



New York City
Employees' Retirement System
Performance Overview as of March 31, 2016

Total Fund Overview

New York City Employees' Retirement System

Table of Contents:

Consultant's Commentary & Performance Charts	p.3
Appendix A - Consolidated Performance Report	p.22
Appendix B - Public Markets Manager Performance Detail	p.31
Appendix C - Alternative Assets Manager Performance Detail	p.44
Appendix D - Footnote	p.54

City of New York Employees' Retirement System First Quarter 2016 Summary

General Economic and Market Conditions: The U.S. economy's expansion—while subpar relative to past expansions in the 1980s and 1990s—has been slowly building strength and is now entering its seventh year. However, you'd hardly know it if you looked at the capital markets' reaction over the past nine months. Concerns about China, a slowing global recovery, political uncertainty in more than a few countries, and an unclear path as to future interest rates have all spurred investors to swing wildly from lows to highs and back again, all while the broad underlying economic data remain solid.

The National Bureau of Economic Research tracks four monthly indicators in order to identify turning points in the economic cycles. Only one of those—industrial production—is declining, and that decline began back in 2014, when the collapse in oil prices hit the mining sector and the U.S. dollar began to rally, hampering U.S. manufacturing and exports. The other three indicators show no signs of a slowdown, let alone a decline: employment, personal incomes, and real business sales. Adding to this incongruity is the first report on GDP growth for the first quarter of 2016. It came in at a weak 0.5%, down from 1.4% in the fourth quarter of 2015. Almost all economic indicators have been more upbeat than GDP over the past year or two, suggesting that the sum has been less than the parts, that we are misrepresenting economic growth with our GDP calculation, or that we are misreading the headwinds to aggregate growth.

Real GDP growth has continued a familiar pattern, showing anemic first-quarter growth in five of the past six years. Such a pattern is a recent development in U.S. economic history, and suggests (to us) that part of this weakness may in fact be a problematic seasonal-adjustment process within the data calculation. Consumer spending grew 1.9% in the quarter, with the bulk of that growth occurring in services (2.7% gain). The brightest spot was a 14.8% jump in housing, which contributed almost 0.5% to total GDP growth. The residential housing market has finally turned the corner after the plunge that began in late 2005, and several markets on the coasts and in a few other large metro areas are seeing substantial gains in existing home prices and sales. However, housing was the only bright spot in private domestic investment as non-residential sectors suffered declines, led by a 10.7% drop in structures.

The plunge in oil prices early in 2016 triggered another sharp decline in energy-sector capital spending, a trend that has hampered the sector since the initial oil price collapse in 2014. The cause of the drop in equipment spending is less clear, but may be traced to corporate caution following the stock market turmoil that began last summer and reappeared with a vengeance this past January and February.

Through March 31, 2016



The continuing drag from inventories was larger than expected in the first quarter, but on the plus side, it appears that the bulk of the inventory adjustment is now behind us. The rebound in energy prices in March may spell the end of the rout in the energy sector. These factors, combined with signs of continuing economic growth, give businesses confidence and are likely to limit the decline in business fixed investment. The forward-looking Institute for Supply Management activity indices, which measure sentiment for business investment in manufacturing and non-manufacturing areas, are both back above 50, the dividing line between expansion and contraction, and are at levels consistent with GDP growth in excess of 2%.

Concerns about China's growth and its role in restraining confidence elsewhere in the global economy have fueled negative investor sentiment and subsequent capital market volatility. China adopted a new Five-Year Plan with a goal of GDP growth averaging at least 6.5% during 2016-2020. History suggests that goal may be ambitious for an economy that has reached China's level of current development. Official figures stated growth averaging 7.8% per year from 2011-2015, but economists from Capital Economics, a research consultancy based in London, and other forecasters estimate that growth has been closer to 6.5%. A more reasonable estimate for China's economy for the next five years may be closer to 5%; however, a figure that far below the official target could spur further stimulus from the Chinese government, increasing the medium-term risks to growth.

The strong dollar has been a significant drag on U.S. exports and manufacturing. It has also certainly lowered the cost of imports, particularly energy. The dollar reached its most recent peak in January, but has since declined sharply. The rebound in commodity prices and a scaling back of expectations for the Fed to raise rates will continue to dictate the dollar's course over the next two years.

Total Fund Performance: For the quarter ended March 31, 2016, the Fund returned +2.20%, thirty basis points below the Policy Target return of +2.50%. Over the trailing year, NYCERS has earned a return of -0.06% versus the Policy Target return of +0.23%. Over three years, the total Fund has returned +6.40% annualized. Over the trailing five years, the Fund has gained 6.76% annualized. The trailing 10-year return is +5.77% annualized.

Total Fund Assets: The Fund's assets totaled \$53.3 billion as of the end of the first quarter of 2016.

U.S. Equity: The total domestic equity portion of the NYCERS Fund returned +1.67% for the quarter, above the +0.97% return of the Russell 3000 Index. For the trailing year, NYCERS underperformed the index, returning -0.87% versus -0.34% for the index. The Fund is below the benchmark over three, five, seven, and ten years. The active portfolio bested the passive one over the quarter as well as the seven and ten year return periods. The passive portfolio performed better over the one, three and five year return periods.

Through March 31, 2016



In Large Cap, the Fund outperformed the Russell 1000 Index, returning +1.66% versus the Russell 1000's return of +1.17% during the first quarter. Over the past year, the Fund is below the benchmark, returning +0.31% versus +0.50% for the index.

In Mid Cap, the Fund's performance closely mirrored that of the index for the quarter, consistent with its strictly passive exposure. The Fund returned +3.79%, beating the return of the S&P Mid Cap Index by one basis point. Over the past year, the Fund's -3.45% return is fifteen basis points above that of the index (-3.60%).

In Small Cap, the Fund returned +2.00%, above the Russell 2000 return of -1.52% for the quarter. The Fund's one year return of -6.69% outperformed the -9.76% return of the Index.

Developed International: For the quarter, the Fund's Non-U.S. Developed Equity composite returned -1.44% (excluding NYCERS' non-U.S. Environmental and Activist managers), outperforming the MSCI EAFE Index by 157 basis points. The Fund returned -6.48% for the trailing one year period, above the return of the benchmark (-8.27%). The Fund is above the benchmark over the trailing three, five, seven, and ten-year periods.

Emerging Markets Equity: The Fund's emerging markets equity composite returned +8.14% in the quarter, underperforming the +8.81% return of the FTSE NYCERS custom benchmark. The passive portfolio outperformed the active one for the quarter. The one year return for the emerging markets composite is -10.98%, underperforming the -9.39% return for the benchmark. The Fund is ahead of the benchmark over the trailing five, seven, and ten-year periods and below the benchmark over the trailing three year period.

Fixed Income: The composite of the Fund's structured investment grade bond managers returned +3.30% during the quarter, while the NYCERS Core Plus Five Index returned +3.53%. For the past year, the structured composite has gained 1.63%, while the benchmark's return is +2.03%. Over longer time periods, the composite is ahead of the benchmark, having beaten it over the trailing three, five, seven, and ten year periods.

TIPS: The Fund's TIPS composite delivered a +4.47% return in the quarter, slightly above the +4.46% return for the Barclays Capital US TIPS Index. Over the past year, the Fund's TIPS managers have returned +1.54%, above the benchmark's return of +1.51%. Over longer time periods, the composite is ahead of the benchmark, having beaten it over the trailing three, five, seven, and ten year periods.

Through March 31, 2016



Enhanced Yield: In enhanced yield, the Fund's managers returned +2.94% for the quarter, while the Citigroup BB&B Index posted a higher return of +3.04%. The Fund underperformed the benchmark over the past year, returning -3.78% as compared to the benchmark's return of -3.69%. The Fund has beaten the benchmark over the trailing three, five, seven, and ten year periods.

Bank Loans: The NYCERS bank loan composite returned +1.38% in the first quarter, ahead of the Credit Suisse Leveraged Loan Index's return of +1.33%. The Fund outperformed the benchmark for the year returning +0.29% versus -1.11% for the benchmark. The Fund has outperformed relative to the benchmark over the trailing three year period.

Convertibles: The convertible portfolio returned +0.02% in the quarter, ahead of the -0.51% return of the NYCERS Custom Convertible Bond Index. Over the past year, the convertibles portfolio has returned -3.14%, outperforming the benchmark by 370 basis points. Over the trailing three, five, and seven-year periods, the Fund has outperformed the custom benchmark.

Opportunistic Fixed Income: The opportunistic fixed income composite returned -3.00% over the first quarter. For the past year, the Fund is below the 10% annual return target with a return of -6.21%. Over five years, the Fund's +5.34% return is below the 10% annual return target. Over seven years, the Fund's +12.49% return is above the 10% annual return target.

Alternatives: For the quarter, the Private Equity portfolio had approximately \$4.2 billion in invested capital, representing roughly 7.8% of the Total Fund. The Real Assets portfolio had approximately \$3.0 billion invested, accounting for roughly 5.6% of the Total Fund. Hedge Fund investments represented \$1.4 billion, or 2.7%. Performance is reported separately by NYCERS' Private Equity, Real Estate and Hedge Fund consultants.

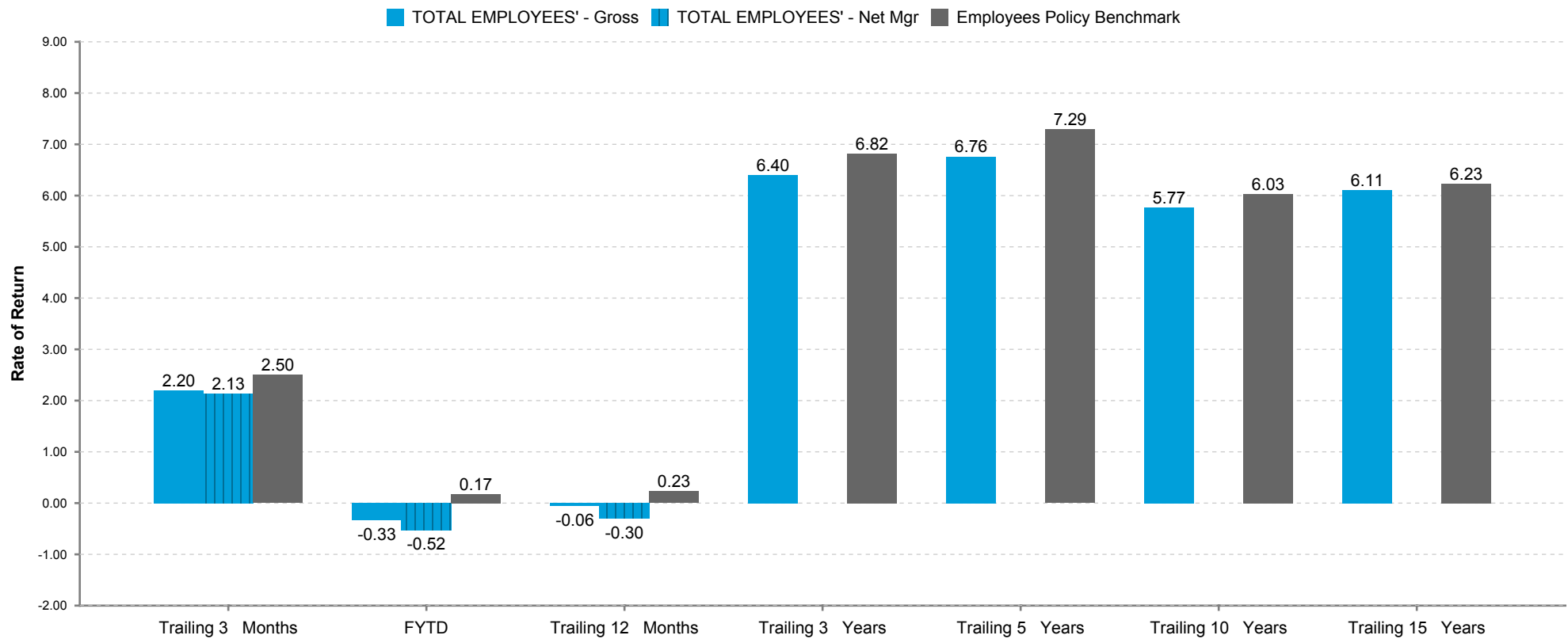
Total Portfolio Returns: March 31, 2016



TOTAL EMPLOYEES'

Market Value (Billions)

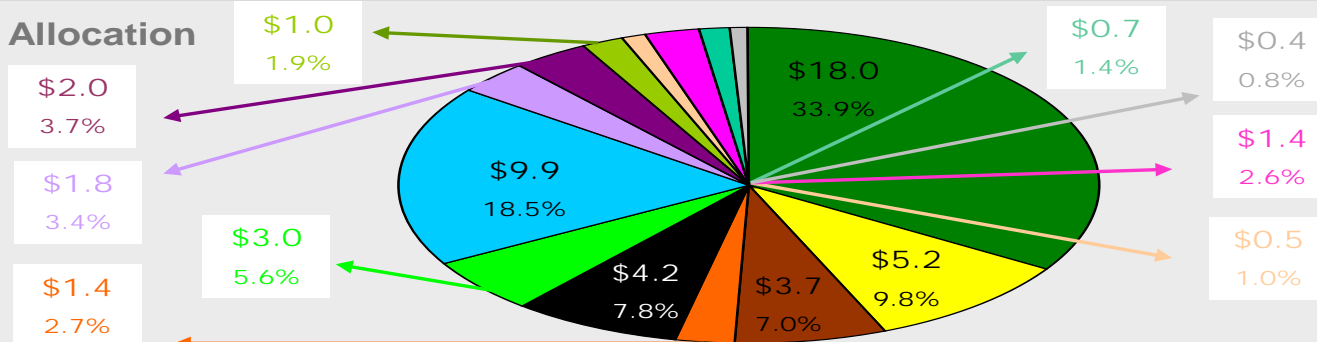
\$53.3



	Plan 3 Years	Benchmark 3 Years	Plan 5 Years	Benchmark 5 Years	Plan 10 Years	Benchmark 10 Years
Standard Deviation						
TOTAL EMPLOYEES'	6.7	6.4	6.8	7.6	10.1	10.9

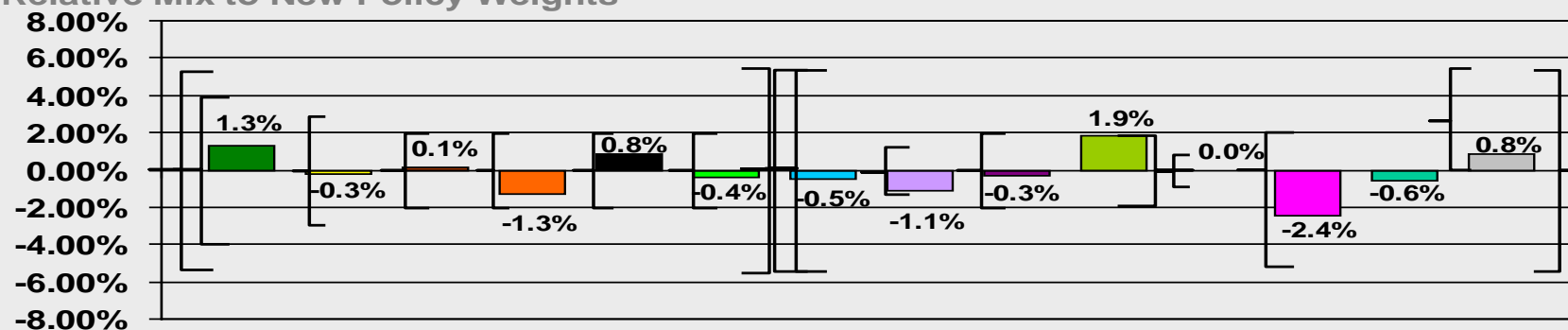
\$53.3B Under Management

Asset Allocation



■ Domestic Equity
 ■ Developed Markets
 ■ Emerging Markets
 ■ Hedge Funds
 ■ Private Equity
 ■ Real Assets
 ■ Core + 5
 ■ TIPS
 ■ Enhanced Yield
 ■ Bank Loans
 ■ Convertible Bonds
 ■ Opportunistic FI
 ■ ETI
 ■ Cash

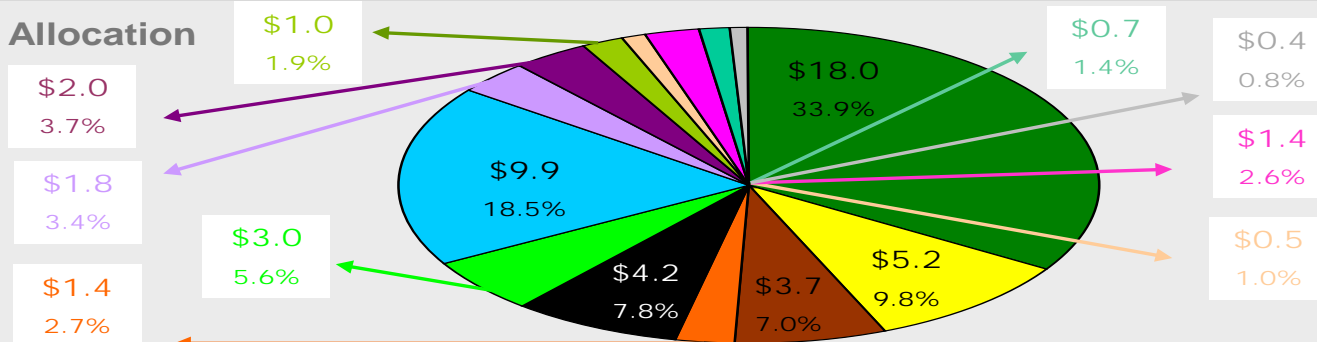
Relative Mix to New Policy Weights



Note: Brackets represent rebalancing ranges versus policy.

