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## MOSERS

# Deferred Compensation Plan

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## Changes to the Deferred Compensation Plan Should Benefit Participants

Since September 1, 2007, the Missouri State Employees' Retirement System (MOSERS) Board of Trustees has been responsible for the administration of the state's deferred compensation plan. The plan serves as supplemental retirement savings for Missouri state employees who choose to participate. At April 2008, current and former state employees had approximately \$1.43 billion invested in the plan. Because of the significance of these investments, our audit objectives included evaluating (1) the performance of investment options offered by the deferred compensation plan, (2) how Missouri's plan compared to similar plans in other states, and (3) the expected plan changes.

Investment options often underperformed benchmarks

Our analysis of the current investment options showed a significant number underperformed their investment benchmark. Of the investment options available, 24 had 5 and 10 year established benchmarks to evaluate against. Of those 24 funds, 15 funds (63 percent) underperformed relative to their 5-year benchmark, 13 funds (54 percent) underperformed relative to their 10-year benchmark, and 10 funds (42 percent) underperformed relative to both their 5 and 10-year benchmarks. Participants had invested approximately \$237 million (32 percent of the total plan investments in mutual fund options) in these 10 funds as of April 2008. (See page 9)

The number of similar investment options may have negatively impacted investment diversification

Based on the number of investment options available in other states' plans and discussions with MOSERS officials, the number of investment options currently available in Missouri's plan may have led to overlap in investment strategies and negatively impacted diversification. MOSERS officials said many funds had similar investment styles. Deferred compensation plans in the 8 surrounding states average 18.5 investment options, compared to the 31 available in Missouri's plan. (See page 9)

Changes should significantly reduce participant costs and simplify investment planning

Adding target-date funds as investment options should result in significant cost savings for plan participants. MOSERS officials expect the management costs for the target-date funds to be approximately .25 percent of invested assets (25 basis points). Our analysis showed that would be about 68 percent less than management fees charged on the current mutual fund options. MOSERS officials said the administrative costs for the target-date funds may be impacted depending on how many plan assets do not transfer to the target-date funds.

Target-date funds are designed to be self-adjusting, shifting from a more aggressive investment mix to a more conservative mix as the investor approaches retirement age. The use of target-date funds should simplify investment decisions for plan participants and help them to improve investment returns relative to investment risk. (See page 10)

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## Abbreviations

MOSERS	Missouri State Employees' Retirement System
TPA	Third Party Administrator
PEBSCO	Public Employee Benefit Services Company
OA	Office of Administration
RSMo	Missouri Revised Statutes



**SUSAN MONTEE, CPA**  
**Missouri State Auditor**

Honorable Jeremiah W. (Jay) Nixon, Governor  
and  
Missouri State Employees' Retirement System Board of Trustees  
and  
Gary Findlay, Executive Director  
Missouri State Employees' Retirement System  
Jefferson City, Missouri

The Missouri State Employees' Retirement System (MOSERS) Board of Trustees is responsible for administration of the Missouri State Public Employees Deferred Compensation plan. The deferred compensation plan serves as supplemental retirement savings for Missouri state employees who choose to participate. At April 2008, current and former state employees had approximately \$1.4 billion invested in the plan. Because of the significance of these investments, our audit objectives included evaluating (1) the performance of investment options offered by the deferred compensation plan, (2) how Missouri's plan compared to similar plans in other states, and (3) the expected plan changes.

We found many investment options currently offered in the state's deferred compensation plan had performance returns that underperformed their investment benchmark for the last 5 years or 10 years and during both periods. Ten of 24 investment options (42 percent) with both 5 and 10-year benchmark histories had underperformed both periods relative to their benchmark. Missouri's deferred compensation plan offered more investment options than other states' plans reviewed; however, the similar style of many of these options may have resulted in overlapping investment strategies. MOSERS planned elimination of the current investment options and replacement with custom target-date funds should benefit participants by reducing fund management costs, while providing more diversified and simplified investment choices for participants.

