



Los Angeles Fire and Police Pension System

2023 Year End Summary by Composite

Period Ended: December 31, 2023



Los Angeles Fire and Police Pension System
Comparative Performance

As of December 31, 2023

	Market Value (\$M)	QTD	FYTD	1 Year	3 Years	5 Years	7 Years	10 Years	Since Incep.	Inception Date	Expense Ratio
Total Fund Composite - Gross	\$30,683.4	7.49	4.81	12.40	5.78	9.94	8.85	7.87	6.25	04/01/2000	0.16%
Target Allocation Index		8.65	5.66	15.05	5.46	9.82	8.56	7.47	6.28		
Difference		-1.16	-0.85	-2.65	0.32	0.12	0.29	0.40	-0.03		
Total Fund Composite - Net		7.45	4.70	12.22	5.63	9.78	8.69	-	7.72	01/01/2015	
Target Allocation Index		8.65	5.66	15.05	5.46	9.82	8.56	7.47	7.59		
Difference		-1.20	-0.96	-2.83	0.17	-0.04	0.13	-	0.13		
All Public Plans-Total Fund Median		7.85	4.90	12.69	3.96	8.69	7.65	6.74	6.00		
Rank		59	55	55	14	11	10	9	37		
Total Fund Composite Ex PE - Gross	\$25,444.9	9.04	5.71	14.01	4.24	9.01	7.85	7.01	7.21	10/01/2004	0.16%
Target Allocation Index Ex PE		7.87	4.83	12.59	4.17	8.39	7.27	6.28	6.44		
Difference		1.17	0.88	1.42	0.07	0.62	0.58	0.73	0.77		
Total Fund Composite Ex PE - Net		8.99	5.58	13.77	4.05	8.81	7.65	-	6.82	01/01/2015	
Target Allocation Index Ex PE		7.87	4.83	12.59	4.17	8.39	7.27	6.28	6.41		
Difference		1.12	0.75	1.18	-0.12	0.42	0.38	-	0.41		
Domestic Equity Composite - Gross	\$9,360.5	11.68	7.49	22.09	8.46	14.91	12.58	11.02	8.04	01/01/2001	0.14%
Russell 3000 Index		12.07	8.43	25.96	8.54	15.16	12.81	11.48	7.91		
Difference		-0.39	-0.94	-3.87	-0.08	-0.25	-0.23	-0.46	0.13		
Domestic Equity Composite - Net		11.64	7.40	21.92	8.32	14.75	12.42	-	10.85	01/01/2015	
Russell 3000 Index		12.07	8.43	25.96	8.54	15.16	12.81	11.48	11.36		
Difference		-0.43	-1.03	-4.04	-0.22	-0.41	-0.39	-	-0.51		
All Public Plans-US Equity Segment Median		11.69	7.79	23.18	7.81	14.09	11.93	10.40	7.90		
Rank		52	65	58	36	31	29	34	44		
Domestic Large Cap Equity Composite - Gross	\$7,499.9	11.52	7.76	22.92	9.29	15.46	13.39	11.90	8.81	04/01/2001	0.03%
S&P 500 Index (Cap Wtd)		11.69	8.04	26.29	10.00	15.69	13.42	12.03	8.48		
Difference		-0.17	-0.28	-3.37	-0.71	-0.23	-0.03	-0.13	0.33		
Domestic Large Cap Equity Composite - Net		11.51	7.74	22.87	9.25	15.41	13.34	-	11.73	01/01/2015	
S&P 500 Index (Cap Wtd)		11.69	8.04	26.29	10.00	15.69	13.42	12.03	11.85		
Difference		-0.18	-0.30	-3.42	-0.75	-0.28	-0.08	-	-0.12		
IM U.S. Large Cap Equity (SA+CF) Median		11.72	8.51	25.14	9.49	15.28	13.19	11.74	9.11		
Rank		59	70	57	53	48	45	45	59		
Domestic Small Cap Equity Composite - Gross	\$1,860.6	12.33	6.41	18.76	5.50	12.57	9.47	7.61	9.35	04/01/2001	0.57%
Russell 2000 Index		14.03	8.18	16.93	2.22	9.97	7.33	7.16	8.28		
Difference		-1.70	-1.77	1.83	3.28	2.60	2.14	0.45	1.07		
Domestic Small Cap Equity Composite - Net		12.14	6.05	18.09	4.95	11.98	8.91	-	7.53	01/01/2015	
Russell 2000 Index		14.03	8.18	16.93	2.22	9.97	7.33	7.16	7.41		
Difference		-1.89	-2.13	1.16	2.73	2.01	1.58	-	0.12		
IM U.S. Small Cap Equity (SA+CF) Median		12.73	8.00	17.43	6.68	12.39	9.46	8.87	10.49		
Rank		56	63	40	57	47	50	79	81		