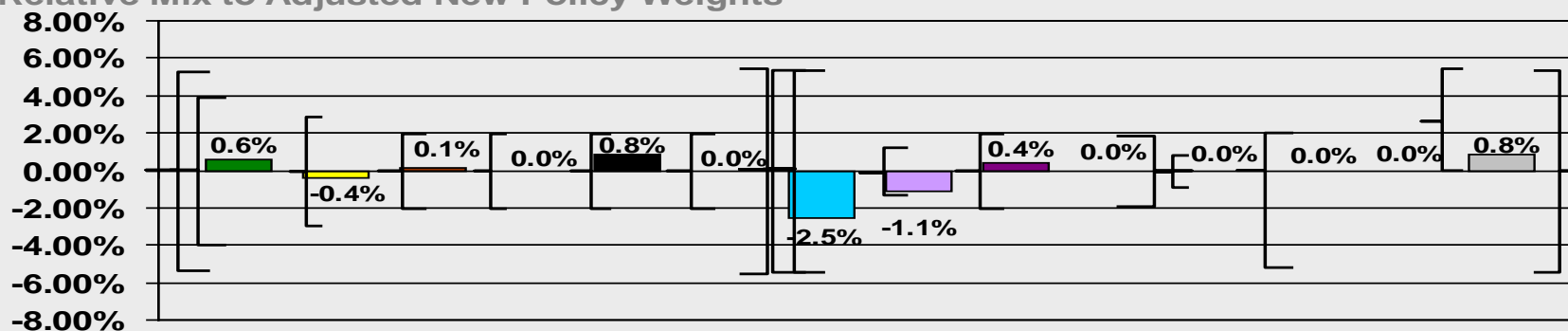
\$53.3B Under Management

Asset Allocation



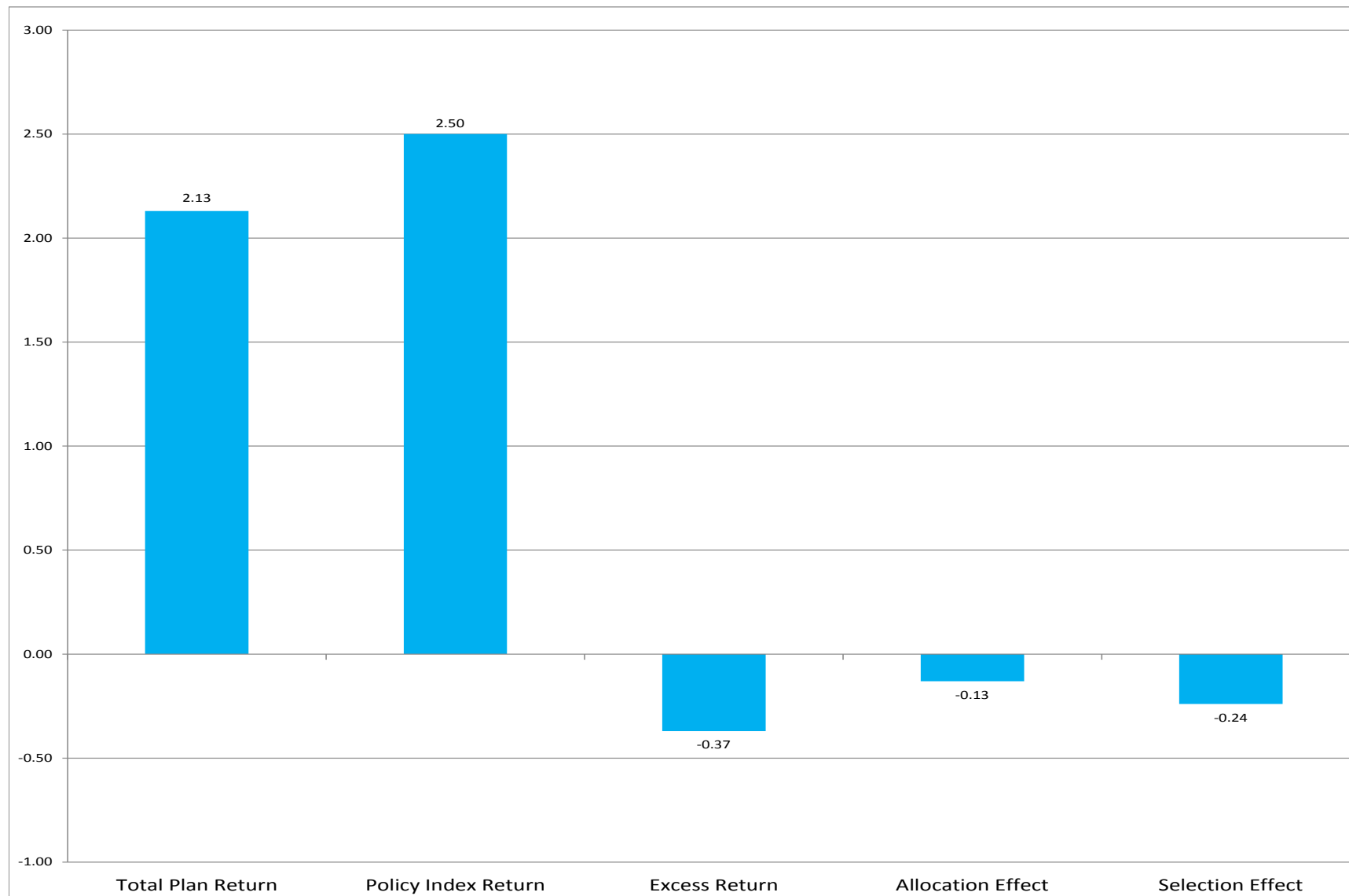
■ Domestic Equity
 ■ Developed Markets
 ■ Emerging Markets
 ■ Hedge Funds
 ■ Private Equity
 ■ Real Assets
 ■ Core + 5
 ■ TIPS
 ■ Enhanced Yield
 ■ Bank Loans
 ■ Convertible Bonds
 ■ Opportunistic FI
 ■ ETI
 ■ Cash

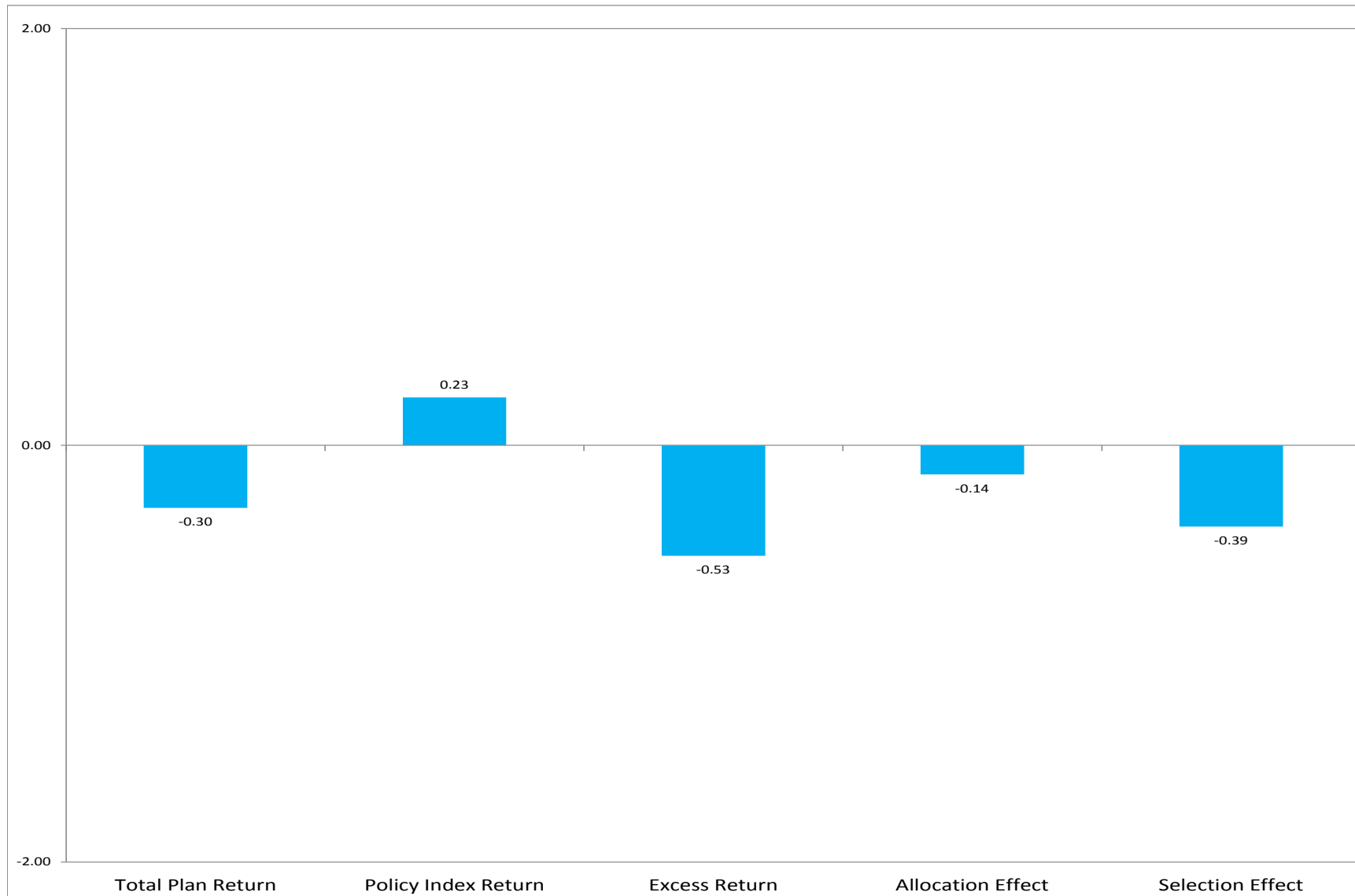
Relative Mix to Adjusted New Policy Weights

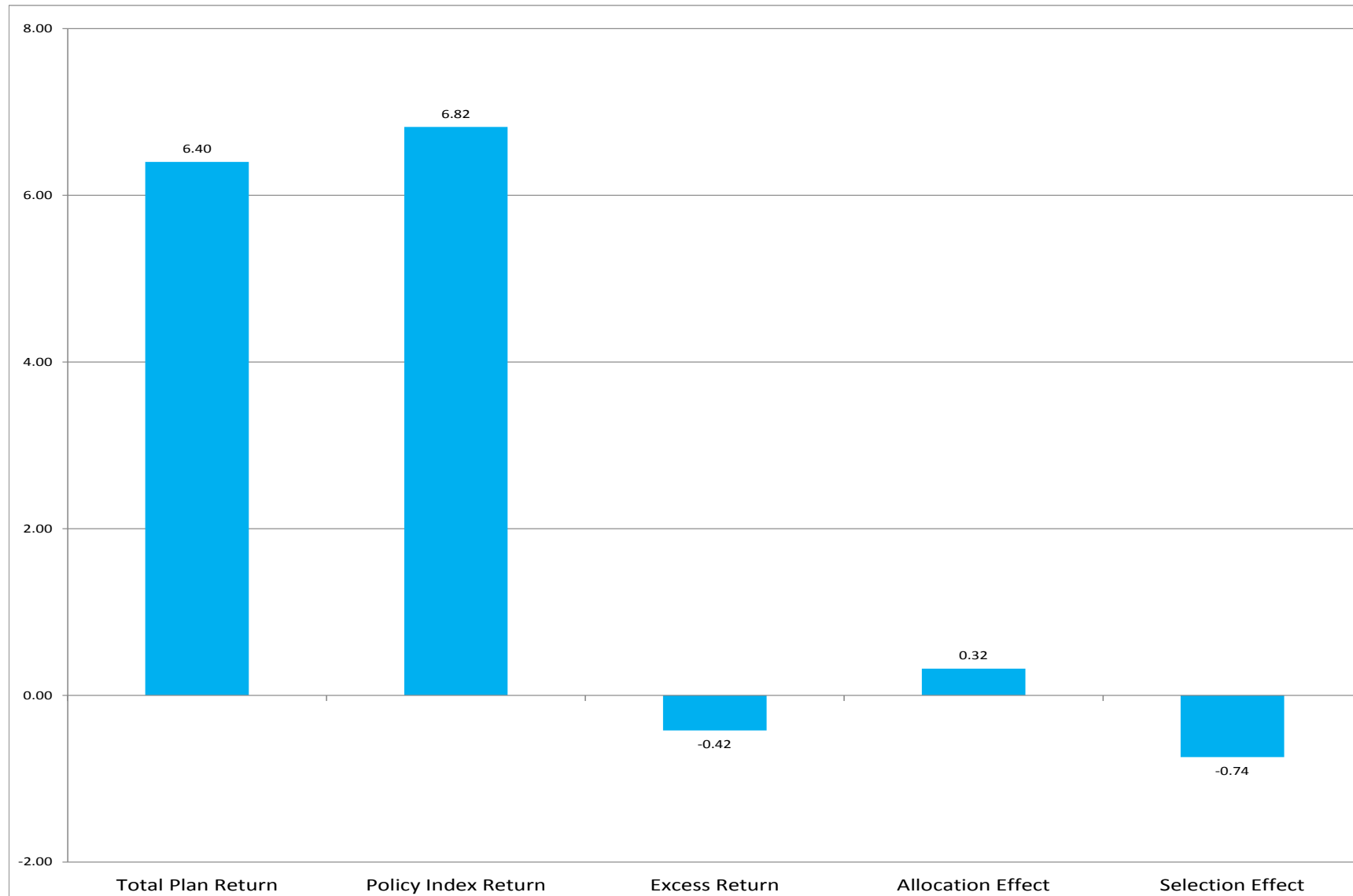


Note: Brackets represent rebalancing ranges versus policy.

Note: On March 31, 2016 NYCERS' combined Fixed Income and Cash portfolios have a duration of 5.2 years. The duration of the Barclays US Aggregate Index was 5.5 years on that date.







Allocation Effect - Asset Class Breakdown				
	<u>Quarter</u>	<u>12 Months</u>	<u>3 Years*</u>	<u>Benchmark</u>
TOTAL EMPLOYEES'	-0.13	-0.14	0.32	Employees Policy Benchmark
TOTAL DOMESTIC EQUITY	-0.04	-0.06	0.15	RUSSELL 3000
TOTAL DEVELOPED EQUITY	0.01	0.00	-0.04	MSCI EAFE NET
TOTAL EMERGING MARKETS	-0.02	-0.01	-0.02	FTSE NYCERS Custom EM Index
TOTAL PRIVATE EQUITY	0.04	0.00	0.09	NYC R3000 +3% Lagged
TOTAL PRIVATE REAL ESTATE	0.00	0.02	0.01	NCREIF NFI-ODCE NET + 1%
TOTAL INFRASTRUCTURE	0.00	0.00	0.00	CPI + 4%
TOTAL HEDGE FUNDS	0.00	0.00	0.00	1 Year Treasury Bill Yield + 4%
TOTAL STRUCTURED	-0.06	-0.11	0.17	NYC - CORE PLUS FIVE
TOTAL ENHANCED YIELD	0.00	-0.02	-0.03	CITIGROUP BB & B
TOTAL BANK LOANS	0.00	0.00	0.00	CSFB LEVERAGED LOAN INDEX
TOTAL TIPS MANAGERS	-0.03	-0.02	0.11	BARCLAYS U.S TIPS INDEX
TOTAL CONVERTIBLE BONDS	0.00	0.00	0.00	BofAML ALL CONVERTIBLE - ex Mandatory
TOTAL OPPORTUNISTIC FIXED	0.00	0.00	0.00	10% Annual Return
TOTAL CASH	-0.02	0.05	-0.08	

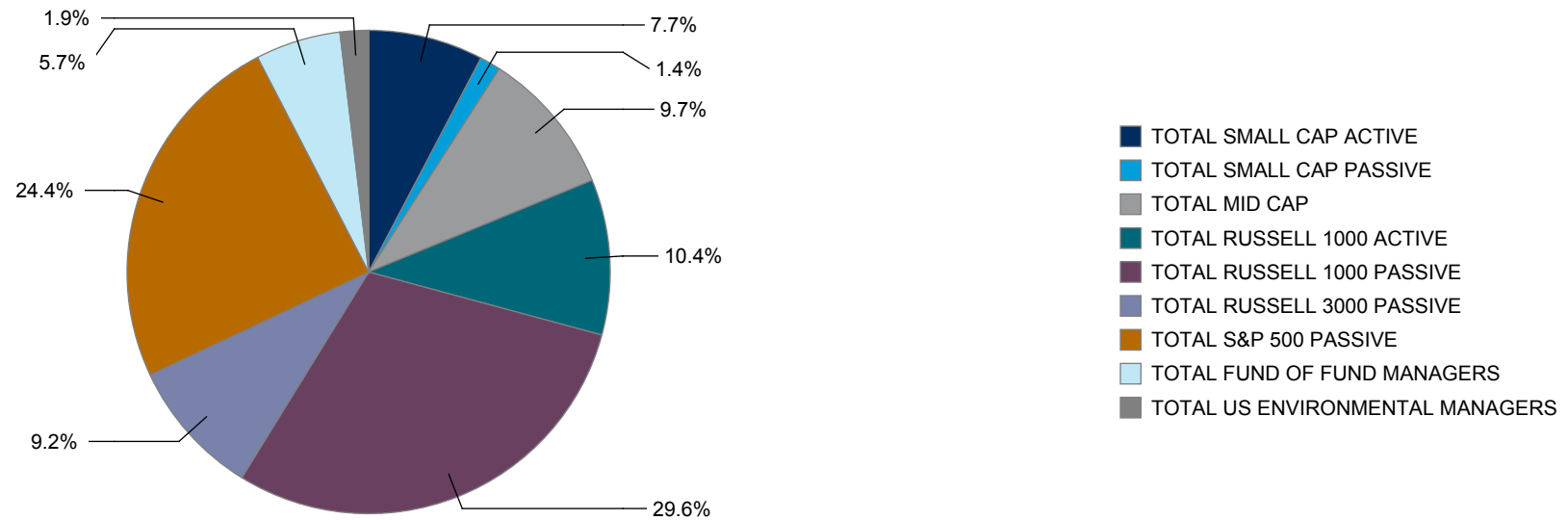
Selection Effect - Asset Class Breakdown				
	<u>Quarter</u>	<u>12 Months</u>	<u>3 Years*</u>	<u>Benchmark</u>
TOTAL EMPLOYEES'	-0.24	-0.39	-0.74	Employees Policy Benchmark
TOTAL DOMESTIC EQUITY	0.24	-0.20	-0.15	RUSSELL 3000
TOTAL DEVELOPED MARKETS	0.15	0.18	0.03	MSCI EAFE NET
TOTAL EMERGING MARKETS	-0.05	-0.14	-0.01	FTSE NYCERS Custom EM Index
TOTAL PRIVATE EQUITY	-0.42	0.49	-0.49	NYC R3000 +3% Lagged
TOTAL PRIVATE REAL ESTATE	0.03	0.00	0.02	NCREIF NFI-ODCE NET + 1%
TOTAL INFRASTRUCTURE	0.00	0.01	0.00	CPI + 4%
TOTAL HEDGE FUNDS	-0.03	-0.28	-0.07	1 Year Treasury Bill Yield + 4%
TOTAL STRUCTURED	-0.04	-0.08	0.02	NYC - CORE PLUS FIVE
TOTAL ENHANCED YIELD	-0.01	-0.02	0.03	CITIGROUP BB & B
TOTAL BANK LOANS	0.00	0.02	0.02	CSFB LEVERAGED LOAN INDEX
TOTAL TIPS MANAGERS	0.00	0.00	0.00	BARCLAYS U.S TIPS INDEX
TOTAL CONVERTIBLE BONDS	0.03	0.05	0.00	BofAML ALL CONVERTIBLE - ex Mandatory
TOTAL OPPORTUNISTIC FIXED	-0.15	-0.42	-0.16	10% Annual Return
TOTAL CASH	0.00	0.01	0.01	