We conducted our audit in accordance with the standards applicable to performance audits contained in *Government Auditing Standards*, issued by the Comptroller General of the United States. Those standards require that we plan and perform our audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and conclusions based on our audit objectives. We believe that the evidence obtained provides such a basis. This report was prepared under the direction of Douglas Porting. Key contributors to this report included Jon Halwes, Robert Showers, Travis Owens, and Ed Morgan.

A handwritten signature in cursive script that reads "Susan Montee".

Susan Montee, CPA  
State Auditor

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# Introduction

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The General Assembly enacted legislation in 1974 creating the Missouri Deferred Compensation Commission, with the deferred compensation plan<sup>1</sup> (the plan) becoming operational in 1978. Under plan provisions, state employees are eligible to contribute to the plan through a reduction of salary. The state matches the first \$35<sup>2</sup> per month in contributions for each employee. To be eligible to receive the match an employee must have been employed by the state for 12 consecutive months. In accordance with Section 457 of the Internal Revenue Code, employee contributions are limited to 100 percent of compensation, not to exceed \$16,500. Contributions to the plan are deferred for federal and state income tax purposes until benefits are paid. In accordance with plan provisions, participants contributing to the plan or their beneficiaries may begin withdrawal of funds contributed, subject to applicable taxes, upon retirement, death, or termination of employment with the state. Withdrawals may also occur due to an unforeseeable emergency, if documentation of the hardship conforms to federal regulations. Participants may select various payout options, including lump sum payments or installments. Retiring participants have the option to annuitize their account balance as one of the payout options.

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## Plan Administration

Prior to September 1, 2007, the Missouri Deferred Compensation Commission provided plan oversight. After that date, plan oversight responsibilities transferred to the Missouri State Employees' Retirement System (MOSERS) Board of Trustees.<sup>3</sup> Administration of the plan is contracted out to a third-party administrator (TPA), whose responsibilities include general plan administration, record keeping, marketing and providing consulting services to state employees. The state awarded the initial TPA contract to Public Employee Benefit Services Company (PEBSCO) in December 1978. PEBSCO merged with a subsidiary of Nationwide Financial in 1998 to form Nationwide Retirement Services (Nationwide). The TPA contract remained with Nationwide until June 2006, when the state awarded a new contract to CitiStreet.<sup>4</sup> ING Group<sup>5</sup> (ING) acquired CitiStreet in July 2008 and that company continues to provide TPA services.

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<sup>1</sup> The deferred compensation plan is comprised of 2 legally separate plans. Participants contribute to the 457 plan and employer match incentives go into the 401a plan. Participants may also roll other retirement plan funds into the 401a plan.

<sup>2</sup> The state matched \$25 per month prior to fiscal year 2009 for participants deferring \$25 or more in wages.

<sup>3</sup> In accordance with Section 105.910, RSMo.

<sup>4</sup> A joint venture between Citigroup Inc. and State Street Corporation.

<sup>5</sup> A financial company headquartered in the Netherlands.

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The first investments occurred in March 1980. The initial investment options included one fixed annuity and seven variable annuities. Since 1980, based on investment performance and the need for additional investment choices, the commission approved adding and deleting various investments from the investment options. Currently, participants have investment options which include 30 mutual funds (including domestic and international equity funds, and bond funds) and a stable value fund.<sup>6</sup> The mutual fund options will be replaced with new investment options for new participants and current participants who choose not to remain in the existing funds as discussed on page 6. Participants also have the ability to invest in other stock or bond products available in the marketplace through a self-directed investment option.

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### Ongoing stable value fund litigation

The state is currently involved in litigation related to the fixed account assets transferred from Nationwide to ING in June 2006. The state bid for a new fixed account contract concurrently with the TPA contract and awarded the contract to ING effective June 2006. When Nationwide transferred the assets to ING for placement in the stable value fund, Nationwide withheld approximately \$18.6 million as a market-value adjustment. The state filed suit seeking, on behalf of the plan, recovery of the \$18.6 million adjustment, claiming Nationwide's contract did not allow for such an adjustment. As of January 2009, this litigation was still pending.

Although Nationwide withheld \$18.6 million when the transfer occurred, ING recognized participant balances of \$505,064,665, despite only receiving \$486,478,285 in assets. To make up for the difference, ING is amortizing the market value adjustment over the life of the company's contract. MOSERS staff is currently tracking the status of these amortization adjustments.

