September 16, 2003

MEMORANDUM

TO: Ben D. Altamirano, Chairman
Legislative Finance Committee Members

FROM: Dominic Garcia, Fiscal Analyst

SUBJECT: Overview of Investment Programs – FY03 Final Quarter

SUMMARY

For the fiscal year ended June 30, 2003, all investment programs- the Educational Retirement Board (ERB), Public Employee Retirement Association (PERA), and the State Investment Council funds (Land Grant Permanent Fund and Severance Tax Permanent Fund)- showed positive returns in a quarter over quarter and year over year comparison.

In a year over year comparison, PERA continued to outpace all other state funds in annual returns with a 3.7 percent return, the Land Grant Permanent Fund (LGPF) was closely behind at 3.6 percent, the Severance Tax Permanent Fund (STPF) at 3.0 percent, and finally ERB at 2.8 percent. However, the LGPF and STPF were the only state funds to exceed their policy targets. This over performance contributed to approximately $63.7 million in annual gains over their policy target returns.

In a quarter over quarter comparison, ERB posted an 11.7 percent return to lead the pack. This is an encouraging sign for ERB considering its below-the-median performance the last few years. Followed closely behind ERB were the LGPF with an 11.3 percent return, STPF at 11.2 percent, and PERA at 9.3 percent. PERA, notably, had a significant underperformance of its targets for the quarter, however this was mainly due to under allocation in the equity markets that PERA reversed by the end of the quarter. Lastly, as the equity markets perked up during the last quarter, all funds including PERA are positioned to likely see higher gains.

ASSET VALUES AND CHANGES

Table 1 presents changes in asset values for the fourth quarter and for the fiscal year ending June 30, 2003. For the quarter, all funds showed positive gains. ERB's June 30 ending asset value totaled $6.05 billion, up $626 million from the previous quarter. PERA's ending asset value balance totaled $8.15 billion, up $688 million from the previous quarter. SIC's permanent funds combined gained roughly $975 million from the previous quarter.

Table 1

Fund Asset Values
For Fourth Quarter and Year Ending June 30, 2003
(In Millions)

QUARTERLY	ERB	PERA	LGPF	STPF
Ending Asset Values (6-30-03)	6,050.3	8,146.2	6,807.6	3,323.1
Change (Previous Qtr)	625.5	687.6	681.0	294.0
Change (Percent)	11.5	9.2	11.1	9.7
ANNUAL	**ERB**	**PERA**	**LGPF**	**STPF**
Change (Year Ago)	79.9	263.2	111.5	-84.6
Change (Percent)	1.3	3.3	1.6	-2.4

ASSET ALLOCATION

Table 2 presents data detailing the asset allocation of all funds for the quarter ending June 30, 2003. ERB had the largest percentage portfolio allocation of U.S. equity for all the funds, with 53.8 percent. Moreover, this asset allocation translated into ERB outperforming all state funds due to gains in the U.S. equity market for the quarter. In the bond side, PERA remained the fund with the largest portfolio allocation of U.S. fixed income with 36.1 percent, reflecting the defensive position of the fund.

Table 2

Fund Asset Allocation Detail
Quarter Ending June 30, 2002
(In Percent)

ASSET CLASS	ERB		PERA		LGPF		STPF	
	Actual	**Target**	**Actual**	**Target**	**Actual**	**Target**	**Actual**	**Target**
Total Equity	69.2	70.0	63.9	60.0	68.2	71.0	70.0	71.0
U.S. Equity	53.8	53.0	50.2	42.0	51.8	50.0	52.4	50.0
International Equity	15.4	17.0	13.7	18.0	13.9	15.0	14.1	15.0
Private Equity	n/a	n/a	n/a	n/a	2.5	6.0	3.5	6.0
U.S. Fixed Income	29.9	30.0	36.1	40.0	27.9	26.0	25.3	26.0
U.S. High Yield Bonds	n/a	n/a	n/a	n/a	3.5	3.0	3.3	3.0
Economically Targeted	n/a	n/a	n/a	n/a	0.1	0.0	1.3	0.0
Cash Equivalents	0.9	0.0	0.1	0.0	0.3	0.0	0.1	0.0

In addition to the data given above, SIC, in the quarter ended June 30, moved $1.6 billion from the large cap active portfolio of both the LGPF and STPF into the internal large cap index passive portfolio and into the core bond portfolio. Consequently, the large cap active portfolio dropped from 25.3 percent of the total fund to 10 percent and the large cap passive increased from 16.5 percent to 30.3 percent of the total fund.

INVESTMENT PERFORMANCE

<u>Market Environment.</u> After a few years of negative returns in the stock markets in the US, the market had robust returns for the quarter ended June 30. The market rebound was buoyed by low interest rates, tax cuts, better than expected corporate profits, and an official end to the war in Iraq. The market was up in all ten of the S&P 500 industry sectors and 470 of the 500 stocks in the index were also up. The S&P 500 index (a key index for U.S. equities) increased 15.4 percent. Also, the Dow and NASDAQ indices recorded their strongest quarterly returns since December 2001.

