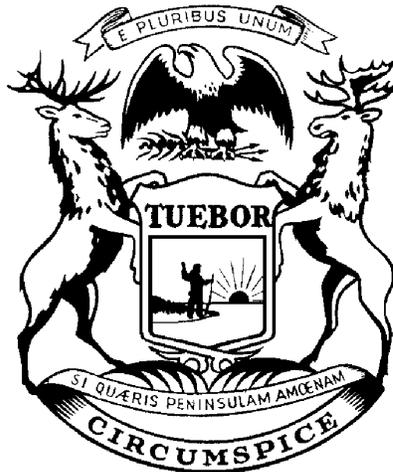


**Michigan State Employees' Retirement System**  
a Pension Trust Fund of the State of Michigan

**Comprehensive Annual Financial Report  
for the Fiscal Year Ended September 30, 2002**



**M S E R S**

**Prepared by:  
Financial Services  
for  
Office of Retirement Services  
P.O. Box 30171  
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The cost of printing this report was \$1,253.84 (\$2.51 each), which was paid for by the System at no cost to taxpayers.

# INTRODUCTORY SECTION

Certificate of Achievement  
Letter of Transmittal  
Retirement Board Members  
Advisors & Consultants  
Organization Chart

# INTRODUCTORY SECTION

## Certificate of Achievement

# Certificate of Achievement for Excellence in Financial Reporting

Presented to

## Michigan State Employees' Retirement System

For its Comprehensive Annual  
Financial Report  
for the Fiscal Year Ended  
September 30, 2001

A Certificate of Achievement for Excellence in Financial Reporting is presented by the Government Finance Officers Association of the United States and Canada to government units and public employee retirement systems whose comprehensive annual financial reports (CAFRs) achieve the highest standards in government accounting and financial reporting.



*William Patrick Pate*  
President

*Jeffrey L. Esser*  
Executive Director

# INTRODUCTORY SECTION

## Letter of Transmittal

State Employees' Retirement System  
P.O. Box 30171  
Lansing, Michigan 48909  
Telephone 517-322-5103  
Outside Lansing 1-800-381-5111

### STATE OF MICHIGAN

JOHN ENGLER, Governor

## DEPARTMENT OF MANAGEMENT AND BUDGET

December 6, 2002

The Honorable John Engler  
Governor, State of Michigan,

Members of the Legislature  
State of Michigan,

Retirement Board Members  
and  
Members, Retirees and Beneficiaries

Ladies and Gentlemen:

We are pleased to present the comprehensive annual financial report of the Michigan State Employees' Retirement System (System) for fiscal year 2002.

Responsibility for both the accuracy of the data and the completeness and fairness of the presentation, including all disclosures, rests with the leadership team of the System. To the best of our knowledge and belief, the enclosed data is accurate in all material respects and is reported in a manner designed to present fairly the financial position and results of operations of the System.

The System was established by legislation under Public Act 240 of 1943 (the Michigan State Employees' Retirement Act) and is administered by the Office of Retirement Services (ORS). The number of active and retired members and beneficiaries of the System and a list of participating employers is presented in Note 1 of the financial statements in the Financial Section of this report. The purpose of the System is to provide benefits for all State Employees. The services performed by the staff provide benefits to members.

The 2002 comprehensive annual financial report is presented in five sections. The Introductory Section contains the transmittal letter and identifies the administrative organization and professional consultants used by the System. The Financial Section contains the independent auditor's report, management's discussion and analysis, financial statements and notes of the System and certain supplemental schedules. The Investment Section summarizes investment activities. The Actuarial Section contains the independent consulting actuary's certification, an outline of actuarial assumptions and methods, and other actuarial statistics. The Statistical Section contains statistical tables of significant data pertaining to the System.

# INTRODUCTORY SECTION

## Letter Of Transmittal (Continued)

### MAJOR GOALS ACCOMPLISHED

The Michigan Department of Management and Budget, Office of Retirement Services (ORS) is a customer-focused organization whose primary purpose is to deliver pensions, related benefits, and services that will enhance the future financial security of its customers. Five years ago, ORS acknowledged that the organization would need to transform itself in order to meet the challenges posed by a substantial increase in the number of new retirees without a corresponding increase in the size of the staff. Starting with a vision to provide *fast, easy access to complete and accurate information and exceptional service*, ORS developed a sound strategic plan that would strengthen the organization and foster financial stability, without losing sight of the needs of the customer.

The world has changed dramatically since the terrorist attacks on the United States on September 11, 2001. Faced with uncertainty in their personal lives, people are seeking some sense of stability and security, not only for themselves but also for their financial future. ORS has been able to respond quickly and efficiently to the changing environment. Heightened security in government buildings has enhanced the safety and security of personnel and physical property, while new safeguards were added to protect vital records and other critical member data. For example, the State's Information Technology Services Division (ITSD) moved the web servers off-site to facilitate system recovery in the event of a disaster. To better safeguard ORS' employer web site and retirement member information, ITSD moved the employers' Member Inquiry System application to a more secure server and added a second level of firewall protection. In addition, ITSD implemented greater controls over content to restrict unauthorized changes to web content and applications.

Even before the 9-11 tragedy, ORS was learning to be adaptable and flexible when faced with a changing environment. In today's society, little remains the same for very long, so ORS continues to be a proactive organization, rather than a reactionary one. However, through it all, ORS continues to focus on three primary interconnected objectives: *provide excellent customer service, improve business processes, and optimize technology*. Some of our accomplishments in these areas are presented below.

#### ***Provide Excellent Service to All Customers***

*Easily Accessible Information*—ORS responded to customers' need for prompt, accurate information by offering several new and enhanced avenues for them to interact with their retirement system. This became a critical issue in February 2002 when the Governor introduced an Early Out retirement proposal for State employees as part of his fiscal year 2003 Executive Budget proposal. During the next few months, the ORS web site became a vital source of self-serve information for State employees. Any time of the day or night they were able to acquire accurate, up-to-date information about the status of the Early Out proposal, estimate their pension benefits under various scenarios using a custom-designed on-line Early Out pension calculator, and register for special Early Out PreRetirement Orientation (PROs) seminars. An estimated 80-90% of those who attended these Early Out PROs registered via the web site.

*Personal Contact*—Customers who preferred face-to-face interactions were able to visit the newly renovated main office at the Secondary Complex in the Lansing area, or meet with Detroit office staff in their new offices at the Cadillac Center in Detroit. In August 2002, CitiStreet placed several of its representatives at ORS' main office. CitiStreet is the third party administrator and custodian for the deferred compensation/defined contribution plans. Customers can now obtain information about their defined benefit *and* their deferred compensation/defined contribution retirement benefits in a single location.

ORS continued to reach out to customers where they work and live by offering a variety of regional seminars. Approximately 2,800 pending state retirees and guests attended 53 regular PreRetirement Orientation (PROs) sessions held across the state to learn more about their retirement eligibility and benefits. ORS also held another 106 special Early Out meetings that drew an additional 9,690 attendees. These seminars received an overall satisfaction rating of 98% from attendees.

*Needs Assessment*—ORS continues to assess customer needs and the quality of the service ORS offers by surveying both active employees and retirees. Depending on the audience being targeted, ORS conducts these surveys on a regular basis; annually, semiannually, or quarterly. The information gathered from these surveys results in changing the way we do business to improve services to our customers.

## **Letter Of Transmittal (Continued)**

*Enhanced Benefits—Long-Term Care Insurance*—In early 2002, ORS joined with the Office of the State Employer to make available a group long-term care (LTC) insurance plan for both active State employees and all ORS retirees. LTC insurance provides one of the few available means by which individuals can protect themselves against the cost of long-term care. The addition of the LTC insurance program helps promote the future financial security of ORS' customers. MetLife, the selected LTC carrier, offered 57 informational seminars in Michigan along with two seminars in Florida and one seminar in Arizona over the course of 20 days. Approximately 1,345 interested retirees were able to learn more about this LTC insurance.

*Tax Relief*—The Economic Growth and Tax Relief Reconciliation Act of 2001, or EGTRRA, provided higher contribution limits and greater flexibility for deferred compensation retirement accounts. ORS implemented all of the major provisions of EGTRRA as of January 1, 2002, the earliest effective date allowed by law. These provisions include:

- Increases to the maximum contribution limits
- Removal of the coordination limits between 457 and 401(k) plans
- Addition of new age-50+ catch-up provisions
- Allowing the purchase of service credit with 457 and 401(k) funds
- Greater payout flexibility for those retirees with 457 plans
- Enhanced portability options

### ***Continuously improve the processes that direct how ORS conducts its business***

Several years ago, ORS began implementing a process-based approach to conducting business. By focusing on how to eliminate unnecessary steps in the process and consolidate other parts of the process, ORS gained efficiencies and improved service to customers in a number of areas. Some of these successes are highlighted below.

*Using the Process-Based Approach for Early Out*—As soon as the Governor announced the Early Out retirement proposal, ORS' Business Process Leaders (BPLs) began developing a plan to handle the projected increased demands on the organization's resources. Using the BPLs' knowledge and expertise of their processes, the necessary resources were quickly identified, authorized, and supplied.

Between the beginning of February and the end of May, ORS created some impressive Early Out retirement statistics while continuing to serve ORS' other customers:

- ORS staff answered over 139,000 telephone calls. During the month of April, when Early Out applications could be accepted, the call center handled 31,500 calls – an 85% increase over the previous April's call volume. Of those 31,500 calls, over 20,000 were Early Out-related.
- Staff processed 10,863 requests for service credit billings, resulting in approximately 6,400 completed purchases.
- ORS prepared and mailed over 13,000 Early Out retirement application packets to prospective retirees.
- 7,690 walk-in customers met with a Customer Service Representative, with over 5,000 of those walk-ins occurring during the month of April. During that same month, call center staff also responded to over 5,000 email messages.
- ORS staff scheduled, promoted and led 106 Early Out retirement seminars, with over 9,600 potential retirees and guests in attendance.
- ORS received 8,484 Early Out retirement applications and processed pension estimates for them.

*Employee Development*—One of the strategic goals this year for the Department of Management and Budget (DMB) was to invest in the workforce—providing employees with the knowledge they need to be successful. Using a Competency Based Training (CBT) approach, staff and supervisors work together to design an individualized development plan that will provide training targeted at the individual needs of each employee.

ORS has already seen the positive effects of this CBT effort. Employees are being cross-trained to fill a variety of roles, learning new skills that make them more adaptable to new job tasks and responsibilities, while promoting greater

# INTRODUCTORY SECTION

## Letter Of Transmittal (Continued)

employee satisfaction. Employees feel they are valued members of the organization, and it shows through their positive interactions with co-workers and customers.

*Partnership Building*—ORS is building cooperative relationships not only internally with other DMB offices, but also outside the department with other State agencies and external partners. These partnerships improve the efficiency and quality of the product or service being provided. For example, ORS strengthened its relationship with the legislative process to facilitate more uniformity and consistency between the various retirement systems ORS oversees. During the early stages of the Early Out proposal, the value of partnership-building was readily apparent as ORS, other DMB associates, and various State agencies worked together as an effective team, accomplishing a great deal in a short period of time.

*Records Consolidation*—ORS is preparing for the implementation of new technology and changes to its processes as they relate to storage and retrieval of records. In anticipation of this, staff purged unnecessary documents from member files in preparation for the future transfer of data to electronic imaging. Streamlining of the records retention process is underway. ORS completed several data purity projects to standardize existing data into uniform fields and formats, thereby facilitating the conversion to automated processing of records and applications.

*Measurement Tools*—ORS is an organization adept at implementing its strategic plan. In order to measure its success, ORS established quantifiable performance measures for its organizational goals along with metrics to measure the progress made towards attaining those goals. ORS has a clear direction—we can clearly see where we have been, where we are now, and what is still left to accomplish.

### *Optimize technology*

ORS proceeded with its Vision ORS project to incorporate leading-edge technology into its process-based approach to business. As part of the implementation of the first stage of Vision ORS, the team introduced the Customer Relationship Management (CRM) tool. This tool assists in the capturing of data to determine who is calling ORS, for what purpose, and what additional requests for service were made previously.

The Vision ORS team implemented the new stage 2 tool, the Retirement Processing Application (RPA), on a small scale as a pilot project to help process the State Early Out retirement applications.

To improve efficiencies, ORS streamlined the Common Pension Payroll system to reduce the number of transactions required to process pension payments. In addition, ORS facilitated the electronic transmission of this pension data to the Department of Treasury, thereby enhancing the accuracy of the data records.

### *Looking to the future*

In 1999, ORS embarked on a course of action that would produce an organization ready to provide for the changing needs of both active members and retirees. The plan requires ORS to invest in its *people*, its *processes*, and *technology*. By preparing staff for a changing environment through employee development, ORS invests in its *people*. By eliminating redundancies and becoming more efficient, ORS gains the benefits of a *process-based approach*. By implementing state-of-the-art *technology*, ORS has the tools it needs for the future. The future that ORS envisioned back in 1999 is nearly here, and ORS is well prepared to achieve its vision, to provide *fast, easy access to complete and accurate information and exceptional service*.

## CERTIFICATE OF ACHIEVEMENT

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 September 30, 2001. In order to be awarded a Certificate of Achievement, a government must publish an easily readable and efficiently organized comprehensive annual financial report. This report must satisfy both accounting principles generally accepted in the United States of America and applicable legal requirements.

# INTRODUCTORY SECTION

## **Letter Of Transmittal (Continued)**

A Certificate of Achievement is valid for a period of one year only. We believe our current report continues to meet the Certificate of Achievement Program's requirements and we are submitting it to the GFOA to determine its eligibility for another certificate.

### **INTERNAL CONTROL**

The leadership team of the System is responsible for maintaining adequate internal accounting controls designed to provide reasonable assurance that transactions are executed in accordance with management's general or specific authorization, and are recorded as necessary to maintain accountability for assets and to permit preparation of financial statements in accordance with accounting principles generally accepted in the United States of America. The internal control structure is designed to provide reasonable assurance regarding the safekeeping of assets and reliability of all financial records.

### **INVESTMENT**

The State Treasurer is the investment fiduciary and custodian of all investments of the System pursuant to State law. The primary investment objective is to maximize the rate of return on the total investment portfolio, consistent with a high degree of prudence and sufficient diversity to eliminate inordinate risks and to meet the actuarial assumption for the investment return rate. The investment activity for the year produced a total rate of return on the portfolio of (10.3%). For the last five years, the System has experienced an annualized weight rate of return of 2.8%. A summary of asset allocation and rates of return can be found in the Investment Section of this report.

### **FUNDING**

Funds are derived from the excess of additions to plan net assets over deductions from plan net assets. Funds are accumulated by the System in order to meet future benefit obligations to retirees and beneficiaries. The percentage computed by dividing the actuarial value of assets by the actuarial accrued liability is referred to as the "funded ratio." This ratio provides an indication of the funding status of the System and generally, the greater this percentage, the stronger the System. Effective in fiscal year 2001, the System used the valuation from the previous fiscal year for this report. This approach is consistent with Governmental Accounting Standards Board (GASB) Statement Number 25. Consistent with this approach, the most recent actuarial valuation was performed as of September 30, 2001. The actuarial value of the assets and actuarial accrued liability of the System were \$10.6 billion and \$9.9 billion, respectively, resulting in a funded ratio of 107.6% at September 30, 2001. A historical perspective of funding levels for the System is presented on the Schedule of Funding Progress in the Required Supplementary Information in the Financial Section of this report.

### **POSTEMPLOYMENT BENEFITS**

The System also administers the postemployment health benefits (health, dental and vision) offered to retirees. The benefits are funded on a cash or "pay as you go" basis. An actuarial valuation was completed as of September 30, 2001 to determine the actuarial accrued liability if the benefits were to be pre-funded. If these benefits were pre-funded, the actuarial accrued liability for these benefits would be approximately \$7.4 billion and the employer contribution for health care benefits would be 21.14% of payroll. Only members of the defined benefit plan were included when calculating the actuarial accrued liability.

### **PROFESSIONAL SERVICES**

An annual audit of the System was conducted by Andrews Hooper & Pavlik P.L.C., independent auditors. The independent auditor's report on the System's financial statements is included in the Financial Section of this report.

Statute requires an annual actuarial valuation be conducted. The purpose of the valuation is to evaluate the mortality, service, compensation and other financial experience of the System and to recommend employer-funding rates for the

# ***INTRODUCTORY SECTION***

## **Letter Of Transmittal (Continued)**

subsequent year. This annual actuarial valuation was completed by The Segal Company for the fiscal year ended September 30, 2001. Actuarial certification and supporting statistics are included in the Actuarial Section of this report.

### **ACKNOWLEDGMENTS**

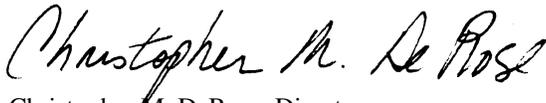
The preparation of this report was accomplished with the dedication and cooperation of many people. It is intended to provide complete and reliable information as a basis for making management decisions, as a means of determining compliance with legal provisions, and as a means for determining responsible stewardship of the funds of the System.

We would, therefore, like to express our appreciation for the assistance given by staff, the advisors and many people who contributed to its preparation. We believe their combined efforts have produced a report that will enable the employers and plan members to better evaluate and understand the Michigan State Employees' Retirement System. Their cooperation contributes significantly to the success of the System.

