

(Preliminary Subject to Change)



Employees Retirement System

City of Philadelphia Employees Retirement System Executive Summary May 31, 2020 Total Fund Composite

	Ending May 31, 2020										
	Asset Class	Market Value (\$)	3 Mo Net Cash Flows (\$)	% of Portfolio	Policy %	Policy Difference (\$)					
Total Fund Composite		5,671,579,976	355,579,718	100.0	100.0	0					
Total Fund w/o Alternative Assets		4,188,830,451	360,647,682	73.9	71.0	162,008,668					
Investment Grade Fixed Income Composite		725,006,720	19,780	12.8	13.0	-12,298,677					
Brandywine Global Investment Management	Global Fixed Income	140,083,299	0	2.5							
Garcia Hamilton & Associates	Int. Govt. Fixed Income	184,058,120	0	3.2							
MetLife Investment Management	Core Plus Fixed Income	50,935,663	19,780	0.9							
Longfellow	Core Plus Fixed Income	179,090,097	0	3.2							
RhumbLine Core Bond Index	Core Fixed Income	170,839,540	0	3.0							
Opportunistic Fixed Income Composite		222,277,479	-614,213	3.9	4.0	-4,585,720					
T - Apollo Franklin Partnership, L.P.	Opportunistic Fixed Income	5,973,569	0	0.1							
T - Avenue Coppers Opportunity Fund LP	Opportunistic Fixed Income	14,482,435	0	0.3							
T - KKR-PBPR Capital Partners LP	Opportunistic Fixed Income	25,831,486	-394,232	0.5							
MetLife Investment Management - EMD	EM Fixed Income	73,460,020	-219,980	1.3							
Strategic Income Management	High Yield Fixed Income	49,898,659	0	0.9							
Lord Abbett High Yield	High Yield Fixed Income	52,215,876	0	0.9							
U.S. Equity Composite		1,670,820,339	0	29.5	28.0	82,777,946					
RhumbLine Russell 1000 Index	Large-Cap Core	1,241,815,804	0	21.9							
O'Shaughnessy Asset Management	Large-Cap Value	25,387,417	0	0.4							
RhumbLine MidCap Index	Mid-Cap Core	150,788,432	-6,007	2.7							
RhumbLine Russell 2000 Index	Small-Cap Core	89,374,861	-3,667	1.6							
Emerald Advisors	Small-Cap Growth	84,108,253	0	1.5							
Fiera Capital	Smid-Cap Growth	30,931,273	0	0.5							
Ariel	Smid-Cap Value	48,263,010	0	0.9							
Non-U.S. Equity Developed Composite		987,775,387	-2,005	17.4	23.0	-316,688,008					
Causeway Capital Management	Non-U.S. Large-Cap Core	66,543,109	0	1.2							
Northern Trust MSCI EAFE+Canada	Non-U.S. Large-Cap Core	732,868,152	0	12.9							
Northern Trust International Small Cap	Non-U.S. Small-Cap Core	95,775,650	0	1.7							
Strategic Global Advisors	Non-U.S. Small-Cap Core	29,098,067	0	0.5							
Mackenzie Investments	Non-U.S. Small-Cap Core	59,542,615	-28	1.0							
Non-U.S. Equity Emerging Composite		196,410,182	1,977	3.5	3.0	26,262,783					
RhumbLine Emerging Markets Index	Emerging Markets	196,405,727	1,977	3.5							