Net of fees performance started being calculated by Northern Trust on 01/01/2015.

Los Angeles Fire and Police Pension System
Comparative Performance

As of December 31, 2023

	Market Value (\$M)	QTD	FYTD	1 Year	3 Years	5 Years	7 Years	10 Years	Since Incep.	Inception Date	Expense Ratio
Int'l Equity Composite - Gross	\$5,040.5	11.49	8.07	21.59	2.48	8.44	7.42	5.22	4.86	04/01/2000	0.21%
MSCI ACW Ex US Index (USD) (Gross)		9.82	5.78	16.21	2.04	7.60	6.84	4.32	4.28		
Difference		1.67	2.29	5.38	0.44	0.84	0.58	0.90	0.58		
Int'l Equity Composite - Net		11.36	7.75	21.05	2.11	8.06	7.05	-	5.76	01/01/2015	
MSCI ACW Ex US Index (USD) (Gross)		9.82	5.78	16.21	2.04	7.60	6.84	4.32	5.22		
Difference		1.54	1.97	4.84	0.07	0.46	0.21	-	0.54		
All Public Plans-Intl. Equity Segment Median		10.20	5.42	17.04	2.17	8.68	7.84	5.11	-		
Rank		5	4	7	42	58	62	46	-		
MSCI EAFE Index (USD) (Gross)		10.47	6.00	18.85	4.53	8.69	7.43	4.78	4.09		
Int'l Developed Equity Composite - Gross	\$5,030.4	11.55	7.67	23.07	3.70	9.03	7.67	5.44	6.31	10/01/2004	0.21%
MSCI ACW Ex US Index (USD) (Gross)		9.82	5.78	16.21	2.04	7.60	6.84	4.32	6.13		
Difference		1.73	1.89	6.86	1.66	1.43	0.83	1.12	0.18		
Int'l Developed Equity Composite - Net		11.51	7.55	22.78	3.43	8.74	7.39	-	6.16	01/01/2015	
MSCI ACW Ex US Index (USD) (Gross)		9.82	5.78	16.21	2.04	7.60	6.84	4.32	5.22		
Difference		1.69	1.77	6.57	1.39	1.14	0.55	-	0.94		
IM All ACWI Ex US (SA+CF) Median		10.21	4.71	16.98	1.73	8.82	7.77	5.25	7.00		
Rank		25	14	6	32	46	53	42	79		
Fixed Income Composite - Gross	\$6,466.2	6.76	3.95	7.40	-1.13	3.64	3.23	3.53	4.85	04/01/2000	0.13%
Bloomberg US Unv Bond Index		6.83	3.76	6.17	-2.97	1.44	1.57	2.08	4.26		
Difference		-0.07	0.19	1.23	1.84	2.20	1.66	1.45	0.59		
Fixed Income Composite - Net		6.74	3.88	7.27	-1.25	3.51	3.09	-	3.04	01/01/2015	
Bloomberg US Unv Bond Index		6.83	3.76	6.17	-2.97	1.44	1.57	2.08	1.70		
Difference		-0.09	0.12	1.10	1.72	2.07	1.52	-	1.34		
All Public Plans-US Fixed Income Segment Median		5.92	3.30	5.62	-2.15	2.11	2.14	2.48	-		
Rank		24	32	18	29	8	7	11	-		
Domestic Core Fixed Income Composite - Gross	\$2,932.2	8.32	3.31	6.57	-4.27	2.13	2.19	2.83	4.77	04/01/2001	0.08%
Bloomberg US Agg Bond Index		6.82	3.37	5.53	-3.31	1.10	1.29	1.81	3.64		
Difference		1.50	-0.06	1.04	-0.96	1.03	0.90	1.02	1.13		
Domestic Core Fixed Income Composite - Net		8.30	3.26	6.46	-4.35	2.05	2.11	-	2.15	01/01/2015	
Bloomberg US Agg Bond Index		6.82	3.37	5.53	-3.31	1.10	1.29	1.81	1.36		
Difference		1.48	-0.11	0.93	-1.04	0.95	0.82	-	0.79		
IM U.S. Brd Mkt Core Fixed Income (SA+CF) Median		6.82	3.49	6.06	-3.01	1.64	1.76	2.25	4.07		
Rank		1	72	22	100	16	13	9	4		