Sincerely,



Duane E. Berger, Director  
Department of Management and Budget



Christopher M. DeRose, Director  
Office of Retirement Services

# INTRODUCTORY SECTION

## Administrative Organization

### Retirement Board Members

Douglas Drake, Vice Chair  
Retiree Member  
Term Expires July 31, 2004

Janet McClelland  
Employee Member  
Term Expires July 31, 2005

John Reurink  
Retiree Member  
Term Expires July 31, 2003

George M. Elworth  
Representing Attorney General  
Statutory Member

Dr. James S. Neubecker, Chair  
Representing Auditor General  
Statutory Member

John Schoonmaker  
Representing Commissioner of  
Finance & Insurance Services  
Statutory Member

D. Daniel McLellan  
Representing State Personnel Director  
Statutory Member

Roy A. Pentilla, C.P.A.  
Representing State Treasurer  
Statutory Member

Janine Winters  
Employee Member  
Term Expires July 31, 2003

### Administrative Organization

**Department of Management and Budget  
Office of Retirement Services  
P.O. Box 30171  
Lansing, Michigan 48909-7671  
517-322-5103  
1-800-381-5111**

### Advisors and Consultants

**Actuary**  
The Segal Company  
Michael J. Karlin, F.S.A., M.A.A.A.  
New York, New York

**Auditors**  
Thomas H. McTavish, C.P.A.  
Auditor General  
State of Michigan

**Investment Manager and Custodian**  
Douglas B. Roberts  
State Treasurer  
State of Michigan

Andrews Hooper & Pavlik P.L.C.  
Jeffrey J. Fineis, C.P.A.  
Okemos, Michigan

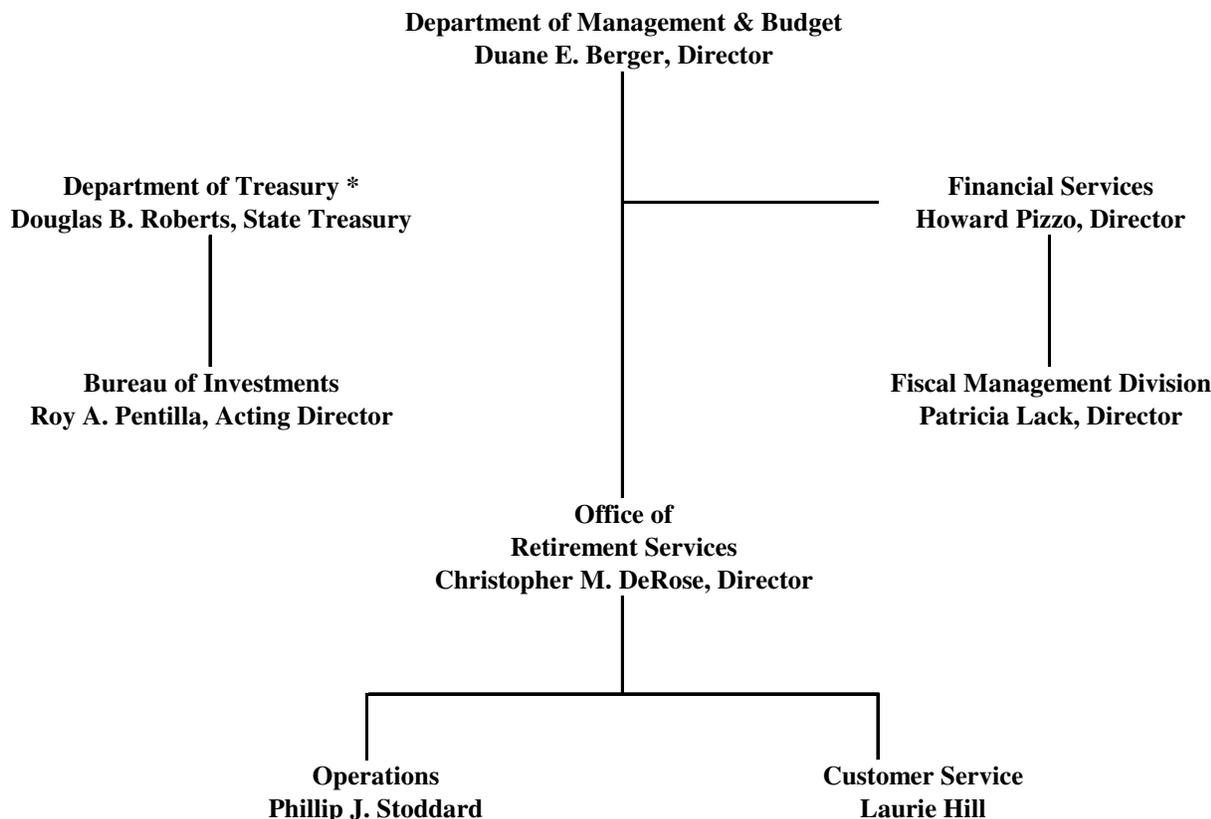
**Legal Advisor**  
Jennifer M. Granholm  
Attorney General  
State of Michigan

**Investment Performance  
Measurement**  
Capitol Resource Advisors  
Chicago, Illinois

# INTRODUCTORY SECTION

## Administrative Organization (Continued)

### Organization Chart



\* The investments of the System are managed by the Michigan Department of Treasury. Information on the investments and the fiduciary, Michigan Department of Treasury, can be found in the Investment Section, Introduction. In addition, see the Investment Section, Schedule of Investment Fees and Schedule of Investment Commissions, for information regarding the investment fees and commissions paid as well as investment professionals utilized by the System.

# FINANCIAL SECTION

Independent Auditor's Report  
Management's Discussion and Analysis  
Basic Financial Statements  
Notes to Basic Financial Statements  
Required Supplementary Information  
Notes to Required Supplementary Information  
Supporting Schedules

# FINANCIAL SECTION

## Independent Auditor's Report



**ANDREWS HOOPER & PAVLIK P.L.C.**  
Certified Public Accountants

Mr. Duane E. Berger, Director, Department of Management and Budget  
Mr. Christopher M. DeRose, Director, Office of Retirement Services  
Mr. Thomas H. McTavish, CPA, Auditor General, Office of the Auditor General  
Michigan State Employees' Retirement System Board

We have audited the accompanying statements of pension plan and postemployment healthcare plan net assets of the Michigan State Employees' Retirement System, as of September 30, 2002 and 2001, and the related statements of changes in pension plan and postemployment healthcare plan net assets for the years then ended. These financial statements are the responsibility of the management of the Michigan State Employees' Retirement System. Our responsibility is to express an opinion on these financial statements based on our audits.

We conducted our audits 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 audits to obtain reasonable assurance about whether the financial statements are free of material misstatement. An audit includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements. An audit also includes assessing the accounting principles used and significant estimates made by management, as well as evaluating the overall financial statement presentation. We believe that our audits provide a reasonable basis for our opinion.

In our opinion, the financial statements referred to above present fairly, in all material respects, the financial status of the Michigan State Employees' Retirement System, as of September 30, 2002 and 2001, and the changes in its financial status for the years then ended, in conformity with accounting principles generally accepted in the United States of America.

Our audits were conducted for the purpose of forming an opinion on the basic financial statements taken as a whole. The required supplementary information and supporting schedules listed in the table of contents are presented for the purpose of additional analysis and are not a required part of the basic financial statements. The required supplementary information and supporting schedules are the responsibility of the Michigan State Employees' Retirement System's management. The Schedules of Funding Progress and Employer Contributions and related notes and the supporting schedules have been subjected to the auditing procedures applied in our audits of the basic financial statements, and in our opinion, are fairly stated in all material respects when considered in relation to the basic financial statements taken as a whole.

The Management's Discussion and Analysis (MD&A) is not a required part of the basic financial statements but is supplemental information required by the Governmental Accounting Standards Board. We have applied certain limited procedures, which consisted principally of inquiries of management regarding the methods of measurement and presentation of this supplemental information. However, we did not audit the information and express no opinion on it. The Introductory, Investment, Actuarial, and Statistical Sections were not audited by us and, accordingly, we express no opinion on those sections.

In accordance with *Government Auditing Standards*, we have also issued a report dated November 25, 2002 on our consideration of the Michigan State Employees' Retirement System's internal control over financial reporting and on our tests of its compliance with certain provisions of laws, regulations, and contracts. That report is an integral part of an audit performed in accordance with *Government Auditing Standards* and should be read in conjunction with this report in considering the results of our audit.

*Andrews Hooper & Pavlik P.L.C.*

Okemos, Michigan  
November 25, 2002

4295 Okemos Road, Suite 200 • Okemos, Michigan 48864 • ph 517.487.5000 fx 517.487.9535 • www.ahpplc.com

## Management's Discussion and Analysis

Our discussion and analysis of the Michigan State Employees' Retirement System's (System) financial performance provides an overview of the System's financial activities for the fiscal year ended September 30, 2002. Please read it in conjunction with the transmittal letter in the Introductory Section on page 5 and the basic financial statements, which follow this discussion.

### FINANCIAL HIGHLIGHTS

- System assets exceeded liabilities at the close of fiscal year 2002 by \$8.4 billion (reported as *net assets*). Net assets are held in trust to meet future benefit payments.
- The System's funding objective is to meet long-term benefit obligations through contributions and investment income. As of September 30, 2001, the funded ratio was approximately 107.6%.
- Revenues for the year were (\$479.1 million), which is comprised of contributions of \$524.7 million and investment losses of (\$1,003.8 million).
- Expenses increased over the prior year from \$731.0 million to \$788.9 million or 7.9%. Most of this increase represented increased retirement benefits paid.

### THE STATEMENT OF PLAN NET ASSETS AND THE STATEMENT OF CHANGES IN PLAN NET ASSETS

This Comprehensive Annual Financial Report (CAFR) consists of two financial statements; *The Statement of Pension Plan and Postemployment Healthcare Plan Net Assets* (page 20) and *The Statement of Changes in Pension Plan and Postemployment Healthcare Plan Net Assets* (page 21). These financial statements report information about the System, as a whole, and about its financial condition that should help answer the question: Is the System, as a whole, better off or worse off as a result of this year's activities? These statements include all assets and liabilities using the economic resources measurement focus and the accrual basis of accounting. Under the accrual basis of accounting, all revenues and expenses are taken into account regardless of when cash is received or paid.

*The Statement of Pension Plan and Postemployment Healthcare Plan Net Assets* presents all of the System's assets and liabilities, with the difference between the two reported as net assets. Over time, increases and decreases in net assets measure whether the System's financial position is improving or deteriorating. *The Statement of Changes in Pension Plan and Postemployment Healthcare Plan Net Assets* presents how the System's net assets changed during the most recent fiscal year. These two financial statements should be reviewed along with the Schedule of Funding Progress and Schedule of Employer Contributions to determine whether the System is becoming financially stronger or weaker and to understand changes over time in the funded status of the System.

### FINANCIAL ANALYSIS

System total assets as of September 30, 2002, were \$8.8 billion and were mostly comprised of cash, investments, and contributions due from employers. Total assets decreased \$1.3 billion or 13.3% from the prior year primarily due to decreased investment earnings.

Total liabilities as of September 30, 2002, were \$379.5 million and were mostly comprised of warrants outstanding, administrative costs, and obligations under securities lending. Total liabilities decreased \$74.2 million or 16.4% from the prior year primarily due to a decrease in obligations under securities lending and a decrease in payables from the purchase of investments.

# FINANCIAL SECTION

## Management's Discussion and Analysis (Continued)

System assets exceeded its liabilities at the close of fiscal year 2002 by \$8.4 billion, of which \$1.2 million is for Defined Contribution Benefit Plan Savings and \$87.5 million is for Advanced Health Funding. Total net assets held in trust for pension and health benefits decreased \$1.3 billion or 13.2% from the previous year, primarily due to adverse market conditions and a decrease in investment earnings. This is consistent with the previous year, when net assets decreased by \$1.6 billion or 14.4% from the prior year.

### Michigan State Employees' Retirement System Net Assets (In Thousands)

	<u>2002</u>	<u>2001</u>	<u>Total Percentage Change</u>
<b>Assets</b>			
Cash	\$ 20,224	\$ 44,800	(54.9) %
Receivables	97,780	50,135	95.0
Investments	<u>8,633,038</u>	<u>9,998,337</u>	<u>(13.7)</u>
<b>Total Assets</b>	8,751,042	10,093,272	(13.3)
<b>Liabilities</b>			
Warrants outstanding	2,884	3,852	(25.1)
Accounts payable and other accrued liabilities	10,280	41,161	(75.0)
Obligations under securities lending	<u>366,352</u>	<u>408,715</u>	<u>(10.4)</u>
<b>Total Liabilities</b>	<u>379,516</u>	<u>453,728</u>	<u>(16.4)</u>
<b>Net Assets - DC Savings SubAccount</b>	1,156	1,156	-
<b>Net Assets - Advanced Health Funding SubAccount</b>	87,486	-	-
<b>Net Assets - Pension and Health Benefits</b>	<u>8,282,884</u>	<u>9,638,388</u>	<u>(14.1)</u>
<b>Total Net Assets</b>	<u>\$ 8,371,526</u>	<u>\$ 9,639,544</u>	<u>(13.2) %</u>

### REVENUES - ADDITIONS TO PLAN NET ASSETS

The reserves needed to finance retirement and health benefits are accumulated through the collection of employer contributions and through earnings on investments. Contributions and net investment income/(losses) for fiscal year 2002 totaled (\$479.1 million).

Total contributions and net investment income increased \$412.9 million or 46.3% from those of the prior year primarily due to changes in market conditions and investment earnings. Total employer contributions decreased from the previous year by \$16.3 million or 4.5%, while member contributions increased by \$170.4 million or 1,865.7%. The System is non-contributory; however, members may purchase service credit. The increase in member contributions occurred because more individuals purchased service credit. Net investment income increased from the previous year by \$259.2 million or 20.5%. The Investment Section of this report reviews the results of investment activity for 2002.

## Management's Discussion and Analysis (Continued)

**Additions to Plan Net Assets  
(In Millions)**

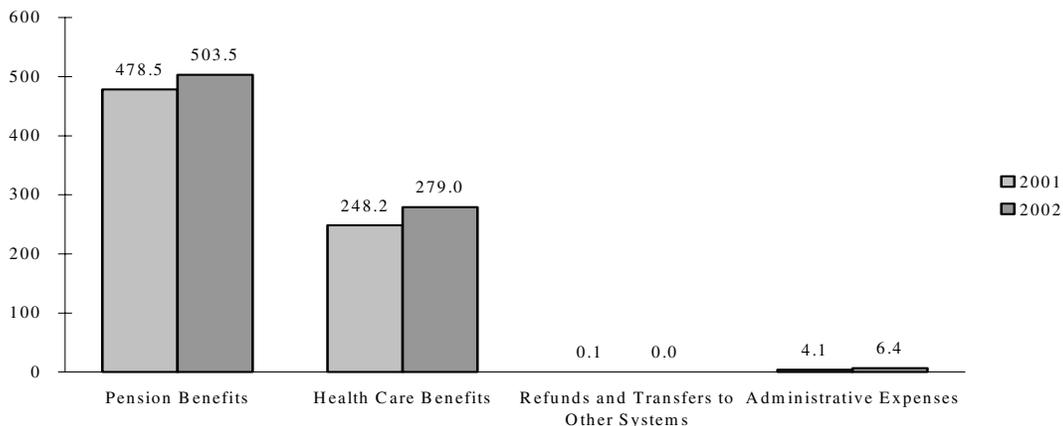


### EXPENSES - DEDUCTIONS FROM PLAN NET ASSETS

The primary expenses of the System include the payment of pension benefits to members and beneficiaries, payment for health, dental and vision benefits, refunds of contributions to former members, and the cost of administering the System. Total deductions for fiscal year 2002 were \$788.9 million, an increase of 7.9% over year 2001 expenditures.

The growth of health care expenditures continued during the year and increased by \$30.8 million or 12.4% from \$248.2 million to \$279.0 million during the fiscal year. The payment of pension benefits increased by \$25.0 million or 5.2% from the previous year. The increase in pension benefit expenditures resulted from an increase in retirees (2,555) and an increase in benefit payments to retirees. Administrative expenses increased by \$2.3 million or 55.0% from the previous year, primarily due to an increase in technological/computer operations support and postage, telephone, and other expenses.

**Deductions from Plan Net Assets  
(In Millions)**



# *FINANCIAL SECTION*

## **Management's Discussion and Analysis (Continued)**

### **RETIREMENT SYSTEM AS A WHOLE**

The System's combined net assets have experienced two years of decreases over the last 5 years. Again, this decrease is a result of a national economic slowdown that resulted in investment income decreases. Management believes, and actuarial studies concur, that the System is in a financial position to meet its current obligations. We believe the current financial position will improve due to a prudent investment program, cost controls, and strategic planning.

### **CONTACTING SYSTEM FINANCIAL MANAGEMENT**

This financial report is designed to provide the Retirement Board, our membership, taxpayers, investors, and creditors with a general overview of the System's finances and to demonstrate the System's accountability for the money it receives. If you have any questions about this report or need additional financial information, contact the Office of Retirement Services, P.O. Box 30171, Lansing, MI 48909-7671.

# *FINANCIAL SECTION*

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# FINANCIAL SECTION

## Statements of Pension Plan and Postemployment Healthcare Plan Net Assets

As of Fiscal Years Ending September 30, 2002 and 2001

	September 30, 2002			September 30, 2001		
	Pension Plan	Health Plan	Total	Pension Plan	Health Plan	Total
<b>Assets:</b>						
Cash	\$ 19,987,171	\$ 236,347	\$ 20,223,518	\$ 44,696,683	\$ 103,626	\$ 44,800,309
Receivables:						
Amounts due from employer	27,388,034	323,862	27,711,896	13,379,313	762,950	14,142,263
Amounts due from employer long term	36,102,379		36,102,379			-
Interest and dividends	32,094,047	379,511	32,473,558	35,570,053	82,466	35,652,519
Sale of investments	1,475,184	17,444	1,492,628	339,116	786	339,902
<b>Total receivables</b>	<b>97,059,644</b>	<b>720,817</b>	<b>97,780,461</b>	<b>49,288,482</b>	<b>846,202</b>	<b>50,134,684</b>
Investments:						
Short term investments	135,253,542	1,599,367	136,852,909	596,950,961	1,383,983	598,334,944
Bonds, notes, mortgages, and preferred stock	1,986,048,531	23,484,935	2,009,533,466	1,989,633,023	4,612,805	1,994,245,828
Common stock	3,372,534,093	39,880,065	3,412,414,158	3,922,793,441	9,094,683	3,931,888,124
Real estate	858,852,197	10,155,889	869,008,086	936,361,734	2,170,880	938,532,614
Alternative investments	1,205,401,921	14,253,825	1,219,655,746	1,491,758,311	3,458,522	1,495,216,833
International investments	611,985,038	7,236,696	619,221,734	629,943,329	1,460,473	631,403,802
Collateral on loaned securities	362,070,558	4,281,468	366,352,026	407,769,647	945,381	408,715,028
<b>Total investments</b>	<b>8,532,145,880</b>	<b>100,892,245</b>	<b>8,633,038,125</b>	<b>9,975,210,446</b>	<b>23,126,727</b>	<b>9,998,337,173</b>
<b>Total assets</b>	<b>8,649,192,695</b>	<b>101,849,409</b>	<b>8,751,042,104</b>	<b>10,069,195,611</b>	<b>24,076,555</b>	<b>10,093,272,166</b>
<b>Liabilities:</b>						
Warrants outstanding	2,850,426	33,706	2,884,132	3,842,844	8,909	3,851,753
Accounts payable and other accrued liabilities	10,159,496	120,136	10,279,632	41,066,275	95,209	41,161,484
Obligations under securities lending	362,070,558	4,281,468	366,352,026	407,769,647	945,381	408,715,028
<b>Total liabilities</b>	<b>375,080,480</b>	<b>4,435,310</b>	<b>379,515,790</b>	<b>452,678,766</b>	<b>1,049,499</b>	<b>453,728,265</b>
Net Assets - DC Savings SubAccount		1,156,400	1,156,400		1,156,400	1,156,400
Net Assets - Advanced Health Funding SubAccount		87,486,128	87,486,128			-
Net Assets - Pension and Health Benefits	8,274,112,215	8,771,571	8,282,883,786	9,616,516,845	21,870,656	9,638,387,501
<b>Net Assets (Liabilities) Held in Trust for Pension and Health Benefits*</b>	<b>\$ 8,274,112,215</b>	<b>\$ 97,414,099</b>	<b>\$ 8,371,526,314</b>	<b>\$ 9,616,516,845</b>	<b>\$ 23,027,056</b>	<b>\$ 9,639,543,901</b>

\*A schedule of funding progress is presented in the Required Supplementary Information of the Financial Section.