The bond market also continued to rise. The Lehman Aggregate (the key benchmark for the US bond market) rose 2.5 percent with corporate bonds leading the way and outperforming treasuries. However, with greater yields in the stock markets for the past quarter, bond investors looked for higher returns resulting in surges into high yield or junk bonds.

In the international markets, equities surged as well. The MSCI EAFE index (the key index for non-US developed markets) rose 19.3 percent for the quarter. Moreover, despite the outbreak of SARS, Asian stocks were able to rally, enjoying gains not seen in three and a half years. Lastly, emerging markets top 20 markets were able to record double-digit gains for the quarter.

<u>Comparing Fund Returns.</u> Table 3 and Table 4 present a breakdown of fund performance of all state funds for the quarter and year ending June 30, 2003. The investment agencies in September 2002 agreed to common benchmarks for comparison between funds, but these benchmarks do not correspond to individual fund policy targets. Because each fund has differing asset allocations and investment policies, the benchmark shown in the second column for Table 3 and Table 4 are only for inter-fund comparisons. However, the policy target data shown is the key measure to evaluate an individual fund's performance; this is compared against actual returns of a particular fund. Lastly, the benchmark for economically targeted investments is unreasonably low, which may imply a significant opportunity cost of investing in other assets with higher return.

Table 3
Fund Performance Detail
Quarter Ended June 30, 2003
(In Percent)

ASSET CLASS	BENCHMARK**	ERB	PERA	LGPF	STPF
U.S. Equity	16.2	15.5	15.0	15.2	15.2
U.S. Fixed Income	2.5	2.6	2.6	3.2	3.2
U.S. High Yield Bonds	10.1	n/a	n/a	5.6	5.6
International Equity	19.3	19.8	18.6	19.1	19.1
Emerging Market Equity	23.3	25.4	n/a	25.3	25.3
Private Equity/Venture Capital *	-7.0	n/a	n/a	-11.3	-11.3
Economically Targeted Investments	0.3	n/a	n/a	1.2	0.3
Cash Equivalents	0.3	0.4	1.8	0.5	0.3
Individual Fund Policy Target		**12.9**	**11.3**	**12.0**	**12.0**
Total Fund Actual Return		**11.7**	**9.3**	**11.3**	**11.2**

** Performance for Venture Capital is reported on a lag*

***Benchmarks for each asset class are listed in the appendix.*

For the quarter, ERB's returns averaged 11.7 percent, which was roughly 40 basis points (a basis point is one-hundredth of a percent) higher than the SIC and 2.4 percent higher than PERA. ERB outperformed all other funds in U.S. and international equity as well as in emerging markets. However, in domestic fixed income, the SIC outperformed both PERA and ERB by approximately 60 basis points.

Furthermore, as Table 4 shows, PERA leads the pack for year ended returns at 3.7 percent. This is 90 basis points above ERB, 10 basis points above the LGPF, and 70 basis points above the STPF. ERB outperformed the other funds in domestic equities, domestic fixed income, and emerging markets; while the SIC lead the way in international equities. However, because of PERA's defensive posture and overexposure to bonds and cash equivalents, PERA outpaced the other funds in overall fund return.

Table 4
Fund Performance Detail
Year Ended June 30, 2003
(In Percent)

ASSET CLASS	BENCHMARK**	ERB	PERA	LGPF	STPF
U.S. Equity	0.22	2.9	-1.2	-0.4	-0.4
U.S. Fixed Income	10.4	11.0	9.8	12.3	12.3
U.S. High Yield Bonds	22.8	n/a	n/a	18.3	18.3
International Equity	-6.46	-6.2	-7.4	-3.5	-3.5
Emerging Market Equity	6.9	9.8	n/a	12.8	12.8
Private Equity/Venture Capital *	-29.4	n/a	n/a	-23.7	-23.7
Economically Targeted Investments	1.5	n/a	n/a	6.3	6.3
Cash Equivalents	1.5	1.9	3.8	1.8	1.8
Individual Fund Policy Target		**3.9**	**4.2**	**2.8**	**2.7**
Total Fund Actual Return		**2.8**	**3.7**	**3.6**	**3.0**

**Venture Capital is reported on a lag.*

***Benchmarks for each asset class are listed in the appendix.*

ERB. The quarterly returns for ERB equaled 11.7 percent versus its policy target of 12.9 percent, indicating a 1.2 percent underperformance of its target. For the year, ERB returns equaled 2.8 percent, underperforming its annual policy target of 3.9 percent. Based on the June 2002 valuation of ERB's fund, the loss to the fund for underperforming the annual policy target was approximately $65.6 million. For the quarter, much of ERB's underperformance of its target is attributed to the underperformance in domestic equities. In fact, partly to address performance in U.S. equities and diversification of the overall portfolio, ERB replaced one domestic equity manager and adopted an asset policy that reduces overall allocation in domestic equities by 7 percent. The adopted reallocation will move into high yield bonds for the first time and increase allocation in international equities.

