a) The member has retired;
- b) The member is eligible to retire;
- c) The death is in the line of duty; or
- d) The death is not in the line of duty but occurs after the member has five years of credited service.

The benefit is payable to the surviving spouse until remarriage and to children under age 18, to dependent children through age 23 when full-time students, and to dependent children of any age if handicapped. For the cities of Clarksdale, Columbus, Gulfport, Hattiesburg, Jackson, McComb, Meridian, Vicksburg, and Yazoo City, benefits payable to spouses do not cease upon remarriage.

Amount of Benefits

The annual benefit payable, under all conditions in the case of firefighters and police officers and under other than condition (c) in the case of general employees is equal to 2.5 percent of average compensation for each year of credited service up to 20 and 1.7 percent of average compensation for each year over 20, with a maximum benefit of 66.67 percent (87.0 percent for the city of Clinton) of average compensation.

For general employee members under condition (c), the annual benefit payable is equal to 50.0 percent of salary at the time of death.

REFUND OF CONTRIBUTIONS

Upon a member's termination of employment for any reason before retirement, his or her accumulated contributions are refunded. Upon the death of a member who is not eligible for any other death benefit, his or her accumulated contributions are paid to his or her beneficiary.

MINIMUM ALLOWANCES

The minimum monthly allowances paid to members from the following municipalities, for all retirement and death benefits, are:

0	\$600	BILOXI
0	500	COLUMBUS
0	500	GULFPORT
0	750	HATTIESBURG
0	500	JACKSON
0	600	MERIDIAN
0	750	TUPELO
5	1,515	VICKSBURG

POST-RETIREMENT ADJUSTMENTS IN ALLOWANCES

The allowances of certain retired members are adjusted annually by a Cost-of-Living Adjustment (COLA) on the basis of the annual percentage change in each fiscal year of the Consumer Price Index.

Those cities adjustments are limited as follows:

Biloxi:	3.0 percent per year (not to exceed 64.4 percent) for each full fiscal year of retirement after June 30, 2000, for all retirees and beneficiaries with the COLA being compounded beginning with the state fiscal year in which the retired member turns age 55. This is in addition to the previously granted maximum of 3.0 percent per year (not to exceed 9.0 percent) for all members who retired on or before December 31, 1995.
Clarksdale:	Maximum of 2.5 percent per year for all retirees and beneficiaries.
Clinton:	Maximum of 2.5 percent per year (not to exceed 10.0 percent) for service retirements only.
Columbus:	Maximum of 2.5 percent per year (not to exceed 25.0 percent) for all retirees and beneficiaries.
Greenville:	Maximum of 2.5 percent per year (not to exceed 25.0 percent) for all retirees and beneficiaries.

Gulfport:	Maximum of 3.0 percent per year (not to exceed 27.0 percent) for each fiscal year of retirement after June 30, 2002, for all retirees and beneficiaries. This is in addition to the previously granted COLA of 2.0 percent per year (not to exceed 6.0 percent) for those retiring before July 1, 2001. All Gulfport retirees and beneficiaries who were receiving a retirement allowance as of June 30, 2002, were granted a monthly ad-hoc benefit increase of \$2 per month for each year of service plus \$2 per month for each full fiscal year retired.
Hattiesburg:	2.5 percent per year for all retirees and beneficiaries (not to exceed 30.0 percent).
Jackson:	Maximum aggregate increase of 19.5 percent for service and disability retirements only.
Laurel:	2.0 percent per year, compounded annually (maximum of three years) for each fiscal year of retirement after June 30, 2002, for all retirees and beneficiaries. COLA increases begin at the later of age 60 or after one full fiscal year of retirement.
McComb:	Maximum of 2.5 percent per year for all retirees and beneficiaries (not to exceed 10.0 percent).
Meridian:	All Meridian retirees and beneficiaries who were receiving a retirement allowance as of June 30, 1999, were granted a 3.9 percent ad-hoc benefit increase.
Pascagoula:	Maximum of 2.5 percent per year for all retirees and beneficiaries (not to exceed 15.0 percent).
Tupelo:	All Tupelo retirees and beneficiaries received an increase of 5.0 percent in allowances effective December 1, 1991. Additional 3.0 percent ad hoc benefit increases were granted to members retired at least one full fiscal year as of September 30, 1995, as of September 30, 1997, as of September 30, 1998, and as of September 30, 2000. Furthermore, a 2.0 percent ad-hoc benefit increase was granted to members retired at least one full fiscal year as of September 30, 1999, and a 2.34 percent ad-hoc benefit increase was granted to members retired at least one full fiscal year as of September 30, 1999, and a 2.34 percent ad-hoc benefit increase was granted to members retired at least one full fiscal year as of September 30, 2001. Furthermore, a 2.0 percent ad-hoc benefit increase was granted to members retired at least one full fiscal year as of September 30, 2010. Futhermore, a 2.0 percent ad hoc benefit increase was granted to embers retired at least one full fiscal year as of September 30, 2010. Futhermore, a 2.0 percent ad hoc benefit increase was granted to embers retired at least one full fiscal year as of September 30, 2014. Furthermore, a 3.0 percent ad-hoc benefit increase was granted to members retired at least one full fiscal year as of September 30, 2015. Furthermore, a 3 percent ad- hoc benefit increase was granted to members who were retired for at least one full fiscal year as of September 30, 2016. Furthermore, a 2.0 percent ad- hoc benefit increase was granted to members who were retired for at least one full fiscal year as of September 30, 2016. Furthermore, a 2.0 percent ad- hoc benefit increase was granted to members who were retired for at least one full fiscal year as of September 30, 2017.
Vicksburg:	3.0 percent per year for all retirees and beneficiaries.
Yazoo City:	Maximum of 2.5 percent per year (not to exceed 25.0 percent) for all retirees and beneficiaries.

Post-retirement adjustments are included in System liabilities for future increases for the cities of Biloxi, Clinton, Columbus, Greenville, Gulfport, Hattiesburg, Jackson, Laurel, McComb, Pascagoula, Tupelo, Vicksburg, and Yazoo City.

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CONTRIBUTIONS

Funding policies established by Mississippi statutes provide the rates of employer contributions for MRS. The adequacy of these rates are checked annually by actuarial valuation. The following table provides a comparison of employer required contributions to actual contributions received for MRS (dollars in thousands):

FISCAL YEAR 10/1 - 9/30	VALUATION DATE 9/30	ANNUAL REQUIRED CONTRIBUTION (A)	ACTUAL CONTRIBUTION (B)	DIFFERENCE (A-B)	PERCENTAGE CONTRIBUTED
1996-97	1996	\$20,674	\$71,350	\$50,676	345.10%
1997-98	1997	14,727	14,200	(527)	96.40
1998-99	1998	13,803	13,770	(33)	99.80
1999-00	1999	12,364	14,162	1,798	114.50
2000-01	2000	11,276	14,201	2,925	125.90
2001-02	2001	10,823	14,338	3,515	132.50
2002-03	2002	11,989	13,979	1,990	116.60
2003-04	2003	13,286	13,890	604	104.50
2004-05	2004	14,091	14,173	82	100.60
2005-06	2005	15,397	15,635	238	101.50
2006-07	2006	15,426	14,976	(450)	97.10
2007-08	2007	15,219	16,132	913	106.00
2008-09	2008	14,765	16,892	2,127	114.40
2009-10	2009	17,739	21,426	3,687	120.80
2010-11	2010	18,576	22,791	4,215	122.70
2011-12	2011	18,751	23,823	5,072	127.00
2012-13	2012*	19,512	20,017	505	102.60
2013-14	2013*	19,344	20,395	1,051	105.40
2014-15	2014*	18,338	19,346	1,008	105.50
2015-16	2015*	18,034	18,542	508	102.80
2016-17	2016*	17,694	17,731	37	100.20
2017-18	2017*	17,393	-	-	N/A
2018-19	2018*	16,695	-	-	N/A

*Municipal Retirement Systems' plan year changed from September 30 to June 30 beginning in fiscal year 2013.

Supplemental Legislative Retirement Plan: Summary of Main System Provisions as Interpreted for Valuation Purposes

SUMMARY OF MAIN BENEFIT AND CONTRIBUTION PROVISIONS

The following summary presents the main benefit and contribution provisions of the plan in effect June 30, 2018, as interpreted in preparing the actuarial valuation. As used in the summary, "average compensation" means the average annual covered earnings of an employee during the four highest years of service. To determine the member's four highest years, PERS considers these scenarios:

- » Four highest fiscal years of earned compensation;
- » Four highest calendar years of earned compensation;
- » Combination of four highest fiscal and calendar years of earned compensation that do not overlap; or
- » Final 48 months of earned compensation prior to termination of employment.

"Covered earnings" means gross salary not in excess of the maximum amount on which contributions were required. "Fiscal year" means a year commencing July 1 and ending June 30. "Eligibility service" means service while a contributing member of PERS plus additional service as described below. (Old: "Eligibility service" is all service in PERS, including that credited for SLRP service.) "Credited Service" means service while a contributing member of SLRP plus additional service as described below. (Old: "Creditable service" includes only SLRP service.) "Unused sick and vacation leave" means service credit is provided at no charge to members for unused sick and vacation time that has accrued at the time of retirement. A payment of up to 240 hours of leave may be used in the average compensation definition. "Additional service" means additional service. "Attribution" means a period for the normal cost is based on entry into PERS even for members who first participated in SLRP at a later age than PERS.

The maximum covered earnings for employers and employees over the years are as follows:

DATE FROM	DATE TO	EMPLOYER RATE	MAXIMUM COVERED EARNINGS	MEMBER RATE	MAXIMUM COVERED EARNINGS
7/1/1989	6/30/1992	6.33%	\$75,600	3.00%	\$75,600
7/1/1992	6/30/2002	6.33	125,000	3.00	125,000
7/1/2002	6/30/2006	6.33	150,000	3.00	150,000
7/1/2006	6/30/2008	6.65	150,000	3.00	150,000
7/1/2008	6/30/2009	6.65	230,000	3.00	230,000
7/1/2009	12/31/2011	6.65	245,000	3.00	245,000
1/1/2012	6/30/2012	7.40	245,000	3.00	245,000
7/1/2012	6/30/2013	7.40	250,000	3.00	250,000
7/1/2013	6/30/2014	7.40	255,000	3.00	255,000
7/1/2014	6/30/2015	7.40	260,000	3.00	260,000
7/1/2015	6/30/2017	7.40	265,000	3.00	265,000
7/1/2017	6/30/2018	7.40	270,000	3.00	270,000
7/1/2018	6/30/2019	7.40	275,000	3.00	275,000

Benefits

ts SUPERANNUATION RETIREMENT

Condition for Retirement

- a) A retirement allowance is paid upon the request of any member who retires and has attained age 60 and completed at least eight years* of membership service under PERS. A retirement allowance may also be paid upon the completion of at least 25 years of creditable service under PERS for members hired prior to July 1, 2011, or upon the completion of 30 years of creditable service for members hired on or after July 1, 2011.
- b) Any member who withdraws from service prior to his or her attainment of age 60 and who has completed at least eight years* of membership service under PERS is entitled to receive (in lieu of a refund of his or her accumulated contributions) a retirement allowance commencing at age 60.

*Four years for those who entered PERS before July 1, 2007.

Amount of Allowance

The annual retirement allowance payable to a member who retires under condition (a) above is equal to:

- 1. A member's annuity that is the actuarial equivalent of his or her accumulated contributions at the time of his or her retirement, plus
- 2. An employer's annuity that, together with the member's annuity, is equal to 1.0 percent of his or her average compensation for each of the first 25 years of creditable service plus 1.25 percent for each year of creditable service over 25 years.

The minimum allowance is \$60 per year of creditable service.

DISABILITY RETIREMENT

Condition for Retirement

A retirement allowance is paid to a member who is totally and permanently disabled, as determined by the Board of Trustees and has accumulated eight or more years* of membership service under PERS.

*Four years for those who entered PERS before July 1, 2007.

Amount of Allowance

For those who were active members prior to July 1, 1992, and did not elect the benefit structure outlined below, the annual disability retirement allowance payable is equal to a superannuation retirement allowance if the member has attained age 60, otherwise it is equal to a superannuation retirement allowance calculated as follows:

- 1. A member's annuity equal to the actuarial equivalent of his or her accumulated contributions at the time of retirement, plus
- 2. An employer's annuity equal to the amount that would have been payable had the member continued in service to age 60.

For those who become active members after June 30, 1992, and for those who were active members prior to July 1, 1992, who so elected, the following benefits are payable:

 A temporary allowance equal to the greater of (a) 20.0 percent of average compensation plus 5.0 percent for each dependent child up to a maximum of two, or (b) the member's accrued allowance. This temporary allowance is paid for a period of time based on the member's age at disability, as follows:

AGE AT DISABILITY	DURATION
60 & earlier	to age 65
61	to age 66
62	to age 66
63	to age 67
64	to age 67
65	to age 68
66	to age 68
67	to age 69
68	to age 70
69 & later	one year

The minimum allowance is \$60 per year of service credit.

2. A deferred allowance commencing when the temporary allowance ceases equal to the greater of (a) the allowance the member would have received based on service to the termination age of the temporary allowance, but not more than 20.0 percent of average compensation, or (b) the member's accrued allowance.

The minimum allowance is \$60 per year of service credit.

Effective July 1, 2004, a temporary benefit can be paid out of a member's accumulated contribution balance while the member is awaiting a determination for eligibility for disability benefits. Future disability payments, if any, would be offset by advanced payments made from the member's accumulated contributions.

ACCIDENTAL DISABILITY RETIREMENT

Condition for Retirement

A retirement allowance is paid to a member who is totally and permanently disabled in the performance of duty.

Amount of Allowance

The annual accidental disability retirement allowance is equal to the allowance payable on disability retirement but not less than 25.0 percent of average compensation. There is no minimum benefit.

ACCIDENTAL DEATH BENEFIT

Condition for Benefit

A retirement allowance is paid to a spouse and/or dependent children upon the death of an active member in the performance of duty.

Amount of Allowance

The annual retirement allowance is equal to 25.0 percent of average compensation payable to the spouse and 12.5 percent of average compensation payable to one dependent child or 25.0 percent to two or more children until age 19 (23 if a full-time student). There is no minimum benefit.

ORDINARY DEATH BENEFIT

Condition for Benefit

Upon the death of a member who has completed at least eight years* of membership service, a benefit is payable (in lieu of a refund of the member's accumulated contributions) to his or her spouse, if said spouse has been married to the member for not less than one year.

*Four years for those who entered the System before July 1, 2007.

Amount of Allowance

The annual retirement allowance payable to the lawful spouse of a vested member who dies is equal to the greater of:

- The allowance that would have been payable had the member retired and elected Option 2, reduced by an actuarially determined factor based on the number of years the member lacked in qualifying for unreduced benefits, or
- 2. A lifetime benefit equal to 20.0 percent of the deceased member's average compensation, but not less than \$25 per month.