Net of fees performance started being calculated by Northern Trust on 01/01/2015.

Los Angeles Fire and Police Pension System
Comparative Performance

As of December 31, 2023

	Market Value (\$M)	QTD	FYTD	1 Year	3 Years	5 Years	7 Years	10 Years	Since Incep.	Inception Date	Expense Ratio
High Yield Fixed Income Composite - Gross	\$739.6	6.09	7.03	12.72	3.68	6.34	5.38	5.67	6.31	04/01/2001	0.34%
High Yield Custom Index		7.07	7.64	13.47	2.01	5.19	4.41	4.51	6.98		
Difference		-0.98	-0.61	-0.75	1.67	1.15	0.97	1.16	-0.67		
High Yield Fixed Income Composite - Net		6.01	6.68	12.35	3.34	5.99	5.02	-	5.64	01/01/2015	
High Yield Custom Index		7.07	7.64	13.47	2.01	5.19	4.41	4.51	4.73		
Difference		-1.06	-0.96	-1.12	1.33	0.80	0.61	-	0.91		
IM U.S. High Yield Bonds (SA+CF) Median		6.53	7.14	12.58	2.50	5.42	4.63	4.71	7.02		
Rank		71	56	47	19	15	14	3	87		
Global Credit Composite - Gross	\$815.8	7.73	6.15	10.08	-	-	-	-	8.39	09/01/2022	0.28%
Global Credit Custom Index		6.76	6.27	10.68	-0.58	3.23	3.05	-	7.46		
Difference		0.97	-0.12	-0.60	-	-	-	-	0.93		
Global Credit Composite - Net		7.73	6.15	10.08	-	-	-	-	8.39	09/01/2022	
Global Credit Custom Index		6.76	6.27	10.68	-0.58	3.23	3.05	-	7.46		
Difference		0.97	-0.12	-0.60	-	-	-	-	0.93		
IM Global Fixed Income (SA+CF) Median		7.34	5.24	8.75	-1.46	3.07	3.04	2.80	6.05		
Rank		42	37	37	-	-	-	-	30		
Unconstrained Fixed Income Composite - Gross	\$738.4	4.00	4.02	8.00	1.90	3.83	3.41	-	3.11	08/01/2014	0.22%
Unconstrained Fixed Income Custom Index		1.62	3.21	6.07	3.17	3.68	3.95	3.78	3.82		
Difference		2.38	0.81	1.93	-1.27	0.15	-0.54	-	-0.71		
Bloomberg US Agg Bond Index		6.82	3.37	5.53	-3.31	1.10	1.29	1.81	1.53		
Difference		-2.82	0.65	2.47	5.21	2.73	2.12	-	1.58		
Unconstrained Fixed Income Composite - Net		3.95	3.91	7.70	1.68	3.59	3.17	-	3.09	01/01/2015	
Unconstrained Fixed Income Custom Index		1.62	3.21	6.07	3.17	3.68	3.95	3.78	3.84		
Difference		2.33	0.70	1.63	-1.49	-0.09	-0.78	-	-0.75		
Bloomberg US Agg Bond Index		6.82	3.37	5.53	-3.31	1.10	1.29	1.81	1.36		
Difference		-2.87	0.54	2.17	4.99	2.49	1.88	-	1.73		
Real Estate Composite - Gross	\$3,202.6	5.99	2.60	-1.62	4.62	5.09	5.12	7.23	7.34	04/01/2000	N/A
Real Estate Custom Index		1.51	-2.01	-5.29	4.88	4.80	5.08	6.94	8.49		
Difference		4.48	4.61	3.67	-0.26	0.29	0.04	0.29	-1.15		
NCREIF ODCE Index (AWA) (Net)+0.50%		-4.88	-6.77	-12.29	4.53	3.86	4.90	6.86	6.97		
NCREIF Property Index+1%		-2.78	-3.87	-7.02	5.61	5.38	6.09	7.87	8.95		
REITS Composite - Gross	\$1,368.4	16.75	8.31	12.28	4.27	7.23	6.27	7.49	6.22	06/01/2006	0.39%
REITS Custom Index		16.78	8.65	11.13	3.95	5.25	4.13	5.92	5.02		
Difference		-0.03	-0.34	1.15	0.32	1.98	2.14	1.57	1.20		
REITS Composite - Net		16.63	8.08	11.80	3.88	6.82	5.87	-	5.38	01/01/2015	
REITS Custom Index		16.78	8.65	11.13	3.95	5.25	4.13	5.92	4.11		
Difference		-0.15	-0.57	0.67	-0.07	1.57	1.74	-	1.27		
IM Global REIT (SA+CF) Median		15.82	9.20	12.65	3.09	6.03	5.58	6.08	5.28		
Rank		25	74	58	27	20	23	9	1		