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### Plan Statistics

The plan had total assets of approximately \$1.43 billion as of April 2008. Participants had invested 47.7 percent of the assets in the stable value fund, 51.8 percent of the assets in the 30 mutual fund options available, and the remaining .5 percent through the self-directed investment option. See Appendix I for details of plan asset amounts and fund performance.

As of April 2008, MOSERS records showed:

- 57,567 participants (current and former employees) with a plan balance

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<sup>6</sup> A stable value fund is a core bond fund whose holdings include high-quality bonds, as well as interest-bearing contracts bought from banks and insurance companies. Those contracts have a guarantee, which is called a wrapper, that protects the net asset value of the fund.

- 38,546 current employees contributing to the plan
- 11,783 of these current employees (30 percent) contributed only \$25 per month - the minimum required to receive the state match limit at that time
- 23,499 eligible employees did not participate in the plan

As of March 31, 2008, documents provided by CitiStreet showed:

- 26,118 participants had all of their plan assets invested in one fund
- 15,560 of those 26,118 participants (60 percent) had all of their plan assets in the stable value fund
- 21,278 participants had investments in 2, 3 or 4 funds

## Other States' Plans

Based on conversations with plan representatives of surrounding states, Missouri's plan has significantly higher enrollment than 7 of the surrounding states, and equivalent enrollment to Illinois' plan. The average account balance in Missouri is generally higher than the average balance in the other states contacted. Half of the surrounding states require employees to contribute to the state's pension fund, which may impact participation in deferred compensation plans. The number of investment options available in Missouri's plan (31) was significantly more than the surrounding state average (18.5). Table 1.1 documents information on Missouri's plan and the plans in 8 surrounding states obtained in spring 2008.

**Table 1.1: Surrounding States' Plan Participation, Assets and Investment Options**

State	Participants	Assets	Investment Options
Missouri	57,567	\$1,427,027,906	31
Illinois	53,000 <sup>1</sup>	3,003,328,043	13
Oklahoma	25,000 <sup>1</sup>	492,728,161	15
Kentucky	17,617	337,851,120	28
Kansas	15,580	456,447,260	20
Nebraska	15,000 <sup>1</sup>	135,000,000 <sup>1</sup>	12
Iowa	14,591	321,002,000	24 <sup>2</sup>
Arkansas	10,000 <sup>1</sup>	352,539,360	25
Tennessee	5,000 <sup>1</sup>	160,000,000 <sup>1</sup>	11

<sup>1</sup> Amount estimated based on discussion with plan representative.

<sup>2</sup> Represents the average options available from the 4 investment providers Iowa offers.

Source: MOSERS and interviews of other states' plan representatives.

Missouri is one of 3 states (including Iowa and Oklahoma) that provide a match incentive to plan participants. Due to differences in TPA duties and plan services provided, administrative fees of the other states' plans could not be easily compared. Missouri's plan has several features not common in other states' plans, including investment advice (3 of 8 states), a self-directed option (4 of 8 states), and a managed account option (1 of 8 states).

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## Plan Changes

MOSERS officials are making significant changes to the deferred compensation plan. The changes will eliminate the existing mutual fund options as investment options for new participants and current participants who do not elect to remain in the existing funds. The stable value fund will remain an investment option, and a series of target-date funds will also be added to the investment options. Target-date funds are an investment tool that is designed to be self-adjusting, shifting from a more aggressive investment mix to a more conservative mix as the investor approaches retirement age. Instead of adding established target-date funds currently available as investment options, MOSERS officials told us they chose to design custom target-date funds with glide paths<sup>7</sup> and investment mixes that are expected to be more supplemental and consistent with the investment mix in the defined benefit pension plan. The officials said management of the funds is outsourced. Our review of surrounding state deferred compensation plans showed 6 of the 8 surrounding states' plans had implemented, or had plans to soon implement, some form of target-date fund(s) as investment options.