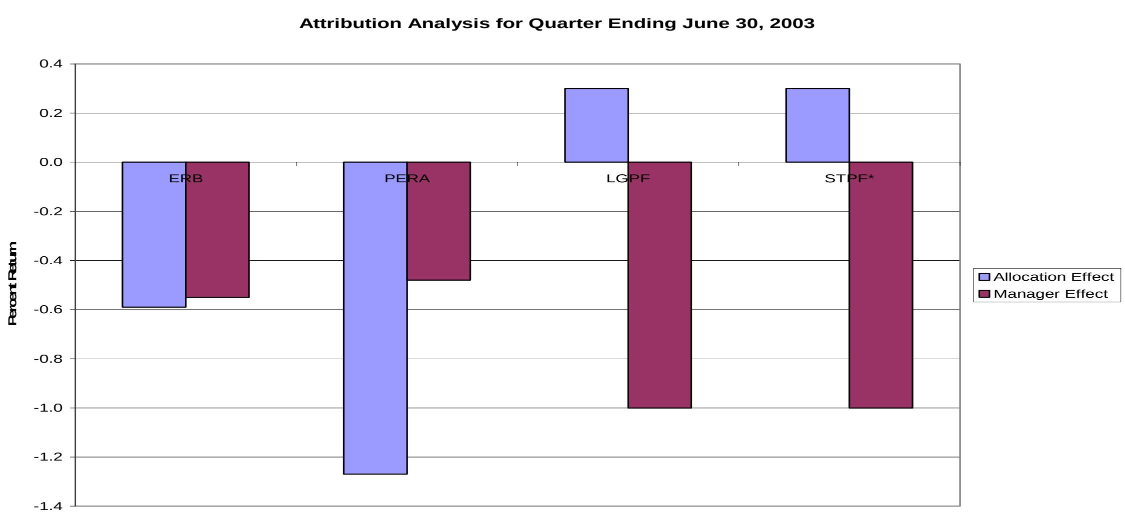
PERA. The quarterly returns for PERA equaled 9.3 percent, underperforming its policy target significantly by 1.9 percent. For the year, PERA's investments returned 3.7 percent, also underperforming the annual policy target of 4.2 percent. Based on the June 2002 valuation of the PERA fund, the loss to the fund for underperforming the annual policy target amounted to roughly $39.4 million. For the quarter, PERA's underperformance of its target was mainly due to under allocation in both the domestic and international equity markets at the beginning of the quarter. However, PERA has quickly reversed this position to end the quarter with an 8.2 percent over allocation in domestic equities over its policy target.

State Investment Council (LGPF and STPF). SIC quarterly returns for the LGPF and STPF equaled 11.3 percent and 11.2 percent respectively, both underperforming their policy target of 12.0 percent. For the year, the LGPF and STPF outpaced their policy target of 2.8 percent and 2.7 percent and posted returns of 3.6 percent and 3.0 percent respectively. Based on June 2002 valuations of the LGPF and STPF, the funds' annual performance roughly gained a combined $63.7 million beyond its targets. Moreover, for the quarter, SIC's large cap active equity portfolio posted a 12.3 percent return, but significantly struggled against the S&P 500 benchmark that gained 15.4 percent. The internal large cap active portfolio has consistently underperformed its benchmarks where for five years ending June 30, 2003 the portfolio underperformed the S&P 500 by 90 basis points. As a result, SIC pulled $1.6 billion out of the large cap active portfolio in April and moved $1.3 billion into a large cap index- a passive portfolio.

Attribution Analysis. When evaluating the investment performance of a fund, the baseline for comparison is the individual fund's policy targets. Consequently, actual investment performance for a given time period above or below those targets can be attributed to the fund's asset allocation or the fund's manager performance. The attribution to asset allocation is due to over/under weighting the portfolio in a particular asset class that has had superior/inferior returns for a time period. The performance of the fund beyond asset allocation is known as manager effect, where the excess return is attributed to investment manager savvy at selecting individual investments. Therefore, if the asset allocation is equal to the policy target then the asset allocation effect would be zero, and all returns in excess of the policy target would be attributed to manager effect.

Figure 1 shows the attribution between asset allocation and manager performance for the quarter ending June 30, 2003. SIC's investment funds are the only funds that had positive allocation effects of 30 basis points, but their manager effects pulled down returns versus the target of -1.0 percent. PERA had the most significant negative impact of asset allocation of -1.3 percent, which again is reflective of PERA's defensive allocation at the beginning of the quarter. Lastly, all funds had negative manager effects that had significant costs to fund performance.