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

# FINANCIAL SECTION

## Statements of Changes in Pension Plan and Postemployment Healthcare Plan Net Assets

For Fiscal Years Ended September 30, 2002 and 2001

	September 30, 2002			September 30, 2001		
	Pension Plan	Health Plan	Total	Pension Plan	Health Plan	Total
<b>Additions:</b>						
Contributions:						
Member contributions	\$ 173,232,835	\$ 6,326,267	\$ 179,559,102	\$ 3,341,381	\$ 5,793,284	\$ 9,134,665
Employer contributions	87,486,128	257,730,817	345,216,945	112,299,808	249,214,002	361,513,810
DC Savings SubAccount			-		412,200	412,200
Total contributions	260,718,963	264,057,084	524,776,047	115,641,189	255,419,486	371,060,675
Investment income (loss):						
Investment income (loss)	(989,642,419)		(989,642,419)	(1,249,999,446)		(1,249,999,446)
Securities lending income	9,531,880		9,531,880	13,564,316		13,564,316
Interest income		1,842,164	1,842,164		1,174,367	1,174,367
Investment expenses:						
Real estate operating expenses	(110,434)		(110,434)	(423,619)		(423,619)
Securities lending expenses	(7,638,094)		(7,638,094)	(12,487,632)		(12,487,632)
Other investment expenses	(17,873,614)		(17,873,614)	(14,945,646)		(14,945,646)
Net investment income (Loss)	(1,005,732,681)	1,842,164	(1,003,890,517)	(1,264,292,027)	1,174,367	(1,263,117,660)
Miscellaneous income	245		245	1,571		1,571
<b>Total additions</b>	(745,013,473)	265,899,248	(479,114,225)	(1,148,649,267)	256,593,853	(892,055,414)
<b>Deductions:</b>						
Benefits paid to plan members and beneficiaries:						
Retirement benefits	503,453,879		503,453,879	478,525,328		478,525,328
Health benefits		257,587,230	257,587,230		229,870,026	229,870,026
Dental/vision benefits		21,411,103	21,411,103		18,376,354	18,376,354
Refunds of member contributions	4,870		4,870	14,900		14,900
Transfers to other systems	13,461		13,461	76,799		76,799
Administrative expenses	6,432,819		6,432,819	4,149,284		4,149,284
<b>Total deductions</b>	509,905,029	278,998,333	788,903,362	482,766,311	248,246,380	731,012,691
<b>Net Increase (Decrease)</b>	(1,254,918,502)	(13,099,085)	(1,268,017,587)	(1,631,415,578)	8,347,473	(1,623,068,105)
<b>Other Changes in Net Assets:</b>						
Transfers to Advanced Funding SubAccount						
	(87,486,128)	87,486,128	-			-
	(87,486,128)	87,486,128	-	-	-	-
<b>Net Assets (Liabilities) Held in Trust for Pension and Health Benefits:</b>						
<b>Beginning of Year</b>	9,616,516,845	23,027,056	9,639,543,901	11,247,932,423	14,679,583	11,262,612,006
<b>End of Year*</b>	\$ 8,274,112,215	\$ 97,414,099	\$ 8,371,526,314	\$ 9,616,516,845	\$ 23,027,056	\$ 9,639,543,901

\* A schedule of funding progress is presented in the Required Supplementary Information of the Financial Section.

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

# FINANCIAL SECTION

## Notes to Basic Financial Statements

### NOTE 1 - PLAN DESCRIPTION

#### ORGANIZATION

The Michigan State Employees' Retirement System (System) is a cost sharing, multiple-employer, state-wide, defined benefit public employee retirement plan governed by the State of Michigan (State) and created under Public Act 240 of 1943, as amended. The System was established by the State to provide retirement, survivor and disability benefits to the State's government employees. The System is a qualified trust fund under section 401(a) of the Internal Revenue Code. By statute, employees of the following employers are also covered by this plan: American Legion, American Veterans, Disabled American Veterans, Mackinac Island State Park, Marine Corps League, Michigan Bar Association, Military Order of the Purple Heart, Commission for Independent Vendors, Third Circuit Court, Records Court and 36th District Court. Michigan judges and elected officials, legislators, national guard and state police officers are covered by separate retirement plans.

The System's financial statements are included as a pension trust fund in the combined financial statements of the State.

The System is administered by the Office of Retirement Services, within the Michigan Department of Management and Budget. The Department Director appoints the Office Director who serves as Executive Secretary to the System's Board, with whom the general oversight of the System resides. The State Treasurer serves as the investment officer and custodian for the System.

#### MEMBERSHIP

At September 30, 2002 and 2001, the System's membership consisted of the following:

Retirees and beneficiaries currently receiving benefits:		
	<b>2002</b>	<b>2001 *</b>
Regular benefits	30,737	28,401
Survivor benefits	5,541	5,410
Disability benefits	3,388	3,300
<b>Total</b>	<u>39,666</u>	<u>37,111</u>
 Current employees:		
Vested	35,062	36,942
Non-vested	8,002	8,910
<b>Total</b>	<u>43,064</u>	<u>45,852</u>
 Inactive employees entitled to benefits and not yet receiving them	 7,917	 8,809
<b>Total members</b>	<u><u>90,647</u></u>	<u><u>91,772</u></u>

\* Restated based on more complete information provided by the actuary.

Enrollment in the health plan is voluntary. The number of participants is as follows:

<b>Health/Dental/Vision Plan</b>	<b>2002</b>	<b>2001</b>
Eligible participants:	<u>39,689</u>	<u>37,111</u>
 Participants receiving benefits:		
Health	36,209	33,963
Dental	35,734	33,375
Vision	35,856	33,505

# FINANCIAL SECTION

## Notes to Basic Financial Statements (Continued)

At September 30, 2002, the System recognized 23 participants in the Defined Contribution (DC) Plan who elected to retire under the Early Out Retirement program. This program provided a .25% incentive for those DC members who qualified, which will be provided by the System. These 23 participants have not been included in the pension membership schedule on the previous page.

### BENEFIT PROVISIONS

#### *Introduction*

Benefit provisions of the defined benefit pension plan are established by State statute, which may be amended. Public Act 240 of 1943, as amended, establishes eligibility and benefit provisions for the defined benefit pension plan. Retirement benefits are determined by final average compensation and years of service. Members are eligible to receive a monthly benefit when they meet certain age and service requirements. The System also provides duty disability, non-duty disability and survivor benefits.

Members who have separated from employment may request a refund of his or her member contribution account. (The System is currently non-contributory.) A refund may cancel a former member's rights to future benefits. However, former members who return to employment and who previously received a refund of their contributions may reinstate their service through repayment of the refund upon satisfaction of certain requirements.

Effective March 31, 1997, Public Act 487 of 1996 closed the plan to new entrants. All new employees become members of the defined contribution plan. The Public Act allows returning employees and members who left State employment on or before March 31, 1997, to elect the defined benefit plan instead of the defined contribution plan.

#### *Regular Retirement*

The retirement benefit is based on a member's years of credited service (employment) and final average compensation. The normal benefit equals 1.5% of a member's final average compensation multiplied by the years and partial year of credited service and is payable monthly over the member's lifetime.

Final average compensation is the average of a member's monthly pay during 36 consecutive months of credited service. The 36 consecutive month period producing the highest monthly average is used. For most members, this is the last three years of employment.

A member may retire and receive a monthly benefit after attaining:

1. age 60 with 10 or more years of credited service; or
2. age 55 with 30 or more years of credited service; or
3. age 55 with at least 15 but less than 30 years of credited service. The benefit allowance is permanently reduced 0.5% for each month from the member's age on the effective date of retirement to the date the member will attain age 60.

Employees in covered positions are eligible for supplemental benefits and may retire after attaining:

1. age 51 with 25 or more years in a covered position; or
2. age 56 with 10 or more years in a covered position.

In either case, the three years immediately preceding retirement must have been in a covered position. Employees in covered positions are responsible for the custody and supervision of inmates.

Employees of closing Department of Community Health facilities are eligible for retirement under one of the following conditions:

1. age 51 with 25 years of service, the last 5 of which were rendered in the closing facility;
2. age 56 with 10 years of service, the last 5 of which were rendered in the closing facility; or
3. 25 years of service at the closing facility regardless of age.

# FINANCIAL SECTION

## Notes to Basic Financial Statements (Continued)

Employees of the State Accident Fund, Michigan Biologic Products, or Liquor Control Commission who were terminated as the result of privatization may retire if the member's age and length of service was equal to or greater than 70 on the date of transfer or termination.

Conservation Officers (CO) with a hire date on or before April 1, 1991, are eligible to retire after 25 years of service, 20 of which must have been rendered as a CO. CO's hired after April 1, 1991 and before March 31, 1997, must have 23 years of service as a CO to be eligible for a full retirement with only 25 years of service. In either case, 2 years immediately preceding retirement must be as a CO.

### *Deferred Retirement*

Any member with 10 or more years of credited service who terminates employment but has not reached the age of retirement is a deferred member and is entitled to receive a monthly pension upon reaching age 60, provided the member's accumulated contributions have not been refunded. Deferred retirement is available after 5 years of service for State employees occupying unclassified positions in the executive and legislative branches and certain Department of Community Health employees subject to reduction in force lay-offs by reason of deinstitutionalization.

### *Non-Duty Disability Benefit*

A member with 10 or more years of credited service who becomes totally and permanently disabled not due to performing duties as a State employee is eligible for a non-duty disability pension. The non-duty disability benefit is computed in the same manner as an age and service allowance based upon service and salary at the time of disability.

### *Duty Disability Benefit*

A member who becomes totally and permanently disabled from performing duties as a State employee as a direct result of State employment and who has not met the age and service requirement for a regular pension, is eligible for a duty disability pension. If the member is under age 60, the duty disability allowance is a maximum payment of \$6,000 payable annually. At age 60 the benefit is recomputed under service retirement.

### *Survivor Benefit*

Upon the death of a member who was vested, the surviving spouse shall receive a benefit calculated as if the member had retired the day before the date of death and selected a survivor pension. Certain designated beneficiaries can be named to receive a survivor benefit.

### *Pension Payment Options*

When applying for retirement, an employee may name a person other than his or her spouse as a beneficiary if the spouse waives this right. If a beneficiary is named, the employee must choose whether the beneficiary will receive 100%, 75% or 50% of the retiree's pension benefit after the retiree's death. The decision is irrevocable. A description of the options follows.

Regular Pension — The pension benefit is computed with no beneficiary rights. If the retiree made contributions while an employee and has not received the total accumulated contributions before death, a refund of the balance of the contributions is made to the beneficiary of record. If the retiree did not make any contributions, there will not be payments to beneficiaries.

100% Survivor Pension — Under this option, after the retiree's death, the beneficiary will receive 100% of the pension for the remainder of the beneficiary's lifetime. If this option is elected, the normal retirement benefit is reduced by a factor based upon the ages of the retiree and of the beneficiary. If the beneficiary predeceases the retiree, the pension "pops-up" to the regular pension amount; another beneficiary cannot be named.

# FINANCIAL SECTION

## Notes to Basic Financial Statements (Continued)

75% Survivor Pension - Under this option, after the retiree's death, the beneficiary will receive 75% of the pension for the remainder of the beneficiary's lifetime. If this option is elected, the normal retirement benefit is reduced by a factor based upon the ages of the retiree and of the beneficiary. If the beneficiary predeceases the retiree, the pension "pops-up" to the regular pension amount; another beneficiary cannot be named.

50% Survivor Pension — Under this option, after the retiree's death, the beneficiary will receive 50% of the pension for the remainder of the beneficiary's lifetime. If this option is elected, the normal retirement benefit is reduced by a factor based upon the ages of the retiree and of the beneficiary. The reduction factor is lower than the factor used in the 100% or 75% option previously described. If the beneficiary predeceases the retiree, the pension "pops-up" to the regular pension amount; another beneficiary cannot be named.

Equated Pension — An equated pension may be chosen by any member under age 65 except a disability retiree and an early supplemental retiree. Equated pensions provide an additional amount until age 65 and may be combined with Regular, 100%, 75% or 50% option. At age 65 the monthly amount is permanently reduced. The initial and reduced amounts are based on an estimate of social security benefits at age 65, provided by the Social Security Administration Office. In order to calculate this benefit, members choosing this option must provide ORS with an estimate from the Social Security Administration Office. The actual amount received from social security may vary from the estimate.

### *Post Retirement Adjustments*

One-time upward benefit adjustments were made in 1972, 1974, 1976, 1977 and 1987. Beginning October 1, 1988, a 3% non-compounding increase, up to a maximum of \$25 monthly, is paid each October to recipients who have been retired 12 full months. Beginning in 1983, eligible benefit recipients share in a distribution of investment income earned in excess of 8% annually. This distribution is known as the supplemental payment. The supplemental payment is offset by one year's cumulative increases received after the implementation of the annual 3% increase in benefits. These adjustment payments were not issued during fiscal years 1991 through 1994. Members who retired on or after October 1, 1987, are not eligible for the supplemental payment.

### *Contributions*

Member Contributions — Members currently participate in the System on a noncontributory basis. Under certain circumstances, members may contribute to the System for the purchase of creditable service, such as military service or maternity leave, or a universal buy-in. If a member terminates the System employment before a retirement benefit is payable, the member's contribution and interest on deposit may be refunded. If the member dies before being vested, the member's contribution and interest are refunded to the designated beneficiaries.

Employer Contributions — The statute requires the employer to contribute to finance the benefits of plan members. These employer contributions are determined annually by the System's actuary and are based upon level-percent-of-payroll funding principles so the contribution rates do not have to increase over time.

### *Transfers to Defined Contribution Plan*

During fiscal year 1998, the Michigan State Employees' Retirement Act provided members an opportunity to transfer to the Defined Contribution Plan. This was a one-time opportunity and the decision is irrevocable. The transfer must have been completed by September 30, 1998. With the passage of the legislation permitting the transfer, the System also became a closed system. All new employees are members of the Defined Contribution Plan.

### *Other Postemployment Benefits*

Under the Michigan State Employees' Retirement Act, all retirees have the option of receiving health, prescription, dental, and vision coverage. The employer funds health benefits on a pay-as-you-go basis. Retirees with this coverage contribute 5% and 10% of the monthly premium amount for the health (including prescription coverage), dental and

# FINANCIAL SECTION

## Notes to Basic Financial Statements (Continued)

vision coverage, respectively. The employer's payroll contribution rate to provide this benefit was 9.0% and 8.75% for fiscal years 2002 and 2001, respectively.

Retirees are provided with life insurance coverage equal to 25% of the active life insurance coverage, \$1,000 for spouse and \$1,000 for each dependent under age 23. Premiums are fully paid by the State.

### *Early Out Retirement*

In February 2002, Governor Engler proposed an early out retirement for qualified State employees. Approximately 2,850 State employees retired by the end of fiscal year 2002 with an additional 5,160 expected to retire in fiscal year 2003. Among those members who qualify are Tier 1 (defined benefit) participants and those former members who made an election under section 50 of Public Act 240 of 1943, as amended, to terminate membership in Tier 1 and transfer to become a qualified participant in Tier 2 (defined contribution). Upon their retirement, qualified Tier 2 participants shall receive a retirement allowance equal to the member's number of years of service and fraction of a year of credited service multiplied by .25% of his or her final compensation. For purposes of this section, such individuals shall be considered members of Tier 1 for the limited purpose of receiving a retirement allowance calculated under this section and paid by the System. This allowance will be paid from employer contributions to the System.

## NOTE 2 - SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

### *Basis of Accounting and Presentation*

The System's financial statements are prepared using the accrual basis of accounting. Contributions from the State are recognized as revenue in the period in which employees provide service. Benefits and refunds are recognized when due and payable in accordance with the terms of the System.

### *Reserves*

Public Act 240 of 1943, as amended, created the employees' savings reserve, pension reserve, employer's accumulation reserve, income account and expense account, and health insurance reserve. The financial transactions of the System are recorded in these accounts as required by Public Act 240 of 1943, as amended.

Reserve for Employee Contributions — Members no longer contribute to this fund except to purchase eligible service credit or repay previously refunded contributions. This fund represents active member contributions and interest less amounts transferred to the Pension Reserve for regular and disability retirement, amounts refunded to terminated members and unclaimed amounts transferred to the income account. At September 30, 2002 and 2001, the balance in this account was \$199.5 million and \$38.9 million, respectively.

Reserve for Employer Contributions — All employer contributions are credited to this reserve. Interest from the income account is credited annually. Amounts are transferred annually from this reserve to the Pension Reserve to fund that reserve. At September 30, 2002 and 2001, the balance in this account was \$3.6 billion and \$3.5 billion, respectively.

Reserve for Retired Benefit Payments — This represents the reserves for payment of future retirement benefits to current retirees. At retirement, a member's accumulated contributions plus interest are transferred into this reserve from the Employees' Savings Reserve. Monthly benefits, which are paid to the retiree, reduce the reserve. At the end of each fiscal year, an amount determined by an annual actuarial valuation is transferred from the Employer's Accumulation Reserve to this reserve to bring the balance into balance with the actuarial present value of retirement allowances. At September 30, 2002 and 2001, the balance in this account was \$4.5 billion and \$4.5 billion, respectively.

Reserve for Undistributed Investment Income — The income account is credited with all investment earnings. Interest is transferred annually to the reserves. Administrative expenses are paid from the expense account. The legislature appropriates the funds necessary to defray and cover the administrative expenses of the System. At September 30, 2002 and 2001, the net balance of these accounts was (\$37.1 million) and \$1.6 billion, respectively.

# FINANCIAL SECTION

## Notes to Basic Financial Statements (Continued)

Reserve for Health Related Benefits — This fund is credited with employee and employer contributions for retirees' health (including prescription coverage), dental, and vision benefits and interest is allocated on the beginning balance. Premiums for health, dental, and vision benefits are paid from this fund. At September 30, 2002 and 2001, the unrestricted balance in this account was \$97.4 million and \$21.9 million, respectively.

Health Advanced Funding SubAccount — This funding sub-account was created by Public Act 93 of 2002 as a means to begin pre-funding, on an actuarial basis, health benefits for participants in the System. Any amounts received in the health advance funding sub-account and accumulated earnings on those amounts shall not be expended until the actuarial accrued liability for health benefits under section 20d of PA 93 is at least 100% funded. However, the System may also transfer an amount from the health advance funding subaccount to the employer's accumulation fund (reserve for employer contributions) under certain conditions described in the enabling legislation. At September 30, 2002, this amount was \$87.5 million. This amount represents the current year employer contributions that were transferred in fiscal year 2002 to this subaccount.

DC Savings SubAccount — The savings in employer contributions attributable to the transfer to the Defined Contribution Retirement Plan are contributed to this subaccount. The subaccount is restricted because the statute stipulates that the funds cannot be used until health benefits are fully funded. As of September 30, 2002 and 2001, the balance in this account was \$1.2 million and \$1.2 million, respectively.

### ***Reporting Entity***

The System is a pension trust fund of the State. As such, the System is considered part of the State and is included in the State's Comprehensive Annual Financial Report as a pension trust fund. The System and its Board are not financially accountable for any other entities or other organizations. Accordingly, the System is the only entity included in this financial report.