In addition, a benefit is payable to dependent children until age 19 (23 if a full-time student). The benefit is equal to the greater of 5.0 percent of average compensation or \$25 per month for each dependent child up to three.

RETURN OF CONTRIBUTIONS

Upon the withdrawal of a member without a retirement benefit, his or her contributions are returned to him or her, together with accumulated regular interest thereon.

Upon the death of a member before retirement, his or her contributions, together with the full accumulated regular interest thereon, are paid to his or her designated beneficiary, if any, otherwise, to his or her estate provided no other survivor benefits are payable.

Effective July 1, 2016, the interest rate on employee contributions shall be calculated based on the money market rate as published by *The Wall Street Journal* on December 31 of each preceding year with a minimum rate of 1.0 percent and a maximum rate of 5.0 percent.

NORMAL FORM OF BENEFIT

The normal form of benefit is an allowance payable during the life of the member with the provision that, upon his or her death, the excess of his or her total contributions at the time of retirement over the total retirement annuity paid to him or her will be paid to his or her designated beneficiary.

OPTIONAL BENEFIT

A member upon retirement may elect to receive his or her allowance in one of the following forms, which are computed to be actuarially equivalent to the applicable retirement allowance.

- Option 1. Reduced allowance with the provision that if the pensioner dies before he or she receives the value of the member's annuity as it was at the time of retirement, the balance shall be paid to his or her beneficiary.
- Option 2. Upon his or her death, his or her reduced retirement allowance shall be continued throughout the life of, and paid to, his or her beneficiary.
- Option 3. Upon his or her death, 50.0 percent of his or her reduced retirement allowance shall be continued throughout the life of, and paid to, a designated beneficiary and the other 50.0 percent of his or her reduced retirement allowance to some other designated beneficiary.
- Option 4. Upon his or her death, 75.0 percent of his or her reduced retirement allowance shall be continued throughout the life of, and paid to, a designated beneficiary.

- Option 4A. Upon his or her death, 50.0 percent of his or her reduced retirement allowance shall be continued throughout the life of, and paid to, a designated beneficiary.
- Option 4B. A reduced retirement allowance shall be continued throughout the life of the pensioner, but with the further guarantee of payment to the pensioner, or his or her beneficiary for a specified number of years certain.
- Option 4C. A member may elect any option with the added provision that the member shall receive, so far as possible, the same total amount annually (considering both SLRP and Social Security benefits) before and after the earliest age at which the member becomes eligible for a Social Security benefit. This option was only available to those who retired prior to July 1, 2004.

A member who elects Option 2, Option 4, or Option 4A at retirement may revert to the normal form of benefit if the designated beneficiary predeceases the retired member or if the member divorces the designated beneficiary.

A member who elects the normal form of benefit or Option 1 at retirement may select Option 2, Option 4, or Option 4A to provide beneficiary protection to a new spouse if married at retirement.

A member who has at least 28 years of creditable service* under PERS may select a PLSO at retirement. Under this option, the retiree has the option of taking a partiallump-sum distribution equal to 12, 24, or 36 times the base maximum monthly benefit. With each lump-sum amount, the base maximum monthly benefit will be actuarially reduced. A member selecting the PLSO may also select any of the regular options except Option 1, the prorated single-life annuity, and Option 4C, the Social Security-leveling provision. The benefit is then calculated using the new reduced maximum benefit as a starting point in applying the appropriate option factors for the reduction.

*Or at least age 63 with four years of membership service for those who entered PERS before July 1, 2007.

POST-RETIREMENT ADJUSTMENTS IN ALLOWANCES

The allowances of retired members are adjusted annually by an amount equal to:

- a) 3.0 percent of the annual retirement allowance for each full fiscal year of retirement prior to the year in which the member reaches age 55, plus
- b) 3.0 percent compounded for each year thereafter beginning with the fiscal year in which the member turns age 55.

A prorated portion of the annual adjustment will be paid to the member, beneficiary, or estate of any member or beneficiary who is receiving the annual adjustment in a lump sum, but whose benefits are terminated between July 1 and December 1.

CONTRIBUTIONS

Members currently contribute 3.0 percent of covered earnings. The employer contributes 7.4 percent of covered earnings.

Changes in Plan Provisions

The Mississippi Legislature ended its 2018 legislative session with no changes to the Mississippi Code of 1972 plan provisions of the Public Employees' Retirement System of Mississippi.

VALUATION ASSETS & FUNDING PROGRESS

Funding of the actuarial accrued liability is intended to help users assess each plan's funding status on a going-concern basis and assess progress being made in accumulating sufficient assets to pay benefits when due. Actuarial values of assets for PERS, MHSPRS, MRS, and SLRP are based on a smoothed fair-value basis that recognizes 20.0 percent of the unrecognized and unanticipated gains and losses. The actuarial valuation of assets recognizes assumed investment income fully each year. Differences between actual and assumed investment income are recognized in equal increments over a five-year period beginning with the current year.

The following table presents the actuarial change in asset valuation for the year ended June 30, 2018 (in thousands):

	PERS	MHSPRS	MRS	SLRP	TOTAL
VALUATION ASSETS JUNE 2017	\$26,364,446	\$339,114	\$157,674	\$17,208	\$26,878,442
CONTRIBUTIONS & OTHER REVENUE	1,588,970	17,399	17,635	720	1,624,724
BENEFIT PAYMENTS	(2,733,721)	(32,418)	(33,604)	(1,428)	(2,801,171)
ADMINISTRATIVE EXPENSES	(16,264)	(250)	(352)	(10)	(16,876)
INVESTMENT EXPENSES*	(103,669)	(1,207)	-	(62)	(104,938)
NET NEW MONEY	(1,264,684)	(16,476)	(16,321)	(780)	(1,298,261)
EXPECTED TOTAL INVESTMENT RETURN FOR 2018 (7.75%)	2,115,770	27,099	11,657	1,378	2,155,904
ADJUSTMENT TOWARD MARKET (20%)	240,170	2,678	1,739	139	244,726
VALUATION ASSETS JUNE 2018	\$27,455,702	\$352,415	\$154,749	\$17,945	\$27,980,811

*This amount is based on a proportionate share of the total investment expense of the commingled assets. The ratio of this number to the total investment expense is equal to the ratio of a fiscal year average market value of assets for this fund to a fiscal year average market value of the total commingled assets.

The components of the change in the computed unfunded actuarial accrued liability amortization period are as follows. The plans that comprise MRS are closed and have a funding policy that provides for property tax to be sufficiently levied within limits established by Mississippi statutes to provide for a declining amortization period for each municipality.

The following table presents the actual remaining amortization periods as of June 30, 2018.

	PERS	MHSPRS	SLRP
PREVIOUSLY REPORTED PERIOD	38.4 years	37.6 years	21.6 years
Change Due to:			
NORMAL AMORTIZATION	(1.0)	(1.0)	(1.0)
ACTUARIAL EXPERIENCE	2.4	3.1	(0.5)
ASSUMPTION METHOD CHANGES	-	3.5	-
PLAN AMENDMENTS	-	-	-
ADDITIONAL ASSUMED CONTRIBUTIONS	-	(24.9)	-
CONTRIBUTION EXPERIENCE	(8.9)	-	-
COMPUTED PERIOD	30.9 years	18.3 years	20.1 years

ADJUST

For PERS, the primary reasons for the decrease in the amortization period was the increase in the Fixed Contribution Rate (FCR), the gain due to investment earnings on an actuarial value of assets basis better than expected (9.16 percent vs. 7.75 percent) and salary increases less than expected. These gains were partially offset by a loss due to withdrawals from employment.

For MHSPRS, the primary reasons for the decrease in the amortization period was due to the change in the employer contribution rate from 37.00 percent of pay to 49.08 percent of compensation. This was offset by losses on salary increases and a decrease in the Motor Vehicle Replacement (MVR) fee assumption from \$3.8 million per year to \$3.5 million per year.

For SLRP, the primary reason for the decrease in the amortization period was the investment gain on an actuarial value basis. There were also gains on mortality experience, as well as salary increases less than expected. These gains were slightly offset by losses from four retirements, which was more than expected in a non-election year.

The funded status of each of the plans is shown in the Schedules of Funding Progress on pages 144 and 145. This table shows funding ratios for the last 10 fiscal years. The table also shows the amount by which actuarial assets exceeded or fell short of actuarial benefit liabilities. An actuarial valuation of the plan's assets and benefit obligations is performed annually.

At the date of the most recent actuarial valuation, June 30, 2018, the funded status of PERS increased to 61.8 percent from 61.1 percent at June 30, 2017. The amount by which PERS' actuarial assets were less than actuarial benefit liabilities was \$16.9 billion at June 30, 2018, an increase in unfunded actuarial accrued liabilities of \$138 million from June 30, 2017.

At the date of the most recent actuarial valuation, June 30, 2018, the funded status of the MHSPRS decreased to 66.8 percent from 68.1 percent at June 30, 2017. The amount by which the MHSPRS' actuarial assets were less than actuarial benefit liabilities was \$175.0 million, compared with \$158.9 million at June 30, 2017.

As of the June 30, 2018, actuarial valuation of MRS, the funded status increased to 50.3 percent from 49.0 percent at June 30, 2017. The amount by which the MRS actuarial assets were less than actuarial benefit liabilities was \$152.7 million at June 30, 2018, compared with \$164.1 million at June 30, 2017.

At the date of the most recent actuarial valuation, June 30, 2018, the funded status of SLRP increased to 80.4 percent from 78.8 percent at June 30, 2017. The amount by which the SLRP actuarial assets were less than actuarial benefit liabilities was \$4.4 million, compared with \$4.6 million at June 30, 2017.

SCHEDULES OF FUNDING PROGRESS - LAST 10 FISCAL YEARS -

[in thousands]

ACTUARIAL VALUATION DATE Public Employees' Retirement System of Mississippi	ACTUARIAL VALUE OF ASSETS (A)	ACTUARIAL ACCRUED LIABILITY (AAL) ENTRY AGE (B)	UNFUNDED AAL (UAAL) (B-A)	PERCENT FUNDED (A/B)	ANNUAL COVERED PAYROLL (C)	UAAL AS A PERCENTAGE OF COVERED PAYROLL ((B-A)/C)
6/30/09	\$20,597,581	\$30,594,546	\$9,996,965	67.30%	\$5,831,864	171.40%
6/30/10	20,143,426	31,399,988	11,256,562	64.20	5,763,556	195.30
6/30/11	20,315,165	32,654,465	12,339,300	62.20	5,684,624	217.10
6/30/12	19,992,797	34,492,873	14,500,076	58.00	5,857,789	247.50
6/30/13	20,490,555	35,542,848	15,052,293	57.70	5,823,578	258.50
6/30/14	22,569,940	37,015,288	14,445,348	61.00	5,834,687	247.60
6/30/15	24,387,161	40,364,584	15,977,423	60.40	5,904,827	270.60
6/30/16	25,185,078	41,997,513	16,812,435	60.00	6,022,533	279.20
6/30/17	26,364,446	43,166,491	16,802,045	61.10	6,038,229	278.30
6/30/18	27,455,702	44,396,161	16,940,459	61.80	5,999,231	282.40
Mississippi Highway Safety Patrol Retirement System						
6/30/09	\$292,322	\$394,630	\$102,308	74.10%	\$26,390	387.70%
6/30/10	281,088	411,277	130,189	68.30	26,353	494.00
6/30/11	278,265	414,432	136,167	67.10	24,872	547.50
6/30/12	268,424	421,415	152,991	63.70	25,670	596.00
6/30/13	271,097	431,575	160,478	62.80	25,816	621.60
6/30/14	295,298	445,822	150,524	66.20	25,554	589.00
6/30/15	316,149	477,803	161,654	66.20	25,505	633.80
6/30/16	324,894	494,101	169,207	65.80	27,380	618.00
6/30/17	339,114	497,992	158,878	68.10	28,845	550.80
6/30/18	352,415	527,428	175,013	66.80	29,555	592.20

SCHEDULES OF FUNDING PROGRESS (CONTINUED) - LAST 10 FISCAL YEARS -

[in thousands]

ACTUARIAL VALUATION DATE Municipal Retirement Systems	ACTUARIAL VALUE OF ASSETS (A)	ACTUARIAL ACCRUED LIABILITY (AAL) ENTRY AGE (B)	UNFUNDED AAL (UAAL) (B-A)	PERCENT FUNDED (A/B)	ANNUAL COVERED PAYROLL (C)	UAAL AS A PERCENTAGE OF COVERED PAYROLL ((B-A)/C)
9/30/09	\$191,179	\$381,036	\$189,857	50.20%	\$1,608	11,807.00%
9/30/10	175,988	372,897	196,909	47.20	1,425	13,818.20
9/30/11	167,604	363,604	196,000	46.10	1,357	14,443.60
9/30/12	155,484	356,571	201,087	43.60	1,131	17,779.60
6/30/13*	153,241	349,588	196,347	43.80	794	24,728.80
6/30/14	157,970	340,385	182,415	46.40	727	25,091.50
6/30/15	162,616	341,525	178,909	47.60	579	30,899.70
6/30/16	159,160	330,663	171,503	48.10	419	40,931.50
6/30/17	157,674	321,747	164,073	49.00	321	51,113.10
6/30/18 Supplemental Legislative	154,749	307,457	152,707	50.30	200	76,354.00
Retirement Plan	¢10.007	¢1 < 505	¢0.1.40	01.000/	¢ < 000	14.000/
6/30/09	\$13,386	\$16,535	\$3,149	81.00%	\$6,803	46.30%
6/30/10	13,241	17,081	3,840	77.50	6,605	58.10
6/30/11	13,606	18,605	4,999	73.10	6,810	73.40
6/30/12	13,268	19,537	6,269	67.90	6,872	91.20
6/30/13	13,554	19,978	6,424	67.80	6,695	95.90
6/30/14	14,899	20,240	5,341	73.60	6,918	77.20
6/30/15	16,098	21,213	5,115	75.90	6,861	74.60
6/30/16	16,447	21,259	4,812	77.40	6,862	70.10
6/30/17	17,208	21,849	4,641	78.80	6,928	67.00
6/30/18	17,945	22,319	4,374	80.40	6,833	64.00

*Municipal Retirement Systems' plan year changed from September 30 to June 30, beginning in fiscal year 2013.