*Returns are Gross of Investment Advisory Fees

Total Domestic Equity Asset Allocations: Quarter Ending March 31, 2016



	Market Value (Billions)	% of Plan
TOTAL DOMESTIC EQUITY	\$18.0	33.9

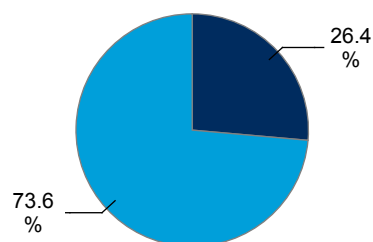


Sub Sector	Policy Weight	Actual Weight	Under/Over Weight	Index Return	Actual Return	Difference
TOTAL SMALL CAP ACTIVE	6.52	7.68	1.16	-1.52	3.06	4.58
TOTAL SMALL CAP PASSIVE	2.20	1.42	-0.78	-1.52	-3.39	-1.87
TOTAL MID CAP	12.51	9.74	-2.77	3.78	3.79	0.01
TOTAL RUSSELL 1000 ACTIVE	8.57	10.41	1.84	1.17	3.14	1.96
TOTAL RUSSELL 1000 PASSIVE	25.27	29.58	4.31	1.17	1.15	-0.03
TOTAL RUSSELL 3000 PASSIVE	17.59	9.20	-8.39	0.97	0.99	0.02
TOTAL S&P 500 PASSIVE	22.00	24.40	2.40	1.35	1.25	-0.10
TOTAL EMERGING MANAGERS	3.50	5.66	2.16	0.97	-0.97	-1.93
TOTAL US ENVIRONMENTAL	1.84	1.91	0.07	-1.52	6.59	8.11

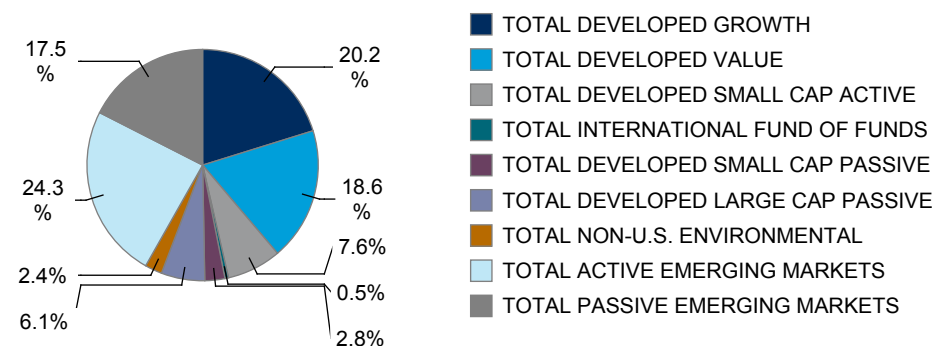
International Equity Asset Allocation: March 31, 2016



	<u>Market Value (Billions)</u>	<u>% of Plan</u>
TOTAL INTERNATIONAL EQUITY	\$8.9	16.8



■ TOTAL PASSIVE INTERNATIONAL EQUITY
■ TOTAL ACTIVE INTERNATIONAL EQUITY

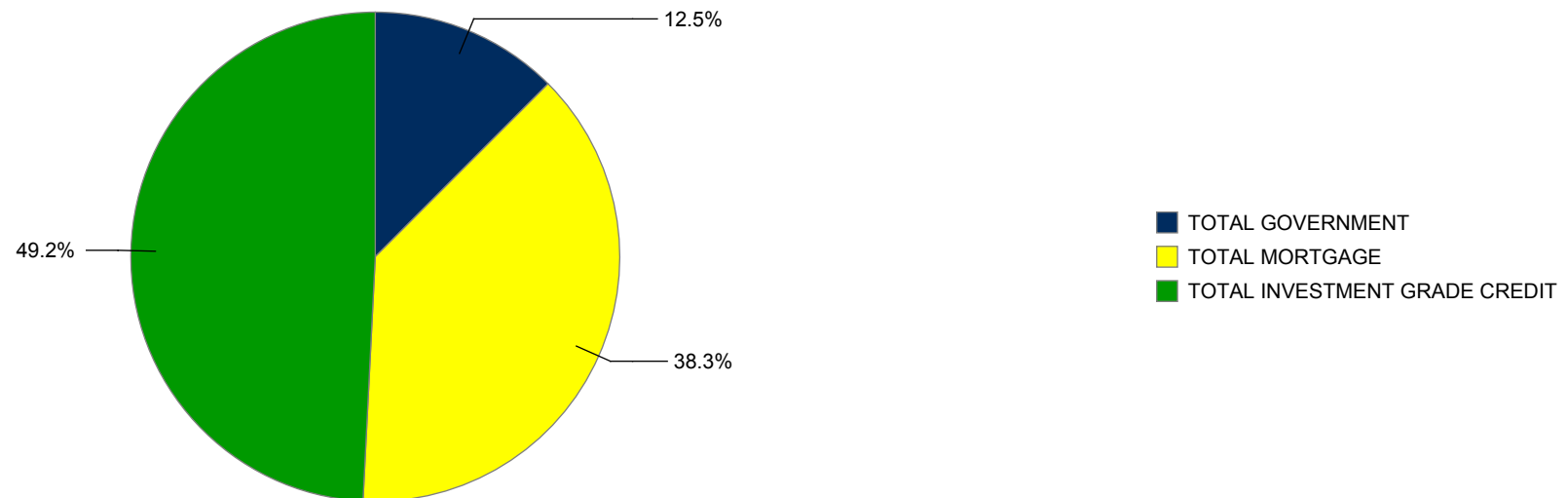


	<u>Asset Class Weight</u>	<u>Quarterly Returns - Fund and Benchmarks</u>		
		<u>Fund</u>	<u>Benchmark</u>	<u>Excess</u>
TOTAL DEVELOPED GROWTH	20.15	(0.95)	(2.07)	1.12
TOTAL DEVELOPED VALUE	18.63	(2.23)	(3.97)	1.73
TOTAL DEVELOPED SMALL CAP ACTIVE	7.57	0.24	(0.41)	0.65
TOTAL INTERNATIONAL FUND OF FUNDS	0.54	(2.94)	(3.01)	0.07
TOTAL DEVELOPED SMALL CAP PASSIVE	2.80	(0.44)	(0.60)	0.15
TOTAL DEVELOPED LARGE CAP PASSIVE	6.10	(2.92)	(3.01)	0.08
TOTAL NON-U.S. ENVIRONMENTAL	2.39	2.60	(0.35)	2.95
TOTAL ACTIVE EMERGING MARKET	24.31	7.46	8.81	(1.35)
TOTAL PASSIVE EMERGING MARKETS	17.49	9.09	8.87	0.22
TOTAL INTERNATIONAL EQUITY	100.00	2.45	(0.38)	2.83

Structured Fixed Income Asset Allocation: March 31, 2016



	<u>Market Value (Billions)</u>	<u>% of Plan</u>
TOTAL STRUCTURED	\$9.4	17.6



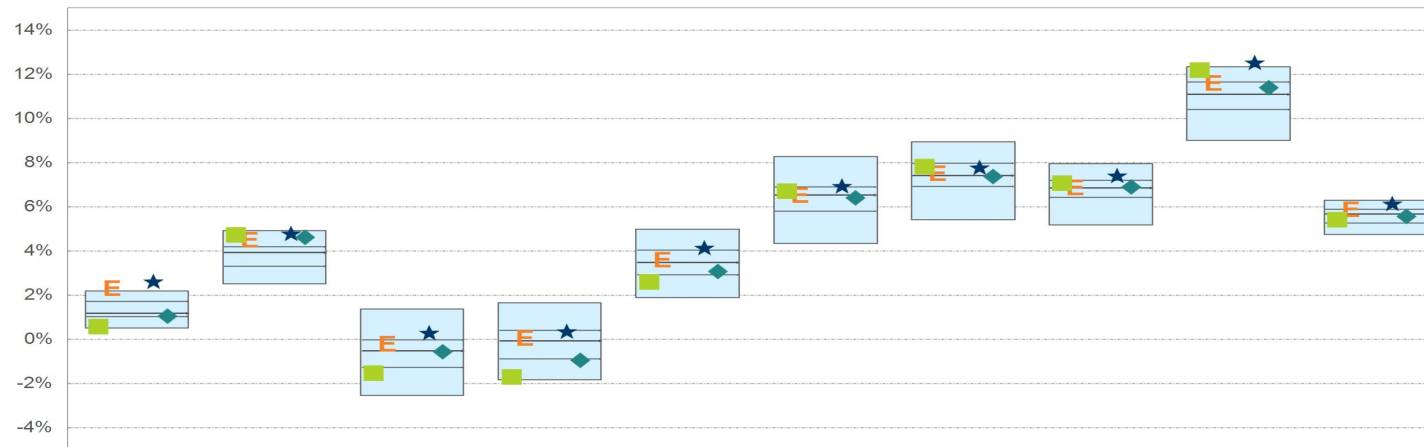
Sub Sector	Policy Weight	Actual Weight	Under/Over Weight	Index Return	Actual Return	Difference
TOTAL TREASURY/AGENCY	21.42	12.54	-8.88	5.55	5.56	0.01
TOTAL MORTGAGE	35.33	38.26	2.93	1.97	1.94	-0.03
TOTAL INV GRADE CREDIT	43.25	49.20	5.95	3.85	3.82	-0.03

Through March 31, 2016



City of New York Performance Comparison

Total Returns of Master Trusts - Public : Plans > \$10 Billion
Cumulative Periods Ending : March 31, 2016



Percentile Rankings	1 Qtr	2 Qtrs	3 Qtrs	1 Year	2 Years	3 Years	4 Years	5 Years	7 Years	10 Years
5th	2.20	4.93	1.37	1.65	4.98	8.28	8.95	7.95	12.36	6.30
25th	1.71	4.19	-0.02	0.41	4.05	6.90	7.99	7.20	11.66	5.90
50th	1.17	3.93	-0.53	-0.08	3.49	6.53	7.43	6.87	11.10	5.67
75th	1.03	3.30	-1.27	-0.88	2.93	5.80	6.93	6.44	10.42	5.27
95th	0.52	2.52	-2.54	-1.83	1.89	4.35	5.42	5.19	9.02	4.76
No. Of Obs	41	41	41	41	41	41	41	41	37	37
E Total System - Employee	2.20 (5)	4.38 (18)	-0.33 (37)	-0.06 (47)	3.49 (50)	6.40 (57)	7.40 (55)	6.76 (57)	11.49 (38)	5.77 (36)
★ Employees Policy Bench	2.50 (1)	4.67 (12)	0.17 (16)	0.23 (35)	4.01 (25)	6.82 (25)	7.66 (37)	7.29 (20)	12.41 (1)	6.03 (20)
■ Public Mkt Equiv 25	0.44 (96)	4.61 (14)	-1.67 (83)	-1.83 (96)	2.48 (88)	6.59 (42)	7.70 (37)	6.94 (45)	12.07 (8)	5.29 (72)
◆ Public Mkt Equiv 35	0.91 (85)	4.50 (14)	-0.70 (55)	-1.08 (77)	2.95 (72)	6.28 (62)	7.26 (62)	6.77 (55)	11.28 (44)	5.44 (66)

Wilshire Trust Universe Comparison Service® (TUCS®)

Through March 31, 2016



City of New York Performance Comparison

Total Returns of Master Trusts - Public : Plans > \$10 Billion
Consecutive Time Periods: March 31, 2016



Percentile Rankings	Mar 16	Dec 15	Sep 15	Jun 15	Mar 15	Mar 16	Mar 15	Mar 14	Mar 13	Mar 12
5th	2.20	3.50	-2.24	1.74	2.95	1.65	9.77	15.71	11.96	8.70
25th	1.71	2.88	-3.78	0.88	2.53	0.41	8.09	13.84	11.16	5.22
50th	1.17	2.42	-4.31	0.46	2.36	-0.08	7.32	12.86	10.50	4.39
75th	1.03	2.02	-4.82	0.07	2.04	-0.88	6.30	11.59	9.90	3.82
95th	0.52	1.45	-5.63	-0.25	1.70	-1.83	5.59	8.29	8.65	3.05
No. Of Obs	41	41	41	41	41	41	41	41	41	41
E Total System - Employee	2.20 (5)	2.13 (67)	-4.51 (60)	0.28 (70)	2.08 (72)	-0.06 (47)	7.16 (57)	12.46 (60)	10.49 (52)	4.24 (57)
★ Employees Policy Bench	2.50 (1)	2.12 (67)	-4.30 (45)	0.06 (77)	2.44 (30)	0.23 (35)	7.93 (27)	12.66 (55)	10.23 (60)	5.84 (14)
■ Public Mkt Equiv 25	0.44 (96)	4.15 (1)	-6.00 (100)	-0.17 (91)	2.67 (20)	-1.83 (96)	6.98 (62)	15.32 (12)	11.11 (30)	3.92 (70)
◆ Public Mkt Equiv 35	0.91 (85)	3.56 (1)	-4.98 (83)	-0.38 (96)	2.48 (27)	-1.08 (77)	7.14 (60)	13.29 (32)	10.23 (60)	4.84 (32)

Wilshire Trust Universe Comparison Service® (TUCS®)

Actual and Estimated Fees



NEW YORK CITY EMPLOYEE RETIREMENT SYSTEM				
ACTUAL FEES FOR FISCAL YEAR ENDING JUNE 30, 2015 AND				
ESTIMATED FEES FOR FY 2016 UPDATED THROUGH SEPTEMBER 2015				
	Actual 2015		Estimates 2016	
INVESTMENT STYLE (EQUITIES)	MV 06-30-15 (\$MM)	Mgmt Fees in Basis Points	MV 09-30-15 (\$MM)	Mgmt in Basis Points
US Equities	18,198	9.10	16,814	8.44
Small Cap Active	1,690	34.38	1,317	32.78
Small Cap Growth	-	0.00	-	-
Small Cap Value	293	50.54	270	53.15
Small Cap core	381	61.65	147	71.89
Small Cap Fundamental Index	1,017	19.52	900	20.31
Small/Mid Cap Active	-	-	-	-
Small/Mid Cap Growth	-	-	-	-
Small/Mid Cap Value	-	-	-	-
Mid Cap Active	-	-	-	-
Mid Cap Growth	-	-	-	-
Mid Cap Value	-	-	-	-
Mid Cap core	-	-	-	-
Russell 1000 Active	1,869	13.27	1,734	13.68
Russell 1000 Fundamental Index	1,869	13.27	1,734	13.68
Active Emerging Managers (U.S. Equities)	1,078	55.87	987	54.78
Total US Active Equities	4,638	30.87	4,037	29.96
Total US Passive Equities	13,217	0.57	12,464	0.54
Environmental US E. Strategies	343	43.70	312	45.44
International Equities	9,172	30.07	8,494	29.80
Active EAFE Equities	4,491	30.84	4,050	32.28
Growth	1,950	27.08	1,717	28.74
Value	1,867	27.48	1,699	29.25
Core	1	0.00	-	-
Small Cap	673	47.49	633	50.01
Non-US Environmental Strategies	205	43.99	189	54.63
Active Emerging Markets	2,336	50.94	2,042	49.81
Total Int'l Active Equities	7,032	37.90	6,280	38.65
Total Int'l Passive Equities	2,140	4.34	2,214	4.68
REITS Passive Index	-	-	-	-

Information provided by the New York City Comptroller

NEW YORK CITY EMPLOYEE RETIREMENT SYSTEM ACTUAL FEES FOR FISCAL YEAR ENDING JUNE 30, 2015 AND ESTIMATED FEES FOR FY 2016 UPDATED THROUGH SEPTEMBER 2015				
	Actual 2015		Estimates 2016	
INVESTMENT STYLE (FIXED INCOME)	MV 06-30-15 (\$MM)	Mgmt Fees in Basis Points	MV 09-30-15 (\$MM)	Mgmt in Basis Points
Fixed Income	17,145	12.68	16,581	13.08
Structured Program	9,044	7.23	9,120	7.22
Government Sector	1,094	4.77	1,129	4.40
Mortgage Sector	3,483	6.47	3,525	6.01
Investment Grade Credit Sector	4,467	8.43	4,467	8.88
Global Fixed Income	376	12.47	378	18.29
Progress Fixed Emerging Managers	111	34.44	112	34.50
TIPS	1,761	1.99	1,740	1.83
Active TIPS	429	6.63	424	5.97
Passive TIPS	1,332	0.50	1,316	0.50
Enhanced Yield	2,070	34.45	1,970	34.78
Bank Loans	1,006	32.65	998	33.01
Convertible Bonds	538	43.00	513	44.12
ETI - Access - RBC	124	21.11	120	22.65
ETI - AFL-CIO HIT	236	42.38	239	42.64
Total Public Markets (Externally managed)	42,634	15.45	40,499	15.11
Other ETI Programs	278	-	307	-
In-House Short Term	1,603	0.00	1,084	0.00
Total Public Markets	44,515	14.80	41,890	14.61
INVESTMENT STYLE (PRIVATE)				
Hedge Funds	1,730	149.60	1,363	139.31
Private Equities	3,758	122.33	4,102	127.04 ¹
Real Assets	2,555	115.63	2,575	102.99 ¹
Private Real Estate	2,442	116.14	2,456	98.65
Infrastructure	113	70.77	119	88.74
Opportunistic Fixed Income	1,332	66.18	1,360	67.56
Total Private Markets	9,375	117.55	9,400	113.62 ³
Total Overall	53,889	32.68	51,289	32.75 ⁴
Footnotes				
1 - Private Equity & Real Assets Investments exclude GP CARRY & Incentive Fees .				
2- Infrastructure Fees are based on committed Amounts for each investment which are higher than the actual Market Values.				
3- Private Equity and Private Real Estate fees are based on Invested values and committed amounts depending on the age of the investment.				
4- The Incentive Fees paid for the NYCERS Fund in 2015 are 15.45 BPS.				