### ***Benefit Protection***

Public Act 100 of 2002 was passed by the Michigan Legislature to protect pension benefits of public employees from alienation (being transferred). Alienation is attachment, garnishment, levy, execution, bankruptcy or other legal process except for divorce orders or eligible domestic relation orders. The statutes governing the System contained an "anti-alienation" clause to provide for this protection; however, many smaller public pension systems did not have the benefit of this protection. Therefore, Public Act 100 of 2002 was passed to establish legal protection of pension assets that encompasses all public employees.

### ***Fair Value of Investments***

Plan investments are reported at fair value, except for short-term investments. Short-term investments are carried at cost, which approximates fair value. Securities traded on a national or international exchange are valued at the last reported sales price at current exchange rates. Corporate bonds not traded on a national or international exchange are based on equivalent values of comparable securities with similar yield and risk. Real estate debt is valued on the basis of future principal and interest payments, and is discounted at prevailing interest rates for similar instruments. The fair value of real estate investments is based on independent appraisals. Other investments not having an established market are recorded at estimated fair value.

### ***Investment Income***

Dividend income is recognized based on the ex-dividend date and interest income is recognized on the accrual basis as earned. Fair value changes are recorded as investment income or loss. Purchases and sales of investments are recorded as of the trade date (the date upon which the transaction is initiated), except for purchase and sale of mortgages, real estate, and alternative investments which are recorded as of the settlement date (the date upon which the transaction is ultimately completed). The effect of recording such transactions as of the settlement date does not materially affect the financial statements.

# FINANCIAL SECTION

## Notes to Basic Financial Statements (Continued)

### *Cost of Administering the System*

Each year a restricted general fund appropriation is requested to fund the on-going business operations of the System. These administrative costs are ultimately funded by the System through the regular transfer of funds from the System to the general fund appropriation based on either a direct cost or allocation basis depending on the nature of the expense.

### *Property and Equipment*

Office space is leased from the State on a year-to-year basis. Office equipment is capitalized if the value exceeds \$5,000. These assets are recorded at cost and are reported net of depreciation in the Statement of Pension and Postemployment Healthcare Plan Net Assets. Such assets are depreciated on a straight line basis over 10 years. As of September 30 1998, all capitalized equipment was fully depreciated. No additional equipment has been capitalized for the System since that date.

### *Related Party Transactions*

Leases and services — The System leases operating space and purchases certain administrative, data processing, legal and investment services from the State. The space and services are not otherwise available by competitive bid. The following summarizes costs incurred by the System for such services.

	<u>2002</u>	<u>2001</u>
Building Rentals	\$ 392,866	\$ 172,959
Technological Support	1,668,565	875,238
Attorney General	141,206	205,454
Investment Services	2,065,440	2,067,022
Personnel Services	1,760,220	1,613,756

Commitment and Contingency – The State has signed a contract with a vendor for technological support through 2004. As of September 30, 2002, the System's portion of this commitment remaining is approximately \$3.7 million.

Cash — On September 30, 2002 and 2001, the System had \$20.2 million and \$44.8 million, respectively in a common cash investment pool maintained for various State operating funds. The participating funds in the common cash pool earn interest at various rates depending upon prevailing short-term interest rates. Earnings from these activities amounted to \$.5 million and \$1.1 million for the years ended September 30, 2002 and 2001, respectively.

### *Reclassification of Prior Year Amounts*

Certain prior year amounts have been reclassified to conform with the current year presentation.

## NOTE 3 - CONTRIBUTIONS

Members currently participate in the System on a non-contributory basis. Under certain circumstances, members may contribute to the System for the purchase of creditable service such as military service or maternity leave. Effective August 1, 1998, the retirement act was amended to permit a "universal buy-in". With a universal buy-in, a member may elect to purchase no more than 5 years of service credit (less other service credit purchased). The State is required by Public Act 240 of 1943, as amended, to contribute amounts necessary to finance the benefits of its employees. Contribution provisions are specified by State statute and may be amended only by action of the State Legislature.

Periodic employer contributions to the System are determined on an actuarial basis using the entry age normal actuarial cost method. Under this method, the actuarial present value of the projected benefits of each individual included in the actuarial valuation is allocated on a level basis over the service of the individual between entry age and assumed exit age. The portion of this cost allocated to the current valuation year is called the normal cost. The remainder is called the actuarial accrued liability. Normal cost is funded on a current basis. The unfunded (overfunded) actuarial accrued liability is amortized over a 35-year period for the 2001 fiscal year and a 34-year period for the 2002 fiscal year.

# FINANCIAL SECTION

## Notes to Basic Financial Statements (Continued)

Actual employer contributions for retirement benefits were \$87.5 million and \$112.3 million for fiscal years 2002 and 2001, respectively, representing 5.0% of annual covered payroll for the year ended September 30, 2001. The fiscal year 2002 annual covered payroll is not yet available. Pursuant to Public Act 93 of 2002, a transfer was made into the Health Advance Funding SubAccount within the Health Plan in the amount of \$87.5 million. The transfer would effectively bring the Pension Plan contributions to \$0 at September 30, 2002. Required employer contributions for pensions included:

1. \$173.8 million and \$173.9 million for fiscal years 2002 and 2001, respectively, for the normal cost of pensions representing 7.8% (before reconciliation) of annual covered payroll for fiscal year 2001.
2. (\$62.3) million and (\$70.9) million for fiscal years 2002 and 2001, respectively, for amortization of overfunded actuarial accrued liability representing (3.2%) (before reconciliation) of annual covered payroll for fiscal year 2001.

The System is required to reconcile with actuarial requirements annually. Any funding excess or deficiency is smoothed over 5 years. One fifth (20%) of the funding excess or deficiency is included in the subsequent years' contribution, and is not recognized as a payable or receivable in the accounting records.

In March 2001, the Internal Revenue Service issued a private letter ruling allowing the System's members to purchase service credit and repay refunds using tax-deferred (pre-tax) dollars. The program was implemented and payments began in fiscal year 2002.

The program allows members to purchase service credit and repay refunds on a tax-deferred basis. Members sign an irrevocable agreement that identifies the contract duration, monthly payment, total contract amount and years of service credit being purchased. The duration of the contract can range from 1 to 20 years. The amounts are withheld from the members' paycheck and are treated as employer pick-up contributions pursuant to Internal Revenue Code Section 414(h). At September 30, 2002, there were 4,195 agreements. Agreement amounts that will not be collected within 12 months are discounted using the assumed actuarial rate of return of 8%. The average length of a contract was approximately 11.5 years for 2002. The short-term receivable was \$12.2 million and the discounted long-term receivable was \$36.1 million at September 30, 2002.

## NOTE 4 – INVESTMENTS

### *Risks and Uncertainties*

The System's investments are exposed to various risks, such as interest rate, market, credit, and other. Due to these various risks, it is at least reasonably possible that changes in market values will occur in the near term and that such changes could materially affect the System and the amount reported in the statement of net assets as available for benefits.

### *Investment Authority*

Under Public Act 380 of 1965, as amended, the authority for the purchase and the sale of investments resides with the State Treasurer. Investments are made subject to the Michigan Public Pension Investment Act, Public Act 314 of 1965, as amended. The Michigan Public Pension Investment Act authorizes, with certain restrictions, the investment of pension fund assets in stock, corporate and government bonds and notes, mortgages, real estate, and certain short-term and alternative investments. Investments must be made for the exclusive purposes of providing benefits to active members, retired members and beneficiaries, and for defraying the expenses of investing the assets.

Under Public Act 314 of 1965, as amended, the State Treasurer may invest up to 5.0% of the System's assets in small businesses having more than one-half of its assets or employees in Michigan as described in section 20(a) of the act and up to 20.0% of the System's assets in investments not otherwise qualified under the act as described in section 20(d). Alternative investments include limited partnerships and distributions from these partnerships in the form of bonds, preferred stock, common stock, and direct investments.

# FINANCIAL SECTION

## Notes to Basic Financial Statements (Continued)

### Derivatives

The State Treasurer does not employ the use of derivatives in the investment of Common Cash or the investment of trust funds other than the pension trust funds.

Derivatives are used in managing pension trust fund portfolios, but uses do not include speculation or leverage of investments. Less than 8.0% of the total pension trust fund's portfolio has been invested from time to time in future contracts, collateralized mortgages, and swap agreements. State investment statutes limit total derivative exposure to 15.0% of a fund's total asset value, and restrict uses to replication of returns and hedging of assets. Swap agreements represent the largest category of derivatives used, and they represented 7.5% of market value of total assets on September 30, 2002, and 6.5% of market value of total assets on September 30, 2001.

To diversify the pension fund's portfolio into international equities, the State Treasurer has entered into swap agreements with investment grade counterparties, which are tied to stock market indices in twenty-three foreign countries. The notional amounts of the swap agreements at September 30, 2002 and 2001, were \$854.4 million and \$776.8 million, respectively. Approximately one half of the notional amount is hedged against foreign currency fluctuations. The swap agreements provide that the System will pay quarterly, over the term of the swap agreements, interest indexed to the three month London InterBank Offer Rate (LIBOR), adjusted for an interest rate spread, on the notional amount stated in the agreements. At the maturity of the swap agreements, the pension fund will either receive the increase in the value of the international equity indices from the level at the inception of the agreements, or pay the decrease in the value of the indices. Swap agreement maturities range from October 2002 to September 2005. U.S. domestic LIBOR based floating rate notes were purchased in the open market to correspond with the notional amount of the swap agreements. The State Treasurer maintains custody and control of these notes.

The value of these synthetic equity structures is a combination of the value of the swap agreements and the value of the notes. The book value represents the cost of the notes. The current value represents the current value of the notes and the change in value of the underlying indices from the inception of the swap agreements. The current value is used as a representation of the fair value based upon the intention to hold all swap agreements until maturity. Since the inception of the international equity investment program, over \$212.2 million of gains on international equity exposure and excess interest received have been realized. The unrealized loss of \$276.2 million at September 30, 2002, reflects the decline in international stock indices and changes in currency exchange rates. Many of the international indices peaked in 1999 and 2000, and the combined swap structure realizes gains and losses on a rolling three-year basis.

To complete domestic market exposure, in June 2002, the State Treasurer entered into two swap agreements, which are tied to the S&P 600 Small Cap index. The notional and current values of these swaps are \$20.8 and \$15.7, in millions, respectively, as of September 30, 2002.

The unrealized loss of \$5 million on September 30, 2002, reflects the decline in the S&P 600 Small Cap index due to market conditions. The swap agreements provide that the System will pay quarterly, over the term of the swap agreements, interest indexed to the three month LIBOR, adjusted for an interest rate spread, on the notional amount stated in the agreements. At the maturity of the swap agreements, the pension fund will either receive the increase in the value of the international equity indices from the level at the inception of the agreements, or pay the decrease in the value of the index. U.S. domestic LIBOR based floating rate notes were purchased in the open market to correspond with the notional amount of the swap agreements. The State Treasurer maintains custody and control of these notes.

The respective September 30, 2002 and 2001 values are as follows:

	<u>Notional Value</u>	<u>Current Value</u>
9/30/2002 (dollars in millions)	\$ 875.1	\$ 599.3
9/30/2001 (dollars in millions)	776.8	614.9

The amounts shown for September 30, 2002 reflect both the total international swap exposure, and the smaller derivative exposure to the S&P 600.

# FINANCIAL SECTION

## Notes to Basic Financial Statements (Continued)

### *Investments Exceeding 5% of Plan Net Assets*

The System did not hold an individual investment (other than U.S. Government securities) that exceeded 5% of net assets available for benefits at September 30, 2002 or 2001.

### *Securities Lending*

State statutes allow the System to participate in securities lending transactions, and the System has, via a Securities Lending Authorization Agreement, authorized the agent bank to lend its securities to broker-dealers and banks pursuant to a form of loan agreement.

During the fiscal year, the agent bank lent, at the direction of the System, the System's securities and received cash (United States and foreign currency), securities issued or guaranteed by the United States government, sovereign debt rated A or better, convertible bonds and irrevocable bank letters of credit as collateral. The agent bank did not have the ability to pledge or sell collateral securities delivered absent a borrower default. Borrowers were required to deliver collateral for each loan equal to (i) at least 102% of the market value of the loaned securities in the case of loaned securities denominated in the United States dollars or whose primary trading market was located in the United States or sovereign debt issued by foreign governments or (ii) 105% of the market value of the loaned securities in the case of loaned securities not denominated in the United States dollars or whose primary trading market was not located in the United States.

The System did not impose any restrictions during the fiscal year on the amount of the loan that the agent bank made on its behalf. There were no failures by any borrowers to return loaned securities or pay distributions thereon during the fiscal year. Moreover, there were no losses during the fiscal year resulting from a default of the borrowers or the agent bank.

During the fiscal year, the System and the borrowers maintained the right to terminate all securities lending transactions on demand. The cash collateral received on each loan was invested, together with the cash collateral of other qualified tax-exempt plan lenders, in a collective investment pool. As of September 30, 2002, such investment pool had an average duration of 66 days and an average weighted maturity of 471 days. Because the loans were terminable at will their duration did not generally match the duration of the investments made with cash collateral. On September 30, 2002, the System had no credit risk exposure to borrowers. The collateral held and the market value of securities on loan for the System as of September 30, 2002, were \$372,373,929 and \$359,190,426, respectively.

Gross income from security lending for the fiscal year was \$9,531,880. Expenses associated with this income amounted to \$6,999,195 for the borrower's rebate and \$638,899 for fees paid to the agent.

### *Categories of Investment Risk*

Investments made by the fund are summarized on the following page. The investments represented by specific identifiable investment securities are classified as to credit risk in three categories.

Category 1 includes investments insured, registered, or held by the System or its agent in the System's name. Category 3 includes uninsured and unregistered investments held by the counterparty, its trust department, or agent, but not in the System's name.

At September 30, 2002, all investments of the System were classified as Category 1 or Category 3, except for certain investments not categorized.

The table on the following page summarizes the investments at market value:

# FINANCIAL SECTION

## Notes to Basic Financial Statements (Continued)

<u>Category 1</u>	<u>2002</u>	<u>2001</u>
Prime Commercial Paper	\$ 136,852,909	\$ 535,584,944
Short Term Investments	-	41,750,000
Government Securities	958,640,783	691,758,129
Corporate Bonds & Notes	797,838,148	968,730,878
Preferred Stock	272,173	404
Common Stock	3,289,089,619	3,847,799,644
Real Estate	-	20,612,208 <sup>1</sup>
Alternative Investments	15,875,556	62,379,491 <sup>3</sup>
International Investments	599,320,743	631,403,802
<b>Total Category 1</b>	<b>\$ 5,797,889,931</b>	<b>\$ 6,800,019,500</b>
<u>Category 3</u>		
Government Securities	\$ 20,750,001	\$ 16,953,788
<u>Non-Categorized</u>		
Short Term Investments	\$ -	\$ 21,000,000 <sup>2</sup>
Mortgages	1,733,430	4,467,432
Real Estate	869,008,086	917,920,406 <sup>1</sup>
Alternative Investments	1,203,780,190	1,432,837,342 <sup>3</sup>
International Investments	19,900,991	
Cash Collateral	366,352,026	408,715,028
Securities on Loan:		
Government Securities	210,540,069	299,789,594
Corporate Bonds & Notes	19,758,862	12,545,603
Common Stock	123,324,539	84,088,480
<b>Total Non-Categorized</b>	<b>\$ 2,814,398,193</b>	<b>\$ 3,181,363,885</b>
<b>Grand Total</b>	<b>\$ 8,633,038,125</b>	<b>\$ 9,998,337,173</b>

<sup>1</sup> In Category 1, the Real Estate investments are all publicly traded real estate investment trusts. Non-Categorized Real Estate consists of investments through various legal entities.

<sup>2</sup> Non-Categorized Short-Term Investments relate to an STIF (Short-Term Investment Fund).

<sup>3</sup> In Category 1, the Alternative Investments are small-cap equities. Non-Categorized Alternative Investments consist of limited partnerships.

## NOTE 5 - COMMITMENTS AND CONTINGENCIES

Under the Administrative Procedures Act, members may appeal a decision made by the Board. Once the administrative procedure has been exhausted, the decision may be appealed in Michigan's court system. Various cases that have exhausted the administrative procedures have been appealed in the court system. These cases are in the normal course of business and the System does not anticipate any material loss as a result of the contingent liabilities.

## Required Supplementary Information

### Schedule of Funding Progress

Expressing the net assets available for benefits as a percentage of the actuarial accrued liability provides one indication of the System's funding status. Analysis of this percentage over time indicates whether the System is becoming financially stronger or weaker. Generally, the greater this percentage, the stronger the System. Trends in unfunded actuarial accrued liability and annual covered payroll are both affected by inflation. Expressing the unfunded or overfunded actuarial accrued liability as a percentage of annual covered payroll approximately adjusts for the effects of inflation and aids analysis of progress made in accumulating sufficient assets to pay benefits when due. Generally, the smaller this percentage, the stronger the System.

#### Retirement Benefits (\$ in Millions)

Valuation Date Sept 30	Actuarial Value of Assets (a)	Actuarial Accrued Liability <sup>(1)</sup> (AAL) Entry Age (b)	Unfunded (Overfunded) Accrued Liability (UAAL) (b-a)	Funded Ratio AAL (a/b)	Covered Payroll (c)	UAAL as a % of Covered Payroll ((b-a)/c)
1992	\$4,534	\$5,480	\$946	82.7 %	\$2,266	41.8 %
1993 <sup>(2)</sup>	5,044	6,173	1,129	81.7	2,261	49.9
1994 <sup>(4)</sup>	5,476	6,560	1,084	83.5	2,351	46.1
1995	6,090	6,861	771	88.8	2,431	31.7
1996	6,678	7,147	469	93.4	2,515	18.7
1997	7,516	8,213	697	91.5	2,273	30.7
1997 <sup>(3)</sup>	8,834	8,101	(733)	109.0	2,273	(32.2)
1998	9,109	8,374	(735)	108.8	2,108	(34.9)
1998 <sup>(3)</sup>	9,109	8,497	(612)	107.2	2,108	(29.0)
1999	9,648	9,029	(619)	106.9	2,214	(28.0)
2000	10,337	9,474	(863)	109.1	2,254	(38.3)
2001	10,633	9,878	(755)	107.6	2,231	(33.8)

<sup>(1)</sup> Based on entry age normal actuarial method.

<sup>(2)</sup> Revised asset valuation method.

<sup>(3)</sup> Revised actuarial assumptions and revised asset valuation method.

<sup>(4)</sup> Revised actuarial assumptions.