SOLVENCY TESTS

[in thousands]

	ACTUAR	ES FOR:		
VALUATION DATE Public Employees' Retirement System of Mississippi	(1) ACCUMULATED EMPLOYEE CONTRIBUTIONS INCLUDING ALLOCATED INVESTMENT EARNINGS	(2) RETIREES AND BENEFICIARIES CURRENTLY RECEIVING BENEFITS	(3) ACTIVE AND INACTIVE MEMBERS EMPLOYER-FINANCED PORTION	NET POSITION AVAILABLE FOR BENEFITS
6/30/09	\$4,235,466	\$15,665,712	\$10,693,368	\$20,597,581
6/30/10	4,266,621	16,763,455	10,369,912	20,143,426
6/30/11	4,356,556	18,001,718	10,296,191	20,315,165
6/30/12	4,463,252	19,547,367	10,482,254	19,992,797
6/30/13	5,053,888	20,789,551	9,699,409	20,490,555
6/30/14	5,277,944	22,033,588	9,703,756	22,569,940
6/30/15	5,379,226	24,012,624	10,972,734	24,387,161
6/30/16	5,468,859	25,390,774	11,137,880	25,185,078
6/30/17	5,534,403	26,686,958	10,945,130	26,364,446
6/30/18	5,570,524	27,874,365	10,951,272	27,455,702
Mississippi Highway Safety Patrol Retirement System				
6/30/09	\$20,136	\$273,774	\$100,720	\$292,322
6/30/10	20,658	284,106	106,513	281,088
6/30/11	20,621	292,234	101,577	278,265
6/30/12	20,760	300,753	99,902	268,424
6/30/13	23,706	306,273	101,596	271,097
6/30/14	24,411	317,825	103,586	295,298
6/30/15	24,827	338,459	114,517	316,149
6/30/16	25,791	343,635	124,675	324,894
6/30/17	26,922	349,850	121,220	339,114
6/30/18	27,581	358,342	141,505	352,415

SOLVENCY TESTS (CONTINUED)

	PORTIONS OF ACCRUED LIABILITIES COVERED BY ASSETS			
VALUATION DATE Public Employees' Retirement	(1)	(2)	(3)	
System of Mississippi				
6/30/09	100.00%	100.00%	6.50%	
6/30/10	100.00	94.70	-	
6/30/11	100.00	88.70	-	
6/30/12	100.00	79.40	-	
6/30/13	100.00	74.30	-	
6/30/14	100.00	78.50	-	
6/30/15	100.00	79.20	-	
6/30/16	100.00	77.70	-	
6/30/17	100.00	78.10	-	
6/30/18	100.00	78.50	-	
Mississippi Highway Safety Patrol Retirement System				
6/30/09	100.00%	99.40%	-%	
6/30/10	100.00	91.70	-	
6/30/11	100.00	88.20	-	
6/30/12	100.00	82.30	-	
6/30/13	100.00	80.80	-	
6/30/14	100.00	85.20	-	
6/30/15	100.00	86.10	-	
6/30/16	100.00	87.00	-	
6/30/17	100.00	89.20	-	
6/30/18	100.00	90.60	-	

SOLVENCY TESTS (CONTINUED)

[in thousands]

	ACTUAR	_			
VALUATION DATE Municipal Retirement Systems	(1) ACCUMULATED EMPLOYEE CONTRIBUTIONS INCLUDING ALLOCATED INVESTMENT EARNINGS	(2) RETIREES AND BENEFICIARIES CURRENTLY RECEIVING BENEFITS	(3) ACTIVE AND INACTIVE MEMBERS EMPLOYER-FINANCED PORTION	NET POSITION AVAILABLE FOR BENEFITS	
9/30/09	\$2,522	\$369,470	\$9,044	\$191,179	
9/30/10	2,295	362,444	8,158	175,988	
9/30/11	2,256	353,609	7,739	167,604	
9/30/12	1,957	348,121	6,493	155,484	
6/30/13	1,483	343,770	4,335	153,241	
6/30/14	1,342	334,937	4,106	157,970	
6/30/15	1,101	337,039	3,385	162,616	
6/30/16	867	327,525	2,271	159,160	
6/30/17	667	319,346	1,734	157,674	
6/30/18 Supplemental Legislative Retirement Plan	442	305,791	1,223	154,749	
6/30/09	\$2,327	\$8,756	\$5,452	\$13,386	
6/30/10	2,509	8,777	5,795	13,241	
6/30/11	2,642	8,734	7,229	13,606	
6/30/12	2,105	11,428	6,004	13,268	
6/30/13	2,416	11,909	5,652	13,554	
6/30/14	2,638	11,920	5,682	14,899	
6/30/15	2,862	12,329	6,023	16,098	
6/30/16	2,485	13,758	5,016	16,447	
6/30/17	2,636	13,799	5,414	17,208	
6/30/18	2,693	13,840	5,786	17,945	

*Municipal Retirement Systems' plan year changed from September 30 to June 30, beginning in fiscal year 2013.

SOLVENCY TESTS (CONTINUED)

	PORTIONS OF ACCRUED LIABILITIES COVERED BY ASSETS			
VALUATION DATE Municipal Retirement Systems	(1)	(2)	(3)	
9/30/09	100.00%	51.10%	-%	
9/30/10	100.00	47.90	-	
9/30/11	100.00	46.80	-	
9/30/12	100.00	44.10	-	
6/30/13*	100.00	44.10	-	
6/30/14	100.00	46.80	-	
6/30/15	100.00	47.90	-	
6/30/16	100.00	48.30	-	
6/30/17	100.00	49.20	-	
6/30/18	100.00	50.50	-	
Supplemental Legislative Retirement Plan				
6/30/09	100.00%	100.00%	42.20%	
6/30/10	100.00	100.00	33.70	
6/30/11	100.00	100.00	30.80	
6/30/12	100.00	97.70	-	
6/30/13	100.00	93.50	-	
6/30/14	100.00	100.00	6.00	
6/30/15	100.00	100.00	15.10	
6/30/16	100.00	100.00	4.10	
6/30/17	100.00	100.00	14.30	
6/30/18	100.00	100.00	24.40	

*Municipal Retirement Systems' plan year changed from September 30 to June 30, beginning in fiscal year 2013.

ANALYSIS OF FINANCIAL EXPERIENCE GAINS AND LOSSES IN ACCRUED LIABILITIES RESULTING FROM DIFFERENCES BETWEEN ASSUMED EXPERIENCE AND ACTUAL EXPERIENCE - FOR THE YEAR ENDED JUNE 30, 2018 -

[in thousands]

	GAIN (LOSS) FOR YEAR			
TYPE OF ACTIVITY	PERS	MHSPRS	MRS	SLRP
AGE & SERVICE RETIREMENTS: IF MEMBERS RETIRE AT OLDER AGES, THERE IS A GAIN. IF YOUNGER AGES, A LOSS.	\$85,100.00	\$554.80	\$42.20	\$(158.00)
DISABILITY RETIREMENTS: IF DISABILITY CLAIMS ARE LESS THAN ASSUMED, THERE IS A GAIN. IF MORE CLAIMS, A LOSS.	1,400.00	(19.60)	-	9.70
DEATH-IN-SERVICE BENEFITS: IF SURVIVOR CLAIMS ARE LESS THAN ASSUMED, THERE IS A GAIN. IF MORE CLAIMS, A LOSS.	100.00	0.60	0.50	5.00
WITHDRAWAL FROM EMPLOYMENT: IF MORE LIABILITIES ARE RELEASED BY WITHDRAWALS THAN ASSUMED, THERE IS A GAIN. IF SMALLER RELEASES, A LOSS.	(165,600.00)	(336.80)	-	72.90
PAY INCREASES: IF THERE ARE SMALLER PAY INCREASES THAN ASSUMED, THERE IS A GAIN. IF GREATER INCREASES, A LOSS.	236,400.00	(11,488.10)	14.30	241.50
NEW MEMBERS: ADDITIONAL UNFUNDED ACCRUED LIABILITY WILL PRODUCE A LOSS.	(60,800.00)	(3,306.90)	-	(4.30)
INVESTMENT INCOME: IF THERE IS GREATER INVESTMENT INCOME THAN ASSUMED, THERE IS A GAIN. IF LESS INCOME, A LOSS.	254,000.00	2,880.30	1,796.30	149.00
DEATH AFTER RETIREMENT: IF RETIRANTS LIVE LONGER THAN ASSUMED, THERE IS A LOSS. IF NOT AS LONG, A GAIN.	20,400.00	131.80	4,562.20	144.90
OTHER: MISCELLANEOUS GAINS AND LOSSES, DATA ADJUSTMENTS, TIMING OF FINANCIAL TRANSACTIONS, ETC.	(155,300.00)	(3,122.70)	(14.10)	(150.40)
GAIN (OR LOSS) DURING YEAR FROM FINANCIAL EXPERIENCE	215,700.00	(14,706.60)	6,401.40	310.30
NON-RECURRING ITEMS: ADJUSTMENTS FOR PLAN AMENDMENTS, ASSUMPTION CHANGES, OR METHOD CHANGES AND CHANGES IN VALUATION SOFTWARE.	-	-	(253.00)	-
COMPOSITE GAIN (OR LOSS) DURING YEAR	\$215,700.00	\$(14,706.60)	\$6,148.40	\$310.30

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SCHEDULE OF ACTIVE MEMBER VALUATION DATA

		ACTIVE MEMBERS			
VALUATION DATE	NUMBER OF EMPLOYERS	NUMBER OF EMPLOYEES	ANNUAL PAYROLL	ANNUAL AVERAGE PAY	INCREASE IN AVERAGE PAY
Public Employees' Retirement System of Mississippi					
6/30/09	866	167,122	\$5,831,863,534	\$34,896	4.30%
6/30/10	868	164,896	5,763,556,195	34,953	0.20
6/30/11	872	161,676	5,684,624,214	35,161	0.60
6/30/12	870	162,311	5,857,789,376	36,090	2.60
6/30/13	873	161,744	5,823,577,978	36,005	(0.20)
6/30/14	871	161,360	5,834,686,655	36,159	0.40
6/30/15	868	157,215	5,904,827,181	37,559	3.90
6/30/16	862	154,104	6,022,532,933	39,081	4.10
6/30/17	861	152,382	6,038,228,708	39,626	1.40
6/30/18	858	150,687	5,999,230,701	39,813	0.50
Mississippi Highway Safety Patrol Retirement System					
6/30/09	1	570	\$26,389,909	\$46,298	(2.10)%
6/30/10	1	542	26,353,400	48,623	5.00
6/30/11	1	515	24,872,085	48,295	(0.70)
6/30/12	1	547	25,670,030	46,929	(2.80)
6/30/13	1	520	25,815,787	49,646	5.80
6/30/14	1	495	25,553,765	51,624	4.00
6/30/15	1	518	25,504,676	49,237	(4.60)
6/30/16	1	484	27,380,162	56,571	14.90
6/30/17	1	470	28,845,478	61,373	8.50
6/30/18	1	511	29,555,411	57,838	(5.80)

SCHEDULE OF ACTIVE MEMBER VALUATION DATA (CONTINUED)

		ACTIVE MEMBERS			
VALUATION DATE	NUMBER OF EMPLOYERS	NUMBER OF EMPLOYEES	ANNUAL PAYROLL	ANNUAL AVERAGE PAY	INCREASE IN AVERAGE PAY
Municipal Retirement Systems					
9/30/09	17	31	\$1,608,396	\$51,884	6.00%
9/30/10	17	27	1,424,636	52,764	1.70
9/30/11	17	25	1,356,858	54,274	2.90
9/30/12	17	21	1,131,252	53,869	(0.70)
6/30/13*	17	16	793,841	49,615	(7.90)
6/30/14	17	14	727,347	51,953	4.70
6/30/15	17	11	579,267	52,661	1.40
6/30/16	17	8	419,000	52,375	(0.50)
6/30/17	17	6	321,243	53,541	2.20
6/30/18	17	4	199,742	49,936	(6.70)
Supplemental Legislative Retirement Plan					
6/30/09	5	174	\$6,803,339	\$39,100	1.30%
6/30/10	5	175	6,605,037	37,743	(3.50)
6/30/11	5	174	6,809,770	39,137	3.70
6/30/12	5	175	6,871,757	39,267	0.30
6/30/13	5	175	6,695,359	38,259	(2.60)
6/30/14	5	175	6,917,939	39,531	3.30
6/30/15	5	174	6,861,166	39,432	(0.30)
6/30/16	5	171	6,862,262	40,130	1.80
6/30/17	5	174	6,928,085	39,817	(0.80)
6/30/18	5	174	6,832,961	39,270	(1.40)

*Municipal Retirement Systems' plan year changed from September 30 to June 30, beginning in fiscal year 2013.

SCHEDULE OF RETIRANTS ADDED TO AND REMOVED FROM ROLLS - LAST SIX FISCAL YEARS -

		A	DDED	REM	NOVED	
FISCAL YEAR ENDED*	PLAN	NUMBER	ANNUAL ALLOWANCES	NUMBER	ANNUAL ALLOWANCES	INCREASE DUE TO ANNUAL COLA
JUNE 30, 2013	PERS	6,276	\$120,592,399	(2,891)	\$(47,237,330)	\$48,758,557
	MHSPRS	23	642,344	(23)	(596,871)	622,206
	MRS	40	896,085	(77)	(1,083,209)	195,722
	SLRP	20	77,003	(5)	(26,497)	24,226
JUNE 30, 2014	PERS	6,159	120,190,296	(2,869)	(48,955,768)	52,368,041
	MHSPRS	28	1,113,236	(21)	(661,028)	678,533
	MRS	29	485,121	(80)	(1,041,083)	173,544
	SLRP	6	32,688	(7)	(44,780)	30,165
JUNE 30, 2015	PERS	5,907	117,113,206	(3,073)	(55,158,128)	56,044,620
	MHSPRS	22	890,167	(18)	(480,408)	700,417
	MRS	40	731,337	(81)	(1,119,680)	143,234
	SLRP	8	58,303	(10)	(95,910)	31,718
JUNE 30, 2016	PERS	6,548	132,970,248	(3,403)	(59,603,335)	59,355,139
	MHSPRS	26	833,870	(26)	(830,278)	701,887
	MRS	46	842,966	(97)	(1,365,194)	132,268
	SLRP	28	177,207	(6)	(57,546)	24,514
JUNE 30, 2017	PERS	6,219	123,938,697	(3,442)	(62,470,173)	64,233,789
	MHSPRS	22	717,225	(20)	(694,187)	758,789
	MRS	34	712,490	(78)	(1,174,872)	125,506
	SLRP	6	31,300	(8)	(64,321)	34,729
JUNE 30, 2018	PERS	5,985	121,870,115	(3,272)	(64,186,324)	68,319,584
	MHSPRS	17	787,728	(18)	(494,512)	757,399
	MRS	36	674,428	(96)	(1,530,600)	102,334
	SLRP	6	34,983	(4)	(42,480)	32,574

*Information for MRS is as of September 30 for fiscal years 2011 through 2012.