Information provided by the New York City Comptroller

NYC EMPLOYEES' RETIREMENT SYSTEM SECURITIES LENDING INCOME
March 31, 2016

	<u>U.S. FIXED INCOME</u>	<u>U.S. EQUITY</u>	<u>INTERNATIONAL EQUITY</u>	
1990*	\$256,000	--	--	
1991	754,000	\$48,000	--	
1992	1,467,000	654,000	\$367,000	
1993	3,445,000	1,308,000	732,000	
1994	4,261,000	2,744,000	1,082,000	
1995	3,727,000	3,191,000	745,000	
1996	3,608,000	3,592,000	1,258,000	
1997	3,924,000	5,921,000	1,533,000	
1998	6,374,000	7,337,000	1,952,000	
1999	6,643,000	6,718,000	2,175,000	
2000	6,552,000	7,669,000	3,049,000	
2001	10,335,000	10,394,000	4,435,000	
2002	5,906,000	7,780,000	3,510,000	
2003	2,442,000	4,766,000	3,603,000	
2004	3,502,000	5,844,000	3,825,000	
2005	5,229,000	8,264,000	4,471,000	
2006	4,626,000	10,012,000	4,163,000	
2007	9,445,000	15,100,000	4,510,000	
2008	25,936,000	26,696,000	6,878,000	
2009	8,149,000	16,388,000	4,305,000	
2010	3,714,000	10,256,000	3,125,000	
2011	4,834,000	12,861,000	5,163,000	
2012	6,691,000	16,287,000	4,116,000	
2013	5,051,000	17,973,000	3,014,000	
2014	5,194,000	14,847,000	5,272,000	
2015	5,010,000	16,300,000	6,124,000	
2016 (3 Month)	1,471,000	3,953,000	1,912,000	
Since Inception	<u>\$148,546,000</u>	<u>\$236,903,000</u>	<u>\$81,319,000</u>	*Inception 7/90

New York City
Employees' Retirement System

Appendix A

Consolidated Performance Report

Consolidated Performance Report

Through March 31, 2016



		Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014	2013	2012	2011	5 Year	10 Year	ITD	Inception Date
SYSTEM RETURN SUMMARY															
5	NYCERS-TOTAL PORTFOLIO - GROSS	53,256	100.00	2.20	(0.33)	2.20	(0.17)	7.34	15.73	13.41	1.13	6.76	5.77	8.61	07/01/1987
	ESTIMATED INVESTMENT FEES			(0.06)	(0.19)	(0.06)	(0.27)	(0.27)							
	EST MANAGEMENT FEES - PUBLIC MARKET (ACCRUAL)			(0.03)	(0.09)	(0.03)	(0.12)	(0.13)							
	EST MANAGEMENT FEES - ALTERNATIVE MARKETS (CASH)			(0.03)	(0.10)	(0.03)	(0.15)	(0.14)							
	EST INCENTIVE FEES														
	EST OTHER FEES														
	EST FEE OFFSETS														
	NYCERS-TOTAL PORTFOLIO - NET MGR			2.13	(0.52)	2.13	(0.44)	7.07							
	NYCERS POLICY BENCHMARK			2.50	0.17	2.50	0.17	8.15	15.33	13.39	2.14	7.29	6.03		
	EXCESS RETURN			(0.36)	(0.69)	(0.36)	(0.61)	(1.08)	0.40	0.02	(1.01)	(0.53)	(0.26)		
EQUITY RETURN DETAIL															
18	NYCERS-TOTAL EQUITY (INCL PE & RA) - GROSS	35,521	66.70	1.97	(1.35)	1.97	(0.17)	7.85	22.95	16.08	(1.39)	7.84	5.52	6.79	04/01/2004
	ESTIMATED INVESTMENT FEES			(0.08)	(0.23)	(0.08)	(0.35)	(0.33)							
	EST MANAGEMENT FEES			(0.08)	(0.23)	(0.08)	(0.35)	(0.33)							
	EST INCENTIVE FEES														
	EST OTHER FEES														
	EST FEE OFFSETS														
	NYCERS-TOTAL EQUITY (INCL PE & RA) - NET MGR			1.89	(1.58)	1.89	(0.52)	7.52							
26	NYCERS-TOTAL DOMESTIC EQUITY - GROSS	18,035	33.87	1.67	(0.83)	1.67	(0.67)	11.35	34.39	16.62	0.17	10.56	6.81	11.08	08/01/1979
	ESTIMATED INVESTMENT FEES			(0.02)	(0.06)	(0.02)	(0.09)	(0.11)							
	NYCERS-TOTAL DOMESTIC EQUITY - NET MGR			1.65	(0.89)	1.65	(0.76)	11.24							
	RUSSELL 3000 (DAILY)			0.97	(0.48)	0.97	0.48	12.56	33.55	16.42	1.03	11.01	6.90	11.43	
	EXCESS RETURN			0.68	(0.42)	0.68	(1.24)	(1.31)	0.84	0.21	(0.85)	(0.45)	(0.10)	(0.34)	
36	NYCERS-TOTAL SMALL CAP - GROSS	1,641	3.08	2.00	(7.01)	2.00	(5.96)	4.40	41.99	17.81	(4.50)	7.83	5.99	7.44	04/01/2004
	ESTIMATED INVESTMENT FEES			(0.07)	(0.20)	(0.07)	(0.27)	(0.31)							
	NYCERS-TOTAL SMALL CAP - NET MGR			1.93	(7.20)	1.93	(6.24)	4.09							
	RUSSELL 2000 (DAILY)			(1.52)	(10.14)	(1.52)	(4.41)	4.89	38.82	16.35	(4.18)	7.20	5.26	6.85	
	EXCESS RETURN			3.45	2.94	3.45	(1.82)	(0.80)	3.17	1.46	(0.33)	0.63	0.73	0.59	
46	NYCERS-TOTAL MID CAP - GROSS	1,756	3.30	3.79	(2.57)	3.79	(2.19)	9.98	33.13	17.81		9.51		10.67	02/01/2011
	ESTIMATED INVESTMENT FEES			(0.00)	(0.01)	(0.00)	(0.01)	(0.01)							
	NYCERS-TOTAL MID CAP - NET MGR			3.79	(2.57)	3.79	(2.20)	9.97							
	S&P 400 MIDCAP INDEX (DAILY)			3.78	(2.56)	3.78	(2.18)	9.77	33.50	17.88		9.52		10.70	
	EXCESS RETURN			0.00	(0.01)	0.00	(0.02)	0.20	(0.37)	(0.07)		(0.02)		(0.02)	
56	NYCERS-TOTAL RUSSELL 1000 - GROSS	7,213	13.54	1.66	0.39	1.66	(0.27)	13.02	35.73	16.76	0.66	11.57		9.60	07/01/2008
	ESTIMATED INVESTMENT FEES			(0.01)	(0.03)	(0.01)	(0.04)	(0.07)							
	NYCERS-TOTAL RUSSELL 1000 - NET MGR			1.65	0.36	1.65	(0.31)	12.95							
	RUSSELL 1000 (DAILY)			1.17	0.39	1.17	0.92	13.24	33.11	16.42	1.50	11.35		8.68	
	EXCESS RETURN			0.47	(0.02)	0.47	(1.23)	(0.29)	2.62	0.33	(0.84)	0.22		0.92	

Consolidated Performance Report

Through March 31, 2016



	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014	2013	2012	2011	5 Year	10 Year	ITD	Inception Date
EQUITY RETURN DETAIL														
68 NYCERS-TOTAL RUSSELL 3000 PASSIVE - GROSS	1,659	3.11	0.99	(0.42)	0.99	0.49	12.89	33.63	16.34	1.05	11.09	6.96	9.75	02/01/1990
ESTIMATED INVESTMENT FEES			(0.00)	(0.01)	(0.00)	(0.01)	(0.01)							
NYCERS-TOTAL RUSSELL 3000 PASSIVE - NET MGR			0.99	(0.43)	0.99	0.48	12.88							
RUSSELL 3000 (DAILY)			0.97	(0.48)	0.97	0.48	12.56	33.55	16.42	1.03	11.01	6.90	9.71	
EXCESS RETURN			0.02	0.05	0.02	(0.00)	0.32	0.08	(0.08)	0.02	0.08	0.06	0.05	
78 NYCERS-TOTAL S&P 500 PASSIVE - GROSS	4,400	8.26	1.25	1.16	1.25	1.11	13.62	32.49	15.99	1.74	11.43	6.91	4.12	07/01/2000
ESTIMATED INVESTMENT FEES			(0.00)	(0.00)	(0.00)	(0.00)	(0.00)							
NYCERS-TOTAL S&P 500 PASSIVE - NET MGR			1.25	1.16	1.25	1.11	13.62							
S&P 500 INDEX (DAILY)			1.35	1.50	1.35	1.38	13.69	32.39	16.00	2.11	11.58	7.01	4.24	
EXCESS RETURN			(0.10)	(0.34)	(0.10)	(0.27)	(0.07)	0.10	(0.02)	(0.37)	(0.15)	(0.10)	(0.12)	
88 NYCERS-TOTAL FUND OF FUNDS - GROSS	1,022	1.92	(0.97)	(5.28)	(0.97)	(2.85)	8.19	37.19	16.17	(0.20)	9.10	6.43	8.46	07/01/1993
ESTIMATED INVESTMENT FEES			(0.15)	(0.42)	(0.15)	(0.57)	(0.64)							
NYCERS-TOTAL FUND OF FUNDS - NET MGR			(1.11)	(5.70)	(1.11)	(3.41)	7.55							
RUSSELL 3000 (DAILY)			0.97	(0.48)	0.97	0.48	12.56	33.55	16.42	1.03	11.01	6.90	9.04	
EXCESS RETURN			(2.08)	(5.22)	(2.08)	(3.89)	(5.01)	3.63	(0.25)	(1.23)	(1.92)	(0.48)	(0.58)	

Consolidated Performance Report

Through March 31, 2016



		Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014	2013	2012	2011	5 Year	10 Year	ITD	Inception Date
EQUITY RETURN DETAIL															
100	NYCERS-TOTAL INTERNATIONAL EQUITY - GROSS	8,925	16.76	2.45	(8.19)	2.45	(7.90)	(2.50)	12.45	18.06	(14.05)	0.42	2.13	5.92	09/01/1990
	ESTIMATED INVESTMENT FEES			(0.07)	(0.21)	(0.07)	(0.28)	(0.30)							
	NYCERS-TOTAL INTERNATIONAL EQUITY - NET MGR			2.37	(8.40)	2.37	(8.17)	(2.80)							
	MSCI AC WORLD EX US (NET)			(0.38)	(9.66)	(0.38)	(5.66)	(3.87)	15.29	16.83	(13.71)	0.31	1.94		
	EXCESS RETURN			2.75	1.27	2.75	(2.51)	1.06	(2.84)	1.23	(0.34)	0.11	0.20		
110	NYCERS-TOTAL DEVELOPED GROWTH ACTIVE - GROSS	1,798	3.38	(0.95)	(7.62)	(0.95)	(1.94)	(5.15)	20.21	20.02	(12.92)	2.31	3.02	6.23	04/01/2004
	ESTIMATED INVESTMENT FEES			(0.07)	(0.20)	(0.07)	(0.28)	(0.27)							
	NYCERS-TOTAL DEVELOPED GROWTH ACTIVE - NET MGR			(1.03)	(7.82)	(1.03)	(2.22)	(5.42)							
	MSCI EAFE GROWTH			(2.07)	(4.66)	(2.07)	4.09	(4.43)	22.55	16.86	(12.11)	3.70	2.92	5.21	
	EXCESS RETURN			1.05	(3.16)	1.05	(6.31)	(0.99)	(2.34)	3.16	(0.80)	(1.40)	0.10	1.03	
120	NYCERS-TOTAL DEVELOPED VALUE ACTIVE - GROSS	1,663	3.12	(2.23)	(10.83)	(2.23)	(6.04)	(3.85)	22.15	14.03	(11.01)	1.34	1.55	4.67	04/01/2004
	ESTIMATED INVESTMENT FEES			(0.07)	(0.19)	(0.07)	(0.27)	(0.26)							
	NYCERS-TOTAL DEVELOPED VALUE ACTIVE - NET MGR			(2.30)	(11.02)	(2.30)	(6.30)	(4.11)							
	MSCI EAFE VALUE NET (DAILY)			(3.97)	(13.00)	(3.97)	(5.68)	(5.39)	22.95	17.69	(12.17)	0.82	0.60	3.86	
	EXCESS RETURN			1.66	1.98	1.66	(0.62)	1.28	(0.80)	(3.66)	1.16	0.52	0.95	0.81	
130	NYCERS-TOTAL DEVELOPED SMALL CAP ACTIVE- GROSS	676	1.27	0.24	0.66	0.24	10.72	(3.78)						7.53	05/01/2013
	ESTIMATED INVESTMENT FEES			(0.13)	(0.38)	(0.13)	(0.55)	(0.48)							
	NYCERS-TOTAL DEVELOPED SMALL CAP ACTIVE - NET MGR			0.12	0.28	0.12	10.18	(4.26)							
	S&P EPAC SMALL CAP INDEX			(0.41)	(1.86)	(0.41)	8.95	(3.10)						6.76	
	EXCESS RETURN			0.52	2.15	0.52	1.22	(1.16)						0.77	
140	NYCERS-TOTAL INTERNATIONAL FUND OF FUNDS ACTIVE - GROS	48	0.09	(2.94)	(7.15)	(2.94)	1.16	(4.89)	21.26	18.84	(13.33)	2.55		(0.24)	12/01/2007
	ESTIMATED INVESTMENT FEES			(0.18)	(0.48)	(0.18)	(0.64)	(0.65)							
	NYCERS-TOTAL INTERNATIONAL FUND OF FUNDS ACTIVE - NET MGR			(3.12)	(7.63)	(3.12)	0.52	(5.54)							
	MSCI EAFE			(3.01)	(8.83)	(3.01)	(0.81)	(4.90)	22.78	17.32	(12.14)	2.29		(1.13)	
	EXCESS RETURN			(0.12)	1.20	(0.12)	1.33	(0.64)	(1.52)	1.52	(1.19)	0.25		0.89	
150	NYCERS-TOTAL DEVELOPED SMALLCAP PASSIVE - GROSS	250	0.47	(0.44)	(0.90)	(0.44)	9.99							2.89	02/01/2014
	ESTIMATED INVESTMENT FEES			(0.00)	(0.01)	(0.00)	(0.02)							(0.02)	
	NYCERS-TOTAL DEVELOPED SMALLCAP PASSIVE - NET MGR			(0.45)	(0.91)	(0.45)	9.97							2.87	
	MSCI EAFE SMALL CAP NET (DAILY)			(0.60)	(1.10)	(0.60)	9.59							2.35	
	EXCESS RETURN			0.15	0.19	0.15	0.39							0.52	
160	NYCERS-TOTAL DEVELOPED LARGE CAP PASSIVE - GROSS	544	1.02	(2.92)	(8.68)	(2.92)	(0.41)	(4.98)	23.02	17.60		2.55		2.67	02/01/2011
	ESTIMATED INVESTMENT FEES			(0.00)	(0.01)	(0.00)	(0.02)	(0.02)							
	NYCERS-TOTAL DEVELOPED LARGE CAP PASSIVE - NET MGR			(2.93)	(8.69)	(2.93)	(0.42)	(5.00)							
	MSCI EAFE			(3.01)	(8.83)	(3.01)	(0.81)	(4.90)	22.78	17.32		2.29		2.42	
	EXCESS RETURN			0.08	0.14	0.08	0.39	(0.10)	0.24	0.28		0.25		0.26	

Consolidated Performance Report

Through March 31, 2016



		Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014	2013	2012	2011	5 Year	10 Year	ITD	Inception Date
EQUITY RETURN DETAIL															
172	NYCERS-TOTAL ACTIVE EMERGING MARKETS - GROSS	2,170	4.07	7.46	(10.62)	7.46	(17.85)	1.02	(0.20)	20.86	(18.86)	(2.68)	4.88	6.86	11/01/2005
	ESTIMATED INVESTMENT FEES			(0.12)	(0.33)	(0.12)	(0.41)	(0.50)							
	NYCERS-TOTAL ACTIVE EMERGING MARKETS - NET MGR			7.34	(10.95)	7.34	(18.25)	0.52							
	FTSE CUSTOM NYCERS ALL EMERGING INDEX			8.81	(8.82)	8.81	(16.80)	(0.07)	(4.22)	17.84	(18.20)	(3.68)	3.84	6.17	
	EXCESS RETURN			(1.47)	(2.13)	(1.47)	(1.45)	0.60	4.03	3.02	(0.67)	1.00	1.03	0.69	
182	NYCERS-TOTAL PASSIVE EMERGING MARKETS - GROSS	1,561	2.93	9.09	(9.70)	9.09	(17.87)	(1.29)	(4.24)	16.11		(4.49)		(4.49)	04/01/2011
	ESTIMATED INVESTMENT FEES			(0.01)	(0.04)	(0.01)	(0.05)	(0.06)							
	NYCERS-TOTAL PASSIVE EMERGING MARKETS - NET MGR			9.07	(9.74)	9.07	(17.92)	(1.35)							
	MSCI CUSTOM NYCERS EMERGING MARKETS (NET)			8.87	(9.45)	8.87	(17.71)								
	EXCESS RETURN			0.21	(0.29)	0.21	(0.21)								

Consolidated Performance Report

Through March 31, 2016



	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014	2013	2012	2011	5 Year	10 Year	ITD	Inception Date
EQUITY RETURN DETAIL														
194 *NYCERS-TOTAL HEDGE FUND	1,415	2.66	(1.19)	(4.47)	(1.19)	(1.31)	6.19	5.58	8.81				3.04	07/01/2011
HFRI FUND OF FUNDS COMPOSITE INDEX + 1%			(2.84)	(5.18)	(2.84)	0.73	4.40	10.04	5.82				2.62	
EXCESS RETURN			1.65	0.71	1.65	(2.04)	1.79	(4.45)	2.98				0.41	
204 *NYCERS-TOTAL DIRECT HEDGE FUNDS	1,173	2.20	(1.37)	(4.76)	(1.37)	(1.58)	6.01	4.24	9.44				3.85	01/01/2012
HFRI FUND OF FUNDS COMPOSITE INDEX + 1%			(2.84)	(5.18)	(2.84)	0.73	4.40	10.04	5.82				4.18	
EXCESS RETURN			1.47	0.42	1.47	(2.31)	1.61	(5.80)	3.62				(0.33)	
214 *NYCERS-TOTAL FUND OF FUNDS HEDGE FUNDS	242	0.46	(1.13)	(5.19)	(1.13)	(2.94)	3.74	8.39	5.73				2.13	07/01/2011
HFRI FUND OF FUNDS COMPOSITE INDEX + 1%			(2.84)	(5.18)	(2.84)	0.73	4.40	10.04	5.82				2.62	
EXCESS RETURN			1.71	(0.01)	1.71	(3.67)	(0.66)	(1.65)	(0.10)				(0.49)	

*Information Provided by Alpha Frontier

Consolidated Performance Report

Through March 31, 2016



	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014	2013	2012	2011	5 Year	10 Year	ITD	Inception Date
EQUITY RETURN DETAIL														
226 NYCERS-TOTAL PRIVATE EQUITY (TIME WEIGHTED)	4,159	7.81	2.32	5.42	2.32	10.61	13.99	8.08	12.74	13.78	10.79	8.91	11.79	04/01/2004
NYC R3000 +3% LAGGED			7.04	0.92	7.04	2.49	21.24	24.53	35.20	5.55	15.95	11.86	12.22	
EXCESS RETURN			(4.73)	4.50	(4.73)	8.11	(7.26)	(16.45)	(22.47)	8.23	(5.16)	(2.95)	(0.42)	
236 NYCERS-TOTAL PRIVATE REAL ESTATE (TIME WEIGHTED)	2,811	5.28	2.89	9.88	2.89	16.06	15.44	12.61	14.43	22.28	14.85	6.55	9.17	04/01/2004
NCREIF NFI-ODCE NET + 100 BP			2.20	9.53	2.20	15.08	12.56	14.02	10.88	16.09	13.31			
EXCESS RETURN			0.68	0.35	0.68	0.98	2.88	(1.41)	3.55	6.19	1.55			
246 NYCERS-TOTAL INFRASTRUCTURE (TIME WEIGHTED)	150	0.28	1.89	7.12	1.89	15.14	20.16						15.87	12/01/2013
CPI + 4%			0.93	3.20	0.93	4.72	4.70						4.72	
EXCESS RETURN			0.96	3.92	0.96	10.42	15.45						11.15	