# FINANCIAL SECTION

## Required Supplementary Information (Continued)

### Schedule of Employer Contributions

<u>Fiscal Year Ended Sept. 30</u>	<u>Actuarial Required Contribution (ARC)</u>	<u>Actual Contribution</u>	<u>Percentage Contributed</u>
1993	\$ 219,912,052	\$ 247,047,499	112.3 %
1994	230,231,706	263,791,739	114.6
1995	260,769,716	306,488,437	117.5
1996	262,458,665	285,766,953	108.9
1997	244,102,003	288,366,799	118.1
1998	126,396,181	145,734,677	115.3
1999	111,415,984	121,119,857	108.7
2000	120,906,261	121,817,366	100.8
2001	102,989,963	112,299,808	109.0
2002	111,551,549	87,486,128 *	78.4

\* Employer contributions for fiscal year 2002 were transferred at year-end into the Advanced Health Funding SubAccount established under Public Act 93 of 2002. PA 93 states in part that, "For each fiscal year that begins on or after October 1, 2001, if the actuarial valuation prepared ... demonstrates that as of the beginning of the fiscal year, and after all credits and transfers required by this act for the previous fiscal year have been made ... the annual level percent of payroll contribution rate ... may (emphasis added) be deposited into the health advance funding subaccount..." Pursuant to this legislation, a transfer was made into the subaccount in the amount of \$87.5 million. The transfer would effectively bring the contribution percentage to 0.0% for the fiscal year ended September 30, 2002.

# FINANCIAL SECTION

## Notes to Required Supplementary Information

### NOTE A - DESCRIPTION

Ten year historical trend information designed to provide information about the System's progress made in accumulating sufficient assets to pay benefits when due is presented in the preceding schedules. Other ten year historical trend information related to the System is presented in the Statistical and Actuarial Sections of the report. This information is presented to enable the reader to assess the progress made by the System in accumulating sufficient assets to pay pension benefits as they become due.

The comparability of trend information is affected by changes in actuarial assumptions, benefit provisions, actuarial funding methods, accounting policies, and other changes. Those changes usually affect trends in contribution requirements and in ratios that use the pension benefit obligation as a factor.

The Schedule of Funding Progress and Schedule of Employer Contributions are reported as historical trend information. The Schedule of Funding Progress is presented to measure the progress being made to accumulate sufficient assets to pay benefits when due. The Schedule of Employer Contributions is presented to show the responsibility of the Employer in meeting the actuarial requirements to maintain the System on a sound financial basis.

### NOTE B - SUMMARY OF ACTUARIAL ASSUMPTIONS

The information presented in the required supplementary schedules was determined as part of the actuarial valuations at the dates indicated. Additional information as of the latest actuarial valuation follows:

Valuation Date	9/30/2001
Actuarial Cost Method	Entry Age, Normal
Amortization Method	Level Percent of Payroll, Closed
Remaining Amortization Period	35 years
Asset Valuation Method	5-Year Smoothed Market
Actuarial Assumptions:	
Inflation Rate	4%
Investment Rate of Return	8%
Projected Salary Increases	4% - 16%
Cost-of-Living Adjustments	3% Annual Non-Compounded with Maximum Annual Increase of \$300 for those eligible

# FINANCIAL SECTION

## Supporting Schedules

### Comparative Summary Schedule of Pension Plan Administrative Expenses For the Years Ended September 30, 2002 and 2001

	<u>2002</u>	<u>2001</u>
<b>Personnel Services:</b>		
Staff Salaries	\$ 1,403,102	\$ 1,168,426
Retirement and Social Security	194,325	249,401
Other Fringe Benefits	<u>162,793</u>	<u>195,929</u>
<b>Total</b>	<u>1,760,220</u>	<u>1,613,756</u>
<b>Professional Services:</b>		
Actuarial	97,919	123,102
Attorney General	141,206	205,454
Audit	38,446	25,523
Consulting	138,191	164,469
Medical	<u>376,780</u>	<u>370,410</u>
<b>Total</b>	<u>792,542</u>	<u>888,958</u>
<b>Building Equipment</b>		
Building Rentals	392,866	172,959
Equipment Purchase, Maintenance, and Rentals	<u>221,192</u>	<u>55,236</u>
<b>Total</b>	<u>614,058</u>	<u>228,195</u>
<b>Miscellaneous:</b>		
Travel and Board Meetings	10,860	14,789
Office Supplies	33,377	29,220
Postage, Telephone and Other	1,457,627	452,618
Printing	95,570	46,510
Technological Support	<u>1,668,565</u>	<u>875,238</u>
<b>Total</b>	<u>3,265,999</u>	<u>1,418,375</u>
<b>Total Administrative Expenses</b>	<u><u>\$ 6,432,819</u></u>	<u><u>\$ 4,149,284</u></u>

**Supporting Schedules (Continued)**

**Schedule of Investment Expenses**

	<u>2002</u>	<u>2001</u>
Real Estate Operating Expenses	\$ 110,434	\$ 423,619
Securities Lending Expenses	7,638,094	12,487,632
Other Investment Expenses*	<u>17,873,614</u>	<u>14,945,646</u>
<b>Total Investment Expenses</b>	<b><u>\$ 25,622,142</u></b>	<b><u>\$ 27,856,897</u></b>

\* See Investment Section for fees paid to investment professionals

**Schedule of Payments to Consultants**

	<u>2002</u>	<u>2001</u>
Independent Auditors	\$ 38,446	\$ 25,523
Consulting	138,191	164,469
Medical	376,780	370,410
Attorney General	141,206	205,454
Actuary	<u>97,919</u>	<u>123,102</u>
<b>Total Payment to Consultants</b>	<b><u>\$ 792,542</u></b>	<b><u>\$ 888,958</u></b>

# FINANCIAL SECTION

## Supporting Schedules (Continued)

### Detail of Changes in Plan Net Assets (Pension and Postemployment Healthcare Benefits) For the Year Ended September 30, 2002

	Employee Contributions	Employer Contributions	Retired Benefit Payments	Undistributed Investment Income	Health Related Benefits *	Total
<b>Additions:</b>						
Contributions:						
Member contributions	\$ 173,232,835				\$ 6,326,267	\$ 179,559,102
Employer contributions		\$ 87,486,128			257,730,817	345,216,945
Total Contributions	<u>173,232,835</u>	<u>87,486,128</u>	<u>-</u>	<u>-</u>	<u>264,057,084</u>	<u>524,776,047</u>
Investment income (loss):						
Investment income (loss)				\$ (989,642,419)		(989,642,419)
Securities lending income				9,531,880		9,531,880
Interest Income					1,842,164	1,842,164
Investment expenses:						
Real estate operating expenses				(110,434)		(110,434)
Securities lending expenses				(7,638,094)		(7,638,094)
Other investment expenses				(17,873,614)		(17,873,614)
Net investment income (loss)	<u>-</u>	<u>-</u>	<u>-</u>	<u>(1,005,732,681)</u>	<u>1,842,164</u>	<u>(1,003,890,517)</u>
Miscellaneous income				245		245
<b>Total additions</b>	<u>173,232,835</u>	<u>87,486,128</u>	<u>-</u>	<u>(1,005,732,436)</u>	<u>265,899,248</u>	<u>(479,114,225)</u>
<b>Deductions:</b>						
Benefits paid to plan members and beneficiaries:						
Retirement benefits			\$ 503,453,879			503,453,879
Health benefits					257,587,230	257,587,230
Dental/vision benefits					21,411,103	21,411,103
Refunds of member contributions	4,870					4,870
Transfers to other systems	13,461					13,461
Administrative expenses				6,432,819		6,432,819
<b>Total deductions</b>	<u>18,331</u>	<u>-</u>	<u>503,453,879</u>	<u>6,432,819</u>	<u>278,998,333</u>	<u>788,903,362</u>
<b>Net Increase (Decrease)</b>	<u>173,214,504</u>	<u>87,486,128</u>	<u>(503,453,879)</u>	<u>(1,012,165,255)</u>	<u>(13,099,085)</u>	<u>(1,268,017,587)</u>
<b>Other Changes in Net Assets:</b>						
Interest allocation	850,368	276,514,424	360,653,781	(638,018,573)		-
Transfers upon retirement	(13,475,963)		13,475,963			-
Transfers of Health Advanced Funding SubAccount		(87,486,128)			87,486,128	-
Transfers of employer shares		(168,975,042)	168,975,042			-
<b>Total other changes in     net assets</b>	<u>(12,625,595)</u>	<u>20,053,254</u>	<u>543,104,786</u>	<u>(638,018,573)</u>	<u>87,486,128</u>	<u>-</u>
<b>Net Increase (Decrease) After Other Changes</b>	<u>160,588,909</u>	<u>107,539,382</u>	<u>39,650,907</u>	<u>(1,650,183,828)</u>	<u>74,387,043</u>	<u>(1,268,017,587)</u>
<b>Net Assets (Liabilities) Held in Trust for Pension and Health Benefits:</b>						
<b>Beginning of Year</b>	<u>38,900,689</u>	<u>3,456,430,296</u>	<u>4,508,172,265</u>	<u>1,613,013,595</u>	<u>23,027,056</u>	<u>9,639,543,901</u>
<b>End of Year</b>	<u>\$ 199,489,598</u>	<u>\$ 3,563,969,678</u>	<u>\$ 4,547,823,172</u>	<u>\$ (37,170,233)</u>	<u>\$ 97,414,099</u>	<u>\$ 8,371,526,314</u>

\* Includes Health Advance Funding SubAccount

# FINANCIAL SECTION

## Supporting Schedules (Continued)

### Detail of Changes in Plan Net Assets (Pension and Postemployment Healthcare Benefits) For the Year Ended September 30, 2001

	Employee Contributions	Employer Contributions	Retired Benefit Payments	Undistributed Investment Income	Health Related Benefits	Total
<b>Additions:</b>						
Contributions:						
Member contributions	\$ 3,341,381				\$ 5,793,284	\$ 9,134,665
Employer contributions		\$ 112,299,808			249,214,002	361,513,810
DC Savings SubAccount					412,200	412,200
Total Contributions	3,341,381	112,299,808	-	-	255,419,486	371,060,675
Investment income (loss):						
Investment income (loss)				\$ (1,249,999,446)		(1,249,999,446)
Securities lending income				13,564,316		13,564,316
Interest Income					1,174,367	1,174,367
Investment expenses:						
Real estate operating expenses				(423,619)		(423,619)
Securities lending expenses				(12,487,632)		(12,487,632)
Other investment expenses				(14,945,646)		(14,945,646)
Net investment income (loss)	-	-	-	(1,264,292,027)	1,174,367	(1,263,117,660)
Miscellaneous income				1,571		1,571
<b>Total additions</b>	3,341,381	112,299,808	-	(1,264,290,456)	256,593,853	(892,055,414)
<b>Deductions:</b>						
Benefits paid to plan members and beneficiaries:						
Retirement benefits			\$ 478,525,328			478,525,328
Health benefits					229,870,026	229,870,026
Dental/vision benefits					18,376,354	18,376,354
Refunds of member contributions	14,900					14,900
Transfers to other systems	24,644	52,155				76,799
Administrative expenses				4,149,284		4,149,284
<b>Total deductions</b>	39,544	52,155	478,525,328	4,149,284	248,246,380	731,012,691
<b>Net Increase (Decrease)</b>	3,301,837	112,247,653	(478,525,328)	(1,268,439,740)	8,347,473	(1,623,068,105)
<b>Other Changes in Net Assets:</b>						
Interest allocation	1,256,495	264,466,019	354,656,980	(620,379,494)		-
Transfers upon retirement	(4,787,481)		4,787,481			-
Transfers of Health Advanced Funding SubAccount						-
Transfers of employer shares		(226,108,610)	226,108,610			-
<b>Total other changes in     net assets</b>	(3,530,986)	38,357,409	585,553,071	(620,379,494)	-	-
<b>Net Increase (Decrease) After Other Changes</b>	(229,149)	150,605,062	107,027,743	(1,888,819,234)	8,347,473	(1,623,068,105)
<b>Net Assets (Liabilities) Held in Trust for Pension and Health Benefits:</b>						
<b>Beginning of Year</b>	39,129,838	3,305,825,234	4,401,144,522	3,501,832,829	14,679,583	11,262,612,006
<b>End of Year</b>	\$ 38,900,689	\$ 3,456,430,296	\$ 4,508,172,265	\$ 1,613,013,595	\$ 23,027,056	\$ 9,639,543,901

# INVESTMENT SECTION

Prepared by Michigan Department of Treasury, Bureau of Investments  
Roy A. Pentilla, Acting Director

Report on Investment Activity  
    Asset Allocation  
        Investment Results  
List of Largest Stock Holdings  
List of Largest Bond Holdings  
    Schedule of Investment Fees  
Schedule of Investment Commissions  
    Investment Summary

# INVESTMENT SECTION

## Report on Investment Activity

### INTRODUCTION

The State Treasurer reports quarterly the investment activity to the Investment Advisory Committee, which reviews the investments, goals and objectives of the retirement funds and may submit recommendations regarding them to the State Treasurer. The Investment Advisory Committee may also, by a majority vote, direct the State Treasurer to dispose of any holdings that, in the Committee's judgment, are not suitable for the funds involved, and may, by unanimous vote, direct the State Treasurer to make specific investments.

The Investment Advisory Committee was created by Act 380 of the Public Acts of 1965. The three public members of the five-member committee are appointed by the Governor with the advice and consent of the Senate for three-year terms. The Director of the Department of Consumer and Industry Services and the Director of the Department of Management and Budget are ex-officio members. The members of the committee are as follows: James B. Henry, PHD (public member), Robert E. Swaney, CFA (public member), David G. Sowerby (public member), Noelle Clark (ex-officio member), and Duane E. Berger (ex-officio member). The public members serve without pay, but are paid actual and necessary travel and other expenses.

### INVESTMENT POLICY & GOAL

The primary function of the System is to provide retirement, survivor and disability benefits to its members. The State Treasurer is the sole investment fiduciary and custodian of the System's investments pursuant to State law. The primary investment objective is to maximize the rate of return on the total investment portfolio, consistent with a high degree of prudence and sufficient diversity to eliminate inordinate risks and to meet the actuarial assumption for the investment rate of return, at a reasonable cost achieved by cultivating a motivated team of dedicated professionals. The goals of the fund are:

1. Assure the availability of sufficient assets to pay benefits.
2. Achieve the optimal rate of return possible within prudent levels of risk and liquidity.
3. To outperform the actuarial assumption over the long term.
4. To perform in the top half of the Capital Resource Advisors public plan universe.
5. To exceed individual asset class benchmarks over the long term.
6. To produce competitive results while operating in a cost-effective manner relative to peers.
7. Maintain sufficient diversification to avoid large losses and preserve capital.

The strategy for achieving these goals is carried out by investing the assets of the System according to a five-year asset allocation model. The System currently has six different asset classes, which provides for a well-diversified portfolio.

#### Asset Allocation (Excludes Collateral on Loaned Securities)

<u>Investment Category</u>	<u>As of 9/30/02 Actual %</u>	<u>Five-Year Target %</u>
International Equities-Passive	7.5%	9.0%
Real Estate	10.5%	9.0%
Alternative Investments	14.7%	10.0%
Short Term Investments	1.9%	1.0%
Fixed Income	24.2%	21.0%
Domestic Equity	41.2%	50.0%
TOTAL	<u>100.0%</u>	<u>100.0%</u>

# INVESTMENT SECTION

## Report on Investment Activity (Continued)

### STATE LAW

Pursuant to State Law (Section 91 of Act No. 380 of the Public Acts of 1965, as amended), the State Treasurer is the investment fiduciary for the following four State sponsored retirement systems: Michigan Public School Employees' Retirement System; Michigan State Employees' Retirement System; Michigan State Police Retirement System; and Michigan Judges' Retirement System.

Act No. 314 of the Public Act of 1965, as amended, authorizes the investment of assets of public employee retirement systems or plans created and established by the State or any political subdivision.

### PROXY VOTING POLICY

The System's Proxy Voting Policy sets forth directives on the following issues: Board of Directors, corporate governance, social issues, corporate restructures and defenses. All proxies are reviewed and voted in accordance with the above mentioned items.

### INVESTMENT RESULTS

#### *Total Portfolio Result*

For the fiscal year ended September 30, 2002, the total portfolio returned -10.3% as compiled by Capital Resource Advisors. Annualized for the three-year period, the fund returned -3.1%; for the five-year period, the fund returned 2.8%; and for the ten-year period, the fund returned 8.0%.

During the fiscal year ending September 30, 2002, the nation's economy experienced a slow economic recovery and reduced consumer spending with corporate earnings slowly recovering. The real economy is doing better than the financial markets. Uncertainty caused by the possibility of war in Iraq and the frauds and accounting irregularities are all negatively impacting the markets.

As a result of the economic conditions, the broad based S&P 500 index declined -20.5% over the fiscal year with the Dow Jones Industrial Average off -12.5%. Growth stocks outperformed value stocks during this period. Given an accommodative Federal Reserve, the Lehman Brothers Government/Corporate bond index appreciated 9.2%.

The returns were calculated using a time-weighted rate of return in accordance with standards of the Association for Investment Management and Research (AIMR), unless a modification is described in the discussion of the return.

The System is well-diversified among asset classes. As of September 30, 2002, the portfolio consisted of 41.2% domestic equities, 24.2% fixed income, 14.7% alternative investments, 10.5% real estate, 1.9% short-term investments, and 7.5% international equities.

#### *Domestic Stocks - Active*

The objective of actively managed domestic stock investments is long-term capital appreciation by investing in publicly traded stocks of primarily U.S.-based companies. Monies are invested in a portfolio of large company value stocks and a portfolio of large company growth stocks. Since historical rates of return for value and growth strategies have been negatively correlated, this allows for further diversification and focused selection of investments. Value investing derives its returns from the market's tendency to periodically undershoot a stock's fair value and then eventually corrects to fair value. Growth stock returns accrue from longer-term broad themes from which companies evolve that will grow faster than the economy. Both portfolios are diversified among various securities and industries.

The U.S. economy began fiscal year 2002 on the heels of a recession marked by three consecutive quarters of negative real GDP and reeling from the terrorist attacks of September 11, 2001. Corporate earnings continued the double-digit declines begun in fiscal 2001, finally showing positive comparisons in the quarter ending March of 2002. The Federal

# INVESTMENT SECTION

## Report on Investment Activity (Continued)

Reserve lowered rates four times between September 2001 and December 2001, taking the Federal Funds rate from 3.50% to 1.75%. Inflation, as measured by the CPI, remained subdued at an annualized rate of 1.5%. Interest rates plummeted, with ten-year U.S. Treasury notes yielding 3.60% by the end of fiscal 2002 compared to 4.59% at the beginning of the fiscal year. A number of retailers even offered 0% financing.

The U.S. economy staged a modest recovery and U.S. equity markets bounced back remarkably from the lows reached after the events of September 11, 2001. However, incessant news of accounting fraud and management scandals, combined with escalating fears of military action against Iraq, rocked the equity markets throughout the remainder of the year. Total return for the Dow Jones Industrial Average was -12.5% for the 12 months ending September 2002, while return for the broader S&P 500 was -20.5%. The NASDAQ's price fell by 21.8% during the fiscal year.

The System's large company Value portfolio achieved a total rate of return of -15.0% for fiscal 2002. This compared favorably with -22.2% for the S&P 500 BARRA Value Index due to the fund's investment in defense and financial stocks and little exposure to technology and telecommunication stocks. The large company Growth portfolio's total rate of return was -25.4% for the fiscal year versus -19.3% for the S&P 500 BARRA Growth Index. Relative underperformance can be attributed to positioning the portfolio for strong economic and market recoveries that failed to materialize before the end of the fiscal year. Because these two portfolios were created effective January 31, 2000, three-year or five-year rates of return are not available.