SCHEDULE OF RETIRANTS ADDED TO AND REMOVED FROM ROLLS (CONTINUED) - LAST SIX FISCAL YEARS -

FISCAL YEAR ENDED*	PLAN	INCREASE DUE TO PLAN AMENDMENTS	NUMBER	ANNUAL ALLOWANCES	INCREASE IN ANNUAL ALLOWANCES	AVERAGE ANNUAL ALLOWANCES
JUNE 30, 2013	PERS	-	90,214	\$1,874,720,385	6.97%	\$20,781
	MHSPRS	-	713	25,835,619	2.65	36,235
	MRS	-	1,941	35,105,891	0.02	18,086
	SLRP	-	188	1,121,404	7.14	5,965
JUNE 30, 2014	PERS	-	93,504	1,998,322,954	6.59	21,372
	MHSPRS	-	720	26,966,360	4.38	37,453
	MRS	-	1,890	34,723,473	(1.09)	18,372
	SLRP	-	187	1,139,477	1.61	6,093
JUNE 30, 2015	PERS	-	96,338	2,116,322,652	5.90	21,968
	MHSPRS	-	724	28,076,536	4.12	38,780
	MRS	-	1,849	34,478,364	(0.71)	18,647
	SLRP	-	185	1,133,588	(0.52)	6,128
JUNE 30, 2016	PERS	-	99,483	2,249,044,704	6.27	22,607
	MHSPRS	-	724	28,782,015	2.51	39,754
	MRS	-	1,798	34,088,404	(1.13)	18,959
	SLRP	-	207	1,277,763	12.72	6,173
JUNE 30, 2017	PERS	-	102,260	2,374,747,017	5.59	23,223
	MHSPRS	-	726	29,563,842	2.72	40,722
	MRS	-	1,754	33,751,528	(0.99)	19,243
	SLRP	-	205	1,279,471	0.13	6,241
JUNE 30, 2018	PERS	-	104,973	2,500,750,392	5.31	23,823
	MHSPRS	-	725	30,614,457	3.55	42,227
	MRS	-	1,694	32,997,690	(2.23)	19,479
	SLRP	-	207	1,304,548	1.96	6,302

ROLLS AT END OF YEAR

*Information for MRS is as of September 30 for fiscal years 2011 through 2012.

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PERSEVERANCE Vulpes vulpes (Red Fox)



Statistical Report

The objectives of the statistical section are to provide additional historical perspective, context, and details to assist readers in using the information in the financial statements and required supplementary information.

Financial Trends The schedule of Changes in Net Position presented on pages 160 through 163 contains historical information related to the System's revenues, expenses, changes in net position, and net position restricted for benefits, as well as a history of employer and member contribution rates over a 10-year period. During the past 10 years, member and employer contributions have generally risen, while investment income has fluctuated due to a volatile global financial environment. PERS, however, experienced a decline in member and employer contributions in fiscal years 2017 and 2018 due to a decline in active members. Retirement annuity payments, and to a lesser degree administrative expenses, have generally increased over the period. However, there was a slight decline in administrative expenses and a decrease in depreciation expense.

PERS funded ratio has ranged from a 10-year high of 67.3 percent in 2009 to a low of 57.7 percent in 2013, primarily due to the effects of smoothing investment losses from 2009. The current funding ratio is 61.8 percent. To help address the funded status of PERS, in 2012 the Board of Trustees approved an increase in the employer contribution rate to 15.75 percent, which was effective for fiscal year 2014. An employer contribution rate increase was again approved by the Board of Trustees, from 15.75 percent to 17.4 percent, effective July 1, 2019. MHSPRS funded ratio has ranged from a high of 74.1 percent in 2009 to a low of 62.8 percent. in 2013, also due to the effects of smoothing investment losses from 2009. The 2018 funded ratio is 66.8. MHSPRS increased its employer contribution rate from 37.0 percent to 49.08 percent effective July 1, 2018. MRS, a closed plan, had funded ratios spanning 50.3 percent in 2018 to a low of 43.6 percent in 2012, brought about by smoothing investment losses from prior years. The number of deceased retirees in the closed plan also had an impact on funding. Funded ratios for SLRP span 81.0 percent in 2009 to 67.8 percent in 2013. The current funded ratio is 80.4 percent. The SLRP employer contribution rate has remained at 7.4 percent, since January 1, 2012. The PERS member contribution rate was increased by the Mississippi Legislature from 7.25 percent to 9.0 percent effective July 1, 2010, where it remains today. The MHSPRS member contribution rate has remained constant at 7.25 percent since 2008, and the SLRP member contribution rate has continued at 3.0 percent since inception of the plan in 1989.

The Board adopted a new funding policy for PERS in June 2018. The increase in the employer contribution rate, coupled with a new funding policy, is projected to improve the financial status of the plan. The policy is based on a signal light approach to indicate actions to be considered by the Board. Metrics include the funded ratio, cash flow as a percentage of assets, and the actuarially determined contribution rate. The funding policies for MHSPRS and SLRP remain unchanged. A discussion of contribution rates can be found on page 60, Note 6. Funding information can be found in the Actuarial Section, beginning on page 153.

Changes were enacted in the PERS retirement benefit structure for those hired on or after July 1, 2001, to better position the System for its financial future. A detailed description of plan benefits can be found in Note 1 on pages 36 through 38 and in the Summary of Main System Provisions for each plan, beginning on page 119.

Demographic and Economic Information The schedule of Total Active Members by Attained Age and Years of Service, shown on pages 178 through 180, provides relevant details about the composition of the System's membership, including concentration of members within various age groups and selected group averages for each pension plan. Page 182 contains comparative information regarding the 10 largest participating employers of the multiple-employer plans, which are the Public Employees' Retirement System and Municipal Retirement Systems. The schedule of Benefit Payments by County on page 181 offers information on the amount of economic contribution attributed to benefit payments by county within the State of Mississippi.

Operating Information Pages 164 through 167 illustrate the number of participants and total benefit payments by type for each retirement plan administered by the System. Additional details regarding monthly benefit distribution by option can be found on pages 174 through 177. The schedule of Average Benefit Payments presents average monthly benefits, average final salary, and the number of active retirees by years of credited service by plan on pages 168 through 171. Comparative supplemental information on employer and member groups covered by the Public Employees' Retirement System cost-sharing plan is offered on pages 172 and 173, with details of participating employers covered by separate agreements on pages 183 through 185.

Statistical data is provided from the System's internal resources and actuarial valuations for each plan. The System had no outstanding debt as of June 30, 2018.

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CHANGES IN NET POSITION - LAST 10 FISCAL YEARS -

[in thousands]

		MEMBER CON	ITRIBUTIONS	EMPLOYER CO	NTRIBUTIONS		
FISCAL YEAR Public Employees' Retirement System of Mississippi	BEGINNING NET POSITION	AMOUNT	PERCENT*	AMOUNT**	PERCENT*	NET INVESTMENT INCOME (LOSS)	OTHER REVENUES & TRANSFERS**
2009	\$19,251,069	\$434,081	7.25%	\$713,569	11.85%	\$(3,717,016)	\$657
2010	15,134,487	439,397	7.25	731,544	12.00	2,148,749	610
2011	16,788,214	533,369	9.00	723,836	12.00	4,167,042	639
2012	20,377,236	545,587	9.00	768,914	12.93	59,595	664
2013	19,781,387	547,792	9.00	881,847	14.26	2,564,097	691
2014	21,686,911	549,528	9.00	969,674	15.75	3,905,728	885
2015	24,877,119	557,909	9.00	996,478	15.75	827,666	670
2016	24,906,556	572,574	9.00	1,021,261	15.75	130,900	633
2017	24,135,016	570,066	9.00	1,019,084	15.75	3,436,144	604
2018 Mississippi Highway Safety Patrol Retirement System	26,543,097	570,807	9.00	1,018,163	15.75	2,385,913	664
2009	\$276,154	\$2,166	7.25%	\$9,066	30.30%	\$(52,869)	\$3,208
2010	214,374	2,043	7.25	8,613	30.30	29,942	3,985
2011	232,873	1,948	7.25	8,067	30.30	57,090	3,427
2012	277,563	1,946	7.25	8,798	35.21	805	3,246
2013	265,232	1,951	7.25	9,952	37.00	34,270	3,414
2014	287,456	1,963	7.25	13,500	37.00	51,575	-
2015	326,032	1,938	7.25	13,695	37.00	10,812	-
2016	323,207	2,128	7.25	14,755	37.00	1,704	-
2017	311,612	2,147	7.25	14,809	37.00	44,499	-
2018	341,719	2,271	7.25	15,128	37.00	27,719	-

*Percentage of annual covered payroll. The rates shown for 2012 for PERS, MHSPRS, and SLRP were effective as of January 1, 2012. For 2012, the rates prior to January 1, 2012, were 12.0 percent, 30.30 percent, and 6.65 percent. respectively.

and 6.65 percent, respectively. **Additional contributions for MHSPRS, from House Bill No. 1015, were previously shown in Other Revenues and Transfers. Beginning with fiscal year 2014, these fees are reported in Employer Contributions.

CHANGES IN NET POSITION (CONTINUED) - LAST 10 FISCAL YEARS -

[in thousands]

FISCAL YEAR Public Employees' Retirement System of Mississippi	TOTAL ADDITIONS (DELETIONS)	RETIREMENT ANNUITIES	REFUNDS	EXPENSES & DEPRECIATION	TRANSFERS	TOTAL DEDUCTIONS	NET CHANGE IN POSITION	ENDING NET POSITION
2009	\$(2,568,709)	\$1,465,500	\$70,050	\$12,323	\$-	\$1,547,873	\$(4,116,582)	\$15,134,487
2010	3,320,300	1,580,808	73,580	12,185	-	1,666,573	1,653,727	16,788,214
2011	5,424,886	1,734,475	88,343	13,046	-	1,835,864	3,589,022	20,377,236
2012	1,374,760	1,862,826	93,379	14,404	-	1,970,609	(595,849)	19,781,387
2013	3,994,427	1,965,660	108,365	14,878	-	2,088,903	1,905,524	21,686,911
2014	5,425,815	2,099,843	121,532	14,232	-	2,235,607	3,190,208	24,877,119
2015	2,382,723	2,219,240	119,356	14,690	-	2,353,286	29,437	24,906,556
2016	1,725,368	2,367,709	112,926	16,273	-	2,496,908	(771,540)	24,135,016
2017	5,025,898	2,477,914	113,707	26,196	-	2,617,817	2,408,081	26,543,097
2018	3,975,547	2,609,415	124,306	21,733	-	2,755,454	1,220,093	27,763,190
Mississippi Highway Safety Patrol Retirement System								
2009	\$(38,429)	\$23,098	\$72	\$-	\$181	\$23,351	\$(61,780)	\$214,374
2010	44,583	25,847	65	-	172	26,084	18,499	232,873
2011	70,532	25,620	60	-	162	25,842	44,690	277,563
2012	14,795	26,926	24	-	176	27,126	(12,331)	265,232
2013	49,587	27,052	112	-	199	27,363	22,224	287,456
2014	67,038	28,220	42	-	200	28,462	38,576	326,032
2015	26,445	28,909	163	-	198	29,270	(2,825)	323,207
2016	18,587	29,913	52	-	217	30,182	(11,595)	311,612
2017	61,455	31,001	144	-	203	31,348	30,107	341,719
2018	45,118	32,315	103	-	250	32,668	12,450	354,169

CHANGES IN NET POSITION (CONTINUED) - LAST 10 FISCAL YEARS -

[in thousands]

		MEMBER CON	ITRIBUTIONS	EMPLOYER CO	NTRIBUTIONS			
FISCAL YEAR Municipal Retirement Systems	BEGINNING NET POSITION	AMOUNT	PERCENT*	AMOUNT	PERCENT*	NET INVESTMENT INCOME (LOSS)	OTHER REVENUES & TRANSFERS	
2009	\$200,155	\$154	**%	\$17,415	**%	\$(35,930)	\$-	
2010	145,467	145	**	21,420	/0	19,369	μ- -	
	,			,		,		
2011	150,203	126	**	22,860	**	35,363	-	
2012	172,451	121	**	23,449	**	487	-	
2013	160,688	100	**	21,718	**	19,837	-	
2014	166,648	78	**	20,337	**	28,453	-	
2015	180,092	45	**	19,344	**	5,692	-	
2016	169,986	53	**	18,542	**	846	-	
2017	154,627	31	**	17,732	**	20,605	-	
2018	158,570	25	**	17,610	**	12,042	-	
Supplemental Legislative Retirement Plan								
2009	\$12,412	\$207	3.00%	\$458	6.65%	\$(2,437)	\$-	
2010	9,832	202	3.00	446	6.65	1,432	-	
2011	11,079	206	3.00	457	6.65	2,832	-	
2012	13,737	206	3.00	490	7.40	39	-	
2013	13,169	204	3.00	503	7.40	1,715	-	
2014	14,374	208	3.00	514	7.40	2,605	-	
2015	16,453	207	3.00	511	7.40	552	-	
2016	16,456	208	3.00	514	7.40	86	-	
2017	15,768	212	3.00	522	7.40	2,264	-	
2018	17,342	207	3.00	513	7.40	1,412	-	

*Percentage of annual covered payroll. The rates shown for 2012 for PERS, MHSPRS, and SLRP were effective as of January 1, 2012. For 2012, the rates prior to January 1, 2012, were 12.0 percent, 30.30 percent, and 6.65 percent, respectively.