Consolidated Performance Report

Through March 31, 2016



		Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014	2013	2012	2011	5 Year	10 Year	ITD	Inception Date
FIXED INCOME RETURN DETAIL															
258	NYCERS-TOTAL FIXED INCOME (DOM & GLOBAL) - GROSS	17,730	33.29	2.59	1.49	2.59	(0.37)	6.18	1.19	8.31	6.77	4.52	5.92	8.50	02/01/1980
	ESTIMATED INVESTMENT FEES			(0.04)	(0.10)	(0.04)	(0.13)	(0.15)							
	EST MANAGEMENT FEES			(0.04)	(0.10)	(0.04)	(0.13)	(0.15)							
	EST INCENTIVE FEES														
	EST OTHER FEES														
	EST FEE OFFSETS														
	NYCERS-TOTAL FIXED INCOME (DOM & GLOBAL) - NET MGR			2.56	1.39	2.56	(0.50)	6.03							
266	NYCERS-TOTAL STRUCTURED FIXED INCOME - GROSS	9,373	17.60	3.30	3.73	3.30	0.28	7.69	(1.73)	6.92	8.85	4.83	5.92	8.06	01/01/1985
	ESTIMATED INVESTMENT FEES			(0.02)	(0.06)	(0.02)	(0.07)	(0.09)							
	NYCERS-TOTAL STRUCTURED FIXED INCOME - NET MGR			3.28	3.67	3.28	0.21	7.60							
	NYC - CORE PLUS FIVE			3.53	4.34	3.53	0.41	7.66	(2.79)	5.41	9.40	4.54	5.56		
	EXCESS RETURN			(0.24)	(0.66)	(0.24)	(0.20)	(0.06)	1.06	1.51	(0.55)	0.28	0.36		
276	NYCERS-TOTAL CORE FIXED INCOME - GROSS	389	0.73	3.11	3.58	3.11	1.04	5.84	(1.54)	6.23	8.11	4.29		5.57	05/01/2009
	ESTIMATED INVESTMENT FEES			(0.05)	(0.14)	(0.05)	(0.18)	(0.17)							
	NYCERS-TOTAL CORE FIXED INCOME - NET MGR			3.07	3.44	3.07	0.86	5.67							
	BARCLAYS AGGREGATE (DAILY)			3.03	3.71	3.03	0.55	5.97	(2.02)	4.21	7.84	3.78		4.50	
	EXCESS RETURN			0.04	(0.26)	0.04	0.31	(0.30)	0.49	2.02	0.27	0.51		1.07	
286	NYCERS-TOTAL FIXED INCOME FUND OF FUNDS - GROSS	115	0.22	2.62	3.60	2.62	0.90	6.18	(1.76)	5.51	8.39	4.19	5.46	6.11	01/01/1992
	ESTIMATED INVESTMENT FEES			(0.09)	(0.27)	(0.09)	(0.35)	(0.36)							
	NYCERS-TOTAL FIXED INCOME FUND OF FUNDS - NET MGR			2.53	3.34	2.53	0.56	5.82							
	BARCLAYS AGGREGATE (DAILY)			3.03	3.71	3.03	0.55	5.97	(2.02)	4.21	7.84	3.78	4.90	5.83	
	EXCESS RETURN			(0.50)	(0.37)	(0.50)	0.01	(0.15)	0.26	1.29	0.55	0.41	0.56	0.28	
296	NYCERS-TOTAL TIPS - GROSS	1,805	3.39	4.47	2.57	4.47	(1.18)	3.50	(8.42)	7.25	13.50	3.18	4.77	4.26	06/01/2005
	ESTIMATED INVESTMENT FEES			(0.00)	(0.01)	(0.00)	(0.03)	(0.07)							
	NYCERS-TOTAL TIPS - NET MGR			4.47	2.55	4.47	(1.21)	3.42							
	BARCLAYS GLOBAL INFLATION LINKED: US TIPS (DAILY)			4.46	2.60	4.46	(1.44)	3.64	(8.61)	6.98	13.56	3.02	4.62	4.09	
	EXCESS RETURN			0.01	(0.05)	0.01	0.23	(0.21)	0.19	0.27	(0.06)	0.16	0.15	0.17	
306	NYCERS-TOTAL ENHANCED YIELD - GROSS	1,982	3.72	2.94	(3.90)	2.94	(3.82)	2.94	8.31	14.56	5.73	5.01	6.84	7.64	10/01/1994
	ESTIMATED INVESTMENT FEES			(0.09)	(0.25)	(0.09)	(0.33)	(0.36)							
	NYCERS-TOTAL ENHANCED YIELD - NET MGR			2.86	(4.15)	2.86	(4.15)	2.58							
	CITIGROUP BB & B			3.04	(3.94)	3.04	(4.21)	2.78	6.17	14.45	6.58	4.83	5.64	6.73	
	EXCESS RETURN			(0.18)	(0.21)	(0.18)	0.06	(0.20)	2.14	0.11	(0.85)	0.18	1.20	0.91	
316	NYCERS- TOTAL BANK LOANS - GROSS	998	1.87	1.38	(0.66)	1.38	1.18	2.58	6.41					3.58	12/01/2012
	ESTIMATED INVESTMENT FEES			(0.08)	(0.25)	(0.08)	(0.33)	(0.34)							
	NYCERS-TOTAL BANK LOANS - NET MGR			1.30	(0.90)	1.30	0.85	2.24							
	CSFB LEVERAGED LOAN INDEX			1.33	(1.88)	1.33	(0.38)	2.06	6.15					2.95	
	EXCESS RETURN			(0.03)	0.97	(0.03)	1.23	0.18	0.26					0.64	

Consolidated Performance Report

Through March 31, 2016



	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014	2013	2012	2011	5 Year	10 Year	ITD	Inception Date
FIXED INCOME RETURN DETAIL														
328 NYCERS- TOTAL CONVERTIBLE BONDS - GROSS	519	0.97	0.02	(3.08)	0.02	(0.85)	8.42	16.33	11.66	(3.02)	5.20		5.61	06/01/2008
ESTIMATED INVESTMENT FEES			(0.11)	(0.31)	(0.11)	(0.43)	(0.47)							
NYCERS-TOTAL CONVERTIBLE BONDS - NET MGR			(0.08)	(3.39)	(0.08)	(1.28)	7.95							
BOFAML ALL CONVERTIBLE EX M AI (DAILY)			(2.56)	(8.77)	(2.56)	(2.89)	9.33	25.00	14.41	(3.42)	6.22		6.40	
EXCESS RETURN			2.48	5.38	2.48	1.61	(1.38)	(8.68)	(2.76)	0.39	(1.02)		(0.78)	
338 NYCERS-TOTAL OPPORTUNISTIC FIXED INCOME	1,372	2.58	(3.00)	(6.67)	(3.00)	(2.18)	8.15	17.55	20.49	(4.40)	5.34		7.03	10/01/2007
10% ANNUAL RETURN			2.41	7.41	2.41	10.00	10.00	10.00	10.00	10.00	10.00		10.00	
EXCESS RETURN			(5.41)	(14.08)	(5.41)	(12.18)	(1.85)	7.55	10.49	(14.40)	(4.66)		(2.97)	
348 NYCERS-TOTAL TARGETED INVESTMENTS (NO CASH)	747	1.40	3.99	9.03	3.99	4.33	8.26	2.35	6.18	6.66	6.16	6.58	8.37	12/01/1984
EMPLOYEES CUSTOM BENCHMARK (NO CASH)			2.44	3.59	2.44	1.42	6.03	(1.64)	3.41	7.66	3.71	5.01		
EXCESS RETURN			1.54	5.43	1.54	2.91	2.22	3.98	2.77	(1.00)	2.45	1.57		
CASH SUMMARY														
360 EMPLOYEES' SHORT TERM - GROSS	430	0.81	0.33	0.34	0.33	0.31	0.36	0.19	0.56	0.92	0.53	1.72		04/01/1982
ESTIMATED INVESTMENT FEES			0.00	(0.00)	0.00	(0.00)	0.00	0.00	0.00	0.00	0.00	0.00		
EMPLOYEES' SHORT TERM - NET MGR			0.33	0.34	0.33	0.31	0.36	0.19	0.56	0.92	0.53	1.72		
364 C/D - FAIL FLOAT EARNINGS	3	0.01												
366 SECURITY LENDING	2	0.00												

New York City
Employees' Retirement System

Appendix B

Public Markets Manager Performance Detail

Public Markets Manager Performance Detail



Net Returns Through March 31, 2016

	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
EQUITY SUMMARY							
US EQUITY							
State Street Global Advisors R3000	1,659	3.11	0.97	(0.53)	0.97	0.39	12.87
RUSSELL 3000 (DAILY)			0.97	(0.48)	0.97	0.48	12.56
Excess			0.01	(0.05)	0.01	(0.09)	0.31
Amalgamated Bank	4,400	8.26	1.25	1.16	1.25	1.11	13.62
S&P 500 INDEX (DAILY)			1.35	1.50	1.35	1.38	13.69
Excess			(0.10)	(0.34)	(0.10)	(0.27)	(0.07)
Blackrock Inst R 2000 Growth	201	0.38	(4.71)	(13.62)	(4.71)	(1.54)	5.70
RUSSELL 2000 GROWTH DAILY			(4.68)	(13.55)	(4.68)	(1.38)	5.60
Excess			(0.03)	(0.07)	(0.03)	(0.16)	0.10
Blackrock Inst R 2000 Value	55	0.10	1.70	(6.77)	1.70	(7.49)	4.90
RUSSELL 2000 VALUE DAILY			1.70	(6.60)	1.70	(7.47)	4.22
Excess			(0.01)	(0.16)	(0.01)	(0.02)	0.68
RAFI - SC Fundamental	947	1.78	2.39	(6.87)	2.39	(7.09)	4.56
RUSSELL 2000 (DAILY)			(1.52)	(10.14)	(1.52)	(4.41)	4.89
Excess			3.90	3.27	3.90	(2.68)	(0.34)
Ceredex SCV	290	0.54	8.09	(0.78)	8.09	(4.74)	2.58
RUSSELL 2000 VALUE DAILY			1.70	(6.60)	1.70	(7.47)	4.22
Excess			6.39	5.83	6.39	2.73	(1.64)
Wellington Small Core	149	0.28	(2.42)	(8.94)	(2.42)	(2.79)	9.89
RUSSELL 2000 (DAILY)			(1.52)	(10.14)	(1.52)	(4.41)	4.89
Excess			(0.90)	1.19	(0.90)	1.63	4.99

Public Markets Manager Performance Detail



Net Returns Through March 31, 2016

	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
State Street GA S&P 400	1,756	3.30	3.79	(2.57)	3.79	(2.31)	9.97
S&P 400 MIDCAP INDEX (DAILY)			3.78	(2.56)	3.78	(2.18)	9.77
Excess			0.00	(0.01)	0.00	(0.13)	0.20
Blackrock Inst R 1000 Growth	2,773	5.21	0.73	2.33	0.73	5.58	12.90
RUSSELL 1000 GROWTH - DAILY			0.74	2.39	0.74	5.67	13.05
Excess			(0.01)	(0.07)	(0.01)	(0.09)	(0.15)
Blackrock Inst R 1000 Value	2,561	4.81	1.60	(1.77)	1.60	(3.94)	13.51
RUSSELL 1000 VALUE (DAILY)			1.64	(1.65)	1.64	(3.83)	13.45
Excess			(0.04)	(0.12)	(0.04)	(0.11)	0.06
VTL S&P 500 Fundamental	477	0.89	2.11	(0.11)	2.11	(1.25)	13.81
S&P 500 INDEX (DAILY)			1.35	1.50	1.35	1.38	13.69
Excess			0.76	(1.61)	0.76	(2.63)	0.12
RAFI - LC Fundamental	1,402	2.63	3.44	0.71	3.44	(3.17)	12.15
RUSSELL 1000 (DAILY)			1.17	0.39	1.17	0.92	13.24
Excess			2.27	0.32	2.27	(4.09)	(1.09)
FUND OF FUNDS							
NYCERS-TOTAL FUND OF FUNDS	1,022	1.92	(1.11)	(5.70)	(1.11)	(3.41)	7.55
RUSSELL 3000 (DAILY)			0.97	(0.48)	0.97	0.48	12.56
Excess			(2.08)	(5.22)	(2.08)	(3.89)	(5.01)
NYCERS-TOTAL ATTUCKS	312	0.59	(1.04)	(5.89)	(1.04)	(3.63)	9.46
RUSSELL 3000 (DAILY)			0.97	(0.48)	0.97	0.48	12.56
Excess			(2.01)	(5.41)	(2.01)	(4.10)	(3.10)
NYCERS-TOTAL CAPITAL PROSPECTS	75	0.14	0.16	(3.54)	0.16	(2.40)	9.13
RUSSELL 3000 (DAILY)			0.97	(0.48)	0.97	0.48	12.56
Excess			(0.81)	(3.06)	(0.81)	(2.88)	(3.42)

Public Markets Manager Performance Detail



Net Returns Through March 31, 2016

	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
NYCERS-TOTAL PROGRESS EQUITY	401	0.75	(1.00)	(6.61)	(1.00)	(4.66)	6.99
RUSSELL 3000 (DAILY)			0.97	(0.48)	0.97	0.48	12.56
Excess			(1.97)	(6.13)	(1.97)	(5.14)	(5.57)
NYCERS-TOTAL F I S	233	0.44	(1.82)	(4.55)	(1.82)	(1.25)	5.52
RUSSELL 3000 (DAILY)			0.97	(0.48)	0.97	0.48	12.56
Excess			(2.79)	(4.07)	(2.79)	(1.73)	(7.03)
U.S. ENVIRONMENTAL							
Walden Asset Management (ENVRN)	344	0.65	6.47	0.76	6.47	(3.33)	(0.34)
RUSSELL 2000 (DAILY)			(1.52)	(10.14)	(1.52)	(4.41)	4.89
Excess			7.99	10.90	7.99	1.08	(5.24)
NON - US EQUITY							
Causeway	794	1.49	(4.80)	(11.58)	(4.80)	(2.41)	(4.94)
MSCI EAFE VALUE NET (DAILY)			(3.97)	(13.00)	(3.97)	(5.68)	(5.39)
Excess			(0.83)	1.42	(0.83)	3.28	0.45
Sprucegrove	869	1.63	0.09	(10.51)	0.09	(9.77)	(3.69)
MSCI EAFE VALUE NET (DAILY)			(3.97)	(13.00)	(3.97)	(5.68)	(5.39)
Excess			4.06	2.49	4.06	(4.08)	1.70
Baillie Gifford MTA	823	1.55	(3.42)	(13.38)	(3.42)	(4.67)	(6.81)
MSCI EAFE GROWTH			(2.07)	(4.66)	(2.07)	4.09	(4.43)
Excess			(1.35)	(8.72)	(1.35)	(8.76)	(2.38)
Walter Scott	975	1.83	1.09	(2.56)	1.09	0.04	(3.43)
MSCI EAFE GROWTH			(2.07)	(4.66)	(2.07)	4.09	(4.43)
Excess			3.16	2.10	3.16	(4.05)	1.00
Acadian	338	0.63	0.14	(0.22)	0.14	8.71	(3.02)
S&P EPAC Small Cap Index			(0.41)	(1.86)	(0.41)	8.95	(3.10)
Excess			0.55	1.65	0.55	(0.24)	0.08

Public Markets Manager Performance Detail



Net Returns Through March 31, 2016

	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
Pyramis	338	0.63	0.09	0.79	0.09	11.68	(5.51)
S&P EPAC Small Cap Index			(0.41)	(1.86)	(0.41)	8.95	(3.10)
Excess			0.50	2.65	0.50	2.72	(2.41)
SSGA MTA 121	544	1.02	(2.93)	(8.69)	(2.93)	(0.42)	(5.00)
MSCI EAFE			(3.01)	(8.83)	(3.01)	(0.81)	(4.90)
Excess			0.08	0.14	0.08	0.39	(0.10)
SSGA MSCI EAFE Small Cap Index	250	0.47	(0.45)	(0.91)	(0.45)	9.97	
MSCI EAFE SMALL CAP NET (DAILY)			(0.60)	(1.10)	(0.60)	9.59	
Excess			0.15	0.19	0.15	0.39	
Generation GE MTA	214	0.40	2.46	3.88	2.46	7.04	11.39
MSCI World Index			(0.35)	(3.75)	(0.35)	(0.87)	4.94
Excess			2.81	7.63	2.81	7.91	6.45
INTERNATIONAL FUND OF FUNDS							
NYCERS-TOTAL INTERNATIONAL FUND OF FUNDS	48	0.09	(3.12)	(7.63)	(3.12)	0.52	(5.54)
MSCI EAFE			(3.01)	(8.83)	(3.01)	(0.81)	(4.90)
Excess			(0.12)	1.20	(0.12)	1.33	(0.64)
EMERGING MARKETS							
BALLIE MTA	551	1.03	1.26	(12.71)	1.26	(13.67)	4.53
FTSE Custom NYCERS All Emerging Index			8.81	(8.82)	8.81	(16.80)	(0.07)
Excess			(7.55)	(3.89)	(7.55)	3.14	4.60
Acadian / MTA	521	0.98	6.90	(11.45)	6.90	(18.25)	3.09
FTSE Custom NYCERS All Emerging Index			8.81	(8.82)	8.81	(16.80)	(0.07)
Excess			(1.91)	(2.63)	(1.91)	(1.45)	3.16
PARAMETRIC EM	526	0.99	10.04	(9.35)	10.04	(19.39)	(1.55)
FTSE Custom NYCERS All Emerging Index			8.81	(8.82)	8.81	(16.80)	(0.07)
Excess			1.23	(0.53)	1.23	(2.59)	(1.48)

Public Markets Manager Performance Detail



Net Returns Through March 31, 2016

	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
DFA MTA	573	1.08	11.66	(10.52)	11.66	(22.06)	(4.16)
FTSE Custom NYCERS All Emerging Index			8.81	(8.82)	8.81	(16.80)	(0.07)
Excess			2.85	(1.69)	2.85	(5.26)	(4.09)
Blackrock EM	1,561	2.93	9.07	(9.74)	9.07	(17.92)	(1.52)
MSCI CUSTOM NYCERS EMERGING MARKETS (NET)			8.87	(9.45)	8.87	(17.71)	
Excess			0.21	(0.29)	0.21	(0.21)	