On a consolidated basis, the actively managed large company domestic stock portfolio had a total rate of return of -20.3% for fiscal year 2002 compared to -20.5% for the S&P 500 Index. Three-year and five-year annualized returns were -11.4% and -2.1%. This compared with -12.9% and -1.6% for the S&P 500.

At the close of fiscal year 2002, large company value stocks represented 13.7% of total investments versus 13.8% at the end of fiscal 2001. Large company growth stocks represented 13.2% of total investments versus 13.0% at the end of fiscal 2001. Consolidated actively managed large company domestic stocks represented 26.9% of total investments, compared to 26.8% at the end of fiscal year 2001.

The System established an investment position with the small company growth managers at Delaware Investment Advisors (Delaware) and Putnam Investments (Putnam). An initial investment of \$10.5 million was placed with each of these managers as of October 1, 2001.

The System's small company growth portfolio invested with Delaware achieved a total rate of return of -8.0% for fiscal 2002. This compares favorably with -18.2% for the Russell 2000 Growth Index. An underweight and positive selectivity in the technology sector provided much of the outperformance. This positive result was partially offset by underperformance in the consumer/retail sector in which the fund had an overweight position.

The System's small company growth portfolio invested with Putnam achieved a total rate of return of -18.5% for fiscal 2002. This compares with -18.2% for the Russell 2000 Growth Index. Performance was negatively impacted by two sectors: financials in which the portfolio was under weighted and technology in which underperformance was the culprit. This was offset somewhat by strength in the portfolio's investments in consumer cyclicals.

At the close of fiscal year 2002, small company growth stocks represented 0.22% of total investments.

### ***Domestic Stocks - Passive***

The objective of the enhanced S&P 500 and S&P MidCap Index Funds is to closely match the return performance of their benchmarks, and use low risk strategies to offset transaction costs and add to performance when possible. The S&P 500 Index Fund return for the fiscal year was -20.0% versus the benchmark's -20.5%. The S&P MidCap Index Fund return for the fiscal year was -4.9% versus its benchmark's -4.7%. The relative enhancement S&P 500 Index Fund Return was the result of strategic allocations of additional funds to passive equity investments during market corrections and the opportunistic use of derivative programs. During fiscal year 2002, \$49.9 million was added to U.S. index funds. An S&P Small Cap Index Fund was established in June of 2002 to match the return of that targeted benchmark. At the end of the fiscal year, passive domestic stock portfolios represented 14.1% of total assets, the S&P

# INVESTMENT SECTION

## Report on Investment Activity (Continued)

500 Index Fund accounting for 12.5%, the S&P MidCap Index Fund 1.4%, and the S&P Small Cap Index fund 0.2% of total investment assets. Indexed stock portfolios represented 14.1% of total investment assets at the end of the prior fiscal year.

### *International Equities – Passive*

The objective of passive international equity portfolios is to match the return performance of the Salomon Smith Barney Broad Market Index (BMI) Europe and Pacific Composite (EPAC) adjusted for net dividends. Fifty percent of the benchmark is hedged to the U.S. Dollar and the other half is impacted by foreign currency exchange rate changes. The total passive international return of -16.0% in the fiscal year approximately matched the Salomon Smith Barney BMI-EPAC return of -15.5%. The passive international return of -12.2% for three years approximately matched the benchmark's return of -12.3% over the same period.

Core passive exposure to international equity returns is achieved primarily by investing in a combination of fixed income notes and equity swap agreements on foreign stock indices in developed markets. Interest on the dedicated notes is exchanged for international stock returns, and the total notional amount of the swap agreements is invested in the approximate proportions of the Salomon Smith Barney Broad Market Index (BMI) Europe and Pacific Composite (EPAC) country weightings in related indices. Use of swap agreements for a core position began in 1993, an American Depository Receipts (ADR) and index-related security portfolio was added in June of 1999 to increase management flexibility, and a country fund portfolio was added in September of 2002 to improve exposure to the smallest companies in the BMI index. During fiscal year 2002, \$111.3 million of exposure was added, raising passive international investments to 7.5% of total investment assets.

The combination of fixed income LIBOR notes and equity swap agreements was valued at \$583.6 million on September 30, 2002. That valuation included a net unrealized loss of \$276.2 million on equity index exposures and an unrealized gain of \$ 3.1 million on LIBOR note investments held. The combined swap agreement and LIBOR portfolio structure continues to perform like a stock index fund that realizes all gains and losses on a rolling three-year basis. During fiscal year 2002, \$24.1 million of losses on equity exposures were realized, \$8.3 million of interest in excess of obligations on completed swaps, and \$597.7 thousand of gains on LIBOR notes were realized. At the end of the fiscal year, total realized gains and net interest received in excess of counterparty obligations on completed agreements were \$212.2 million since the program began.

### *Fixed Income (Excluding Mortgages)*

For the fiscal year ending September 30, 2002, the fixed income portfolio returned 7.8% as compiled by Capital Resource Advisors. The portfolio also returned 8.9% for three years, and 7.4% for five years.

Rates continued to decline during the year in response to the Federal Reserve's repeated reductions in rates and the flight to quality in view of stock market declines. In addition to rates declining in all maturities, there was also the continuation of a steep yield curve. Given the mathematics of bond calculation, long-term government bonds tended to outperform most other sectors.

As rates approached their lowest levels in forty or more years, a defensive reinvestment program concentrating on shorter-term intermediate issues and floating rate securities was chosen. While offering greater liquidity and protection from rising rates they tend to underperform in a declining rate market.

Fixed income represented 24.2% of the total portfolio compared with 20.7% last year. The corporate sector represented 40.7% of fixed income securities with government securities accounting for 59.3%. Last year corporates were 49.3% of the total with government securities representing 50.7%. The increased level of government securities was in response to increased uncertainty and volatility in the corporate sector.

### *Real Estate Equity (Including Mortgages)*

A majority of the direct mortgage holdings were sold in 1997 and 1998, and the equity real estate portfolio and mortgage portfolio were, therefore, combined into a single "Real Estate" allocation during the current fiscal year. For

# INVESTMENT SECTION

## Report on Investment Activity (Continued)

the fiscal year ending September 30, 2002, 10.5% of the System's total investment portfolio was invested in real estate. This compares to 9.7%, and 8.6% for the fiscal years ending September 30, 2001 and 2000, respectively. The current target allocation to real estate is 8.5%, and the five-year target asset allocation for real estate investments is 9%.

The one-year, three-year, five-year, and ten-year net real estate returns for the fiscal year ending September 30, 2002, were 8.1%, 9.6%, 10.6%, and 8.6% respectively, as compiled by Capital Resource Advisors. This compares to the National Council of Real Estate Investment Fiduciaries Property Index (NCREIF) returns of 4.8%, 8.4%, 10.6%, and 8.0% relating to same periods. As of September 30, 2002, the NCREIF portfolio of properties is more weighted in the office sector at 42%, versus the System portfolio at 25%. Because the NCREIF returns are calculated before advisor fees/overhead and the System's returns are calculated after all advisor fees/overhead, the NCREIF returns stated above have been adjusted downward by 75 basis points to approximate comparable returns.

The real estate portfolio is broadly diversified geographically across the country, by type of property and class of property, to reduce risk. Major property types as of September 30, 2002, included apartments (44%); retail centers, including regional malls and grocery-anchored neighborhood/community shopping centers (23%); commercial office buildings (25%); and miscellaneous other property types, such as industrial and self storage (8%). The System, through its advisors and operating joint ventures, acquires, develops, redevelops, and disposes of real estate with the goal of maximizing returns while maintaining an acceptable level of risk. The properties are held in various investment vehicles: partnerships, LLCs and trusts. These legal entities allow the System to enjoy the benefits of real estate ownership while limiting the liability associated with the asset class. In all new investments, the System negotiates key terms in order to further mitigate risk. The properties are regularly valued by independent third parties to establish fair market values.

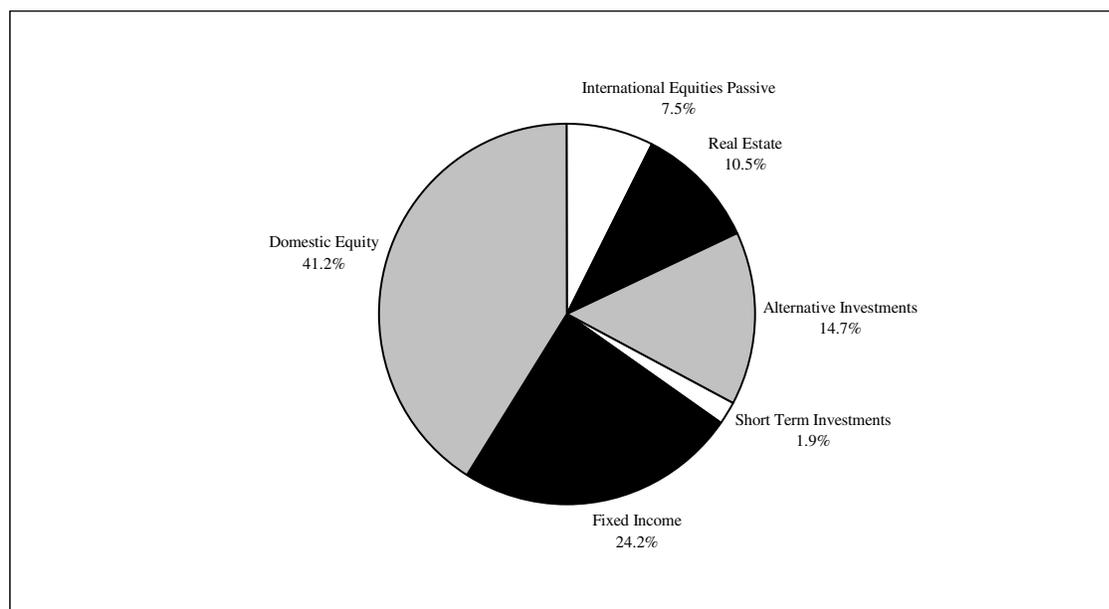
### *Alternative Investments*

Alternative Investments are investments in the private equity market, either directly in companies or indirectly through limited partnerships. Through September 30, 2002, approximately 92% of alternative investments were made through limited partnerships. Of the investments in limited partnerships, approximately 14% were in partnerships investing internationally, 15% in venture capital and 63% in special situations/LBOs. The remaining 8% were direct private equity investments and public stock distributions received from the limited partnerships. The percentage of assets in alternative investments has consistently increased from 4.8% as of September 30, 1993, to 14.7% as of September 30, 2002. The asset allocation range for alternative investments is 14% to 20% while the long-term target asset allocation is 10%.

The one-year, three-year, five-year, and ten-year total alternative investment returns for the fiscal year ending September 30, 2002, were -16.3%, -0.1%, 7.1%, and 12.9%, respectively.

# INVESTMENT SECTION

## Asset Allocation



## Investment Results for the Period Ending September 30, 2002

<u>Investment Category</u>	<u>Current Year</u>	<u>Annualized Rate of Return</u>		
		<u>3 Years</u>	<u>5 Years</u>	<u>10 Years</u>
Total Portfolio	(10.3) %	(3.1) %	2.8 %	8.0 %
Domestic Equities Stock - Active	(20.3)	(11.4)	(2.1)	9.3
Domestic Equities Stock - Passive*	(18.7)	(11.3)	(0.7)	9.8
Standard & Poor's ( S&P 500 )	(20.5)	(12.9)	(1.6)	9.0
Standard & Poor's (MidCap)	(4.7)	3.4	5.4	12.6
International Equities	(16.0)	(12.2)	(3.2)	N/A
Net Salomon BMI - EPAC 50/50	(15.5)	(12.3)	(4.0)	N/A
Fixed Income Bonds ( U.S. Corp and Govt )	7.8	8.9	7.4	7.6
Salomon Smith Barney Broad Investment Grade Bond Index	8.4	9.4	7.8	7.4
Lehman Brothers Government/Corporate	9.2	9.7	7.9	7.4
Real Estate**	8.1	9.6	10.6	8.6
NCREIF minus 75 Basis Points	4.8	8.4	10.6	8.0
Alternative Investments	(16.3)	(0.1)	7.1	12.9

\* Passive portfolio consists of a S&P 500 fund and a S&P Midcap fund. The return is a weighted average of the two funds.

\*\*Real Estate Includes mortgages.

N/A Not available.

# INVESTMENT SECTION

## Largest Assets Held

### Largest Stock Holdings (By Market Value)\* September 30, 2002

<u>Rank</u>	<u>Shares</u>	<u>Stocks</u>	<u>Market Value</u>
1	4,017,787	Pfizer Incorporated	\$ 116,596,179
2	4,590,899	General Electric Corporation	113,165,660
3	2,519,415	Microsoft Corporation	110,199,212
4	2,160,189	Wal-Mart Stores Incorporated	106,367,706
5	3,250,482	Citigroup Incorporated	96,376,791
6	2,906,678	Exxon Mobil Corporation	92,723,028
7	1,448,391	Wells Fargo & Company	69,754,511
8	911,473	Bank of America Corporation	58,151,977
9	973,046	Federal National Mortgage Association	57,935,159
10	604,193	Procter & Gamble Corporation	54,002,770

### Largest Bond Holdings (By Market Value)\* September 30, 2002

<u>Rank</u>	<u>Par Amount</u>	<u>Bonds &amp; Notes</u>	<u>Market Value</u>
1	\$ 85,815,000	U.S. Treasury Bonds at 9.125% Due 5-15-2009	\$ 95,958,333
2	59,950,000	U.S. Treasury 0% Coupon Strips Due 8-15-2003	59,322,324
3	49,486,000	U.S. Treasury 0% Coupon Strips Due 11-15-2011	46,289,204
4	41,520,000	FHLB 2.51% FRN Due 1-12-2007	41,481,802
5	34,777,000	U.S. Treasury Tiger 0% Coupon Due 8-15-2004	33,471,471
6	33,200,000	Bank One NA Chicago ILL MTN 2.026% Due 3-16-2004	33,216,932
7	25,405,225	Chase Manhattan Bank FRN 4.20% Due 7-29-2003	25,893,767
8	25,230,676	First Chicago Corp FRN 4.25% Due 7-28-2003	25,711,573
9	24,905,000	VW Credit Inc FRN 2.14% Due 1-21-2005	24,943,603
10	22,825,000	MTN Nations Bank FRN 1.926% Due 1-05-2004	22,834,815

\*A complete list of stock and bond holdings is available from the Michigan Department of Treasury.

# INVESTMENT SECTION

## Schedule of Investment Fees

The State Treasurer is the investment fiduciary and custodian of the System's funds pursuant to State law. Outside advisors are utilized to augment the State Treasurer's internal staff in the real estate and alternative investment markets. Only 15.3% of the total investment portfolio is managed by fully discretionary outside advisors. Outside advisors' fees are netted against the partnership or trust fund income. The Michigan Department of Treasury's cost of operations applicable to the System for the fiscal year amounted to \$2,066.0 thousand or less than three basis points (.03%) of the market value of the portfolio.

State law created an Investment Advisory Committee comprised of the directors of the Department of Consumer and Industry Services and Management and Budget, or their duly authorized representatives, and three public members appointed by the Governor with the advice and consent of the Senate. The public members serve without pay, but are paid actual and necessary travel and other expenses. The committee meets quarterly to review investments, goals and objectives and may submit recommendations to the State Treasurer. The committee may also, by a majority vote, direct the State Treasurer to dispose of any holding which in the committee's judgment is not suitable for the fund involved, and may by unanimous vote direct the State Treasurer to make specific investments.

### Schedule of Investment Fees

#### *Investment Managers' Fees:*

	<u>Assets under Management ( in thousands)</u>	<u>Fees ( in thousands)</u>	<u>Basis Points*</u>
State Treasurer	\$ 7,020,633.0	\$ 2,066.0	2.9
Outside Advisors - Alternative	1,219,655.7	15,341.7	125.8
Real Estate	46,620.9	-	-
<b>Total</b>	<u>\$ 8,286,909.6</u>		

#### *Other Investment Services Fees:*

Assets in Custody	\$ 8,207,111.9	\$ 465.9
Securities on Loan	359,190.4	7,638.1

\* Outside Advisors Fees are netted against the income of the partnership and trust income. The partnership agreements define the management fees, which range from 150 to 250 basis points of the committed capital, in most cases the fees are netted against income. For Real Estate the asset management fees range from 25 to 90 basis points and are netted against current year's income.

# INVESTMENT SECTION

## Schedule of Investment Commissions

	Fiscal Year Ended September 30, 2002		
	Commissions Paid <sup>(1)</sup>	Number of Shares Traded	Average Commission Rate Per Share
<b>Investment Brokerage Firms:</b>			
Salomon Smith Barney, Inc.	\$ 171,219	\$ 5,568,988	\$ 0.03
Bear Stearns & Co.	128,050	3,150,417	0.04
Bridge Trading Company	114,589	2,291,779	0.05
C.S. First Boston Corporation	107,318	2,502,179	0.04
Lehman Brothers, Inc.	103,988	2,708,752	0.04
Goldman, Sachs & Co.	96,892	2,109,975	0.05
Merrill Lynch & Co.	71,201	2,566,646	0.03
Morgan Stanley Dean Witter & Co.	68,185	1,467,504	0.05
J. P. Morgan Securities, Inc.	65,358	1,307,156	0.05
UBS Warburg LLC.	51,832	1,036,648	0.05
Deutsche Bank	26,755	535,110	0.05
Sanford C. Bernstein & Co.	23,540	470,795	0.05
ISI Group, Inc.	22,217	441,856	0.05
S.G. Cowen & Company	21,436	428,715	0.05
Prudential Securities, Inc.	21,077	421,532	0.05
Charles Schwab & Co., Inc.	19,473	389,458	0.05
OTA Research	12,072	241,430	0.05
Soundview Financial	10,877	217,544	0.05
CIBC World Markets Corp.	10,677	213,537	0.05
Instinet Group Inc	8,883	356,437	0.02
Banc of America Securities, LLC.	7,515	150,302	0.05
Barrington Research	5,354	107,080	0.05
Keefe Bruyette	3,405	68,093	0.05
Howard Weil	3,382	67,636	0.05
<b>Total</b>	<b>\$ 1,175,295</b>	<b>\$ 28,819,569</b>	<b>\$ 0.04 <sup>(2)</sup></b>

<sup>(1)</sup> These amounts are included in purchase and sale prices of investments.

<sup>(2)</sup> The average commission rate per share for all brokerage firms.

# INVESTMENT SECTION

## Investment Summary

Fiscal Year Ended September 30, 2002

	<u>Market Value</u> *	<u>Percent of Total Market Value</u>	<u>Investment &amp; Interest Income</u> ***	<u>Percent of Investment &amp; Interest Income</u>
Fixed Income:				
Government Bonds	\$ 1,189,930,855	14.3%	\$ 82,051,259	-8.3%
Corporate Bonds & Preferred Stocks	817,869,181	9.9%	70,131,960	-7.1%
Mortgages	1,733,430	0.0%	37,649	0.0%
Total Fixed Income	2,009,533,466	24.2%	152,220,868	-15.4%
Common Stock	3,412,414,158	41.2%	(830,111,362)	84.0%
Real Estate	869,008,086	10.5%	69,865,338	-7.0%
Alternative Investments	1,219,655,746	14.7%	(274,821,642)	27.8%
International Equities - Passive	619,221,734	7.5%	(113,524,063)	11.5%
Short Term Investments **	157,076,427	1.9%	8,570,606	-0.9%
<b>Total</b>	<b>\$ 8,286,909,617</b>	<b>100.0%</b>	<b>\$ (987,800,255)</b>	<b>100.0%</b>

\* Short Term Investments are at cost, which approximates market value.