Market Value: \$5,671.6 Million and 100.0% of Fund

Total Fund Composite

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	Asset Class	Market Value (\$)	3 Mo Net Cash Flows (\$)	% of Portfolio	Policy %	Policy Difference (\$)
Cash Composite		386,540,344	361,242,144	6.8	0.0	386,540,344
Cash	Cash & Equivalents	385,884,424	361,247,636	6.8		
Directed Commissions	Cash & Equivalents	655,920	-5,492	0.0		
Absolute Return		21,204,945	0	0.4	0.0	21,204,945
Elizabeth Park Capital Management	Long/Short Hedge Fund	20,176,743	0	0.4		
T - Archview Offshore Fund. LTD	Credit Hedge Fund	1,028,202	0	0.0		
Real Assets Composite		943,316,080	-5,067,964	16.6	17.0	-20,852,516
Real Assets - Public Real Estate Composite		52,070,520	0	0.9	1.0	-4,645,280
RhumbLine FTSE NAREIT	Real Assets	52,070,520	0	0.9		
Real Assets - Open-End Real Estate Composite		533,247,614	-4,420,459	9.4	10.0	-33,910,383
UBS Trumbull Fund	Core Real Estate	389,396,362	-4,130,409	6.9		
Clarion Lion Properties Fund	Core Real Estate	143,851,252	-290,050	2.5		
Real Assets - Infrastructure Composite		264,522,337	0	4.7	5.0	-19,056,662
RhumbLine Infrastructure Index	Publicly-Traded Infrastructure	174,160,508	0	3.1		
Rreef Global Infrastructure	Global Infrastructure	90,361,829	0	1.6		
Real Assets - Private Real Estate Composite		77,644,965	-1,210,595	1.4	1.0	20,929,165
Real Assets - Private Energy/Infrastructure Composite		15,830,644	563,090	0.3		15,830,644
Private Assets Composite		518,228,500	0	9.1	12.0	-162,361,097
Private Assets - Private Equity	U.S. Private Equity FoF	488,968,311	0	8.6		
Private Assets - Private Debt	Mezz. Private Equity	29,260,189	0	0.5		

Ending May 31, 2020

Market Value: \$5,671.6 Million and 100.0% of Fund

Annualized Performance (Net of Fees)

Market Value: \$5,671.6 Million and 100.0% of Fund

Ending May 31, 2020

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	1 Mo	3 Mo	YTD	Fiscal YTD	1 Yr	2 Yrs	3 Yrs	4 Yrs	5 Yrs	7 Yrs	10 Yrs	Inception	Inception Date
Total Fund Composite	3.1%	-1.3%	-6.6%	-0.5%	3.8%	2.9%	5.0%	6.9%	4.5%	5.4%	7.0%	7.3%	Jul-88
Total Fund Policy Benchmark	3.1%	-0.3%	-5.4%	0.9%	5.6%	4.4%	5.9%	7.6%	5.4%	6.3%	7.6%	8.2%	Jul-88
Total Fund w/o Alternative Assets	4.0%	-1.2%	-8.0%	-1.5%	3.4%	1.2%	3.9%	6.2%	3.8%			4.5%	Jan-14