FIXED INCOME SUMMARY

STRUCTURED FIXED INCOME

Neuberger Berman - Mortgage	1,073	2.02	1.89	2.97	1.89	1.42	6.99
CITIGROUP MORTGAGE INDEX			1.97	3.18	1.97	1.56	6.12
Excess			(0.07)	(0.21)	(0.07)	(0.14)	0.86
Blackrock - Mortgage	1,216	2.28	1.96	2.99	1.96	1.67	6.75
CITIGROUP MORTGAGE INDEX			1.97	3.18	1.97	1.56	6.12
Excess			(0.00)	(0.19)	(0.00)	0.11	0.62
Wellington - Mortgage	522	0.98	2.06	3.12	2.06	1.35	6.77
CITIGROUP MORTGAGE INDEX			1.97	3.18	1.97	1.56	6.12
Excess			0.10	(0.06)	0.10	(0.21)	0.65
Goldman Sachs - Mortgage	553	1.04	1.76	2.87	1.76	1.60	6.24
CITIGROUP MORTGAGE INDEX			1.97	3.18	1.97	1.56	6.12
Excess			(0.20)	(0.31)	(0.20)	0.04	0.12
Amundi Smith Breeden - Mortgage	222	0.42	1.87	3.01	1.87	1.73	6.36
CITIGROUP MORTGAGE INDEX			1.97	3.18	1.97	1.56	6.12
Excess			(0.09)	(0.18)	(0.09)	0.16	0.23

Public Markets Manager Performance Detail



Net Returns Through March 31, 2016

	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
Prudential - Corp - Credit	1,223	2.30	4.02	4.29	4.02	(0.32)	7.54
NYC - Investment Grade Credit			3.85	3.72	3.85	(0.65)	7.04
Excess			0.17	0.58	0.17	0.33	0.50
T. Rowe Price - Credit	887	1.67	3.63	3.64	3.63	0.13	7.91
NYC - Investment Grade Credit			3.85	3.72	3.85	(0.65)	7.04
Excess			(0.22)	(0.07)	(0.22)	0.78	0.87
Blackrock - Credit	883	1.66	3.75	3.23	3.75	(0.83)	7.48
NYC - Investment Grade Credit			3.85	3.72	3.85	(0.65)	7.04
Excess			(0.11)	(0.49)	(0.11)	(0.18)	0.44
Taplin Canida Habacht - Credit	753	1.41	4.04	0.70	4.04	(4.37)	7.83
NYC - Investment Grade Credit			3.85	3.72	3.85	(0.65)	7.04
Excess			0.19	(3.01)	0.19	(3.73)	0.79
Barrow Hanley - Credit	671	1.26	3.97	4.22	3.97	(0.09)	7.47
NYC - Investment Grade Credit			3.85	3.72	3.85	(0.65)	7.04
Excess			0.11	0.50	0.11	0.56	0.42
Prudential-Privest - Credit	195	0.37	1.86	2.72	1.86	1.63	7.20
NYC - Investment Grade Credit			3.85	3.72	3.85	(0.65)	7.04
Excess			(1.99)	(1.00)	(1.99)	2.28	0.16
Blackrock - Gov't	587	1.10	5.50	7.42	5.50	0.69	11.98
NYC - Treasury Agency Plus Five			5.55	7.72	5.55	0.72	12.38
Excess			(0.05)	(0.30)	(0.05)	(0.03)	(0.40)
State Street - Gov't	588	1.10	5.59	7.45	5.59	0.46	12.10
NYC - Treasury Agency Plus Five			5.55	7.72	5.55	0.72	12.38
Excess			0.05	(0.27)	0.05	(0.26)	(0.28)

Public Markets Manager Performance Detail



Net Returns Through March 31, 2016

	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
ENHANCED YIELD							
Loomis, Sayles - High Yield	379	0.71	2.60	(8.63)	2.60	(7.67)	4.89
NYC-Loomis (BoA MLMSTII 7-03/BB&B PRIOR)			3.25	(3.94)	3.25	(4.64)	2.50
Excess			(0.65)	(4.69)	(0.65)	(3.02)	2.38
Oaktree - High Yield	317	0.60	3.52	(3.81)	3.52	(4.77)	1.52
BofAML HYM CONSTRAINED (DAILY)			3.25	(3.91)	3.25	(4.61)	2.51
Excess			0.28	0.10	0.28	(0.16)	(0.98)
NEUBERGER BERMAN - HIGH YIELD	338	0.63	3.54	(2.66)	3.54	(4.00)	2.14
BofAML HIGH YIELD MASTER II (DAILY)			3.25	(3.94)	3.25	(4.64)	2.50
Excess			0.29	1.28	0.29	0.64	(0.36)
Stone Harbor - High Yield	196	0.37	2.68	(3.71)	2.68	(4.54)	0.97
BofAML HIGH YIELD MASTER II (DAILY)			3.25	(3.94)	3.25	(4.64)	2.50
Excess			(0.57)	0.23	(0.57)	0.11	(1.54)
T. Rowe Price - Enhanced Yield	345	0.65	2.74	(1.78)	2.74	(1.28)	2.96
CITIGROUP BB & B			3.04	(3.94)	3.04	(4.21)	2.78
Excess			(0.30)	2.16	(0.30)	2.93	0.18
Shenkman - High Yield	170	0.32	2.60	(2.96)	2.60	(2.24)	2.93
CITIGROUP BB & B			3.04	(3.94)	3.04	(4.21)	2.78
Excess			(0.44)	0.98	(0.44)	1.97	0.14
Penn Capital Mgt	124	0.23	1.42	(2.72)	1.42	(1.26)	0.84
CITIGROUP BB & B			3.04	(3.94)	3.04	(4.21)	2.78
Excess			(1.61)	1.22	(1.61)	2.95	(1.95)
Fort Washington	113	0.21	2.49	(4.81)	2.49	(4.43)	2.18
CITIGROUP BB & B			3.04	(3.94)	3.04	(4.21)	2.78
Excess			(0.54)	(0.87)	(0.54)	(0.22)	(0.60)

Public Markets Manager Performance Detail



Net Returns Through March 31, 2016

	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
BANK LOANS							
Babson BL	270	0.51	0.46	(2.58)	0.46	0.12	1.99
CSFB LEVERAGED LOAN INDEX			1.33	(1.88)	1.33	(0.38)	2.06
Excess			(0.87)	(0.70)	(0.87)	0.50	(0.07)
Credit Suisse BL	279	0.52	1.54	0.51	1.54	2.57	2.67
CSFB LEVERAGED LOAN INDEX			1.33	(1.88)	1.33	(0.38)	2.06
Excess			0.21	2.38	0.21	2.96	0.61
Guggenheim BL	179	0.34	1.46	0.33	1.46	2.07	2.88
CSFB LEVERAGED LOAN INDEX			1.33	(1.88)	1.33	(0.38)	2.06
Excess			0.13	2.21	0.13	2.45	0.83
Invesco BL	270	0.51	1.80	(1.43)	1.80	(0.91)	1.65
CSFB LEVERAGED LOAN INDEX			1.33	(1.88)	1.33	(0.38)	2.06
Excess			0.48	0.45	0.48	(0.53)	(0.41)
TIPS							
State Street TIPS MTA	1,366	2.56	4.48	2.55	4.48	(1.35)	3.57
Barclays Global Inflation Linked: US TIPS (Daily)			4.46	2.60	4.46	(1.44)	3.64
Excess			0.02	(0.05)	0.02	0.09	(0.07)
Blackrock TIPS MTA	440	0.83	4.44	2.56	4.44	(1.24)	3.74
Barclays Global Inflation Linked: US TIPS (Daily)			4.46	2.60	4.46	(1.44)	3.64
Excess			(0.02)	(0.04)	(0.02)	0.20	0.10
CONVERTIBLE BONDS							
Advent Conv Bonds	320	0.60	(0.03)	(3.96)	(0.03)	(1.92)	4.68
BofA ML U.S. Convertible Yield Alternative			(1.48)	(10.78)	(1.48)	(9.05)	2.75
Excess			1.45	6.83	1.45	7.13	1.93

Public Markets Manager Performance Detail



Net Returns Through March 31, 2016

	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
Victory - Conv Bonds	199	0.37	(0.17)	(2.48)	(0.17)	(0.24)	13.76
BofA Merrill Lynch US Investment Grade Convertible Bond Index			1.32	0.55	1.32	1.68	15.69
Excess			(1.49)	(3.02)	(1.49)	(1.92)	(1.93)
FIXED INCOME FUND OF FUNDS							
New Century Adv LLC (Core)	48	0.09	2.20	2.50	2.20	(0.04)	6.09
Barclays Aggregate (Daily)			3.03	3.71	3.03	0.55	5.97
Excess			(0.83)	(1.20)	(0.83)	(0.59)	0.12
Pugh Capital Mgmt Inc (Core)	30	0.06	3.10	4.22	3.10	0.69	6.05
Barclays Aggregate (Daily)			3.03	3.71	3.03	0.55	5.97
Excess			0.07	0.51	0.07	0.14	0.08
Ramirez Asset	37	0.07	2.50	3.73	2.50	0.94	
Barclays Aggregate (Daily)			3.03	3.71	3.03	0.55	
Excess			(0.53)	0.02	(0.53)	0.39	
CORE FIXED INCOME							
LM Capital	286	0.54	3.06	3.56	3.06	0.83	5.67
Barclays Aggregate (Daily)			3.03	3.71	3.03	0.55	5.97
Excess			0.03	(0.15)	0.03	0.28	(0.30)
GIA	103	0.19	3.09	3.13	3.09		
Barclays Aggregate (Daily)			3.03	3.71	3.03		
Excess			0.06	(0.58)	0.06		
ECONOMICALLY TARGETED INVESTMENTS							
AFL-CIO HOUSING INV TRUST	301	0.57	2.74	3.51	2.74	1.13	6.10
Barclays Aggregate (Daily)			3.03	3.71	3.03	0.55	5.97
Excess			(0.29)	(0.20)	(0.29)	0.58	0.14

Public Markets Manager Performance Detail



Net Returns Through March 31, 2016

	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
ACCESS RBC	113	0.21	2.13	3.14	2.13	1.83	6.66
Access RBC Benchmark			2.13	3.13	2.13	1.40	5.08
Excess			0.00	0.02	0.00	0.43	1.58
CPC CONST FACILITY	11	0.02	(0.85)	10.50	(0.85)	12.90	
CPC CONST BENCHMARK			0.76	2.22	0.76	2.90	
Excess			(1.61)	8.28	(1.61)	10.00	
BOA-PPAR (FNMA)	21	0.04	7.08	18.52	7.08	42.03	13.31
FNMA Plus 85bps			2.26	3.92	2.26	2.50	7.13
Excess			4.83	14.60	4.83	39.53	6.19
BOA-PPAR (GNMA)	17	0.03	6.67	19.56	6.67	8.04	15.61
GNMA Plus 65bps			1.91	3.54	1.91	2.02	6.65
Excess			4.75	16.02	4.75	6.03	8.96
CCD-PPAR (FNMA)	10	0.02	7.01	19.22	7.01	6.69	25.71
FNMA Plus 85bps			2.26	3.92	2.26	2.50	7.13
Excess			4.75	15.30	4.75	4.20	18.58
CCD-PPAR (GNMA)	7	0.01	5.55	14.41	5.55	5.08	15.37
GNMA Plus 65bps			1.91	3.54	1.91	2.02	6.65
Excess			3.64	10.87	3.64	3.06	8.72
CFSB-PPAR (GNMA)	3	0.01	5.83	15.97	5.83	5.90	15.34
GNMA Plus 65bps			1.91	3.54	1.91	2.02	6.65
Excess			3.92	12.43	3.92	3.88	8.69
CPC-PPAR (FNMA)	69	0.13	7.31	20.89	7.31	8.96	13.91
FNMA Plus 85bps			2.26	3.92	2.26	2.50	7.13
Excess			5.05	16.97	5.05	6.46	6.78

Public Markets Manager Performance Detail



Net Returns Through March 31, 2016

	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
CPC - PPAR (GNMA)	109	0.20	4.80	12.76	4.80	5.08	8.41
GNMA Plus 65bps			1.91	3.54	1.91	2.02	6.65
Excess			2.88	9.22	2.88	3.07	1.76
JPMC-PPAR (FNMA)	35	0.07	7.09	21.09	7.09	6.18	12.06
FNMA Plus 85bps			2.26	3.92	2.26	2.50	7.13
Excess			4.83	17.17	4.83	3.68	4.93
JPMC - PPAR (GNMA)	39	0.07	4.10	12.89	4.10	6.04	13.75
GNMA Plus 65bps			1.91	3.54	1.91	2.02	6.65
Excess			2.19	9.35	2.19	4.03	7.10
LIIF-PPAR (FNMA)	4	0.01	12.84	24.83	12.84	6.29	38.12
FNMA Plus 85bps			2.26	3.92	2.26	2.50	7.13
Excess			10.59	20.92	10.59	3.79	30.99
LIIF-PPAR (GNMA)	3	0.01	4.00	8.18	4.00	3.92	9.74
GNMA Plus 65bps			1.91	3.54	1.91	2.02	6.65
Excess			2.09	4.64	2.09	1.91	3.09
NCBCI PPAR (FNMA)	0	0.00	5.45	14.03	5.45	4.97	14.93
FNMA Plus 85bps			2.26	3.92	2.26	2.50	7.13
Excess			3.19	10.11	3.19	2.47	7.81
NCBCI-PPAR (GNMA)	2	0.00	5.62	14.76	5.62	5.53	16.66
GNMA Plus 65bps			1.91	3.54	1.91	2.02	6.65
Excess			3.70	11.22	3.70	3.52	10.01
NHS-PPAR (GNMA)	1	0.00	4.70	11.94	4.70	4.90	13.73
GNMA Plus 65bps			1.91	3.54	1.91	2.02	6.65
Excess			2.79	8.40	2.79	2.89	7.08

Public Markets Manager Performance Detail

Net Returns Through March 31, 2016



	Market Value (\$MM)	% of Total	3 Month	FYTD	CYTD	2015	2014
CASH							
EMPLOYEES' SHORT TERM	430	0.81	0.33	0.34	0.33	0.31	0.36
91 DAY T-BILL			0.07	0.12	0.07	0.05	0.02
Excess			0.25	0.22	0.25	0.27	0.34
C/D - FAIL FLOAT EARNINGS	3	0.01					
SECURITY LENDING	2	0.00					

New York City
Employees' Retirement System

Appendix C

Alternative Assets Manager Performance Detail

Alternative Assets Manager Performance Detail

Through December 31, 2015



	Vintage Year (Cash Flow)	Commitments	Contributions	Distributions	Market Value	Investment Multiple	ITD IRR%
TOTAL PRIVATE EQUITY		8,580,582,728	7,006,258,212	5,347,231,832	4,111,815,629	1.35	9.1%
TOTAL ACTIVE		8,079,334,026	6,434,930,086	4,658,034,216	4,111,815,629	1.36	9.5%
Cypress Merchant Banking Partners II, L.P.	1999	45,172,972	53,861,600	43,440,706	6,924,387	0.94	-1.3%
FdG Capital Partners LLC	1999	25,000,000	28,756,835	42,947,883	6,365,393	1.71	14.8%
Lincolnshire Equity Fund II, L.P.	1999	18,397,347	19,261,466	36,463,088	1,040,736	1.95	24.6%
Solera Partners, L.P.	2000	19,999,779	26,424,028	41,635,156	4,104,069	1.73	8.6%
SCP Private Equity Partners II, L.P.	2000	27,442,463	30,827,225	9,060,182	5,292,227	0.47	-10.2%
New Mountain Partners, L.P.	2001	18,141,933	17,116,468	24,431,489	442,564	1.45	12.4%
Apollo Investment Fund V, L.P.	2001	40,000,000	62,509,880	122,932,865	1,317,199	1.99	38.6%
RRE Ventures III, L.P.	2001	19,999,999	26,237,704	33,113,046	2,928,305	1.37	5.9%
Yucaipa American Alliance Fund I, LP	2002	90,000,000	114,094,892	94,282,024	37,497,933	1.16	3.7%
Thomas, McNerney & Partners, L.P.	2002	20,000,000	20,000,000	7,003,139	5,101,749	0.61	-10.0%
BDCM Opportunity Fund, L.P.	2002	25,000,000	52,554,619	89,778,751	413,035	1.72	22.8%
Landmark Equity Partners XI, L.P.	2002	55,000,000	52,284,778	76,665,450	4,303,379	1.55	23.6%
FS Equity Partners V, L.P.	2003	25,000,000	21,386,296	38,376,747	6,150,969	2.08	15.9%
Blackstone Capital Partners IV, L.P.	2003	34,418,762	38,818,072	97,741,755	1,330,775	2.55	39.7%
Ares Corporate Opportunities Fund, L.P.	2003	45,000,000	54,008,942	78,961,930	4,281,951	1.54	13.6%
Markstone Capital Partners, LP	2004	40,000,000	46,899,103	19,822,611	1,955,927	0.46	-40.5%
FdG Capital Partners II LP	2004	35,000,000	37,624,231	42,499,038	1,944,066	1.18	3.4%
Paladin Homeland Security Fund (NY City), L.P.	2004	15,000,000	16,236,925	4,919,658	2,582,561	0.46	-10.8%
Lincolnshire Equity Fund III, L.P.	2004	55,000,000	53,368,742	69,373,748	26,202,151	1.79	30.4%
New York/Fairview Emerging Managers Fund, L.P.-Tranche 1	2004	32,000,000	32,452,414	18,854,047	21,661,915	1.25	4.1%
Aurora Equity Partners III L.P.	2004	50,000,000	54,119,877	86,237,201	5,701,901	1.70	14.4%
Trilantic Capital Partners III L.P.	2004	45,088,848	40,126,836	59,174,224	1,118,629	1.50	12.5%
Celtic Pharmaceutical Holdings L.P.	2004	25,000,000	25,402,094	402,094	3,976,018	0.17	-19.8%
Palladium Equity Partners III, L.P.	2005	35,000,000	35,756,837	50,825,061	19,539,112	1.97	18.0%
New Mountain Partners II, L.P.	2005	46,451,615	41,780,816	80,867,650	866,315	1.96	13.7%
VSS Communications Partners IV, L.P.	2005	25,000,000	28,201,361	15,354,684	6,620,397	0.78	-4.3%
Prism Venture Partners V-A, L.P.	2005	30,000,000	30,762,722	15,284,210	7,657,363	0.75	-5.8%
NB New York City Growth Fund	2005	34,819,694	34,819,694	33,604,255	-	0.97	-0.7%
Quadrangle Capital Partners II LP	2005	60,636,859	60,918,852	66,068,895	14,683,189	1.33	5.8%
Snow Phipps Group, L.P.	2005	20,000,000	22,991,038	17,825,994	11,756,659	1.29	7.0%
GI Partners Fund II L.P.	2005	35,000,000	35,404,345	41,823,917	10,621,795	1.48	6.7%
Blackstone Mezzanine Partners II, L.P.	2005	25,000,000	23,474,457	31,459,534	667,450	1.37	8.1%
Psilos Group Partners III, L.P.	2005	35,000,000	37,205,819	17,948,760	28,722,526	1.25	4.7%

Information provided by the New York City Employees' Retirement System Consultants