\*\* Excludes the amounts payable and receivable for sales and purchases of securities with a settlement date after September 30 for the fiscal year. Amount also excludes \$366,352,026 in cash collateral for security lending for fiscal year 2002.

\*\*\* Total Investment & Interest Income excludes net security lending income of \$1,893,786 for fiscal year 2002.

# INVESTMENT SECTION

## Investment Summary (Continued)

Fiscal Year Ended September 30, 2001

	<u>Market Value *</u>	<u>Percent of Total Market Value</u>	<u>Investment &amp; Interest Income ***</u>	<u>Percent of Investment &amp; Interest Income</u>
Fixed Income:				
Government Bonds	\$ 1,008,501,510	10.5%	\$ 160,003,561	-12.8%
Corporate Bonds & Preferred Stocks	981,276,886	10.2%	99,177,964	-7.9%
Mortgages	4,467,432	0.0%	367,278	0.0%
Total Fixed Income	1,994,245,828	20.7%	259,548,803	-20.7%
Common Stock	3,931,888,124	40.8%	(1,107,114,215)	88.6%
Real Estate	938,532,614	9.7%	89,056,173	-7.1%
Alternative Investments	1,495,216,833	15.5%	(290,494,502)	23.2%
International Equities - Passive	631,403,802	6.6%	(221,640,944)	17.7%
Short Term Investments **	643,135,253	6.7%	21,819,606	-1.7%
<b>Total</b>	<u>\$ 9,634,422,454</u>	<u>100.0%</u>	<u>\$ (1,248,825,079)</u>	<u>100.0%</u>

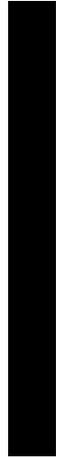
\* Short Term Investments are at cost, which approximates market value.

\*\* Excludes the amounts payable and receivable for sales and purchases of securities with a settlement date after September 30 for the fiscal year. Amount also excludes \$408,715,028 in cash collateral for security lending for fiscal year 2001.

\*\*\* Total Investment & Interest Income excludes net security lending income of \$1,076,684 for fiscal year 2001.

# ACTUARIAL SECTION

Actuary's Certification  
Summary of Actuarial Assumptions and Methods  
Schedule of Active Member Valuation Data  
Schedule of Changes in the Retirement Rolls  
Prioritized Solvency Test  
Analysis of Financial Experience  
Summary of Plan Provisions



## Actuary's Certification



THE SEGAL COMPANY  
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Michael J. Karlin, F.S.A., M.A.A.A.  
Senior Vice President & Actuary  
mkarlin@segalco.com

December 3, 2002

Mr. Duane E. Berger  
Director  
Department of Management and Budget  
and  
Retirement Board  
Michigan State Employees Retirement System  
P.O. Box 30176  
Lansing, Michigan 48909

Ladies and Gentlemen:

The Michigan State Employees Retirement System (MSERS) is funded on an actuarial reserve basis. The basic financial objective of MSERS is to establish and receive contributions that remain approximately level as a percentage of active member payroll over a long period of years.

Actuarial valuations are prepared annually to determine MSERS's actuarial liabilities and the employer contributions required to fund the System in accordance with the actuarial reserve funding provisions of the governing State Statute. The most recent actuarial valuation as of September 30, 2001 included a total of 91,772 members of MSERS. The actuarial value of MSERS's assets amounted to approximately \$10.63 billion on September 30, 2001.

The actuarial assumptions used in the 2001 valuation are the same as those used in the previous annual actuarial valuation. These assumptions produce valuation results which we consider to be reasonably indicative of the plan's underlying cost. Also, in our opinion, the actuarial assumptions and methods used for funding purposes meet the parameters for the disclosures presented in the financial section by GASB Statement No. 25.

Our actuarial valuation of MSERS as of September 30, 2001 was performed by qualified actuaries in accordance with accepted actuarial procedures. In our opinion, the calculated contribution rate meets the fundamental objectives of State law. Based on the 2001 valuation results, it is also our opinion that the Michigan State Employees Retirement System continues in sound condition, in accordance with actuarial principles of level cost financing.

Most of the information used in the supporting schedules in the Actuarial and Statistical Sections, as well as the Schedules of Funding Progress and the employer contributions shown in the Schedules of Employer Contributions in the Financial Section of this report were provided by our firm.

Sincerely,

Michael Karlin, F.S.A., M.A.A.A.  
Senior Vice President & Actuary  
Benefits, Compensation and HR Consulting ATLANTA BOSTON CHICAGO CLEVELAND DENVER HARTFORD HOUSTON LOS ANGELES MINNEAPOLIS  
NEW ORLEANS NEW YORK PHILADELPHIA PHOENIX SAN FRANCISCO SEATTLE TORONTO WASHINGTON, DC



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# ***ACTUARIAL SECTION***

## **Summary of Actuarial Assumptions and Methods**

1. The investment return rate used in making the valuations was 8% per year, compounded annually. This rate of return is not the assumed real rate of return. The real rate of return is the rate of investment return in excess of the inflation rate. Considering other financial assumptions, this investment return rate translates to an assumed long term real rate of return of 4%. Adopted 1994.
2. The mortality table used in evaluating allowances to be paid was the 1994 Group Annuity Mortality Table, set forward one year for both men and women. Adopted 1998.
3. Sample probabilities of retirement with an age and service allowance are shown in Schedule 1 on the next page. Adopted 1998.
4. Sample probabilities of withdrawal from service and disability, together with individual pay increase assumptions, are shown in Schedule 2 on the next page of this report. Adopted 1998.
5. Total active member payroll is assumed to increase 4% per year. This represents the portion of the individual pay increase assumptions attributable to inflation. Adopted 1994.
6. An individual entry age actuarial cost method of valuation was used in determining age and service allowance actuarial liabilities and normal cost. Adopted 1975. Unfunded actuarial accrued liabilities are financed over a period of 50 years and over a declining 40 year period for years beginning October 1, 1996. Adopted 1996.
7. During 1998, the Department of Management and Budget approved the use of market value of assets as of September 30, 1997 for valuation purposes. For investment gains and losses that occur after that date, a 5-year smoothing technique will be used. Specifically, the excess (shortfall) of actual investment income (including interest, dividends, realized and unrealized gains or losses) over the imputed income at the valuation interest rate is considered the gain (loss), which is spread over five years.
8. The data about persons now covered and about present assets was furnished by the System's administrative staff. Although examined for general reasonableness, the data was not audited by the actuary.
9. The actuarial valuation computations were made by or under the supervision of a Member of the American Academy of Actuaries (MAAA). The assumptions used in the actuarial valuations were adopted by the System's Board after consulting with the actuary.

# ACTUARIAL SECTION

## Summary of Actuarial Assumptions and Methods (Continued)

### SCHEDULE 1

#### Percent of Eligible Active Members Retiring Each Year

<u>Retirement Ages</u>	<u>Correction Officers</u>	<u>Conservation Officers</u>	<u>Other Members</u>
45		16 %	
48		16	
51	25 %	16	
55	15	16	20 %
58	12	15	15
61	15	15	15
64	22	22	22
67	25	25	25
70	50	50	50
75	100	100	100

### SCHEDULE 2

#### Separation From Active Employment Before Age & Service Retirement & Individual Pay Increase Assumptions

<u>Sample Ages</u>	<u>Years of Service</u>	<u>Percent of Active Members Withdrawing Within Next Year (Men and Women)</u>	<u>Percent of Active Members Becoming Disabled Within Next Year</u>	<u>Percent Increase In Pay During Next Year</u>
All	0	20.00 %		
	1	14.00		
	2	9.00		
	3	7.00		
	4	5.50		
25	5 & Over	5.50	0.01 %	11.50 %
35		3.50	0.04	5.70
45		2.25	0.26	4.75
55		1.75	0.65	4.24
60		1.75	0.90	4.00

# ACTUARIAL SECTION

## Actuarial Valuation Data

### Schedule of Active Member Valuation Data

<u>Valuation Date Sept. 30</u>	<u>Number</u>	<u>Reported Annual Payroll*</u>	<u>Average Annual Pay</u>	<u>% Increase</u>	<u>Average Age</u>	<u>Average Service</u>
1992	64,248	\$ 2,189,752	\$ 34,083	0.0 %	42.2	11.9
1993	63,906	2,185,036	34,191	0.3	42.6	12.1
1994	64,923	2,271,158	34,982	2.3	43.1	12.6
1995	65,133	2,348,534	36,058	3.1	43.2	12.7
1996	63,807	2,515,420	39,422	9.3	43.8	13.0
1997	55,434	2,273,203	41,007	4.0	43.7	13.1
1998	49,717	2,107,996	42,400	3.4	44.8	14.8
1999	49,612	2,213,851	44,623	5.2	45.9	15.8
2000	47,778	2,253,818	47,173	5.7	46.7	16.7
2001	45,852	2,230,562	48,647	3.1	47.4	17.7

\* In thousands of dollars. Base pay only excluding 3 1/2% for overtime and shift differentials through 1995. Greater of base pay or prior year actual earnings beginning in 1996.

### Schedule of Changes in the Retirement Rolls

<u>Year Ended Sept. 30</u>	<u>Added to Rolls</u>		<u>Removed from Rolls</u>		<u>Rolls—End of Year</u>		<u>% Increase in Annual Allowances</u>	<u>Average Annual Allowances</u>
	<u>No.</u>	<u>Annual Allowances*</u>	<u>No.</u>	<u>Annual Allowances*</u>	<u>No.</u>	<u>Annual Allowances*</u>		
1992	4,177	\$ 55,336	887	\$ 6,652	28,856	\$ 243,612	25.0 %	\$ 8,442
1993	1,105	18,468	786	4,887	29,175	257,193	5.6	8,816
1994	1,888	22,636	1101	6,442	29,962	273,387	6.3	9,124
1995	1,566	23,575	966	6,268	30,562	290,694	6.3	9,512
1996	1,595	24,527	1064	7,288	31,093	307,933	5.9	9,904
1997	6,098	121,005	1,068	7,878	36,123	421,060	36.7	11,656
1998	1,279	21,085	1,217	9,689	36,185	432,456	2.7	11,951
1999	1,409	21,227	1,248	9,516	36,346	444,167	2.7	12,221
2000	1,540	22,421	1,181	2,619	36,705	463,969	4.5	12,640
2001	1,648	22,501	1,242	15,063	37,111	471,407	1.6	12,703

\* In thousands of dollars

## Prioritized Solvency Test

The System's funding objective is to meet long term benefit promises through contributions that remain approximately level from year to year as a percent of member payroll. If the contributions to the System are level in concept and soundly executed, the System will pay all promised benefits when due, the ultimate test of financial soundness. Testing for level contribution rates is the long-term solvency test.

A prioritized solvency test is another means of checking a system's progress under its funding program. In a short condition test, the plan's present assets (cash and investments) are compared with: (1) active member contributions on deposit; (2) the liabilities for future benefits to present retired lives; and (3) the liabilities for service already rendered by active and inactive members. In a system following the discipline of level percent of payroll financing, the liabilities for active member contributions on deposit (liability 1) and the liabilities for future benefits to present retired lives (liability 2) will be fully covered by present assets (except in rare circumstances). In addition, the liabilities for service already rendered by active members (liability 3) are normally partially covered by the remainder of present assets. Generally, if the System has been using level-cost financing, the funded portion of liability 3 will increase over time. Liability 3 being fully funded is not necessarily a by-product of level percent of payroll funding methods.

The schedule below illustrates the history of the liabilities of the System and is indicative of the System's policy of following the discipline of level percent of payroll financing.

Valuation Date	Actuarial Present Value of Actuarial Accrued Liability (\$ in Millions)			Valuation Assets	Portion of Present Value Covered by Assets						
	(1)	(2)	(3)		(1)	(2)	(3)	(4) <sup>3</sup>			
	Active Member Contributions	Retirants and Beneficiaries	Active and Inactive Members (Employer Financed Portion)								
Sept. 30											
1992	\$ 83	\$ 2,413	\$ 2,984	\$ 4,533	100 %	100 %	68.3 %	82.7 %			
1993 <sup>1</sup>	72	2,561	3,540	5,043	100	100	68.1	81.7			
1994 <sup>2</sup>	73	2,778	3,709	5,476	100	100	70.8	83.5			
1995	72	2,751	4,038	6,090	100	100	80.9	88.8			
1996	55	2,844	4,248	6,678	100	100	89.0	93.4			
1997	3	4,300	3,910	7,516	100	100	82.2	91.5			
1998	27	4,360	3,987	9,109	100	100	118.4	108.8			
1998 <sup>2</sup>	27	4,484	3,986	9,109	100	100	115.4	107.2			
1999	35	4,538	4,456	9,648	100	100	113.9	106.9			
2000	29	4,659	4,786	10,337	100	100	118.0	109.1			
2001	34	4,677	5,167	10,633	100	100	114.6	107.6			

<sup>1</sup> Revised asset valuation method.

<sup>2</sup> Revised actuarial assumptions.

<sup>3</sup> Percents funded on a total valuation asset and total actuarial accrued liability basis.

# ACTUARIAL SECTION

## Analysis of Financial Experience

### Gains/(Losses) in Accrued Liabilities During Year Ended September 30, 2001 Resulting from Differences Between Assumed Experience & Actual Experience

<u>Type of Activity</u>	<u>Gain/(Loss)</u>
1. <b>Retirements (including Disability Retirement).</b> If members retire at older ages or with lower final average pay than assumed, there is a gain. If younger ages or higher average pays, a loss.	(\$28,983,156)
2. <b>Withdrawal From Employment</b> (including death-in-service). If more liabilities are released by withdrawals and deaths than assumed, there is a gain. If smaller releases, a loss.	(4,406,445)
3. <b>Pay Increases.</b> If there are smaller pay increases than assumed, there is a gain. If greater increases, a loss.	82,095,050
4. <b>Investment Income.</b> If there is greater investment income than assumed, there is a gain. If less income, a loss.	(153,650,019)
5. <b>Death After Retirement.</b> If retirants live longer than assumed, there is a loss. If not as long, a gain.	(754,977)
6. <b>New entrants.</b> New Entrants into the plan will generally result in an actuarial loss. This does not apply to plans closed to new entrants.	(933,741)
7. <b>Other.</b> Miscellaneous gains and losses resulting from data adjustments, timing of financial transactions, etc.	<u>89,382</u>
8. <b>Composite Gain (or Loss) During Year</b>	<u><u>(\$106,543,906)</u></u>

# ACTUARIAL SECTION

## Summary of Plan Provisions

Our actuarial valuation of the System as of September 30, 2001 is based on the present provisions of the Michigan State Employees' Retirement Act, which are summarized in this section.

### ***Regular Retirement (no reduction factor for age)***

Eligibility — Age 55 with 30 years service, or age 60 with 10 or more years service. Corrections Officers may retire at age 51 with 25 or more years service, or age 56 with 10 or more years service. Conservation Officers may retire after 25 years of service regardless of age.

Final Average Compensation — Regular retirement benefit is based on final average compensation (FAC), which is the average of highest 3 consecutive years (2 years for Conservation Officers).

Annual Amount — Total service times 1.5% of FAC. For members with 20 or more years of service, a \$3,000 minimum annual benefit is payable. Corrections Officers receive an additional temporary supplement to age 62 equal to the product of supplemental service times 0.5% of FAC. Conservation Officers retiring after 25 years receive a benefit equal to 60% of FAC.

### ***Early Retirement (age reduction factor used)***

Eligibility — Age 55 with 15 or more years service.

Annual Amount — Computed as regular retirement benefit but reduced by 0.5% for each month under age 60.

### ***Deferred Retirement (vested benefit)***

Eligibility — 10 years of service (5 years for unclassified persons in the executive or legislative branch). Benefit commences at age 60.

Annual Amount — Computed as regular retirement benefit based on service and FAC at termination.

### ***Duty Disability Retirement***

Eligibility — No age or service requirement.

Annual Amount — Disability after age 60: Computed as regular retirement benefit with minimum benefit based on 10 years service. Disability prior to age 60: To age 60, benefit is two-thirds of FAC but limited to \$6,000 per year. Additional limitation such that benefit plus workers' compensation does not exceed final compensation. After age 60, benefit is recomputed as a regular retirement benefit with service granted for period in receipt of disability benefit before age 60 (benefit not reduced after age 60).

### ***Non-Duty Disability Retirement***

Eligibility — 10 years of service.

Annual Amount — Computed as regular retirement benefit based on service and FAC at time of disability. Minimum annual benefit is \$600.

# ACTUARIAL SECTION

## Summary of Plan Provisions (Continued)

### *Duty Death Before Retirement*

Eligibility — No age or service requirement. Also applies to duty disability retiree who dies within 3 years of disability and before age 60.

Annual Amount — Accumulated employee contributions are refunded. Surviving spouse receives annual benefit of one-third of final compensation until death. Unmarried children under age 18 each receive an equal share of one-fourth of final compensation (if no spouse each child receives one-fourth, to a maximum of one-half for all children). If no spouse or eligible children, each dependent parent receives one-sixth of final compensation. Total benefits payable are limited to \$2,400 per year. Additional limitation such that benefits plus workers' compensation does not exceed final compensation.

### *Non Duty Death Before Retirement*

Eligibility — 10 years of service. In the case of a deceased vested former member, the survivor benefit commences when the deceased former member would have attained age 60.

Annual Amount — Computed as regular retirement benefit but reduced in accordance with a 100% joint and survivor election.

### *Post-Retirement Cost-of-Living Adjustments*

One-time upward adjustments have been made in 1972, 1974, 1976, 1977 and 1987. Beginning in 1983, some benefit recipients share in a distribution of a portion of investment income earned in excess of 8% annually (supplemental payment). Beginning in 1988, all benefit recipients are eligible for automatic 3% annual (non-compounded) benefit increases, with a maximum \$300 annual increase. Eligibility for the above benefits:

Retired before October 1, 1987	Greater of supplemental payment or the combination of the 1987 onetime adjustment and the automatic increases.
Retired on or after October 1, 1987	Automatic increases only.

### *Post-Retirement Health Insurance Coverage*

Persons in receipt of retirement allowance (including members who did not retire directly from the System, but come from a vested deferred status), and their dependents, are eligible for 95% System paid health insurance coverage and 90% System paid dental and vision insurance.

### *Member Contributions*

None.

### *Defined Contribution*

New employees hired on or after March 31, 1997, become participants in Tier 2 (i.e., the defined contribution plan) rather than Tier 1 (i.e., the above described defined benefit plan).