Investment Grade Fixed Income Composite	1.3%	0.7%	2.7%	5.0%	6.7%	5.6%	4.0%	3.6%	3.2%	2.8%	3.6%	6.0%	Jul-88
Fixed Income Custom Benchmark	0.4%	1.4%	5.0%	7.0%	8.6%	7.3%	4.7%	3.9%	3.7%	3.5%	3.8%	6.3%	Jul-88
Brandywine Global Investment Management	3.9%	-0.7%	-3.9%	-2.0%	1.6%	0.8%	1.5%	2.6%	2.1%	1.7%	4.4%	6.0%	Jan-09
FTSE WGBI TR	0.2%	0.8%	3.4%	3.9%	6.4%	4.6%	3.7%	2.7%	3.5%	2.0%	2.5%	2.6%	Jan-09
Garcia Hamilton & Associates	0.8%	1.5%	3.8%	5.6%	6.5%	5.8%	3.8%	3.3%	3.3%	3.2%	4.0%	5.2%	Aug-00
BBgBarc US Govt/Credit Int TR	0.8%	1.7%	4.6%	6.5%	7.6%	6.7%	4.2%	3.5%	3.2%	2.9%	3.2%	4.5%	Aug-00
MetLife Investment Management	1.0%	0.6%	4.5%	7.5%	8.9%	7.7%	5.3%	4.8%	4.3%			4.2%	Oct-14
BBgBarc US Aggregate TR	0.5%	1.6%	5.5%	8.1%	9.4%	7.9%	5.1%	4.2%	3.9%	3.6%	3.9%	3.9%	Oct-14
Longfellow	0.9%	0.2%	4.0%	6.6%	7.9%	7.1%	4.8%	4.2%	3.9%			3.9%	Sep-14
BBgBarc US Aggregate TR	0.5%	1.6%	5.5%	8.1%	9.4%	7.9%	5.1%	4.2%	3.9%	3.6%	3.9%	4.0%	Sep-14
RhumbLine Core Bond Index	0.3%	1.7%	5.7%	8.2%	9.5%	7.8%	5.0%	4.1%	3.8%	3.4%	3.7%	4.4%	Jun-07
BBgBarc US Aggregate TR	0.5%	1.6%	5.5%	8.1%	9.4%	7.9%	5.1%	4.2%	3.9%	3.6%	3.9%	4.6%	Jun-07
Opportunistic Fixed Income Composite	5.1%	-11.9%	-13.1%	-10.7%	-8.7%	-4.6%	-1.9%	0.8%	-0.1%	1.0%		1.4%	Dec-12
Opportunistic FI Custom Benchmark	4.5%	-4.5%	-5.1%	-1.8%	-0.2%	2.3%	2.6%	4.6%	3.6%	3.8%	5.5%	4.1%	Dec-12
T - Apollo Franklin Partnership, L.P.	-0.6%	-29.4%	-36.1%	-36.1%	-34.9%	-17.8%	-12.3%	-9.7%	-10.4%	-8.1%		-8.1%	May-13
50% BarCap HY / 50% CSFB Lev Loans	4.1%	-4.3%	-5.4%	-2.3%	-1.0%	1.8%	2.4%	4.3%	3.4%	3.7%	5.5%	3.7%	May-13
T - Avenue Coppers Opportunity Fund LP	0.0%	-5.4%	-5.5%	-3.5%	-3.7%	-8.2%	-3.7%	-1.7%	-1.9%			-0.1%	Dec-13
Actuarial Rate	0.6%	1.8%	3.1%	6.9%	7.6%	7.6%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	Dec-13
T - KKR-PBPR Capital Partners LP	0.0%	-37.3%	-37.1%	-38.6%	-38.8%	-24.6%	-15.7%	-9.6%	-7.8%	-4.1%		-2.3%	Jun-12
Actuarial Rate	0.6%	1.8%	3.1%	6.9%	7.6%	7.6%	7.7%	7.7%	7.7%	7.7%	7.7%	7.7%	Jun-12
MetLife Investment Management - EMD	6.9%	-6.4%	-6.9%	-3.5%	0.7%	2.3%	2.0%	5.0%	4.2%			4.2%	Feb-15
JP Morgan EMBI Global TR	5.7%	-5.5%	-4.6%	-1.4%	1.7%	4.3%	2.2%	4.1%	4.2%	3.8%	5.7%	4.3%	Feb-15
Strategic Income Management	7.6%	-6.1%	-8.6%	-4.7%	-2.7%	0.6%	1.8%	4.3%				5.4%	Mar-16
ICE BofA US High Yield TR	4.6%	-4.2%	-5.7%	-2.0%	0.4%	2.9%	2.7%	5.4%	4.1%	4.3%	6.5%	6.3%	Mar-16