**Employee and employer rates vary among the 19 systems that comprise the Municipal Retirement Systems.

CHANGES IN NET POSITION (CONTINUED) - LAST 10 FISCAL YEARS -

[in thousands]

FISCAL YEAR Municipal Retirement Systems	TOTAL ADDITIONS (DELETIONS)	RETIREMENT ANNUITIES	REFUNDS	EXPENSES & DEPRECIATION	TRANSFERS	TOTAL DEDUCTIONS	NET CHANGE IN POSITION	ENDING NET POSITION
2009	\$(18,361)	\$35,848	\$12	\$-	\$467	\$36,327	\$(54,688)	\$145,467
2010	40,934	35,766	3	-	429	36,198	4,736	150,203
2011	58,349	35,609	35	-	457	36,101	22,248	172,451
2012	24,057	35,348	3	-	469	35,820	(11,763)	160,688
2013	41,655	35,227	34	-	434	35,695	5,960	166,648
2014	48,868	35,014	3	-	407	35,424	13,444	180,092
2015	25,081	34,799	1	-	387	35,187	(10,106)	169,986
2016	19,441	34,429	-	-	371	34,800	(15,359)	154,627
2017	38,368	34,070	-	-	355	34,425	3,943	158,570
2018	29,677	33,604	-	-	353	33,957	(4,280)	154,290
Supplemental Legislative Retirement Plan								
2009	\$(1,772)	\$790	\$9	\$-	\$9	\$808	\$(2,580)	\$9,832
2010	2,080	804	20	-	9	833	1,247	11,079
2011	3,495	828	-	-	9	837	2,658	13,737
2012	735	1,268	25	-	10	1,303	(568)	13,169
2013	2,422	1,182	25	-	10	1,217	1,205	14,374
2014	3,327	1,216	22	-	10	1,248	2,079	16,453
2015	1,270	1,220	37	-	10	1,267	3	16,456
2016	808	1,454	32	-	10	1,496	(688)	15,768
2017	2,998	1,397	17	-	10	1,424	1,574	17,342
2018	2,132	1,410	18	-	10	1,438	694	18,036

BENEFIT AND REFUND PAYMENTS BY TYPE: PUBLIC EMPLOYEES' RETIREMENT SYSTEM OF MISSISSIPPI - LAST 10 FISCAL YEARS -

					REFUNI	DS
FISCAL YEAR Number of Participants by Type of Benefit	SERVICE	DISABILITY	SURVIVOR	TOTAL	TERMINATED	DEATHS*
2009	61,466	5,257	9,420	76,143	15,654	-
2010	64,049	5,399	9,720	79,168	14,433	-
2011	67,486	5,676	9,953	83,115	16,595	-
2012	70,843	5,845	10,141	86,829	18,053	-
2013	73,830	6,030	10,354	90,214	19,920	-
2014	76,665	6,229	10,610	93,504	20,700	-
2015	79,156	6,352	10,830	96,338	19,479	-
2016	82,145	6,430	10,908	99,483	13,026	449
2017	84,825	6,485	10,950	102,260	13,003	633
2018 Total Payments by Type of Benefit [in thousands]	87,277	6,506	11,190	104,973	12,407	454
2009	\$1,339,209	\$92,925	\$33,366	\$1,465,500	\$70,050	\$-
2010	1,444,987	99,920	35,901	1,580,808	73,580	-
2011	1,588,369	107,657	38,449	1,734,475	88,343	-
2012	1,707,922	115,042	39,862	1,862,826	93,379	-
2013	1,804,812	120,342	40,506	1,965,660	108,365	-
2014	1,930,284	127,537	42,022	2,099,843	121,532	-
2015	2,042,728	133,454	43,058	2,219,240	119,356	-
2016	2,182,627	140,619	44,464	2,367,710	106,644	6,282
2017	2,289,330	143,292	45,292	2,477,914	108,652	5,055
2018	2,415,631	146,835	46,949	2,609,415	118,638	5,668

*Information unavailable prior to 2016.

BENEFIT AND REFUND PAYMENTS BY TYPE: MISSISSIPPI HIGHWAY SAFETY PATROL RETIREMENT SYSTEM - LAST 10 FISCAL YEARS -

				-	REFU	NDS
FISCAL YEAR	SERVICE	DISABILITY	SURVIVOR	TOTAL	TERMINATED	DEATHS*
Number of Participants by Type of Benefit 2009	400	16	104	(02	14	
	480	16	196	692	14	-
2010	489	18	189	696	5	-
2011	500	18	186	704	14	-
2012	510	19	184	713	7	-
2013	510	19	184	713	9	-
2014	516	17	187	720	9	-
2015	525	17	182	724	13	-
2016	526	17	181	724	3	1
2017	528	16	182	726	7	-
2018	534	17	174	725	6	-
Total Payments by Type of Benefit [in thousands]						
2009	\$21,194	\$478	\$1,426	\$23,098	\$72	\$-
2010	24,029	472	1,346	25,847	65	-
2011	23,953	507	1,160	25,620	60	-
2012	25,337	516	1,073	26,926	24	-
2013	25,476	522	1,054	27,052	112	-
2014	26,595	526	1,099	28,220	42	-
2015	27,295	501	1,113	28,909	163	-
2016	29,153	509	249	29,911	42	10
2017	30,175	518	308	31,001	144	-
2018	31,455	554	306	32,315	103	-

*Information unavailable prior to 2016.

BENEFIT AND REFUND PAYMENTS BY TYPE: MUNICIPAL RETIREMENT SYSTEMS - LAST 10 FISCAL YEARS -

					REFUN	NDS
FISCAL YEAR Number of Participants by Type of Benefit	SERVICE	DISABILITY	SURVIVOR	TOTAL	TERMINATED	DEATHS****
2009*	1,431	93	566	2,090	3	-
2010*	1,388	84	584	2,056	9	-
2011*	1,334	80	602	2,016	7	-
2012*	1,302	75	601	1,978	-	-
2013**	1,260	71	610	1,941	4	-
2014**	1,216	70	604	1,890	7	-
2015**	1,170	66	613	1,849	1	-
2016**	1,110	64	624	1,798	-	-
2017**	1,070	59	625	1,754	-	-
2018** Total Payments by Type of Benefit*** [in thousands]	1,014	57	623	1,694	-	-
2009*	\$27,409	\$1,003	\$7,045	\$35,457	\$3	\$-
2010*	27,062	927	7,430	35,419	35	-
2011*	26,315	894	7,956	35,165	3	-
2012*	26,056	850	8,190	35,096	-	-
2013**	25,787	817	8,623	35,227	34	-
2014**	25,382	816	8,816	35,014	3	-
2015**	24,824	761	9,214	34,799	1	-
2016**	24,085	744	9,600	34,429	-	-
2017**	23,456	688	9,926	34,070	-	-
2018**	22,807	657	10,140	33,604	-	-

* Valuation information furnished for MRS is as of September 30.

** Valuation information furnished for MRS is as of June 30, due to plan year change.

*** Individual MRS COLA increases are paid if funding is available. **** Information unavailable prior to 2016.

BENEFIT AND REFUND PAYMENTS BY TYPE: SUPPLEMENTAL LEGISLATIVE RETIREMENT PLAN - LAST 10 FISCAL YEARS -

					REFUN	IDS
FISCAL YEAR	SERVICE	DISABILITY	SURVIVOR	TOTAL	TERMINATED	DEATHS*
Number of Participants by Type of Benefit 2009	113	2	26	141	1	
2010	113	2	23	141	3	-
					3	-
2011	118	2	27	147	-	-
2012	143	2	28	173	8	-
2013	150	2	36	188	4	-
2014	149	2	36	187	5	-
2015	145	2	38	185	7	-
2016	167	2	38	207	2	1
2017	168	1	36	205	1	1
2018	168	1	38	207	2	1
Total Payments by Type of Benefit [in thousands]						
2009	\$739	\$12	\$39	\$790	\$9	\$-
2010	758	12	34	804	20	-
2011	781	12	35	828	-	-
2012	1,184	16	68	1,268	25	-
2013	1,104	13	65	1,182	25	-
2014	1,123	13	80	1,216	22	-
2015	1,126	13	81	1,220	37	-
2016	1,341	15	97	1,453	9	22
2017	1,314	11	72	1,397	12	5
2018	1,332	10	68	1,410	13	5

*Information unavailable prior to 2016.

AVERAGE BENEFIT PAYMENTS: PUBLIC EMPLOYEES' RETIREMENT SYSTEM OF MISSISSIPPI

				YEARS CREDI	TED SERVICE			
RETIREMENT EFFECTIVE DATES: JULY 1, 2013, TO JUNE 30, 2018	0-9	10-14	15-19	20-24	25	26-29	30	31+
2018 AVERAGE MONTHLY BENEFIT	\$485	\$722	\$1,057	\$1,767	\$2,024	\$2,174	\$2,534	\$3,179
AVERAGE FINAL SALARY	\$32,660	\$37,608	\$39,878	\$49,009	\$52,289	\$52,205	\$57,261	\$60,427
NUMBER OF ACTIVE RETIRANTS	672	933	849	1,047	348	1,080	192	864
2017								
AVERAGE MONTHLY BENEFIT	\$476	\$727	\$1,013	\$1,656	\$1,948	\$2,106	\$2,446	\$3,093
AVERAGE FINAL SALARY	\$31,990	\$37,033	\$39,332	\$47,400	\$49,568	\$50,461	\$55,156	\$59,849
NUMBER OF ACTIVE RETIRANTS	732	938	859	1,014	369	1,174	190	943
2016								
AVERAGE MONTHLY BENEFIT	\$512	\$701	\$1,054	\$1,638	\$1,879	\$2,118	\$2,400	\$3,196
AVERAGE FINAL SALARY	\$31,771	\$34,459	\$39,422	\$45,571	\$46,533	\$50,536	\$52,472	\$59,306
NUMBER OF ACTIVE RETIRANTS	751	997	874	1,048	402	1,204	234	1,038
2015								
AVERAGE MONTHLY BENEFIT	\$458	\$688	\$977	\$1,346	\$1,834	\$1,989	\$2,217	\$2,899
AVERAGE FINAL SALARY	\$29,781	\$33,585	\$37,938	\$40,770	\$46,461	\$48,614	\$50,908	\$57,019
NUMBER OF ACTIVE RETIRANTS	599	898	774	693	494	1,072	230	1,147
2014								
AVERAGE MONTHLY BENEFIT	\$465	\$712	\$999	\$1,384	\$1,871	\$1,993	\$2,283	\$2,954
AVERAGE FINAL SALARY	\$31,044	\$35,356	\$37,962	\$40,947	\$47,490	\$48,732	\$51,456	\$57,022
NUMBER OF ACTIVE RETIRANTS	751	945	815	663	505	1,146	232	1,102

AVERAGE BENEFIT PAYMENTS: MISSISSIPPI HIGHWAY SAFETY PATROL RETIREMENT SYSTEM

_			,	YEARS CREDI	TED SERVICE			
RETIREMENT EFFECTIVE DATES: JULY 1, 2013, TO JUNE 30, 2018 2018	0-9	10-15	16-20	21-24	25	26-29	30	31+
AVERAGE MONTHLY BENEFIT	\$-	\$1,307	\$2,491	\$3,100	\$-	\$3,562	\$4,826	\$5,101
AVERAGE FINAL SALARY	\$-	\$31,380	\$68,832	\$60,334	\$-	\$68,126	\$77,928	\$75,940
NUMBER OF ACTIVE RETIRANTS	-	1	2	4	-	1	2	7
2017								
AVERAGE MONTHLY BENEFIT	\$338	\$996	\$556	\$2,928	\$1,186	\$2,670	\$4,606	\$3,493
AVERAGE FINAL SALARY	\$19,660	\$45,533	\$22,016	\$67,683	\$28,912	\$54,518	\$72,101	\$47,950
NUMBER OF ACTIVE RETIRANTS	1	1	1	6	2	6	4	1
2016								
AVERAGE MONTHLY BENEFIT	\$315	\$-	\$-	\$2,078	\$-	\$3,013	\$1,729	\$5,059
AVERAGE FINAL SALARY	\$53,306	\$-	\$-	\$45,948	\$-	\$37,841	\$50,692	\$51,223
NUMBER OF ACTIVE RETIRANTS	3	-	-	6	-	13	1	3
2015								
AVERAGE MONTHLY BENEFIT	\$-	\$-	\$1,831	\$1,719	\$1,978	\$4,054	\$-	\$4,758
AVERAGE FINAL SALARY	\$-	\$-	\$45,652	\$30,832	\$36,845	\$51,500	\$-	\$67,378
NUMBER OF ACTIVE RETIRANTS	-	-	3	3	2	10	-	4
2014								
AVERAGE MONTHLY BENEFIT	\$-	\$-	\$402	\$2,013	\$-	\$2,756	\$3,899	\$4,528
AVERAGE FINAL SALARY	\$-	\$-	\$15,019	\$54,344	\$-	\$51,233	\$69,760	\$68,011
NUMBER OF ACTIVE RETIRANTS	-	-	1	5	-	8	5	9

AVERAGE BENEFIT PAYMENTS: MUNICIPAL RETIREMENT SYSTEMS

_	YEARS OF CREDITED SERVICE							
RETIREMENT EFFECTIVE DATES: JULY 1, 2013, TO JUNE 30, 2018 2018	0-9	10-14	15-19	20-24	25	26-29	30	31+
AVERAGE MONTHLY BENEFIT	\$-	\$-	\$-	\$-	\$-	\$-	\$-	\$3,738
AVERAGE FINAL SALARY	\$-	\$-	\$-	\$-	\$-	\$-	\$-	\$67,277
NUMBER OF ACTIVE RETIRANTS	-	-	-	-	-	-	-	2
2017								
AVERAGE MONTHLY BENEFIT	\$-	\$-	\$-	\$-	\$-	\$-	\$-	\$2,424
AVERAGE FINAL SALARY	\$-	\$-	\$-	\$-	\$-	\$-	\$-	\$43,631
NUMBER OF ACTIVE RETIRANTS	-	-	-	-	-	-	-	2
2016								
AVERAGE MONTHLY BENEFIT	\$-	\$-	\$-	\$-	\$-	\$-	\$-	\$3,479
AVERAGE FINAL SALARY	\$-	\$-	\$-	\$-	\$-	\$-	\$-	\$44,155
NUMBER OF ACTIVE RETIRANTS	-	-	-	-	-	-	-	3
2015								
AVERAGE MONTHLY BENEFIT	\$-	\$-	\$-	\$-	\$-	\$-	\$2,898	\$2,912
AVERAGE FINAL SALARY	\$-	\$-	\$-	\$-	\$-	\$-	\$51,253	\$56,520
NUMBER OF ACTIVE RETIRANTS	-	-	-	-	-	-	1	2
2014								
AVERAGE MONTHLY BENEFIT	\$-	\$-	\$-	\$-	\$-	\$-	\$-	\$2,778
AVERAGE FINAL SALARY	\$-	\$-	\$-	\$-	\$-	\$-	\$-	\$47,160
NUMBER OF ACTIVE RETIRANTS	-	-	-	-	-	-	-	2

AVERAGE BENEFIT PAYMENTS: SUPPLEMENTAL LEGISLATIVE RETIREMENT PLAN

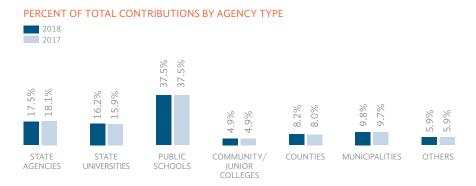
_	YEARS CREDITED SERVICE									
RETIREMENT EFFECTIVE DATES: JULY 1, 2013, TO JUNE 30, 2018	0-9	10-15	16-20	21-24	25	26-29	30	31+		
2018										
AVERAGE MONTHLY BENEFIT	\$33	\$-	\$-	\$521	\$-	\$-	\$-	\$1,285		
AVERAGE FINAL SALARY	\$20,840	\$-	\$-	\$27,700	\$-	\$-	\$-	\$41,618		
NUMBER OF ACTIVE RETIRANTS	2	-	-	3	-	-	-	1		
2017										
AVERAGE MONTHLY BENEFIT	\$181	\$-	\$609	\$452	\$732	\$-	\$-	\$-		
AVERAGE FINAL SALARY	\$29,821	\$-	\$37,791	\$28,378	\$40,932	\$-	\$-	\$-		
NUMBER OF ACTIVE RETIRANTS	2	-	1	2	1	-	-	-		
2016										
AVERAGE MONTHLY BENEFIT	\$250	\$350	\$487	\$654	\$522	\$-	\$-	\$1,200		
AVERAGE FINAL SALARY	\$36,600	\$39,878	\$35,211	\$39,774	\$41,482	\$-	\$-	\$42,238		
NUMBER OF ACTIVE RETIRANTS	6	6	4	7	2	-	-	3		
2015										
AVERAGE MONTHLY BENEFIT	\$164	\$740	\$721	\$-	\$579	\$-	\$-	\$1,032		
AVERAGE FINAL SALARY	\$18,636	\$68,228	\$37,912	\$-	\$34,791	\$-	\$-	\$42,949		
NUMBER OF ACTIVE RETIRANTS	2	2	2	-	1	-	-	1		
2014										
AVERAGE MONTHLY BENEFIT	\$-	\$345	\$491	\$473	\$-	\$580	\$-	\$-		
AVERAGE FINAL SALARY	\$-	\$34,404	\$34,871	\$39,301	\$-	\$43,165	\$-	\$-		
NUMBER OF ACTIVE RETIRANTS	-	2	2	1	-	1	-	-		