Active members on March 30, 1997, had an opportunity to irrevocably elect to terminate membership in Tier 1 and become participants in Tier 2. Elections were in writing and submitted between January 2, 1998 and April 30, 1998. Such members became Tier 2 participants on June 1, 1998, and had the actuarial present value of their Tier 1 accrued benefit transferred into Tier 2 by September 30, 1998.

# STATISTICAL SECTION

Schedule of Revenues by Source  
Schedule of Expenses by Type  
Schedule of Benefit Expenses by Type  
Schedule of Retired Members by Type of Benefit  
Schedule of Average Benefit Payments  
Ten Year History of Membership

# STATISTICAL SECTION

## Schedule of Revenues by Source

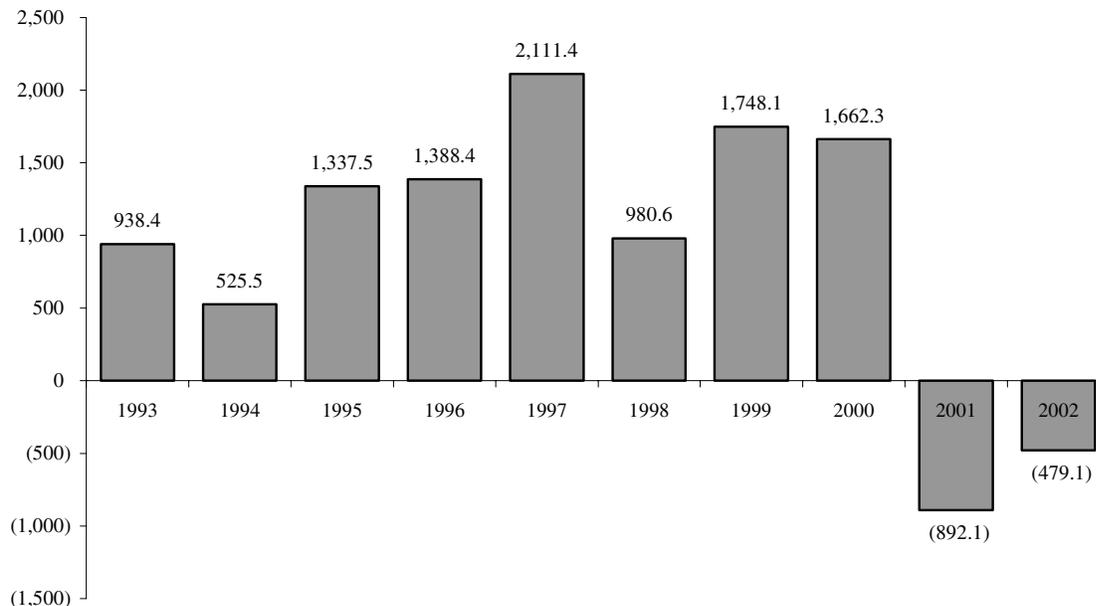
Fiscal Year Ended Sept. 30	Member Contributions	Employer Contributions		Net Investment & Misc. income	Total
		Dollars*	% of Annual Covered Payroll		
1993	\$ 4,068,696	\$371,902,232	16.45 %	\$ 562,436,683	\$ 938,407,611
1994	2,257,216	389,728,590	16.58	133,510,369	525,496,175
1995	2,260,510	422,294,609	17.37	912,938,131	1,337,493,250
1996	2,619,067	431,094,371	17.14	954,696,384	1,388,409,822
1997	15,858,366 **	410,231,627	18.05	1,685,326,508	2,111,416,501
1998	9,777,845	259,799,179	12.32	711,056,989	980,634,013
1999	11,047,645	265,806,232	12.01	1,471,244,852	1,748,098,729
2000	9,663,633	289,224,539	12.83	1,363,374,870	1,662,263,042
2001	9,134,665	361,926,010	15.48	(1,263,116,089)	(892,055,414)
2002	179,559,102	345,216,945	N/A	(1,003,890,272)	(479,114,225)

\* Includes financing for early retirement pensions. Fiscal year 1999 and 2000 also includes amount received for DC Savings (see Note 2 to the financial statements in the Financial Section).

\*\* Increase is attributable to purchase of service credit in connection with "early out" retirement.

N/A Not available

**Total Revenues**  
Year Ended September 30  
(In Millions)



# STATISTICAL SECTION

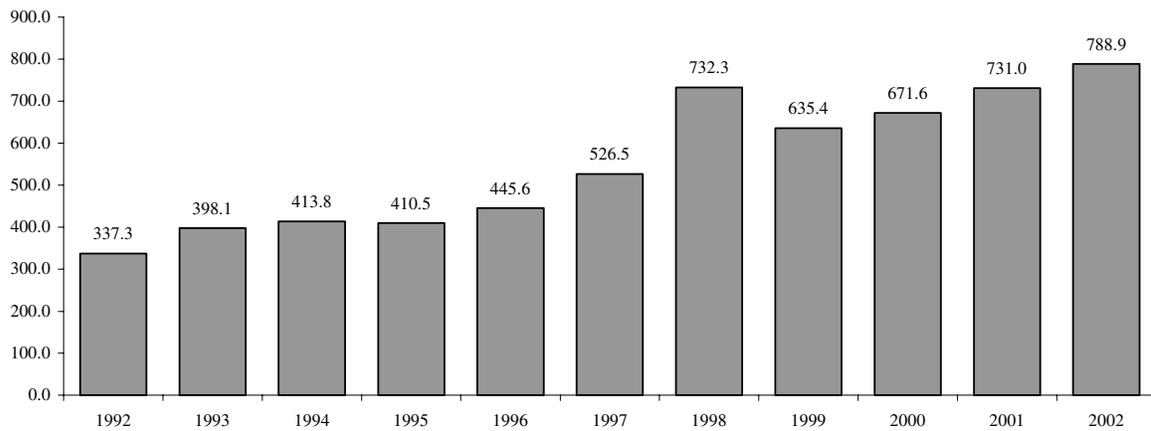
## Schedule of Expenses by Type

Fiscal Year Ended Sept. 30	Benefits *	Refunds and Transfers	Administrative & Other Expenses	Total
1992	\$ 333,082,770	\$ 123,792	\$ 4,047,661	\$ 337,254,223
1993	394,557,537	99,369	3,412,142	398,069,048
1994	409,975,308	92,153	3,777,812	413,845,273
1995	406,140,322	80,453	4,268,833	410,489,608
1996	439,056,397	30,082	6,489,761	445,576,240
1997	513,359,239	7,848,649 **	5,247,943	526,455,831
1998	593,453,930	134,533,763 **	4,297,092	732,284,785
1999	630,346,729	728,366	4,330,623	635,405,718
2000	667,431,376	222,171	3,954,992	671,608,539
2001	726,771,708	91,699	4,149,284	731,012,691
2002	782,452,212	18,331	6,432,819	788,903,362

\* Includes health, dental and vision benefits.

\*\* Includes transfers to defined contribution plan in connection with the "early out" retirement.

**Total Expenses**  
Year Ended September 30  
(In Millions)

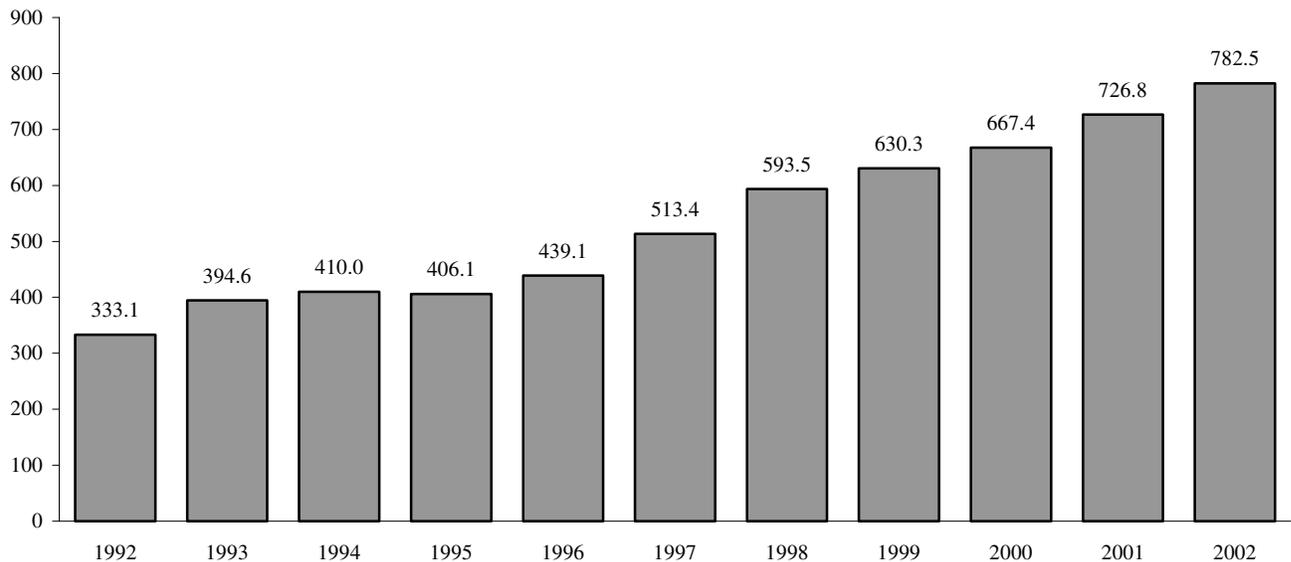


# STATISTICAL SECTION

## Schedule of Benefit Expenses by Type

<u>Fiscal Year Ended Sept. 30</u>	<u>Regular Allowances</u>	<u>Disability Allowances</u>	<u>Supplemental Check</u>	<u>Health Insurance</u>	<u>Total</u>
1992	\$ 212,280,362	\$ 13,850,266		\$ 106,952,142	\$ 333,082,770
1993	245,615,207	14,725,503		134,216,826	394,557,536
1994	256,660,402	16,672,201		136,642,705	409,975,308
1995	269,206,552	20,494,647		116,439,123	406,140,322
1996	284,061,320	22,017,877	\$ 15,234,884	117,742,316	439,056,397
1997	331,964,200	26,069,505	24,832,674	130,492,860	513,359,239
1998	401,855,102	28,024,773	-	163,574,055	593,453,930
1999	417,313,133	28,227,807	678,314	184,127,475	630,346,729
2000	427,500,808	30,867,062	435,904	208,627,602	667,431,376
2001	444,244,814	33,902,047	378,467	248,246,380	726,771,708
2002	467,909,032	35,544,847	-	278,998,333	782,452,212

**Total Benefit Expenses**  
**Year Ended September 30**  
**(In Millions)**



# STATISTICAL SECTION

## Schedule of Retired Members by Type of Benefit

September 30, 2001

Amount Monthly Benefit	Number of Retirees	Type of Retirement *							
		1	2	3	4	5	6	7	8
\$ 1 - 200	1,328	475	456	15	178	6	165	2	31
201 - 400	4,340	2,677	832	18	590	18	117	-	88
401 - 600	5,871	3,409	616	424	920	-	251	5	246
601 - 800	4,784	3,069	396	1	731	1	221	30	335
801 - 1,000	4,121	2,593	256	-	553	-	182	44	493
1,001 - 1,200	3,725	2,492	181	-	349	-	139	41	523
1,201 - 1,400	3,329	2,335	151	-	150	-	95	42	556
1,401 - 1,600	2,425	1,862	99	-	66	-	57	49	292
1,601 - 1,800	1,863	1,532	46	-	46	-	38	65	136
1,801 - 2,000	1,472	1,231	53	-	16	-	16	83	73
Over 2,000	3,853	3,396	74	-	14	-	38	259	72
Totals	<u>37,111</u>	<u>25,071</u>	<u>3,160</u>	<u>458</u>	<u>3,613</u>	<u>25</u>	<u>1,319</u>	<u>620</u>	<u>2,845</u>

\* Type of Retirement

- 1 - Normal retirement for age & service
- 2 - Survivor payment - normal or early retirement
- 3 - Duty disability retirement (incl. survivors)
- 4 - Non-duty disability retirement (incl. survivors)
- 5 - Survivor payment - duty death in service
- 6 - Survivor payment - non-duty death in service
- 7 - Retirees with supplemental benefits for early retirement incentive factors
- 8 - Retirees with reduced benefits for early retirement reduction factors

Source: The Segal Company

# STATISTICAL SECTION

## Schedule of Retired Members by Type of Benefit (Continued)

September 30, 2001

Amount Monthly Benefit	Number of Retirees	Selected Option **						
		Reg.	Opt. A	Opt. B	Opt. C	Opt. E	Opt. E1	Opt. E2
1 - 200	1,328	318	541	329	2	110	15	13
201 - 400	4,340	1,834	1,161	802	10	387	71	75
401 - 600	5,871	2,856	1,523	911	20	424	55	82
601 - 800	4,784	2,204	1,290	862	10	308	51	59
801 - 1,000	4,121	1,879	1,155	787	18	198	34	50
1,001 - 1,200	3,725	1,638	1,084	722	11	156	52	62
1,201 - 1,400	3,329	1,264	1,048	726	17	170	35	69
1,401 - 1,600	2,425	900	776	511	13	130	36	59
1,601 - 1,800	1,863	613	616	367	12	125	49	81
1,801 - 2,000	1,472	413	534	296	8	124	41	56
Over 2,000	3,853	1,077	1,235	836	39	324	150	192
Totals	37,111	14,996	10,963	7,149	160	2,456	589	798

\*\*Selected Option

Reg. - Straight life allowance

Opt. A - 100% survivor option

Opt. B - 50% survivor option

Opt. C - 75% survivor option

Opt. E - Social Security equated

Opt. E1 - Social Security equated w/100% survivor

Opt. E2 - Social Security equated w/50% survivor option

Source: The Segal Company

# STATISTICAL SECTION

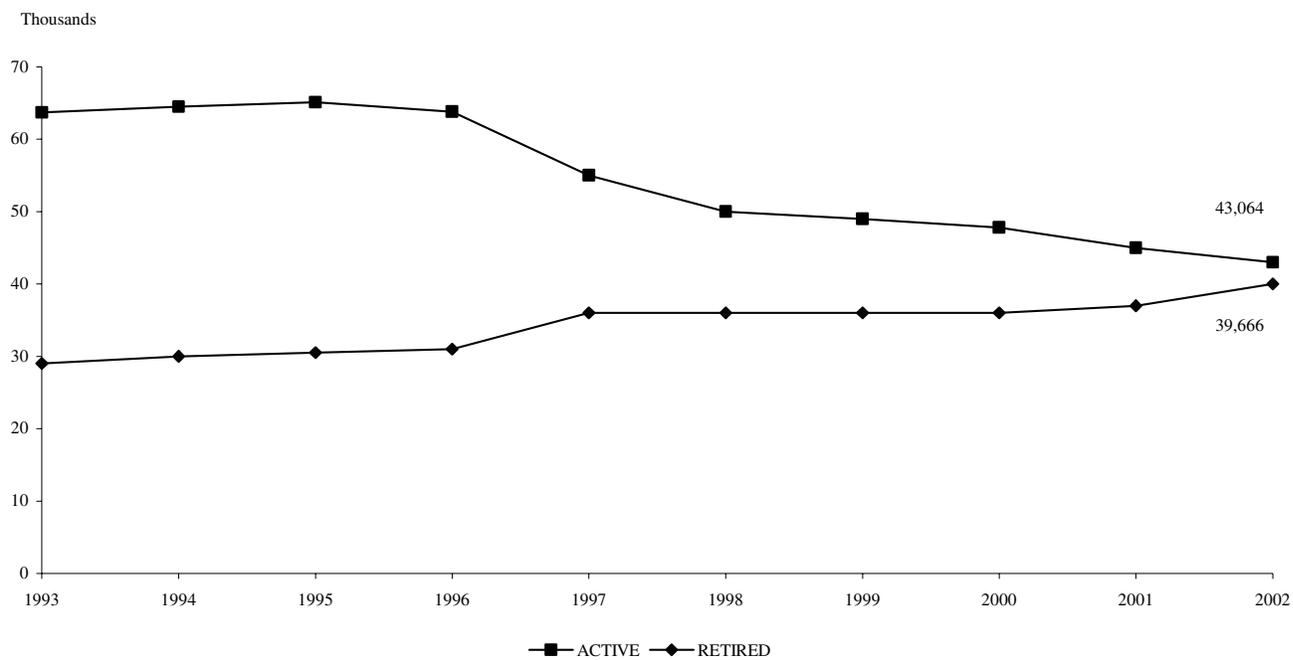
## Schedule of Average Benefit Payments

Retirement Effective Dates	Years Credited Service							Total
	0-5	5-10	10-15	15-20	20-25	25-30	30+	
Period 10/1/95 to 9/30/96:								
Average Monthly Benefit	\$ 316	\$ 343	\$ 375	\$ 571	\$ 793	\$ 1,045	\$ 1,340	\$ 825
Average Final Average Salary	12,260	25,997	21,206	23,275	25,383	27,175	28,936	25,142
Number of Active Retirants	341	429	5,977	6,311	5,636	5,149	7,250	31,093
Period 10/1/96 to 9/30/97:								
Average Monthly Benefit	\$ 367	\$ 357	\$ 400	\$ 632	\$ 877	\$ 1,272	\$ 1,536	\$ 971
Average Final Average Salary	11,007	26,932	22,665	25,373	27,707	32,426	33,096	28,415
Number of Active Retirants	396	440	6,207	6,947	6,410	7,030	8,693	36,123
Period 10/1/97 to 9/30/98:								
Average Monthly Benefit	\$ 373	\$ 369	\$ 414	\$ 651	\$ 901	\$ 1,298	\$ 1,571	\$ 996
Average Final Average Salary	10,322	28,458	23,509	26,087	28,395	33,076	33,906	29,148
Number of Active Retirants	411	449	6,246	6,906	6,389	7,074	8,710	36,185
Period 10/1/98 to 9/30/99:								
Average Monthly Benefit	\$ 375	\$ 379	\$ 433	\$ 673	\$ 926	\$ 1,329	\$ 1,600	\$ 1,018
Average Final Average Salary	9,939	29,279	24,597	26,881	29,163	33,685	34,435	29,846
Number of Active Retirants	432	457	6,328	6,939	6,421	7,091	8,678	36,346
Period 10/1/99 to 9/30/00:								
Average Monthly Benefit	\$ 398	\$ 390	\$ 453	\$ 694	\$ 952	\$ 1,388	\$ 1,656	\$ 1,053
Average Final Average Salary	9,908	30,734	25,784	27,734	29,943	34,218	35,149	30,620
Number of Active Retirants	450	454	6,476	6,984	6,488	7,145	8,708	36,705
Period 10/1/00 to 9/30/01:								
Average Monthly Benefit	\$ 663	\$ 578	\$ 474	\$ 711	\$ 970	\$ 1,373	\$ 1,653	\$ 1,059
Average Final Average Salary	22,101	29,518	26,928	28,637	30,998	34,818	35,868	31,509
Number of Active Retirants	771	697	6,429	6,929	6,485	7,204	8,598	37,111

Source: The Segal Company

# STATISTICAL SECTION

## Ten Year History of Membership Fiscal Year Ended September 30



Source: The Segal Company