Annualized Performance (Net of Fees)

Market Value: \$5,671.6 Million and 100.0% of Fund

Ending May 31, 2020

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	1 Mo	3 Mo	YTD	Fiscal YTD	1 Yr	2 Yrs	3 Yrs	4 Yrs	5 Yrs	7 Yrs	10 Yrs	Inception	Inception Date
Lord Abbett High Yield	5.2%	-5.6%	-6.8%	-2.4%	0.3%							2.9%	Jan-19
ICE BofA US High Yield TR	4.6%	-4.2%	-5.7%	-2.0%	0.4%	2.9%	2.7%	5.4%	4.1%	4.3%	6.5%	2.4%	Jan-19
U.S. Equity Composite	5.9%	2.2%	-6.6%	2.3%	9.5%	5.5%	8.6%	10.8%	7.9%	10.0%	12.1%	9.5%	Jul-88
U.S. Equity Custom Benchmark	5.7%	1.3%	-7.7%	1.2%	8.3%	5.4%	8.5%	10.7%	8.5%	10.7%	12.5%	10.1%	Jul-88
RhumbLine Russell 1000 Index	5.3%	3.4%	-4.9%	5.2%	12.6%	7.9%	10.2%	12.1%	9.6%	11.4%	12.9%	7.9%	May-07
Rhumbline Russell 1000 Custom Benchmark	5.3%	3.4%	-5.0%	5.1%	12.5%	7.9%	10.2%	11.9%	9.6%	11.5%			May-07
O'Shaughnessy Asset Management	3.8%	-7.5%	-20.7%	-13.9%	-7.0%	-6.3%	1.8%	5.8%	2.8%	7.0%		9.4%	Jun-12
Russell 1000 Value	3.4%	-4.6%	-15.7%	-8.2%	-1.6%	-0.1%	2.6%	5.5%	4.4%	7.1%	9.8%	9.4%	Jun-12
RhumbLine MidCap Index	7.0%	-1.4%	-10.6%	-3.9%	2.7%	2.2%	5.5%					6.9%	Dec-16
Rhumbline Russell Mid Cap Custom Benchmark	7.0%	-1.5%	-10.7%	-4.0%	2.6%	2.2%	5.6%					7.0%	Dec-16
RhumbLine Russell 2000 Index	6.5%	-5.1%	-15.9%	-9.7%	-3.3%	-6.1%	2.1%					2.3%	Dec-16
Rhumbline Russell 2000 Custom Benchmark	6.5%	-5.3%	-16.0%	-10.8%	-4.5%	-6.8%	1.7%					1.9%	Dec-16
Emerald Advisors	11.4%	4.5%	-2.5%	0.8%	6.5%	3.2%	10.3%	13.3%	7.8%	12.1%	14.1%	9.5%	Dec-04
Russell 2000 Growth	9.4%	1.7%	-6.6%	-0.4%	7.3%	0.0%	7.7%	10.6%	6.3%	9.3%	11.7%	8.1%	Dec-04
Fiera Capital	10.5%	10.6%	0.4%	5.9%	14.4%	6.2%	11.2%	12.4%	7.3%	10.7%	13.7%	13.7%	Dec-09
Russell 2500 Growth	10.4%	5.4%	-1.6%	5.3%	13.5%	6.2%	11.6%	13.1%	8.7%	11.3%	13.3%	13.2%	Dec-09
Ariel	6.0%	-6.4%	-18.1%	-12.7%	-6.4%	-5.7%	-0.7%	3.3%				5.2%	Jan-16
Russell 2500 Value	4.6%	-11.1%	-22.6%	-17.0%	-11.7%	-9.6%	-2.3%	1.9%	1.3%	4.3%	7.7%	5.0%	Jan-16
Non-U.S. Equity Developed Composite	5.0%	-3.4%	-13.8%	-6.9%	-1.8%	-4.3%	-0.1%	3.6%	0.6%	2.4%	4.9%	5.1%	Jan-89
Non-U.S. Equity Developed Custom Benchmark	4.8%	-3.7%	-14.4%	-7.8%	-2.6%	-4.7%	-0.2%	3.6%	1.0%	3.2%	5.4%		Jan-89
Causeway Capital Management	4.6%	-8.3%	-21.0%	-14.4%	-9.6%	-9.9%	-4.1%	0.4%	-2.0%	1.3%		4.6%	Nov-11
MSCI EAFE	4.4%	-3.7%	-14.3%	-8.3%	-2.8%	-4.3%	-0.4%	3.6%	0.8%	2.9%	5.3%	5.2%	Nov-11
MSCI EAFE Value	3.0%	-10.7%	-22.1%	-17.4%	-13.0%	-10.7%	-5.4%	0.0%	-2.9%	0.1%	3.0%	2.8%	Nov-11
Northern Trust MSCI EAFE+Canada	4.4%	-3.4%	-13.2%	-6.9%	-1.4%	-3.0%	0.7%	4.2%	1.4%	3.1%	5.5%	2.3%	Mar-07
Northern Trust MSCI EAFE + Canada Custom Benchmark	4.4%	-3.4%	-13.2%	-6.8%	-1.2%	-2.8%	0.9%	4.5%	1.6%	3.8%	5.9%	1.9%	Mar-07

Annualized Performance (Net of Fees)