Current participants, who elect to keep plan assets in the current mutual fund options, will be allowed to transfer plan assets to the stable value fund or new target-date funds at a later date, but once assets are transferred out of the existing mutual fund options the assets cannot be transferred back. MOSERS officials had planned to entirely eliminate the existing mutual fund options as investment choices in April 2009, but based on participant feedback elected in March 2009 to modify the plan and allow current participants to remain in those funds if desired.

A self-directed investment option will remain in place to allow participants to allocate their account to other investments available on the market. The \$50 annual fee to maintain a self-directed account will be eliminated. See Chapter 2 for analysis of MOSERS plan changes.

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## Scope and Methodology

To gain an understanding of the deferred compensation plan and to discuss plan changes, we conducted interviews with MOSERS officials and current and former officials of the Office of Administration (OA) who assisted the Deferred Compensation Commission in overseeing the plan. We also obtained and reviewed Deferred Compensation Commission minutes, applicable MOSERS Board of Trustees minutes, and available plan documentation.

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<sup>7</sup> The glide path refers to formula that defines the asset allocation mix of a target-date fund, based on the number of years to the target date.

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To evaluate the TPA and stable value fund contract selection process, we reviewed OA bid documentation, including bids submitted and OA's bid evaluation summary analysis. We also interviewed OA purchasing officials involved in the process and the consultant hired by OA to help formulate the bid proposal. We did not identify any significant weaknesses in the selection process.

We interviewed an official from the Attorney General's Office to obtain background information and the current status of the pending litigation against Nationwide regarding the market value adjustment occurring when fixed account assets transferred to ING. We also reviewed documents related to the litigation.

To evaluate the performance of the investment options in the plan, we obtained from MOSERS staff mutual fund performance documentation analyzing both actual and benchmark<sup>8</sup> results. We also obtained and reviewed an analysis done by MOSERS staff that evaluated performance of the 30 mutual fund options currently available in the plan compared to the state's employee retirement defined benefit pension plan.

To assess the impact of MOSERS investment option changes in terms of cost to participants, we obtained expense ratio information for the current mutual fund options from MOSERS documentation, and obtained data on how participants invested their assets among the investment options as of April 2008. We also considered the number of participants in the plan as of April 2008. We used this information to determine the approximate amount of administrative and fund expenses participants are currently paying. To determine potential cost savings that would result from the changes, we took the expense ratio expected by MOSERS and multiplied it by the amount of assets currently invested in the mutual fund options, excluding the assets currently invested in the stable value fund. We attempted to account for participants choosing to use the self-directed investment option by projecting several scenarios. We projected costs assuming 10, 15, and 25 percent of plan assets would be invested through the self-directed window.<sup>9</sup>

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<sup>8</sup> Investment literature defines benchmark as a standard against which the performance of a security, mutual fund or investment manager can be measured. Generally, broad market and market-segment stock and bond indexes are used for this purpose.

<sup>9</sup> It appears reasonable to assume these projections should also be similar to participants that choose to keep their current mutual fund investment options as part of adjustments to the plan changes MOSERS officials announced in March 2009.

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We performed our work in late spring and early summer 2008 as MOSERS officials were in the process of finalizing the investment option changes discussed in the report. We updated the report as new information became available and the proposed changes became finalized. The report could not be released until MOSERS staff informed plan participants of the changes.

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# MOSERS Changes Should Benefit Participants

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Many investment options currently offered in the state's deferred compensation plan had returns that underperformed their investment benchmark for the last 5 years or 10 years and during both periods.<sup>10</sup> The plan offered more investment options than other states' plans reviewed; however, the similar style of many of these options may have resulted in overlapping investment strategies. MOSERS planned elimination of these investment options and replacement with custom target-date funds should benefit participants by reducing fund management costs while providing more diversified investment choices.

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## Investment Options Often Underperformed Benchmarks

The performance of investment options currently available in the plan could have been better. Our analysis of these investment options showed a significant number underperformed their investment benchmark. Of the 30<sup>11</sup> investment options available, 24 had 5 and 10 year established benchmarks to evaluate against. Of those 24 funds, 15 funds (63 percent) underperformed relative to their 5-year benchmark, 13 funds (54 percent) underperformed relative to their 10-year benchmark, and 10 funds (42 percent) underperformed relative to both their 5 and 10-year benchmarks. Participants had invested approximately \$237 million (32 percent of the total plan investments in mutual fund options) in these 10 funds as of April 2008.