ANALYSIS OF EMPLOYER AND MEMBER CONTRIBUTIONS PUBLIC EMPLOYEES' RETIREMENT SYSTEM OF MISSISSIPPI - FOR FISCAL YEARS ENDED JUNE 30, 2018 AND 2017 -

[contributions in thousands]

	EN	IPLOYER	ME	MBER	TOTAL		
EMPLOYER GROUP	UNITS	CONTRIBUTIONS	NUMBER	CONTRIBUTIONS	TOTAL CONTRIBUTIONS	PERCENT	
2018							
STATE AGENCIES	107	\$178,585	27,383	\$100,120	\$278,705	17.54%	
STATE UNIVERSITIES	9	165,350	17,599	92,699	258,049	16.24	
PUBLIC SCHOOLS	143	381,404	60,952	213,824	595,228	37.46	
COMMUNITY/JUNIOR COLLEGES	15	49,890	6,076	27,970	77,860	4.90	
COUNTIES	82	83,693	13,741	46,920	130,613	8.22	
MUNICIPALITIES	242	99,780	16,168	55,939	155,719	9.80	
OTHERS	260	59,461	8,768	33,335	92,796	5.84	
TOTALS	858	\$1,018,163	150,687	\$570,807	\$1,588,970	100.00%	
2017							
STATE AGENCIES	111	\$184,658	28,434	\$103,296	\$287,954	18.12%	
STATE UNIVERSITIES	9	162,544	17,636	90,926	253,470	15.95	
PUBLIC SCHOOLS	143	382,157	61,509	213,775	595,932	37.50	
COMMUNITY/JUNIOR COLLEGES	15	50,138	6,100	28,047	78,185	4.92	
COUNTIES	82	81,119	13,630	45,377	126,496	7.96	
MUNICIPALITIES	241	98,444	16,163	55,068	153,512	9.66	
OTHERS	260	60,024	8,910	33,577	93,601	5.89	
TOTALS	861	\$1,019,084	152,382	\$570,066	\$1,589,150	100.00%	

Note: Above table excludes MHSPRS, MRS, and SLRP contributions. Classification amounts are established at the time entities join PERS. Classification amounts may differ from those identified through other sources.



Note: Above chart excludes MHSPRS, MRS, and SLRP contributions.

RETIRED MEMBERS BY TYPE OF BENEFIT - JUNE 30, 2018 -

_			OPTION SEL	ECTED**		
AMOUNT OF MONTHLY BENEFIT* Public Employees' Retirement System of Mississippi	LIFE	OPT. 1	OPT. 2	OPT. 3	OPT. 4	OPT. 4A
\$1-500	16,251	736	2,697	163	132	468
501 - 1,000	14,675	682	2,806	172	185	907
1,001 - 1,500	11,860	684	3,027	191	247	1,153
1,501 - 2,000	9,426	465	2,505	120	267	1,156
2,001 - 2,500	6,718	282	1,874	75	185	1,071
2,501 - 3,000	3,986	151	1,104	40	136	630
3,001 - 3,500	2,452	94	678	24	95	426
3,501 - 4,000	1,339	52	398	12	46	235
4,001 - 4,500	773	23	248	6	38	184
4,501 - 5,000	409	9	144	2	13	102
OVER 5,000	740	19	366	7	56	232
TOTALS	68,629	3,197	15,847	812	1,400	6,564
TOTALS Mississippi Highway Safety Patrol Retirement System	68,629	3,197	15,847	812	1,400	6,564
Mississippi Highway Safety	68,629 31	3,197	15,847 1	812	1,400	6,564 4
Mississippi Highway Safety Patrol Retirement System		3,197 - -			1,400 - -	
Mississippi Highway Safety Patrol Retirement System \$1 - 500	31	-	1	-	1,400 - - -	4
Mississippi Highway Safety Patrol Retirement System \$1 - 500 501 - 1,000	31 83	-	1	- 1	1,400	4
Mississippi Highway Safety Patrol Retirement System \$1 - 500 501 - 1,000 1,001 - 1,500	31 83 37	-	1 - 3	- 1 -	1,400	4 9 29
Mississippi Highway Safety Patrol Retirement System \$1 - 500 501 - 1,000 1,001 - 1,500 1,501 - 2,000	31 83 37 13	-	1 - 3 9	- 1 - 2	1,400 	4 9 29 72
Mississippi Highway Safety Patrol Retirement System \$1 - 500 501 - 1,000 1,001 - 1,500 1,501 - 2,000 2,001 - 2,500	31 83 37 13 7		1 - 3 9 9	- 1 - 2 -		4 9 29 72 85
Mississippi Highway Safety Patrol Retirement System \$1 - 500 501 - 1,000 1,001 - 1,500 1,501 - 2,000 2,001 - 2,500 2,501 - 3,000	31 83 37 13 7 2	- - - - -	1 - 3 9 9 9	- 1 - 2 - 1		4 9 29 72 85 81
Mississippi Highway Safety Patrol Retirement System \$1 - 500 501 - 1,000 1,001 - 1,500 1,501 - 2,000 2,001 - 2,500 2,501 - 3,000 3,001 - 3,500	31 83 37 13 7 2 5		1 - 3 9 9 10 9	- 1 - 2 - 1 -		4 9 29 72 85 81 78
Mississippi Highway Safety Patrol Retirement System \$1 - 500 501 - 1,000 1,001 - 1,500 1,501 - 2,000 2,001 - 2,500 2,501 - 3,000 3,001 - 3,500 3,501 - 4,000	31 83 37 13 7 2 5 5	- - - - - - 1 -	1 - 3 9 9 10 9 10	- 1 2 - 1 1 1		4 9 29 72 85 81 78 45
Mississippi Highway Safety Patrol Retirement System \$1 - 500 501 - 1,000 1,001 - 1,500 1,501 - 2,000 2,001 - 2,500 2,501 - 3,000 3,001 - 3,500 3,501 - 4,000	31 83 37 13 7 2 5 5 - 1	- - - - - - 1 1 -	1 - 3 9 9 10 9 10 9 1 1 4	- 1 - 2 - 1 1 - 1		4 9 29 72 85 81 78 45 27

- * Excluding Cost-of-Living Adjustment.
 ** Option Selected: Life return of contributions;
 Opt. 1 return of member's annuity;
 Opt. 2 100.0 percent survivorship;
 Opt. 3 50.0 percent / 50.0 percent dual survivorship;
 Opt. 4 75.0 percent survivorship;
 Opt. 4A 50.0 percent survivorship;

 - Opt. 4B years certain and life;

 - Opt. 4C
 Social Security leveling;

 Opt. 5
 pop up; PLSO Partial-Lump-Sum Option.

RETIRED MEMBERS BY TYPE OF BENEFIT (CONTINUED) - JUNE 30, 2018 -

	OPTION SELECTED** (CONTINUED)					
AMOUNT OF MONTHLY BENEFIT* Public Employees' Retirement System of Mississippi	OPT. 4B	OPT. 4C***	OPT. 5	PLSO 1 YR.***	PLSO 2 YR.***	PLSO 3 YR.***
\$1-500	1,753	169	60	586	479	2,284
501 - 1,000	1,486	782	79	790	568	1,968
1,001 - 1,500	1,401	972	85	750	682	2,766
1,501 - 2,000	1,262	431	37	645	709	3,254
2,001 - 2,500	928	123	22	708	627	2,634
2,501 - 3,000	590	48	16	521	416	1,452
3,001 - 3,500	351	19	7	401	269	813
3,501 - 4,000	169	10	-	225	147	385
4,001 - 4,500	104	3	-	139	85	259
4,501 - 5,000	53	2	-	65	34	137
OVER 5,000	121	3	-	124	70	236
TOTALS	8,218	2,562	306	4,954	4,086	16,188
Mississippi Highway Safety Patrol Retirement System						
\$1 - 500	-	-	-	-	-	-
	-	-	-	-	-	-
\$1-500			-	- - 2		- - 3
\$1 - 500 501 - 1,000	-	1			1	-
\$1 - 500 501 - 1,000 1,001 - 1,500	- 1	1 3		2	1 -	- 3
\$1 - 500 501 - 1,000 1,001 - 1,500 1,501 - 2,000	- 1 3	1 3 3		2 1	1 - 1	- 3 7
\$1 - 500 501 - 1,000 1,001 - 1,500 1,501 - 2,000 2,001 - 2,500	- 1 3 2	1 3 3 1	-	2 1 8	1 - 1 3	- 3 7 16
\$1 - 500 501 - 1,000 1,001 - 1,500 1,501 - 2,000 2,001 - 2,500 2,501 - 3,000	- 1 3 2 5	1 3 3 1 3	-	2 1 8 4	1 - 1 3 5	- 3 7 16 36
\$1 - 500 501 - 1,000 1,001 - 1,500 2,001 - 2,500 2,501 - 3,000 3,001 - 3,500	- 1 3 2 5 1	1 3 1 3 -	-	2 1 8 4 8	1 - 1 3 5 5	- 3 7 16 36 32
\$1 - 500 501 - 1,000 1,001 - 1,500 1,501 - 2,000 2,001 - 2,500 2,501 - 3,000 3,001 - 3,500 3,501 - 4,000	- 1 3 2 5 1 2	1 3 1 3 - -		2 1 8 4 8 7	1 - 3 5 5 4	- 3 7 16 36 32 19
\$1 - 500 501 - 1,000 1,001 - 1,500 2,001 - 2,500 2,501 - 3,000 3,001 - 3,500 3,501 - 4,000	- 1 3 2 5 1 2 2 1	1 3 1 3 - - -	- - - - -	2 1 8 4 8 7 3	1 - 3 5 5 4 3	- 3 7 16 36 32 19 9

* Excluding Cost-of-Living Adjustment. ** Option Selected: Life - return of contributions;

- Option Selected: Life return of contributions;

 Opt. 1
 return of member's annuity;

 Opt. 2
 100.0 percent survivorship;

 Opt. 3
 50.0 percent / 50.0 percent dual survivorship;

 Opt. 4
 75.0 percent survivorship;

 Opt. 4A
 50.0 percent survivorship;

 Opt. 4A
 50.0 percent survivorship;

- Opt. 4A
 50.0 percent survivorship,

 Opt. 4B
 years certain and life;

 Opt. 4C
 Social Security leveling;

 Opt. 5
 pop up; PLSO Partial-Lump-Sum Option.

 *** Included in other options.

RETIRED MEMBERS BY TYPE OF BENEFIT (CONTINUED) - JUNE 30, 2018 -

AMOUNT OF MONTHLY BENEFIT* Supplemental Legislative Retirement Plan	LIFE	OPT. 1	OPT. 2	OPT. 3	OPT. 4	OPT. 4A	
\$1-100	5	-	6	-	-	-	
101 - 200	17	1	16	-	-	-	
201 - 300	14	-	13	2	1	3	
301 - 400	21	1	13	-	-	3	
401 - 500	12	1	6	2	-	1	
501 - 600	4	-	2	1	-	2	
601 - 700	3	-	10	-	-	1	
701 - 800	1	-	4	-	-	-	
801 - 900	4	-	1	-	-	1	
901 - 1,000	1	-	1	-	-	-	
OVER 1,000	4	-	2	1	-	-	
TOTALS	86	3	74	6	1	12	

* Excluding Cost-of-Living Adjustment.
** Option Selected: Life - return of contributions;
Opt. 1 - return of member's annuity;
Opt. 2 - 100.0 percent survivorship;
Opt. 3 - 50.0 percent / 50.0 percent dual survivorship;
Opt. 4 - 75.0 percent survivorship;
Opt. 4A - 50.0 percent survivorship;
Opt. 4B - years certain and life;
Opt. 4C - Social Security leveling:

 Opt. 4C
 - Social Security leveling;

 Opt. 5
 - pop up; PLSO - Partial-Lump-Sum Option.

RETIRED MEMBERS BY TYPE OF BENEFIT (CONTINUED) - JUNE 30, 2018 -

101-200 1 - </th <th></th> <th>OPTION</th> <th>SELECTED** (CONT</th> <th>rinued)</th> <th>51.00</th> <th>DI CO</th> <th>51.50</th>		OPTION	SELECTED** (CONT	rinued)	51.00	DI CO	51.50
101-200 1 - </td <td>MONTHLY BENEFIT*</td> <td>OPT. 4B</td> <td>OPT. 4C***</td> <td>OPT. 5</td> <td></td> <td></td> <td></td>	MONTHLY BENEFIT*	OPT. 4B	OPT. 4C***	OPT. 5			
201-300 2 - - 1 - 2 301-400 7 - - 2 - 8 401-500 3 - - 1 3 6 501-600 2 - - 1 1 3 601-700 2 - - - - 1 1 3 701-800 - - - - - - 1 1 3 901-1,000 2 - - - - - 1 1 1	\$1-100	3	1	-	-	-	1
301-400 7 - - 2 - 8 401-500 3 - - 1 3 6 501-600 2 - - 1 1 3 601-700 2 - - - - 1 1 3 10 501-600 2 - - - 1 1 3 <td>101 - 200</td> <td>1</td> <td>-</td> <td>-</td> <td>-</td> <td>-</td> <td>4</td>	101 - 200	1	-	-	-	-	4
401-500 3 - - 1 3 6 501-600 2 - - 1 1 3 601-700 2 - - - 1 1 3 701-800 - - - - - 1 1 1 1 1 3 901-1,000 2 - - - - - 1 </td <td>201 - 300</td> <td>2</td> <td>-</td> <td>-</td> <td>1</td> <td>-</td> <td>2</td>	201 - 300	2	-	-	1	-	2
501-600 2 - - 1 1 3 601-700 2 - - - - 1 1 3 701-800 - - - - - - 1 <td>301 - 400</td> <td>7</td> <td>-</td> <td>-</td> <td>2</td> <td>-</td> <td>8</td>	301 - 400	7	-	-	2	-	8
601-700 2 - - - 1 701-800 - - - - 1 801-900 2 - - - 1 901-1,000 2 - - 1 1	401 - 500	3	-	-	1	3	6
701-800 - - - - - 1 801-900 2 - - - - 1 901-1,000 2 - - - 1 1	501 - 600	2	-	-	1	1	3
801-900 2 - - - 1 901-1,000 2 - - 1 1	601 - 700	2	-	-	-	-	1
901-1,000 2 1 1	701 - 800	-	-	-	-	-	1
	801 - 900	2	-	-	-	-	1
OVER 1,000 1 2 - 4	901-1,000	2	-	-	-	1	1
	OVER 1,000	1	-	-	2	-	4
TOTALS 25 1 - 7 5 32	TOTALS	25	1	-	7	5	32

* Excluding Cost-of-Living Adjustment.
** Option Selected: Life - return of contributions;
Opt. 1 - return of member's annuity;
Opt. 2 - 100.0 percent survivorship;
Opt. 3 - 50.0 percent / 50.0 percent dual survivorship;
Opt. 4 - 75.0 percent survivorship;
Opt. 4A - 50.0 percent survivorship;
Opt. 4B - years certain and life;
Opt. 4C - Social Security leveling:

Opt. 4D - years certain and mile, Opt. 4C - Social Security leveling; Opt. 5 - pop up; PLSO - Partial-Lump-Sum Option. *** Included in other options.