Market Value: \$5,671.6 Million and 100.0% of Fund

Ending May 31, 2020

	1 Mo	3 Mo	YTD	Fiscal YTD	1 Yr	2 Yrs	3 Yrs	4 Yrs	5 Yrs	7 Yrs	10 Yrs	Inception	Inception Date
Northern Trust International Small Cap	7.1%	-2.0%	-14.2%	-4.8%	-0.9%	-6.7%						-6.3%	Mar-18
Northern Trust EAFE Small Cap Custom Benchmark	7.1%	-1.9%	-14.1%	-4.3%	-0.2%	-6.1%						-5.7%	Mar-18
Strategic Global Advisors	6.6%	-2.9%	-15.9%	-9.1%	-4.7%	-10.6%						-7.4%	Nov-17
MSCI World ex USA Small Cap	7.0%	-2.3%	-14.4%	-4.9%	-0.6%	-6.4%	0.0%	3.7%	2.9%	4.9%	7.0%	-3.9%	Nov-17
Mackenzie Investments	8.9%	1.1%	-11.4%	0.1%	3.5%	-6.9%						-3.6%	Nov-17
MSCI EAFE Small Cap	7.1%	-2.1%	-14.3%	-4.8%	-0.8%	-6.5%	0.1%	4.0%	3.3%	5.6%	7.8%	-4.0%	Nov-17
Non-U.S. Equity Emerging Composite	0.8%	-7.8%	-17.6%	-11.2%	-5.6%	-7.2%	-0.5%	5.6%	0.9%	1.1%	1.5%	6.9%	Jan-09
MSCI Emerging Markets	0.8%	-6.9%	-16.0%	-10.0%	-4.4%	-6.6%	-0.2%	6.1%	0.9%	1.2%	2.5%	7.6%	Jan-09
RhumbLine Emerging Markets Index	0.8%	-7.8%	-17.6%	-11.2%	-5.6%	-7.2%	-0.5%	5.7%	0.9%	1.2%		0.4%	Feb-13
MSCI Emerging Markets	0.8%	-6.9%	-16.0%	-10.0%	-4.4%	-6.6%	-0.2%	6.1%	0.9%	1.2%	2.5%	0.5%	Feb-13

Investment Manager

Annualized Performance (Net of Fees)