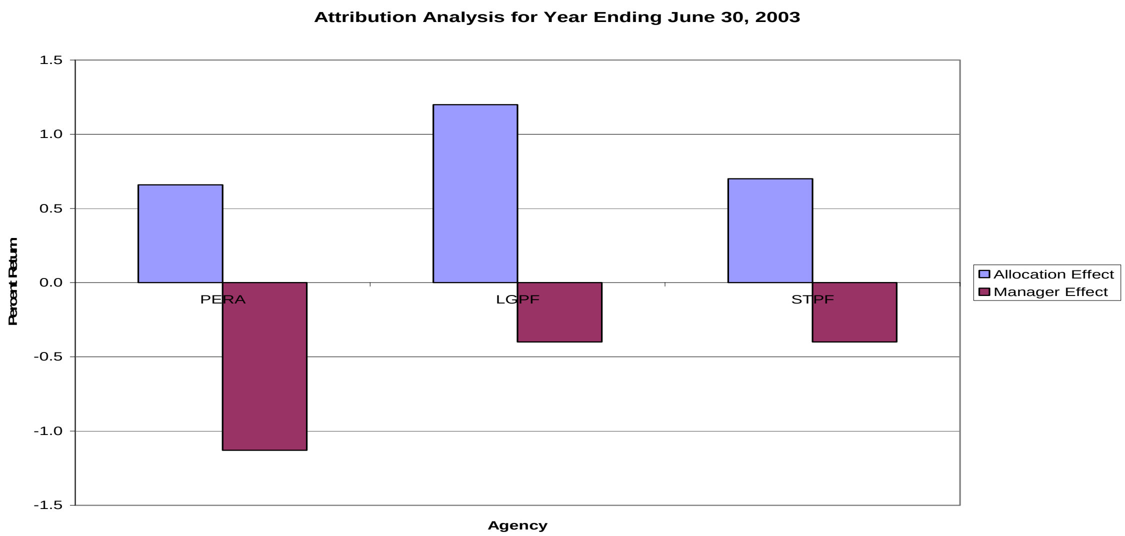
Figure 1



**The STPF attribution is assumed to duplicate the LGPF.*

Figure 2 demonstrates the attribution analysis between asset allocation and manager performance for the year ended June 30, 2003. It should be noted that there is no data for ERB. Again, the LGPF and STPF are the only funds that posted gains above its policy targets. As the analysis demonstrates, most of that excess gain is attributed to asset allocation. On the other hand, although PERA posted the highest returns for the year of any fund, manager performance held PERA down from further gains.

Figure 2



RISK ANALYSIS

A chief way to evaluate an individual fund's degree of risk is to examine the fund's standard deviation from the mean return in the portfolio. This statistical measure shows the historical volatility of the fund that indicates the risk-adjusted quality of the return. For instance, if two funds have identical returns, the fund with a lower standard deviation (less volatile or risky) is considered to have a superior performance.

A short-term analysis of one-year standard deviation indicates that the LGPF and STPF had the lowest standard deviation and consequently least volatile fund for the year ended June 30. Also, ERB had an inordinately high standard deviation of 19.4 percent. This high level of volatility is due to ERB's over allocation in equities and limited asset diversification. However, more importantly, a long-term analysis indicates that PERA has the least risky portfolio of all the funds. This is significant because PERA's long-term returns continue to lead its peers in New Mexico and the country, while maintaining a minimal risk profile.

Table 6

Fund Standard Deviation for Quarter Ending June 30, 2003

	ERB	PERA	LGPF	STPF
1 year	19.41	14.16	12.46	12.65
3 year	14.41	10.35	12.4	12.5
5 year	14.05	11.43	13.00	13.00
10 year	11.44	9.60	10.4	10.3

Appendix

(1) The following are benchmarks used for comparison among the investment agencies:

ASSET CLASS	BENCHMARK
U.S. Equity	Russell 3000
U.S. Fixed Income	Lehman Aggregate
U.S. High Yield Bonds	Lehman High Yield
International Equity	MSCI EAFE
Emerging Market Equity	MSCI EMF
Private Equity/Venture Capital	Cambridge VC
Economically Targeted Investments	90 day T-Bill
Cash Equivalents	90 day T-Bill

(2) The following are the major market indices return:

Major Market Indices

	FY03- Q4	FY ENDED JUNE 30, 2002
S&P 500	15.4	0.22
S&P 500 BARRA Value	18.8	-1.8
Russell 3000	16.2	0.7
MSCI EAFE	19.3	-6.46
MSCI EMF	23.3	6.9
Lehman Aggregate	2.5	10.4

DG/lg