TOTAL ACTIVE MEMBERS BY ATTAINED AGE AND YEARS OF SERVICE:
PUBLIC EMPLOYEES' RETIREMENT SYSTEM OF MISSISSIPPI
- JUNE 30, 2018 -

			ACTIVE MEN			TOTALS			
ATTAINED AGE	0-4	5-9	10-14	15-19	20-24	25-29	30+	NUMBER	VALUATION PAYROLL
UNDER 21	270	-	-	-	-	-	-	270	\$4,797,012
21-24	5,762	46	-	-	-	-	-	5,808	156,010,094
25-29	11,679	2,493	50	-	-	-	-	14,222	469,026,412
30-34	7,680	6,465	2,244	40	-	-	-	16,429	617,132,551
35-39	6,521	4,661	6,059	1,971	34	-	-	19,246	781,779,725
40-44	5,535	3,711	4,055	4,698	1,543	25	-	19,567	835,962,443
45-49	5,061	3,606	3,759	3,675	4,024	1,195	23	21,343	926,997,753
50-54	4,166	2,975	3,164	2,993	2,797	2,071	580	18,746	784,329,069
55-59	3,582	2,758	2,891	3,056	2,732	1,657	1,218	17,894	722,179,334
60-64	2,094	1,982	1,984	1,681	1,538	1,134	1,038	11,451	469,610,349
65-69	786	762	700	529	410	288	359	3,834	160,096,832
70 & OVER	395	335	347	273	196	115	216	1,877	71,309,127
TOTALS	53,531	29,794	25,253	18,916	13,274	6,485	3,434	150,687	\$5,999,230,701

While not used in the financial computations, the following group averages are computed and shown because of their general interest:

Age: 44.8 years Service: 10.3 years Annual Pay: \$39,813

TOTAL ACTIVE MEMBERS BY ATTAINED AGE AND YEARS OF SERVICE:	
MISSISSIPPI HIGHWAY SAFETY PATROL RETIREMENT SYSTEM	
- JUNE 30, 2018 -	

_			ACTIVE MEM			TOTALS			
ATTAINED AGE	0-4	5-9	10-14	15-19	20-24	25-29	30+	NUMBER	VALUATION PAYROLL
UNDER 25	16	-	-	-	-	-	-	16	\$221,127
25-29	32	5	-	-	-	-	-	37	1,195,561
30-34	29	18	14	-	-	-	-	61	2,595,490
35-39	13	13	53	3	-	-	-	82	4,337,592
40-44	7	4	46	32	5	-	-	94	5,539,844
45-49	8	2	31	31	39	4	-	115	7,509,710
50-54	-	2	6	11	31	8	2	60	4,409,227
55-59	-	-	-	4	13	2	14	33	2,629,143
60-64	-	-	-	2	1	1	9	13	1,117,717
65 & OVER	-	-	-	-	-	-	-	-	-
TOTALS	105	44	150	83	89	15	25	511	\$29,555,411

While not used in the financial computations, the following group averages are computed and shown because of their general interest:

Age: 42.6 years Service: 13.8 years Annual Pay: \$57,838

TOTAL ACTIVE MEMBERS BY ATTAINED AGE AND YEARS OF SERVICE: MUNICIPAL RETIREMENT SYSTEMS - JUNE 30, 2018 -

		A	CTIVE MEMB			TOTALS			
ATTAINED AGE	0-4	5-9	10-14	15-19	20-24	25-29	30+	NUMBER	VALUATION PAYROLL
UNDER 25	-	-	-	-	-	-	-	-	\$-
25-29	-	-	-	-	-	-	-	-	-
30-34	-	-	-	-	-	-	-	-	-
35-39	-	-	-	-	-	-	-	-	-
40-44	-	-	-	-	-	-	-	-	-
45-49	-	-	-	-	-	-	-	-	-
50-54	-	-	-	-	-	-	-	-	-
55-59	-	-	-	-	-	-	1	1	50,886
60 & OVER	-	-	-	-	-	-	3	3	148,856
TOTALS	-	-	-	-	-	-	4	4	\$199,742

While not used in the financial computations, the following group averages are computed and shown because of their general interest:

Age: 65.3 years Service: 40.5 years Annual Pay: \$49,936

TOTAL ACTIVE MEMBERS BY ATTAINED AGE AND YEARS OF SERVICE: SUPPLEMENTAL LEGISLATIVE RETIREMENT PLAN - JUNE 30, 2018 -

_			ACTIVE MEM			TOTALS			
ATTAINED AGE	0-4	5-9	10-14	15-19	20-24	25-29	30+	NUMBER	VALUATION PAYROLL
UNDER 25	-	-	-	-	-	-	-	-	\$-
25-29	2	-	-	-	-	-	-	2	78,228
30-34	4	1	-	-	-	-	-	5	175,003
35-39	9	3	-	-	-	-	-	12	414,798
40-44	4	6	5	-	-	-	-	15	563,117
45-49	9	15	3	1	-	-	-	28	1,063,731
50-54	11	7	2	2	1	-	-	23	884,613
55-59	6	8	6	1	2	1	-	24	998,140
60-64	3	3	6	2	-	4	2	20	836,013
65-69	1	4	6	3	1	3	3	21	846,366
70-74	-	1	4	-	2	3	1	11	449,948
75 & OVER	-	-	3	1	1	3	5	13	523,004
TOTALS	49	48	35	10	7	14	11	174	\$6,832,961

While not used in the financial computations, the following group averages are computed and shown because of their general interest:

Age: 56.1 years Benefit Service: 11.3 years Eligibility Service: 16.3 years Annual Pay: \$39,270

PERS BENEFIT PAYMENTS BY COUNTY - JUNE 30, 2018 -

COUNTY	NUMBER OF PAYMENTS	AMOUNT PAID*	COUNTY	NUMBER OF PAYMENTS	AMOUNT PAID*
ADAMS	1,260	29,398,314	LOWNDES 1,783		42,807,511
ALCORN	1,278	29,816,400	MADISON	3,912	120,391,619
AMITE	371	7,032,269	MARION	796	18,738,427
ATTALA	830	18,726,259	MARSHALL	755	16,198,645
BENTON	204	4,114,437	MONROE	1,039	23,631,015
BOLIVAR	1,546	38,136,466	MONTGOMERY	577	13,620,748
CALHOUN	467	10,071,928	NESHOBA	955	20,631,285
CARROLL	461	10,519,491	NEWTON	802	18,502,281
CHICKASAW	597	13,567,480	NOXUBEE	314	7,204,329
CHOCTAW	365	7,602,808	OKTIBBEHA	2,405	84,273,976
CLAIBORNE	359	8,412,048	PANOLA	1,173	25,184,021
CLARKE	649	11,578,984	PEARL RIVER	1,303	26,207,503
CLAY	645	16,610,490	PERRY	454	8,436,449
COAHOMA	945	25,937,820	PIKE	1,284	30,687,649
COPIAH	1,020	23,488,700	PONTOTOC	783	18,609,591
COVINGTON	742	16,359,697	PRENTISS	826	20,125,941
DESOTO	1,738	38,187,703	QUITMAN	261	5,644,194
FORREST	3,525	97,083,702	RANKIN	5,960	160,895,941
FRANKLIN	333	7,458,396	SCOTT	873	18,393,892
GEORGE	687	13,718,268	SHARKEY	218	5,104,135
GREENE	337	6,472,616	SIMPSON	1,128	23,752,669
GRENADA	822	18,947,215	SMITH	530	10,567,955
HANCOCK	949	20,113,833	STONE	756	17,995,486
HARRISON	4,793	117,643,265	SUNFLOWER	943	22,141,962
HINDS	9,944	270,524,007	TALLAHATCHIE	452	9,964,902
HOLMES	722	15,622,741	TATE	801	19,615,010
HUMPHREYS	288	7,035,323	TIPPAH	828	17,861,441
ISSAQUENA	25	446,511	TISHOMINGO	612	12,109,465
ITAWAMBA	846	20,134,333	TUNICA	246	5,083,593
JACKSON	3,681	86,517,687	UNION	891	21,105,226
JASPER	585	12,316,686	WALTHALL	395	8,882,281
JEFFERSON	409	10,161,752	WARREN	1,386	35,882,464
JEFFERSON DAVIS	399	7,844,700	WASHINGTON	1,633	38,965,512
JONES	2,576	61,134,531	WAYNE	535	11,929,554
KEMPER	348	7,949,018	WEBSTER	634	14,575,883
LAFAYETTE	2,240	72,003,623	WILKINSON	295	6,793,593
LAMAR	1,013	20,586,243	WINSTON	698	17,226,701
LAUDERDALE	2,668	63,331,816	YALOBUSHA	646	14,365,369
LAWRENCE	577	11,855,381	YAZOO	813	18,838,959
LEAKE	726	15,154,645	MISSISSIPPI	97,284	\$2,402,814,365
LEE	2,461	62,890,024	OUT-OF-COUNTRY	25	726,805
LEFLORE	1,140	28,755,520	OUT-OF-STATE	9,778	205,874,070
LINCOLN	1,018	24,604,058	TOTAL	107,087	\$2,609,415,240

TEN LARGEST PARTICIPATING EMPLOYERS

		2018			2009	
- PARTICIPATING EMPLOYER Public Employees' Retirement System	COVERED EMPLOYEES	RANK	PERCENTAG OF TOTAL SYSTEM	E COVERED EMPLOYEES	RANK	PERCENTAGE OF TOTAL SYSTEM
UNIVERSITY MEDICAL CENTER	7,664	1	5.09	% 6,725	1	4.02%
DESOTO COUNTY BOARD OF EDUCATION	4,126	2	2.74	3,566	4	2.13
JACKSON MUNICIPAL SEPARATE SCHOOLS	3,898	3	2.59	4,706	2	2.82
MISSISSIPPI STATE UNIVERSITY	3,620	4	2.40	3,895	3	2.33
MISSISSIPPI DEPARTMENT OF HUMAN SERVICES	3,091	5	2.05	3,295	6	1.97
MISSISSIPPI DEPARTMENT OF TRANSPORTATION	3,069	6	2.04	3,412	5	2.04
RANKIN COUNTY BOARD OF EDUCATION	2,325	7	1.54	2,402	8	1.44
UNIVERSITY OF MISSISSIPPI	2,080	8	1.38	-	-	-
CORRECTIONS DEPARTMENT	1,959	9	1.30	3,177	7	1.90
HARRISON COUNTY BOARD OF EDUCATION	1,882	10	1.25	-	-	-
ALL OTHER*	116,973	-	77.62	135,944	-	81.35
TOTALS (858 EMPLOYERS)	150,687	-	100.00	% 167,122	-	100.00%
Municipal Retirement Systems						
CITY OF CLINTON	2	1	50.009	% 6	2	17.14%
CITY OF HATTIESBURG	1	2	25.00	6	1	17.14
CITY OF GREENWOOD	1	3	25.00	3	3	8.57
ALL OTHER*	-	-	· _	20	-	57.15
TOTALS (17 EMPLOYERS)**	4	-	100.00	% 35	-	100.00%

*In 2018, "All Other" consisted of state agencies, state universities, public schools, community/junior colleges, counties, municipalities, and other political subdivisions (see chart below). **All MRS are employers included in Ten Largest

TYPE Public Employees' Retirement System	NUMBER OF EMPLOYERS	EMPLOYEES
STATE AGENCIES	104	19,264
STATE UNIVERSITIES	6	4,235
PUBLIC SCHOOLS	139	48,721
COMMUNITY/ JUNIOR COLLEGES	15	6,076
COUNTIES	82	13,741
MUNICIPALITIES	242	16,168
OTHER POLITICAL SUBDIVISIONS	260	8,768
TOTALS	848	116,973

PUBLIC AGENCIES COVERED BY STATE RETIREMENT ANNUITY

Participating Employers Covered by Law STATE AGENCIES

STATE UNIVERSITIES COMMUNITY/JUNIOR COLLEGES PUBLIC SCHOOL DISTRICTS

Participating Employers Covered by Separate Agreement COUNTIES

Local Governmental Entities Covered by Separate Agreement

Municipalities

ABERDEEN ACKERMAN ALGOMA AMORY ANGUILLA ARCOLA ARTESIA ASHLAND BALDWYN BASSFIELD BATESVILLE **BAY SPRINGS** BAY ST. LOUIS BEAUMONT BELMONT BELZONI BENOIT BENTONIA BILOXI **BLUE MOUNTAIN** BOONEVILLE BOYLE BRANDON BROOKHAVEN BROOKSVILLE BRUCE BUDE BURNSVILLE BYHALIA BYRAM CALEDONIA CALHOUN CITY CANTON CARTHAGE CARY CENTREVILLE CHARLESTON CHUNKY CLARKSDALE CLEVELAND CLINTON COFFEEVILLE COLDWATER COLLINS COLUMBIA COLUMBUS сомо CORINTH CRAWFORD