An analysis performed by MOSERS staff showed 7 of the 30 fund options outperformed the MOSERS portfolio for the defined benefit pension fund from July 2000 to March 2008. However, only 1 of those 7 funds did so while assuming less risk than the defined benefit portfolio. Seven funds underperformed the defined benefit portfolio while assuming a lower or equal risk level and the remaining 16 funds underperformed the defined benefit portfolio while assuming a higher risk level than that portfolio. Appendix I shows the status for each fund.

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## Funds with similar investment styles impacts diversification

Based on the number of investment options available in other states' plans and discussions with MOSERS officials, the number of investment options currently available in Missouri's plan may have led to overlap in investment strategies and negatively impacted diversification. Deferred compensation plans in the 8 surrounding states average 18.5 investment options, compared to the 31 Missouri's plan offered. MOSERS officials said the current investment options included too many funds, and specifically too many funds in the same investment style, leading to overlap in investment

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<sup>10</sup> As of March 31, 2008.

<sup>11</sup> Excludes the stable value fund.

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strategies that negatively impacted participant investment diversification and choices.

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## Changes Should Significantly Reduce Participant Costs and Simplify Investment Planning

The changes<sup>12</sup> planned by MOSERS officials to create target-date funds and eliminate the current investment options should result in significant cost savings for plan participants. Overall, participants would pay about the same for TPA annual costs; however, fund management costs would decrease. MOSERS officials expect the management costs for the target-date funds to be approximately .25 percent of invested assets (25 basis points). Our analysis showed that would be about 68 percent less than management fees charged on the current mutual fund options.<sup>13</sup> Depending on how many participants decide to use the self-directed investment option instead of utilizing the target-date funds, our analysis estimates the MOSERS changes would save participants between approximately \$3.1 and \$3.7 million (between 31 to 36 percent) in fees per year.<sup>14</sup>

MOSERS has not determined what level of return plan participants should expect from the target-date fund options. However, MOSERS officials said target-date funds ensure participants receive an adequate return, while assuming a reasonable amount of risk, relative to their age. In other words, a properly designed target-date fund should automatically help participants take on an appropriate level of risk for their age and situation. MOSERS officials said the investment mix that makes up the target-date funds is customized to better diversify the funds and provide an investment mix that supplements the state employees' defined benefit pension plan. The use of target-date funds should, therefore, simplify investment planning for plan participants, reduce the need for investment advice, and change the focus of participant education services.

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<sup>12</sup> We performed this analysis before MOSERS officials elected in March 2009 to alter the planned changes and allow current participants to keep their investments in the existing mutual funds. MOSERS officials could not provide an estimate of the amount of plan assets that would not move into the target-date funds in April 2009. We believe our analysis estimating potential assets that would have moved into the self directed brokerage window would be similar to the estimated assets that will remain in the current mutual fund options. MOSERS officials said the administrative costs for the target-date funds may be impacted depending on how many plan assets do not transfer to the target-date funds. That impact cannot be determined until participants make their investment decisions.

<sup>13</sup> We assumed MOSERS expense ratio to be .25 percent of invested assets, based on discussions with MOSERS officials, while the weighted average expense ratio being paid by participants for the mutual fund investment options is currently .80 percent of invested assets.

<sup>14</sup> Estimate based on 10 and 25 percent of plan assets in mutual fund options at April 2008 being moved to self-directed accounts or remaining in the current mutual fund investment options.

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## Conclusions

An investment plan with too many investment options, particularly investment options that (1) do not achieve benchmark levels, and (2) take on higher risk and provide lower returns, relative to other safer options, is not in the best interest of plan participants. Many investment options currently available in the deferred compensation plan have overlapping investment strategies which may have negatively impacted diversification, and may have resulted in plan participants making poor investment decisions.

MOSERS changes are projected to significantly decrease overall fund management costs, while simplifying participants' investment planning and allowing them to have a more diversified investment portfolio. The use of target-date funds should also allow participants to improve investment returns relative to investment risk.