Alternative Assets Manager Performance Detail

Through December 31, 2015



	Vintage Year (Cash Flow)	Commitments	Contributions	Distributions	Market Value	Investment Multiple	ITD IRR%
USPF II Institutional Fund, L.P.	2005	65,000,000	85,734,194	58,373,292	59,861,305	1.38	6.5%
JP Morgan Fleming (Tranche A)	2005	43,000,000	41,274,016	29,573,959	27,586,569	1.38	7.3%
Aisling Capital II, LP	2006	6,680,102	7,814,346	5,070,342	3,199,535	1.06	1.2%
InterMedia Partners VII, L.P.	2006	25,000,000	28,970,204	17,874,149	24,728,502	1.47	6.0%
Terra Firma Capital Partners III, L.P.	2006	52,765,862	53,205,555	3,796,110	23,456,878	0.51	-11.0%
BDCM Opportunity Fund II, L.P.	2006	25,000,000	36,215,247	35,058,707	33,637,053	1.90	16.5%
Blackstone Capital Partners V, L.P.	2006	122,052,590	129,019,523	147,857,662	57,957,771	1.60	8.1%
Avista Capital Partners, L.P.	2006	45,000,000	58,757,832	50,383,584	24,064,680	1.27	5.4%
GSC Recovery III, L.P.	2006	25,000,000	28,125,676	29,592,470	2,839,241	1.15	3.8%
Apollo Investment Fund VI, L.P.	2006	90,000,000	115,838,240	145,232,785	31,125,323	1.52	9.5%
Landmark Equity Partners XIII, L.P.	2006	50,000,000	47,830,446	43,462,376	18,837,366	1.30	6.0%
Ares Corporate Opportunities Fund II, L.P.	2006	50,000,000	54,777,786	82,742,122	9,357,035	1.68	13.5%
Fairview Ventures Fund III, L.P.	2006	25,000,000	25,378,772	17,383,523	28,350,152	1.80	15.3%
Ampersand 2006	2006	25,000,000	25,000,000	25,032,244	25,834,055	2.03	14.3%
CCMP Capital Investors II, L.P.	2006	30,000,000	32,935,583	36,254,007	16,548,417	1.60	13.0%
CLP 2014 (fka Perseus Partners VII)	2006	30,000,000	35,015,446	10,072,119	888,923	0.31	-32.6%
Thomas, McNerney & Partners II, L.P.	2006	25,000,000	24,269,167	40,366,658	12,190,392	2.17	16.8%
Catterton Partners VI, L.P.	2006	45,000,000	49,681,556	61,097,483	32,706,482	1.89	13.4%
First Reserve Fund XI, L.P.	2006	45,000,000	47,820,682	26,739,005	5,477,954	0.67	-9.8%
Arsenal Capital Partners II, LP	2006	22,500,000	26,890,523	25,313,913	16,773,194	1.57	10.0%
RRE Ventures IV, L.P.	2006	35,000,000	42,884,278	19,963,569	47,629,976	1.58	9.1%
MidOcean Partners III, L.P.	2006	60,000,000	67,120,749	51,379,709	45,950,679	1.45	8.4%
GF Capital Private Equity Fund, L.P.	2006	20,000,000	20,626,154	17,106,190	19,020,707	1.75	15.0%
The Fourth Cinven Fund	2006	71,466,847	72,454,566	75,477,506	24,922,416	1.39	6.8%
Pegasus Partners IV, L.P.	2007	30,000,000	34,878,624	15,877,079	18,935,966	1.00	0.0%
FTVentures III, LP	2007	24,201,990	24,651,990	31,595,290	19,037,675	2.05	16.5%
Co-Investment Partners Europe, L.P.	2007	39,956,041	41,957,058	27,311,294	25,725,102	1.26	5.1%
Montreux Equity Partners IV, L.P.	2007	20,000,000	20,000,000	6,843,774	19,528,041	1.32	6.1%
Quaker BioVentures II, L.P.	2007	20,000,000	17,658,740	10,808,880	13,239,984	1.36	8.2%
SCP Vitalife Partners II Fund	2007	20,000,000	20,099,698	1,579	14,631,704	0.73	-6.6%
Craton Equity Investors I, L.P.	2007	20,000,000	20,089,805	1,453,710	3,746,158	0.26	-22.2%
Nautic Partners VI, L.P.	2007	30,000,000	33,397,160	52,989,663	20,905,916	2.21	19.0%
Constellation Venture Capital III, L.P.	2007	25,000,000	27,160,015	5,676,045	15,653,525	0.79	-5.2%
United States Power Fund III, L.P.	2007	65,000,000	71,706,783	31,625,128	62,793,709	1.32	6.0%
Halyard Capital Fund II, L.P.	2007	25,000,000	21,046,262	20,970,583	9,767,196	1.46	7.6%
Carlyle Partners V, L.P.	2007	70,000,000	71,029,404	74,298,662	41,576,783	1.63	13.4%

Information provided by the New York City Employees' Retirement System Consultants

Alternative Assets Manager Performance Detail

Through December 31, 2015



	Vintage Year (Cash Flow)	Commitments	Contributions	Distributions	Market Value	Investment Multiple	ITD IRR%
PCG Clean Energy & Technology Fund (East), LLC	2007	90,000,000	79,380,090	9,345,681	41,015,734	0.63	-8.9%
GSO Capital Opportunities Fund LP	2007	45,000,000	67,167,107	91,176,696	6,157,993	1.45	18.0%
StarVest Partners II, L.P.	2007	25,000,000	24,464,099	1,166,983	20,263,737	0.88	-3.3%
New Mountain Partners III, L.P.	2007	100,000,000	98,204,970	62,928,377	91,096,255	1.57	11.4%
Vista Equity Partners Fund III, L.P.	2007	30,000,000	31,860,199	67,811,388	13,627,500	2.56	28.6%
Trilantic Capital Partners IV L.P.	2007	69,028,637	69,258,852	85,006,887	22,676,437	1.55	14.1%
RLJ Equity Partners Fund I, L.P.	2007	20,000,000	21,094,120	8,301,877	22,599,335	1.46	11.9%
Pine Brook Capital Partners, L.P.	2007	30,000,000	30,290,730	17,835,817	17,348,182	1.16	5.2%
Paladin III (NY City), L.P.	2008	30,000,000	33,715,844	17,391,950	27,837,059	1.34	8.4%
Relativity Fund, L.P.	2008	10,877,829	10,773,614	2,302,071	3,618,054	0.55	-11.1%
Apollo Investment Fund VII, L.P.	2008	100,000,000	118,027,691	175,043,874	31,446,113	1.75	24.8%
NGN BioMed Opportunity II, L.P.	2008	20,000,000	18,651,821	3,946,209	9,647,949	0.73	-7.4%
Carpenter Community BancFund-A, L.P.	2008	20,000,000	19,519,654	11,658,453	18,076,491	1.52	8.1%
Riverstone/Carlyle Global Energy & Power Fund IV, L.P.	2008	45,000,000	48,011,110	33,780,685	22,103,169	1.16	5.3%
Yucaipa American Alliance Fund II, LP	2008	120,000,000	162,119,768	96,852,660	127,732,190	1.39	9.4%
Levine Leichtman Capital Partners IV, L.P.	2008	35,000,000	35,033,723	40,891,031	19,849,088	1.73	20.8%
Lee Equity Partners Fund, L.P.	2008	42,500,000	50,020,033	38,650,266	29,201,553	1.36	9.7%
New York/Fairview Emerging Managers Fund, L.P.-Tranche 2	2008	45,000,000	40,442,559	20,107,145	41,909,947	1.53	15.2%
Yucaipa Corporate Initiatives Fund II, LP	2008	42,092,788	40,842,713	11,698,560	24,102,171	0.88	-3.1%
Leeds Equity Partners V, L.P.	2008	60,000,000	53,780,291	33,414,337	51,652,510	1.58	15.8%
GI Partners Fund III L.P.	2008	45,000,000	48,032,596	48,538,062	22,049,276	1.47	13.3%
Ares Corporate Opportunities Fund III, L.P.	2008	75,000,000	88,326,583	78,847,538	73,782,619	1.73	20.9%
GCM Grosvenor NYCERS Emerging Manager Co-Investment Fund, L.P.	2008	12,875,950	14,624,434	19,882,463	5,578,805	1.74	13.7%
GCM Grosvenor NYCERS Emerging Manager Fund, L.P.	2008	116,737,374	118,753,450	65,157,557	87,917,050	1.29	10.7%
First Reserve Fund XII, L.P.	2008	45,000,000	47,347,642	21,141,435	14,475,030	0.75	-8.1%
Landmark Equity Partners XIV, L.P.	2008	109,120,000	100,746,932	79,149,454	55,893,842	1.34	13.6%
Crestview Partners II, L.P.	2008	50,000,000	53,934,453	40,003,445	38,230,043	1.45	12.7%
Avista Capital Partners II, L.P.	2008	75,000,000	90,101,099	96,057,291	71,115,316	1.86	18.8%
Blue Wolf Capital Fund II, L.P.	2008	25,000,000	27,167,904	9,980,200	21,521,002	1.16	5.3%
Bridgepoint Europe IV	2008	26,692,309	24,454,185	18,502,077	16,374,093	1.43	10.5%
Aisling Capital III, LP	2008	14,000,000	14,609,804	13,251,959	10,566,540	1.63	22.9%
Onex Partners III LP	2008	75,000,000	80,906,942	47,917,405	71,908,685	1.48	13.3%
Welsh, Carson, Anderson & Stowe XI, L.P.	2009	40,000,000	38,570,874	30,586,944	28,431,030	1.53	14.2%
FS Equity Partners VI, L.P.	2009	32,500,000	30,844,052	24,252,393	31,217,171	1.80	18.9%
Lincolnshire Equity Fund IV, L.P.	2009	27,500,000	26,847,584	9,638,864	23,224,409	1.22	8.1%
Lexington Capital Partners VII, L.P.	2009	50,000,000	41,137,940	34,169,444	27,140,184	1.49	16.1%

Information provided by the New York City Employees' Retirement System Consultants

Alternative Assets Manager Performance Detail

Through December 31, 2015



	Vintage Year (Cash Flow)	Commitments	Contributions	Distributions	Market Value	Investment Multiple	ITD IRR%
Snow Phipps II, L.P.	2010	30,000,000	26,880,613	13,553,711	25,996,465	1.47	17.6%
JP Morgan Fleming (Tranche B)	2010	35,000,000	31,752,331	9,416,330	36,060,618	1.43	13.3%
Trident V, L.P.	2010	110,000,000	115,038,446	23,449,235	119,122,882	1.24	8.4%
Blackstone Capital Partners VI, L.P.	2011	120,000,000	104,391,928	18,269,633	108,425,026	1.21	11.7%
Ampersand 2011	2011	25,000,000	24,125,000	1,410,929	39,775,312	1.71	17.8%
BDCM Opportunity Fund III, L.P.	2011	45,000,000	57,122,206	20,728,277	46,657,456	1.18	9.9%
AXA Secondary Fund V B L.P.	2011	120,000,000	93,522,488	53,948,825	87,366,477	1.51	18.9%
Wellspring Capital Partners V, L.P.	2011	40,000,000	33,481,157	4,728,951	39,127,350	1.31	15.0%
EQT VI, L.P.	2011	105,574,632	88,712,983	2,593,006	95,691,993	1.11	4.6%
Pegasus Partners V, L.P.	2011	20,789,916	15,465,932	3,700,886	17,678,014	1.38	12.5%
BC European Capital IX	2011	131,542,734	107,833,631	34,944,605	88,398,960	1.14	6.6%
American Securities Partners VI, L.P.	2011	80,000,000	73,899,688	23,611,608	79,251,907	1.39	20.0%
Vista Equity Partners Fund IV, L.P.	2011	100,000,000	94,616,577	42,645,356	120,849,834	1.73	23.6%
Warburg Pincus Private Equity XI, L.P.	2012	110,000,000	99,708,488	17,614,960	105,610,009	1.24	15.1%
Trilantic Capital Partners V L.P.	2012	70,000,000	31,668,828	424,163	28,631,238	0.92	-6.0%
Palladium Equity Partners IV, L.P.	2012	55,000,000	24,674,917	2,075,887	24,402,914	1.07	4.5%
Ares Corporate Opportunities Fund IV, L.P.	2012	125,000,000	93,423,285	8,707,794	96,105,409	1.12	8.7%
Green Equity Investors VI, L.P.	2012	120,000,000	78,929,182	3,699,159	91,021,497	1.20	12.3%
Platinum Equity Capital Partners III, L.P.	2012	100,000,000	50,638,053	35,466,367	45,172,481	1.59	48.0%
<u>NYCERS - 2012 Emerging Manager Program</u>	<u>2012</u>	<u>150,000,000</u>	<u>70,646,901</u>	<u>3,003,367</u>	<u>74,931,155</u>	<u>1.10</u>	<u>9.9%</u>
Carlyle Partners VI, L.P.	2013	75,000,000	34,692,409	1,248,343	32,970,099	0.99	-1.3%
Landmark Equity Partners XV, L.P.	2013	75,000,000	24,534,402	6,926,414	21,347,989	1.15	12.9%
Apollo Investment Fund VIII, L.P.	2013	140,000,000	42,159,677	889,829	40,122,052	0.97	-3.5%
Landmark - NYC Fund I, L.P.	2013	25,000,000	10,482,609	1,815,450	10,617,502	1.19	15.6%
CVC Capital Partners VI, L.P.	2013	119,751,277	45,660,789	829,561	40,133,696	0.90	NM
Crestview Partners III, L.P.	2013	66,000,000	15,112,145	249,535	14,679,510	0.99	NM
Crestview Partners III (Co-Investment B), L.P.	2013	22,000,000	7,374,875	309,025	7,329,052	1.04	NM
Olympus Growth Fund VI, L.P.	2014	75,000,000	15,560,952	5,784,184	13,398,825	1.23	NM
ASF VI B L.P.	2014	83,000,000	32,381,936	1,066,283	38,685,325	1.23	NM
ASF VI B NYC Co-Invest L.P.	2014	27,000,000	15,768,881	2,284,200	16,978,692	1.22	NM
Vista Equity Partners Fund V, L.P.	2014	125,000,000	84,328,453	9,745	96,080,250	1.14	NM
Carlyle Partners VI, L.P. (Side Car)	2014	4,567,000	4,574,090	-	4,434,168	0.97	NM
Lexington Capital Partners VIII, L.P.	2014	110,000,000	14,411,611	2,406,154	18,068,217	1.42	NM
Centerbridge Capital Partners III, L.P.	2014	23,700,000	5,231,464	-	5,604,272	1.07	NM
Siris Partners III, L.P.	2015	31,000,000	4,969,397	-	4,576,002	0.92	NM
Welsh, Carson, Anderson & Stowe XII, L.P.	2015	78,500,000	16,471,687	-	15,018,684	0.91	NM

Information provided by the New York City Employees' Retirement System Consultants

Alternative Assets Manager Performance Detail

Through December 31, 2015



	Vintage Year (Cash Flow)	Commitments	Contributions	Distributions	Market Value	Investment Multiple	ITD IRR%
Warburg Pincus Private Equity XII, L.P.	2015	205,500,000	3,167,797	-	2,809,592	0.89	NM
ASF VII B L.P.	2015	94,500,000	5,439,169	-	4,980,050	0.92	NM
ASF VII B NYC Co-Invest L.P.	2015	46,000,000	4,600	-	4,600	1.00	NM
EQT VII, L.P.	2015	154,764,975	-	-	-	-	NM
American Securities Partners VII, L.P.	2015	80,000,000	-	-	-	-	NM
Bridgepoint Europe V L.P.	2015	58,919,298	-	-	54,484	-	NM
Bridgepoint Europe V Co-Invest	2015	17,105,603	-	-	-	-	N/A
<u>NYCERS - 2015 Emerging Manager Program</u>	<u>2015</u>	<u>180,000,000</u>	<u>-</u>	<u>-</u>	<u>-</u>	<u>-</u>	<u>NM</u>
Ares Corporate Opportunities Fund V, L.P.	2016	95,000,000	-	-	-	-	N/A
TOTAL LIQUIDATED		501,248,703	571,328,127	689,197,616	-	1.21	5.8%
AEA Investors 2006 Fund L.P.	2006	22,893,771	26,016,229	30,842,902	-	1.19	7.8%
Allegra Capital Partners IV, L.P.	2000	24,000,000	24,000,000	12,606,027	-	0.53	-7.4%
Carlyle Partners III, L.P.	2000	45,423,105	55,645,609	108,817,410	-	1.96	20.5%
Clayton, Dubilier & Rice Fund VII, L.P.	2005	41,067,427	46,598,100	52,419,668	-	1.12	2.5%
Clayton, Dubilier & Rice Fund VIII, L.P.	2009	29,243,725	35,195,073	40,239,167	-	1.14	6.2%
Emerald Infrastructure Development Fund	2008	996,804	996,804	5,607	-	0.01	-99.4%
Ethos US Dollar Fund V-B	2005	30,290,568	46,370,610	49,740,469	-	1.07	3.0%
HM 2006 Sector Performance Fund	2007	23,185,013	26,474,417	18,633,959	-	0.70	-12.0%
NewSpring Growth Capital II, L.P.	2006	14,400,000	14,561,753	21,528,849	-	1.48	11.7%
Ripplewood Partners II, L.P.	2001	20,000,000	22,522,260	35,969,844	-	1.60	11.1%
Silver Lake Partners II, L.P.	2004	46,469,062	53,190,565	75,839,352	-	1.43	9.1%
Silver Lake Partners III, L.P.	2007	37,822,673	45,707,472	63,369,258	-	1.39	17.0%
Tailwind Capital Partners, L.P.	2007	26,057,294	29,653,998	30,122,727	-	1.02	0.7%
Thomas H. Lee Equity Fund VI, L.P.	2006	34,418,261	39,074,789	35,813,300	-	0.92	-2.0%
VS&A Communications Partners III, L.P.	1998	50,000,000	50,248,403	69,062,415	-	1.37	6.3%
Vitruvian Investment Partnership I	2007	54,981,001	55,072,045	44,186,661	-	0.80	-7.72%

Information provided by the New York City Employees' Retirement System Consultants