Market Value: \$5,671.6 Million and 100.0% of Fund

Ending May 31, 2020

	1 Mo	3 Mo	YTD	Fiscal YTD	1 Yr	2 Yrs	3 Yrs	4 Yrs	5 Yrs	7 Yrs	10 Yrs	Inception	Inception Date
Absolute Return	-0.9%	-22.2%	-29.5%	-27.1%	-24.4%	-21.0%	-10.8%	-5.4%	-6.0%	-3.2%	-1.1%	0.1%	Sep-05
HFRI Fund of Funds Composite Index	2.5%	-2.0%	-3.2%	-1.2%	0.3%	-0.3%	1.7%	2.7%	0.9%	2.2%	2.5%	2.3%	Sep-05
Elizabeth Park Capital Management	-0.9%	-22.0%	-29.7%	-26.0%	-22.7%	-20.0%	-9.5%	-2.5%	-1.0%			0.1%	May-14
HFRX Event Driven Index	2.0%	-1.0%	-1.0%	6.2%	7.9%	0.1%	-0.7%	2.8%	0.6%	0.9%	1.8%	-0.2%	May-14
T - Archview Offshore Fund. LTD	0.0%	-25.5%	-25.9%	-43.6%	-47.2%	-34.5%	-21.7%	-14.9%	-14.8%			-11.2%	Mar-14
HFRI ED: Distressed/Restructuring Index	2.6%	-7.0%	-7.7%	-9.4%	-8.7%	-4.2%	-1.2%	2.6%	0.5%	1.3%	3.2%	0.2%	Mar-14
Real Assets Composite	1.3%	-1.7%	-3.7%	-0.3%	-0.4%	3.9%	3.8%	5.0%	2.0%	4.3%		5.4%	Dec-12
Real Assets Benchmark	1.0%	-1.6%	-3.0%	0.5%	1.9%	4.9%	4.7%	5.7%	0.7%	1.3%		2.5%	Dec-12
Real Assets - Public Real Estate Composite	1.7%	-10.0%	-15.3%	-8.6%	-7.3%	3.7%	3.3%	3.7%	5.1%	6.7%		6.8%	Jan-13
FTSE NAREIT All Equity REIT Custom Benchmark	1.7%	-10.0%	-15.3%	-13.9%	-12.7%	0.7%	1.4%	2.3%	3.9%	5.5%			Jan-13
RhumbLine FTSE NAREIT	1.7%	-10.0%	-15.3%	-8.6%	-7.3%	3.6%	3.3%	3.7%	5.1%	6.3%		5.5%	May-13
FTSE NAREIT All Equity REIT Custom Benchmark	1.7%	-10.0%	-15.3%	-13.9%	-12.7%	0.7%	1.4%	2.3%	3.9%	5.5%		4.7%	May-13
Real Assets - Open-End Real Estate Composite	0.0%	0.5%	0.5%	1.8%	-0.9%	2.4%	3.7%		-			3.6%	Jan-17
NFI	0.0%	0.2%	0.8%	3.1%	3.4%	4.6%	5.5%	5.9%	7.0%	8.5%	10.1%	5.6%	Jan-17
UBS Trumbull Fund	0.0%	0.3%	0.3%	0.9%	-3.0%	0.9%	2.6%					2.7%	Jan-17
NFI	0.0%	0.2%	0.8%	3.1%	3.4%	4.6%	5.5%	5.9%	7.0%	8.5%	10.1%	5.6%	Jan-17
Clarion Lion Properties Fund	0.0%	1.2%	1.2%	4.6%	5.7%	7.1%						7.1%	Feb-18
NFI	0.0%	0.2%	0.8%	3.1%	3.4%	4.6%	5.5%	5.9%	7.0%	8.5%	10.1%	5.1%	Feb-18
Real Assets - Infrastructure Composite	4.3%	-3.2%	-8.8%	-2.2%	1.7%	6.8%	4.4%					5.6%	Mar-17
Dow Jones Brookfield Global Infrastructure Index	4.4%	-4.7%	-10.6%	-4.7%	-1.1%	5.0%	3.0%	5.7%	3.3%	5.8%	10.0%	4.3%	Mar-17
RhumbLine Infrastructure Index	4.5%	-4.5%	-10.3%	-4.1%	-0.4%	5.7%	3.8%					5.0%	Mar-17
Dow Jones Brookfield Global Infrastructure Index	4.4%	-4.7%	-10.6%	-4.7%	-1.1%	5.0%	3.0%	5.7%	3.3%	5.8%	10.0%	4.3%	Mar-17
Rreef Global Infrastructure	3.9%	-0.8%	-5.8%	1.6%	6.0%	9.3%						9.3%	Mar-18
Dow Jones Brookfield Global Infrastructure Index	4.4%	-4.7%	-10.6%	-4.7%	-1.1%	5.0%	3.0%	5.7%	3.3%	5.8%	10.0%	5.3%	Mar-18

Annualized Performance (Net of Fees)

Market Value: \$5,671.6 Million and 100.0% of Fund

Ending May 31, 2020

	1 Mo	3 Mo	YTD	Fiscal YTD	1 Yr	2 Yrs	3 Yrs	4 Yrs	5 Yrs	7 Yrs	10 Yrs	Inception	Inception Date
Real Assets - Private Real Estate Composite	0.0%	-2.6%	-2.6%	-0.2%	1.7%	3.8%	4.5%	5.9%	6.3%	8.0%	9.4%	3.8%	May-06
Real Assets - Private Real Estate Benchmark	0.0%	-2.6%	-2.6%	-0.2%	1.7%	3.8%	4.5%	5.9%	6.3%	8.0%			May-06
Real Assets - Private Energy/Infrastructure Composite	0.0%	-12.1%	-12.1%	-10.5%	-8.3%	11.0%	15.7%	15.1%	3.1%	6.2%		6.2%	May-12
Real Assets - Private Energy/Infrastructure Benchmark	0.0%	-12.1%	-12.1%	-10.5%	-8.3%	11.0%	15.7%	15.1%	3.1%	6.2%		6.2%	May-12
Private Assets Composite	0.0%	0.0%	0.0%	8.5%	17.2%	18.0%	17.0%	15.5%	13.5%	13.0%	13.6%	8.9%	Mar-87
Private Assets Composite Benchmark	0.0%	0.0%	0.0%	8.5%	17.2%	18.0%	17.0%	15.5%	13.5%	13.0%	13.6%	8.9%	Mar-87

Please note: As of January 1, 2019, the total fund policy index incorporates the adjustments as approved by the Board of Trustees to reflect the fundamental changes adopted as a result of the approved asset allocation. T represents any investment terminated by the Board of Trustees.