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## Agency Comments

*We appreciate the State Auditors Office concurring with our plans to offer the deferred compensation plan participants a streamlined and cost-reducing approach to supplementing their retirement income through this tax favored savings arrangement. The imminent changes you opined on in your audit report were not made without thoroughly vetting the alternatives available. Based on our research, we believe the modifications being made reflect best practices in the industry.*

*As a result of the changes, the participants can look forward to lower investment management expenses, and a greater probability of maintaining an age appropriate well diversified portfolio. Consequently, we anticipate that participants will experience greater success rates in achieving their retirement nest-egg objectives in a substantially simplified manner.*

# Investment Option Analysis

Table I.1 lists the current investment options available, the total amount of assets participants had invested in each option at April 2008, whether the option met its 5 and 10 year benchmark, and how the option compared to the MOSERS defined benefit pension plan.

**Table I.1: Investment Option Analysis**

<b>Investment Option</b>	<b>Assets Invested April 2008</b>	<b>% of Total Assets</b>	<b>5-Year<sup>1</sup> Benchmark</b>	<b>10-Year<sup>1</sup> Benchmark</b>	<b>Compared to MOSERS Plan<sup>2</sup></b>
ING Stable Value	\$681,167,614	47.7	NA	NA	NA
Fidelity Contrafund	151,307,662	10.6	Y	Y	D
American Century Ultra	72,445,945	5.1	N	Y	D
SEI Index S&P 500	55,601,922	3.9	N	N	D
Fidelity Equity-Income	54,157,064	3.8	N	N	D
Neuberger Berman Genesis	45,135,581	3.1	Y	Y	B
American Century Equity Income	32,731,458	2.3	N	Y	B
Gartmore Nationwide	27,935,200	2.0	Y	N	D
American Century Growth	27,774,244	2.0	Y	Y	D
Templeton Developing Market	27,311,950	1.9	N	N	B
Vanguard LifeStrategy Growth	24,583,138	1.7	NA	NA	D
T. Rowe Price International Stock	24,274,766	1.7	N	N	D
Vanguard Total Stock Markets	19,534,861	1.4	Y	Y	D
Putnam Investors	19,298,002	1.4	N	N	D
Vanguard LifeStrategy Moderate Growth	18,606,019	1.3	NA	NA	C
AIM Dynamics	17,400,725	1.2	N	N	D
Janus Worldwide	15,756,073	1.1	N	N	D
Goldman Sachs Mid Cap Value	13,149,196	.9	N	Y	B
American Funds Bond Fund	12,681,520	.9	Y	N	C
Jennison Blend	12,338,534	.9	Y	Y	D
Janus Small Cap Value	10,526,262	.7	N	Y	B
Fidelity Asset Manager	10,256,637	.7	N	N	C
Vanguard LifeStrategy Conservative Growth	8,554,015	.6	NA	NA	C
Vanguard Inflation Protected Security	7,090,884	.5	NA	NA	A
Federated US Government 2-5 year	6,965,153	.5	N	N	C
Dreyfus Premier Third Century	6,160,639	.4	N	N	D
Vanguard LifeStrategy Income	5,863,911	.4	NA	NA	C
Dreyfus Small Cap Value	5,400,720	.4	Y	Y	B
Brown Capital Management Small Company	3,054,999	.2	N	Y	D
Dryden Total Return	2,181,830	.15	Y	N	C
AIM Small Cap Growth	681,840	.05	NA	NA	D
Self- directed	7,099,542	.5	NA	NA	NA
<b>Total</b>	<b>\$1,427,027,906</b>	<b>100</b>			

Key: Y - Investment option achieved designated benchmark. N - Investment option did not achieve designated benchmark. NA - Not Applicable.

A - Investment option outperformed the MOSERS defined benefit pension portfolio, while assuming less risk.

B - Investment option outperformed the MOSERS defined benefit pension portfolio, while assuming more risk.

C - Investment option underperformed the MOSERS defined benefit pension portfolio, while assuming less or equal risk.

D - Investment option underperformed the MOSERS defined benefit pension portfolio, while assuming more risk.

<sup>1</sup> Period ended March 31, 2008.

<sup>2</sup> Analysis period July 2000 to March 2008.

Source: MOSERS data