Alternative Assets Manager Performance Detail

Through December 31, 2015



	Vintage Year	Original Commitment	Total Contributions	Total Distributions	Market Value	Total Value Multiple	Net IRR%
TOTAL REAL ASSETS		3,965,057,882	3,431,948,850	1,712,795,799	2,886,600,594	1.34	7.5%
TOTAL PRIVATE REAL ESTATE		3,693,057,882	3,301,573,051	1,707,782,013	2,751,006,294	1.35	7.5%
TOTAL LIQUIDATED PRIVATE REAL ESTATE		171,360,625	132,620,501	332,970,852	-	2.51	9.8%
TOTAL INFRASTRUCTURE		272,000,000	130,375,799	5,013,786	135,594,300	1.08	10.6%
TOTAL PRIVATE REAL ESTATE							
Blackstone Fund IV	2004	30,000,000	38,440,704	45,361,103	9,329,176	1.42	11.1%
The City Investment Fund I	2004	225,000,000	221,883,300	221,759,650	2,791,856	1.01	0.3%
Canyon Johnson Urban Fund II	2005	40,000,000	35,954,818	13,194,594	2,007,192	0.42	-11.4%
AREA Real Estate Investment Fund V, LP	2006	25,000,000	25,000,001	9,268,520	14,446,978	0.95	-0.9%
PRISA SA	2006	86,000,000	92,159,002	20,317,210	109,720,276	1.41	4.1%
Prologis Targeted U.S. Logistics Fund	2006	25,000,000	31,786,961	7,078,838	29,744,878	1.16	2.0%
RREEF America REIT II	2006	86,000,000	113,537,802	47,147,315	109,644,662	1.38	4.7%
UBS Trumbull Property Fund	2006	156,000,000	209,986,605	43,069,797	256,672,357	1.43	6.4%
Blackstone Real Estate Partners VI	2007	110,000,000	121,567,895	159,042,662	68,112,575	1.87	13.2%
Carlyle Realty Partners V	2007	20,000,000	24,963,254	26,605,869	7,357,760	1.36	8.4%
Colony Realty Partners II	2007	20,000,000	21,420,211	666,108	5,983,500	0.31	-13.8%
Heitman HART	2007	115,000,000	155,743,827	40,743,827	203,209,264	1.57	8.1%
JP Morgan Special Situation Property Fund	2007	90,000,000	101,965,460	24,074,066	108,564,200	1.30	3.5%
JP Morgan Strategic Property Fund	2007	136,000,000	148,192,836	-	245,434,537	1.66	7.1%
Metropolitan Workforce Housing Fund	2007	14,000,000	14,013,027	6,292,042	9,648,987	1.14	2.9%
PRISA II	2007	141,518,761	149,597,017	26,020,207	183,441,811	1.40	4.9%
RREEF America REIT III - 1410	2007	90,000,000	90,000,000	46,244,541	5,724,947	0.58	-7.4%
UrbanAmerica II	2007	25,000,000	23,222,735	938,145	1,816,800	0.12	-24.7%
American Value Partners Fund I	2008	55,000,000	39,242,523	29,159,840	16,976,869	1.18	3.9%
AREA European Real Estate Fund III, LP	2008	30,000,000	30,487,500	29,905,000	6,405,886	1.19	4.6%
Capri Urban Investors	2008	60,000,000	59,980,707	15,777,250	38,387,719	0.90	-1.8%
PRISA III	2008	50,000,000	56,895,961	-	114,269,659	2.01	12.9%
Silverpeak Legacy Partners III	2008	50,000,000	22,168,479	2,003,826	7,282,545	0.42	-12.2%
Stockbridge Real Estate Fund III	2008	27,000,000	26,998,145	-	35,183,818	1.30	5.4%
Westbrook Real Estate Fund VII	2008	40,000,000	43,417,229	33,624,247	18,016,200	1.19	3.4%
Thor Urban Property Fund II	2009	40,000,000	51,756,666	32,801,010	39,936,530	1.41	11.4%
Walton Street Real Estate Fund VI	2009	50,000,000	44,323,933	36,173,837	31,430,891	1.53	10.8%
Blackstone Real Estate Partners Europe III (USD Vehicle)	2010	50,000,000	50,970,237	33,690,913	38,258,847	1.41	13.2%
Canyon Johnson Urban Fund III	2010	30,000,000	29,586,980	37,987,841	2,830,363	1.38	12.8%
LaSalle Property Fund	2010	50,000,000	50,000,000	8,889,495	66,395,457	1.51	12.9%
Westbrook Real Estate Fund VIII	2010	50,000,000	59,206,619	64,287,780	13,198,813	1.31	12.7%
Carlyle Realty Partners VI	2011	70,000,000	63,815,840	62,959,192	41,424,413	1.64	29.7%

Information provided by the New York City Employees' Retirement System Consultants

Alternative Assets Manager Performance Detail

Through December 31, 2015



	Vintage Year	Original Commitment	Total Contributions	Total Distributions	Market Value	Total Value Multiple	Net IRR%
H/2 Special Opportunities Fund II	2011	40,000,000	39,999,999	23,365,078	30,804,779	1.35	15.4%
Blackstone Real Estate Partners VII	2012	170,000,000	196,566,587	109,836,230	181,808,750	1.48	24.1%
Brookfield Strategic Real Estate Partners	2012	100,000,000	103,710,668	24,913,895	110,806,555	1.31	18.2%
Taconic New York City Investment Fund LP	2012	70,000,000	28,954,546	12,727,273	35,379,129	1.66	18.9%
KTR Industrial Fund III	2013	40,000,000	17,479,475	27,587,374	75,374	1.58	40.6%
NYC Asset Investor #1 LLC	2013	50,000,000	52,963,403	5,628,517	60,928,756	1.26	24.2%
NYC Asset Investor #2 LLC	2013	75,000,000	62,046,071	9,379,447	62,230,300	1.15	13.9%
NYC Asset Investor #3 LLC	2013	50,000,000	12,652,266	195,673	12,807,803	1.03	2.3%
Blackstone Real Estate Partners Europe IV (USD Vehicle)	2014	169,000,000	127,644,274	12,361,209	122,542,783	N/A	N/A
Carlyle Realty Partners VII	2014	80,000,000	24,777,249	79,296	25,601,081	N/A	N/A
Divco West Fund IV	2014	23,000,000	20,915,719	6,479,863	21,517,343	N/A	N/A
Lone Star Real Estate Fund III	2014	100,000,000	85,552,600	14,823,537	85,108,706	N/A	N/A
MetLife Core Property Fund	2014	50,000,000	50,000,000	2,349,044	55,965,432	N/A	N/A
Almanac Realty Securities VII	2015	65,000,000	14,312,367	-	15,064,211	N/A	N/A
Avanath Affordable Housing Fund II	2015	8,000,000	6,522,390	-	9,020,599	N/A	N/A
Blackstone Real Estate Partners VIII	2015	151,000,000	28,858,784	-	30,047,878	N/A	N/A
H/2 Special Opportunities Fund III	2015	65,000,000	18,690,576	-	18,341,993	N/A	N/A
Almanac Realty Securities VII (Sidecar IV)	2016	20,000,000	2,731,636	-	2,881,745	N/A	N/A
European Property Investors Special Opportunities Fund IV (EPISO IV)	2016	49,178,496	2,483,942	-	2,473,127	N/A	N/A
USAA Eagle Real Estate Fund	2016	60,000,000	23,803,724	-	23,950,184	N/A	N/A
TOTAL LIQUIDATED PRIVATE REAL ESTATE							
Canyon Johnson Urban Fund	2003	15,000,000	13,590,364	15,874,432	-	1.17	10.2%
Tishman Speyer Separate Account (ERS)	2004	100,000,000	71,066,452	259,755,306	-	3.66	63.2%
Carbon Capital III	2009	40,000,000	43,757,162	53,134,591	-	1.21	8.5%
JP Morgan Urban Renaissance Property Fund	2009	16,360,625	4,206,523	4,206,523	-	1.00	0.0%
TOTAL INFRASTRUCTURE INVESTMENTS							
Brookfield Infrastructure Fund II	2013	75,000,000	40,082,347	4,630,557	43,621,780	1.20	17.5%
IFM Global Infrastructure	2014	75,000,000	75,161,227	161,227	77,924,119	N/A	N/A
First Reserve Energy Infrastructure Fund II	2014	45,000,000	5,527,578	-	4,791,990	N/A	N/A
KKR Global Infrastructure Investors II L.P.	2014	77,000,000	9,604,647	222,002	9,256,411	N/A	N/A

Information provided by the New York City Employees' Retirement System Consultants

Alternative Assets Manager Performance Detail

Through March 31, 2016



	Vintage Year	Commitment - Closing (Base)	Contributions Cumulative (Local)	Distributions Cumulative	Final Market Value	3 Month Base%	Inception IRR%
TOTAL OPPORTUNISTIC FIXED INCOME		1,858,619,669	1,644,286,891	469,120,885	1,388,312,880	0.28%	5.49%
Avenue Special Situations Fund V, L.P.	2007	75,784,973	76,951,175	99,724,647	827,209	1.26%	NM
Avenue Europe Special Sit. Fund, L.P.	2008	31,334,696	27,839,090	53,418,068	333,294	4.77%	NM
AG GECC PPIP Fund, L.P.	2010	27,000,000	27,052,129	41,724,862	50,500		20.19%
Avenue Special Situations Fund VI L.P.	2011	70,000,000	71,766,544	40,860,441	36,344,029	-5.77%	2.01%
Golden Tree	2011	140,000,000	131,253,192	-	171,489,278	1.59%	7.59%
Marathon Centre Street Partnership, L.P.	2011	218,750,000	222,250,000	17,500,000	236,428,958	-0.49%	4.60%
AG Centre Street Partnership, L.P.	2012	180,000,000	142,200,000	24,226,130	137,220,128	1.23%	4.54%
Apollo Centre Street Partnership, L.P.	2012	268,750,000	235,888,211	47,413,618	184,609,329	0.89%	-0.88%
FCO MA Centre Street L.P.	2012	140,000,000	165,237,719	57,416,465	125,692,807	1.01%	9.01%
OHA Centre Street Partnership, L.P.	2012	175,000,000	170,722,628	25,600,677	155,906,622	0.31%	2.68%
Contrarian Partnership, L.P.	2013	90,000,000	54,000,000	-	48,796,352	-0.13%	-4.85%
Lone Star Fund VIII(U.S.), L.P.	2013	100,000,000	83,944,347	58,876,214	53,306,059	-8.50%	27.68%
Oaktree Opportunities Fund IX, L.P.	2013	100,000,000	100,000,000	-	95,648,714	2.19%	-2.34%
Ares Centre Street LP	2014	140,000,000	98,478,049	-	106,315,578	2.60%	10.06%
Brightwood Capital Fund III, L.P.	2015	35,000,000	26,653,806	2,359,764	25,707,629	0.00%	3.46%
Torchlight Debt Opportunity Fund V, LP	2015	67,000,000	10,050,000	-	9,636,393	-2.45%	-9.21%

Information provided by Alpha Frontier

Alternative Assets Manager Performance Detail

Through March 31, 2016



	Market Value	MTD Return%	3 Month Return%	FYTD Return%	YTD Return%	1 Year Return%	3 Year Return%	ITD Return%	ITD Cumulative Return%
TOTAL HEDGE FUNDS	1,414,999,986	-0.42%	-1.34%	-4.90%	-1.34%	-6.51%	1.24%	2.43%	12.08%
TOTAL DIRECT HEDGE FUNDS	1,172,622,075	-0.55%	-1.36%	-4.75%	-1.36%	-6.46%	1.26%	3.86%	17.46%
TOTAL FUND OF FUNDS HEDGE FUNDS	242,377,911	0.18%	-1.28%	-5.62%	-1.28%	-6.64%	0.82%	1.52%	7.43%
TOTAL DIRECT HEDGE FUNDS									
SRS Partners US, LP - Class B - 1	47,121,102	-1.54%	-15.76%	-9.15%	-15.76%	0.47%		-2.68%	-3.34%
Turiya Fund LP - Class I Interests	47,405,956	-0.99%	-8.70%	-6.17%	-8.70%			-6.17%	-6.17%
Total Long/Short Equity	94,527,058	-1.27%	-12.36%	-7.93%	-12.36%	-4.39%		1.95%	5.46%
Fir Tree Value Fund, L.P.	92,892,794	1.28%	-10.69%	-20.53%	-10.69%	-19.99%	-3.67%	-2.58%	-7.95%
Luxor Capital Partners, LP	73,852,223	-2.61%	-7.14%	-27.81%	-7.14%	-24.68%		-19.53%	-32.86%
Perry Partners L.P.	94,792,780	1.47%	-2.60%	-13.66%	-2.60%	-15.07%		-5.12%	-13.82%
Standard General Fund L.P.	24,888,579	0.24%	-1.30%	-4.71%	-1.30%	-3.80%		-0.24%	-0.45%
Total Event Driven	286,426,376	0.22%	-6.42%	-19.00%	-6.42%	-18.23%	-4.68%	-3.55%	-10.82%
Brevan Howard L.P. - Series B	47,577,983	-1.98%	-0.93%	-4.41%	-0.93%	-5.78%	-1.51%	0.37%	1.53%
Brevan Howard L.P. - Series L	104,939,143	-1.86%	-0.55%	-3.09%	-0.55%	-4.15%		-0.37%	-1.00%
CCP Quantitative Fund LP	91,592,995	-5.32%	7.54%	5.36%	7.54%	-11.36%	1.98%	0.96%	3.06%
Pharo Gaia Fund, LTD.	50,858,047	-0.56%	1.43%	2.74%	1.43%			2.74%	2.74%
Pharo Macro Fund, Ltd.	101,570,332	1.38%	-0.65%	4.03%	-0.65%	-1.93%		7.62%	22.37%
Systematica BlueTrend Fund L.P.	101,551,420	-1.90%	6.23%	12.16%	6.23%	-0.21%	1.91%	3.58%	14.10%
Total Tactical Trading	498,089,921	-1.77%	2.71%	3.78%	2.71%	-4.40%	1.37%	1.87%	8.02%
Caspian Select Credit Fund, L.P.	105,435,751	0.88%	-2.48%	-11.19%	-2.48%	-12.47%	-1.52%	1.40%	5.62%
D.E. Shaw Composite Fund, L.L.C.	188,142,968	1.18%	2.85%	8.77%	2.85%	10.51%	13.97%	15.33%	83.36%
Total Relative Value	293,578,719	1.07%	0.87%	0.64%	0.87%	1.11%	6.85%	8.96%	44.03%
TOTAL FUND OF FUNDS HEDGE FUNDS									
Fund of Funds Hedge Funds	242,377,911	0.18%	-1.28%	-5.62%	-1.28%	-6.64%	0.82%	1.52%	7.43%

Information provided by Alpha Frontier

New York City
Employees' Retirement System

Appendix D

Footnotes

Through March 31, 2016



- The Barclays Capital Aggregate (then known as the Lehman Brothers Aggregate) was used prior to 1/1/89. Effective 1/1/89, in the Government Sector, maturities of less than 5 years were dropped from the Salomon and Lehman indices. From that date until 7/1/99 the benchmark was the NYC Core + 5, from Lehman.
- Effective 7/1/94, the NYC Core + 5 Index includes BBB rated securities.
- Effective 7/1/99, the basis of the NYC Index was changed from Lehman Brothers to Salomon. Also effective 7/1/99, only Salomon indices have been used to compare all fixed income managers.
- Effective 4/1/03, the name of the benchmark provider was changed from Salomon to Citigroup.
- Effective 7/1/03 the “NYC-Loomis” benchmark index for the Loomis Sayles Enhanced Yield portfolio reflects a change from the Citigroup BB&B Index to the more appropriate Merrill Lynch High Yield Master II Index.
- Effective 7/1/09, the Core+5 program was restructured.
 - The U.S. Gov’t sector benchmark Index was changed from the Citigroup Core+5 Treasury/Gov’t Sponsored Index to the Citigroup Core+5 Treasury/Agency Index.
 - The Corporate and Yankee sectors were combined to form the new Investment Grade Credit sector. The benchmark for the new combined sector is the customized Citigroup Credit Index. For historical performance purposes, the old Corporate sector Index is linked to the new Credit sector Index.
 - There were no changes to the Mortgage sector Index.
 - The total Core+5 results and benchmark returns combine the three sectors. Historical total Core+5 returns continue to include the old Corporate and Yankee sector returns.
- Effective 11/1/10 The NCREIF NPI policy index was replaced with the NCREIF NFI ODEC net Index retroactively.
- Effective 6/1/11 The Opportunistic Fixed NYC-CORE PLUS 5 + 200BPS policy index was replaced with the NYC-10% ANNUAL RETURN primary and JP MORGAN GLOBAL HIGH YIELD PLUS 3% secondary indices retroactively.
- Effective 8/1/11 The Hedge Funds Primary benchmark is the 1 YEAR TREASURY BILL YIELD + 4% and the secondary benchmark is the HFRI FUND OF FUNDS COMPOSITE INDEX + 1%.

General Notes

- Estimated management fees for public market investments are calculated on an accrual basis without adjustment for management fee caps. Alternative investment fees are recorded on a cash basis. Since not all alternative managers currently provide detailed fee disclosure, the alternative investment fees noted here are not comprehensive.
- Public Market returns are Net of Manager Fees for periods after January 2014 and Gross of investment advisory fees for other periods unless otherwise indicated.
- Public market excess returns for periods prior to 2014 are based on Gross performance.

Page Specific

Pages 8 & 9 - Portfolio Asset Allocation

- Rebalancing Ranges: the minimum and maximum weights that actual Asset Allocation may reach before rebalancing between Asset Classes is necessary.

Pages 10 -12 - Performance Attribution: Total Plan

- Plan Return at Policy Weights: the return of the Total Plan assuming actual Asset Class results were maintained at target (Adjusted Policy) weights. *Figure = (Return of Asset Class 1 * Target Weight) plus (Return Of Asset Class 2 * Target Weight) plus (.....)*
- **Allocation Effect** = Total Plan Return minus Plan Return At Adjusted Policy Weights. Allocation is the Contribution to Performance resulting from an overweight or underweight to an asset class. E.g. an underweight to an Asset Class that under-performs results in a positive Allocation Effect and vice versa.
- **Selection Effect** = Equal to the Custom Benchmark (Adjusted Policy Index) Return minus Plan Return at Adjusted Policy Weights. This illustrates how the Managers have added or removed value based on their Security Selection decisions, e.g., *If the manager's Actual Returns are higher than the Implied Return there will be a positive Selection Effect.*
- **Policy Index = Custom Benchmark**
The "policy index" is a custom benchmark representing the weighted average return of the weighted benchmark indexes for each major investment program. Weights may reflect an adjustment of actual policy for outstanding commitments for new or revised programs, such as for private market programs, which are invested gradually, or for any new or updated program requiring the completion of RFPs and contracts. The policy index/custom benchmark is calculated monthly based on adjusted policy weights at the beginning of each month.

The indexes and most recent policy weights are as follows:

*U.S. Equity: Russell 3000 * 33.17%*

*International Developed (EAFE) Markets: MSCI EAFE * 10.15%*

*Emerging Markets: FTSE NYCERS Custom Benchmark * 6.90%*

*Private Equity: Russell 3000 + 300 b.p. per annum * 7.00%*

*Private Real Estate: NFI - ODCE Net+100BPS * 5.47%*

*Infrastructure: CPI + 4% * 0.27%*

*Hedge Funds: 1yr T- Bill yield + 4% * 2.83%*

*Domestic Fixed Income: NYC Core +5 * 20.89%*

*TIPS: Lehman U.S. TIPS * 4.50%*

*Enhanced Yield: Citigroup BB&B * 3.26%*

*Bank Loans: Credit Suisse Leveraged Loan * 1.91%*

*Convertible Bonds: BofAML All Convertibles Ex Mandatory * 1.00%*

*Opportunistic Fixed: 10% Annualized Return * 2.66%*

Page 13 – Allocation and Selection Effects - Asset Class Breakdown

- This chart aims to break down the Allocation and Selection Effects shown on the Performance Attribution pages. The aim of the Page is to show the asset classes where Managers are either out performing or under performing their benchmark and to show the basis point effect that this is having on Plan performance.