CRENSHAW CROSBY CRYSTAL SPRINGS DECATUR DE KALB D'LO DERMA D'IBERVILLE DREW DUCK HILL DURANT ECRU **EDWARDS** ELLISVILLE ENTERPRISE ETHEL EUPORA FALKNER FARMINGTON FLORA FLORENCE FLOWOOD FOREST FRENCH CAMP FULTON GAUTIER GLOSTER GOLDEN GOODMAN GREENVILLE GREENWOOD GRENADA GUI FPORT GUNTOWN HATLEY HATTIESBURG HAZLEHURST HEIDELBERG HERNANDO HICKORY HICKORY FLAT HOLLANDALE HOLLY SPRINGS HORN LAKE HOULKA HOUSTON INDIANOLA INVERNESS ΙΤΤΑ ΒΕΝΑ

IUKA JACKSON **JONESTOWN** JUMPERTOWN KILMICHAEL KOSCIUSKO LAKE LAMBERT LAUREL LEAKESVILLE LELAND LENA LEXINGTON LIBERTY LONG BEACH LOUIN LOUISE LOUISVILLE LUCEDALE LULA LUMBERTON LYON MABEN MACON MADISON MAGEE MAGNOLIA MANTACHIE MARIETTA MARION MARKS MATHISTON MAYERSVILLE MCCOMB MCLAIN MEADVILLE MENDENHALL MERIDIAN MERIGOLD METCALFE MI7F MONTICELLO MOORHEAD MORTON MOSS POINT MOUNT OLIVE MYRTLE NATCHE7 NETTLETON

NEW ALBANY NEW AUGUSTA NEW HEBRON NEWTON NORTH CARROLLTON NOXAPATER OCEAN SPRINGS OKOLONA **OLIVE BRANCH** OSYKA OXFORD PASCAGOULA PASS CHRISTIAN PEARL PELAHATCHIE PETAL PHILADELPHIA PICAYUNE PLANTERSVILLE POLKVILLE PONTOTOC POPLARVILLE PORT GIBSON POTTS CAMP PRENTISS PUCKETT PURVIS QUITMAN RALEIGH RAYMOND RENOVA RICHLAND RICHTON RIDGELAND RIENZI RIPLEY ROLLING FORK ROSEDALE ROXIE RULEVILLE SALTILLO SALLIS SANDERSVILLE SARDIS SEBASTOPOL SEMINARY SENATOBIA SHANNON SHAW

SHELBY SHERMAN SHUBUTA SHUQUALAK SILVER CITY SLEDGE SMITHVILLE SOSO SOUTHAVEN STARKVILLE STATE LINE STONEWALL STURGIS SUMMIT SUMNER SUMRALL SUNFLOWER TAYLORSVILLE TCHULA TERRY TISHOMINGO TREMONT TUNICA TUPELO TUTWILER TYL FRTOWN UNION VAIDEN VARDAMAN VERONA VICKSBURG WALNUT WAI NUT GROVE WALTHALL WATER VALLEY WAVELAND WAYNESBORO WEIR WESSON WEST WEST POINT WIGGINS WINONA WOODLAND WOODVILLE YAZOO CITY

PUBLIC AGENCIES COVERED BY STATE RETIREMENT ANNUITY (CONTINUED)

Juristic Entities

ADAMS COUNTY AIRPORT COMMISSION ADAMS COUNTY SOIL & WATER CONSERVATION DISTRICT BOGUE PHALIA DRAINAGE DISTRICT BOLIVAR COUNTY SOIL & WATER CONSERVATION DISTRICT CALEDONIA NATURAL GAS DISTRICT CALHOUN COUNTY SOIL & WATER CONSERVATION DISTRICT CANTON CONVENTION & VISITORS BUREAU CANTON REDEVELOPMENT AUTHORITY CHICKASAWHAY NATURAL GAS DISTRICT CHOCTAW COUNTY ECONOMIC DEVELOPMENT DISTRICT CLAIBORNE COUNTY HUMAN RESOURCE AGENCY CLEARY WATER. SEWER & FIRE DISTRICT COAHOMA COUNTY SOIL & WATER CONSERVATION DISTRICT COAST COLISEUM & CONVENTION CENTER COPIAH COUNTY HUMAN RESOURCE AGENCY CORINTH-ALCORN AIRPORT BOARD CORINTH-ALCORN CONVENTION & AGRICULTURE EXPOSITION CENTER COVINGTON COUNTY SOIL & WATER CONSERVATION DISTRICT CULKIN WATER DISTRICT DELTA BLUES MUSEUM DESOTO COUNTY CONVENTION & VISITORS BUREAU DESOTO COUNTY REGIONAL UTILITY AUTHORITY DESOTO COUNTY SOIL & WATER CONSERVATION DISTRICT DIAMONDHEAD FIRE PROTECTION DISTRICT EAST LEFLORE COUNTY WATER & SEWER DISTRICT EMERGENCY MANAGEMENT DISTRICT FORREST COUNTY SOIL & WATER CONSERVATION DISTRICT GEORGE COUNTY SOIL & WATER CONSERVATION DISTRICT GLENDALE UTILITY DISTRICT GOLDEN TRIANGLE COOPERATIVE SERVICE DISTRICT GOLDEN TRIANGLE REGIONAL AIRPORT GOLDEN TRIANGLE REGIONAL SOLID WASTE MANAGEMENT AUTHORITY GREENVILLE PORT COMMISSION GREENWOOD TOURISM COMMISSION GRENADA COUNTY CIVIL DEFENSE GRENADA COUNTY SOIL & WATER CONSERVATION DISTRICT GULF REGIONAL PLANNING COMMISSION GULFPORT-BILOXI REGIONAL AIRPORT AUTHORITY HANCOCK COUNTY HUMAN RESOURCE AGENCY HANCOCK COUNTY PLANNING COMMISSION HANCOCK COUNTY PORT & HARBOR COMMISSION HANCOCK COUNTY SOIL CONSERVATION DISTRICT HANCOCK COUNTY UTILITY AUTHORITY HANCOCK COUNTY WATER & SEWER DISTRICT HARRISON COUNTY DEVELOPMENT COMMISSION HARRISON COUNTY SOIL & WATER CONSERVATION DISTRICT HARRISON COUNTY UTILITY AUTHORITY HATTIESBURG TOURISM COMMISSION HINDS COUNTY SOIL & WATER CONSERVATION DISTRICT HOLMES COUNTY SOIL & WATER CONSERVATION DISTRICT ITAWAMBA COUNTY SOIL & WATER CONSERVATION DISTRICT JACKSON COUNTY EMERGENCY/COMMUNICATIONS DISTRICT JACKSON COUNTY PORT AUTHORITY JACKSON COUNTY UTILITY AUTHORITY JACKSON MUNICIPAL AIRPORT AUTHORITY JONES COUNTY ECONOMIC DEVELOPMENT AUTHORITY

KILN WATER & FIRE DISTRICT OF HANCOCK COUNTY LAFAYETTE COUNTY SOIL & WATER CONSERVATION DISTRICT LAMAR COUNTY SOIL & WATER CONSERVATION DISTRICT LAUDERDALE COUNTY EMERGENCY MEDICAL SERVICE DISTRICT LAUDERDALE COUNTY SOIL & WATER CONSERVATION DISTRICT LAUREL AIRPORT AUTHORITY LEE COUNTY SOIL & WATER CONSERVATION DISTRICT MADISON COUNTY ECONOMIC DEVELOPMENT AUTHORITY MADISON COUNTY NURSING HOME MADISON COUNTY SOIL & WATER CONSERVATION DISTRICT MARION COUNTY SOIL & WATER CONSERVATION DISTRICT MENTAL HEALTH & RETARDATION, REGION III (NE MS) MENTAL HEALTH & RETARDATION, REGION IV (CORINTH) MENTAL HEALTH & RETARDATION, REGION VI (GREENWOOD) MENTAL HEALTH & RETARDATION, REGION VIII (BRANDON) MENTAL HEALTH & RETARDATION, REGION X (WEEMS) MENTAL HEALTH & RETARDATION, REGION XI (SW MS) MENTAL HEALTH & RETARDATION, REGION XIV (SINGING RIVER) MERIDIAN AIRPORT AUTHORITY MID-MISSISSIPPI DEVELOPMENT DISTRICT MISSISSIPPI GULF COAST REGIONAL CONVENTION & VISITORS BUREAU MISSISSIPPI LEVEE COMMISSIONERS MUNICIPAL ENERGY AGENCY OF MISSISSIPPI NATCHEZ-ADAMS COUNTY PORT COMMISSION NATCHEZ WATERWORKS NESHOBA COUNTY SOIL CONSERVATION DISTRICT NEWTON COUNTY SOIL CONSERVATION DISTRICT NORTHEAST MISSISSIPPI NATURAL GAS DISTRICT NORTHEAST MISSISSIPPI REGIONAL WATER SUPPLY DISTRICT NROUTE TRANSIT COMMISSION OXFORD TOURISM COUNCIL PANOLA COUNTY SOIL & WATER CONSERVATION DISTRICT PHILADELPHIA-NESHOBA COUNTY PARK COMMISSION PIKE COUNTY SOIL CONSERVATION DISTRICT PINE BELT REGION SOLID WASTE MANAGEMENT AUTHORITY PONTOTOC COUNTY SOIL & WATER CONSERVATION DISTRICT PRENTISS COUNTY SOIL & WATER CONSERVATION DISTRICT RANKIN COUNTY HUMAN RESOURCE AGENCY RANKIN-HINDS PEARL RIVER FLOOD RESERVOIR FIRE PROTECTION DISTRICT RIDGELAND TOURISM COMMISSION ROSEDALE-BOLIVAR COUNTY PORT COMMISSION RUNNELSTOWN UTILITY DISTRICT SEBASTOPOL NATURAL GAS DISTRICT SIMPSON COUNTY PARKS & RECREATION SINGING RIVER SERVICES SOUTH MADISON COUNTY FIRE PROTECTION DISTRICT SOUTH MISSISSIPPI FAIR COMMISSION STONE COUNTY SOIL & WATER CONSERVATION DISTRICT STONE COUNTY UTILITY AUTHORITY SUNFLOWER COUNTY SOIL & WATER CONSERVATION DISTRICT TALLAHATCHIE COUNTY SOIL & WATER CONSERVATION DISTRICT TENNESSEE-TOMBIGBEE WATERWAY DEVELOPMENT AUTHORITY TUNICA COUNTY AIRPORT COMMISSION TUNICA COUNTY TOURISM COMMISSION TUPELO AIRPORT AUTHORITY

PUBLIC AGENCIES COVERED BY STATE RETIREMENT ANNUITY (CONTINUED)

Juristic Entities (continued)

UNION COUNTY SOIL & WATER CONSERVATION DISTRICT VICKSBURG CONVENTION & VISITORS BUREAU WALTHALL COUNTY SOIL & WATER CONSERVATION DISTRICT WARREN COUNTY PARK COMMISSION WARREN COUNTY SOIL & WATER CONSERVATION DISTRICT WAYNE COUNTY ECONOMIC DEVELOPMENT DISTRICT WAYNE COUNTY SOIL & WATER CONSERVATION DISTRICT WEST JACKSON COUNTY UTILITY DISTRICT WEST RANKIN UTILITY AUTHORITY WINSTON COUNTY ECONOMIC DEVELOPMENT WINSTON COUNTY SOIL & WATER CONSERVATION DISTRICT YALOBUSHA WATER & SEWER DISTRICT YAZOO COUNTY CONVENTION & VISITORS BUREAU YAZOO COUNTY SOIL & WATER CONSERVATION DISTRICT YAZOO-MISSISSIPPI DELTA JOINT WATER MANAGEMENT DISTRICT YAZOO-MISSISSIPPI DELTA LEVEE COMMISSION YAZOO RECREATION COMMISSION

Housing Authorities			
ATTALA COUNTY	HATTIESBURG	MS REG. V-NEWTON	SHELBY
BALDWYN	HAZLEHURST	MS REG. VI-JACKSON	SOUTH DELTA REGION
BAY WAVELAND	HOLLY SPRINGS	MS REG. VII-MCCOMB	STARKVILLE
BILOXI	ITTA BENA	MS REG. VIII-GULFPORT	SUMMIT
BOONEVILLE	IUKA	MOUND BAYOU	TUPELO
CANTON	JACKSON	NATCHEZ	VICKSBURG
CLARKSDALE	LAUREL	OXFORD	WATER VALLEY
COLUMBUS	LOUISVILLE	PICAYUNE	WAYNESBORO
CORINTH	МССОМВ	PONTOTOC	WEST POINT
FOREST	MERIDIAN	SARDIS	WINONA
GREENWOOD	MS REG. IV-COLUMBUS	SENATOBIA	YAZOO CITY

Local Hospitals

CLAIBORNE COUNTY MEDICAL CENTER FIELD MEMORIAL COMMUNITY FRANKLIN COUNTY MEMORIAL

Local Libraries

AMORY MUNICIPAL BENTON COUNTY BOLIVAR COUNTY CARNEGIE PUBLIC CARROLL COUNTY CENTRAL MISSISSIPPI REGIONAL COLUMBUS-LOWNDES PUBLIC COPIAH-JEFFERSON REGIONAL COVINGTON COUNTY DIXIE REGIONAL EAST MISSISSIPPI REGIONAL ELIZABETH JONES EVANS MEMORIAL FIRST REGIONAL GREENWOOD-LEFLORE PUBLIC ΗΑΝCOCK COUNTY HARRIETTE PERSON MEMORIAL

JEFFERSON COUNTY MAGNOLIA REGIONAL HEALTH CENTER NORTH SUNFLOWER MEDICAL CENTER

HARRISON COUNTY HATTIESBURG-PETAL-FORREST COUNTY HUMPHREYS COUNTY IACKSON-GEORGE REGIONAL IACKSON-HINDS JENNIE STEPHENS SMITH JUDGE GEORGE W ARMSTRONG KEMPER-NEWTON COUNTY REGIONAL LAMAR COUNTY LAUREL-IONES COUNTY LEE-ITAWAMBA COUNTY LINCOLN-LAWRENCE-FRANKLIN MADISON COUNTY-CANTON PUBLIC MARKS-QUITMAN COUNTY MARSHALL COUNTY MERIDIAN-LAUDERDALE COUNTY MID-MISSISSIPPI REGIONAL

SOUTH SUNFLOWER COUNTY TIPPAH COUNTY

NESHOBA COUNTY PUBLIC NORTHEAST REGIONAL NOXUBEE COUNTY OKTIBBEHA COUNTY PEARL RIVER COUNTY PIKE-AMITE-WALTHALL COUNTY PINE FOREST REGIONAL SHARKEY-ISSAQUENA COUNTY SOUTH MISSISSIPPI REGIONAL SUNFLOWER COUNTY TALLAHATCHIE COUNTY TOMBIGBEE REGIONAL WASHINGTON COUNTY WAYNESBORO-WAYNE COUNTY WILKINSON COUNTY YALOBUSHA COUNTY YAZOO LIBRARY ASSOCIATION

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PUBLIC EMPLOYEES' RETIREMENT SYSTEM OF MISSISSIPPI

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Design development by Communication Arts Company, Jackson, Mississippi