Net of fees performance started being calculated by Northern Trust on 01/01/2015.

Los Angeles Fire and Police Pension System
Comparative Performance

As of December 31, 2023

	Market Value (\$M)	QTD	FYTD	1 Year	3 Years	5 Years	7 Years	10 Years	Since Incep.	Inception Date	Expense Ratio
US REITS Composite - Gross	\$945.3	17.21	7.90	12.65	5.99	9.13	7.32	9.41	7.29	06/01/2006	0.45%
US REITS Custom Index		17.98	8.15	11.36	5.70	6.64	4.61	7.25	5.77		
Difference		-0.77	-0.25	1.29	0.29	2.49	2.71	2.16	1.52		
US REITS Composite - Net		17.07	7.64	12.08	5.54	8.63	6.83	-	6.53	01/01/2015	
US REITS Custom Index		17.98	8.15	11.36	5.70	6.64	4.61	7.25	4.82		
Difference		-0.91	-0.51	0.72	-0.16	1.99	2.22	-	1.71		
IM U.S. REIT (SA+CF) Median		16.37	7.77	13.71	6.69	8.47	6.27	8.33	7.10		
Rank		23	45	68	76	37	21	16	48		
Global REITS Composite - Gross	\$423.1	15.74	9.26	11.31	1.56	4.58	4.71	-	5.25	02/01/2014	0.25%
FTSE EPRA/NAREIT Dvl'd Index (USD) (Gross)		15.59	9.12	10.85	2.16	3.80	3.57	4.52	4.59		
Difference		0.15	0.14	0.46	-0.60	0.78	1.14	-	0.66		
Global REITS Composite - Net		15.66	9.11	11.03	1.30	4.31	4.42	-	3.80	01/01/2015	
FTSE EPRA/NAREIT Dvl'd Index (USD) (Gross)		15.59	9.12	10.85	2.16	3.80	3.57	4.52	3.33		
Difference		0.07	-0.01	0.18	-0.86	0.51	0.85	-	0.47		
IM Global REIT (SA+CF) Median		15.82	9.20	12.65	3.09	6.03	5.58	6.08	6.16		
Rank		52	48	76	78	87	86	-	91		
Passive Commodities Composite - Gross	\$96.1	13.20	-3.83	-	-	-	-	-	-3.83	07/01/2023	0.07%
Passive Commodities Custom Index		11.50	-4.94	-	-	-	-	-	-4.94		
Difference		1.70	1.11	-	-	-	-	-	1.11		
Passive Commodities Composite - Net		13.18	-3.85	-	-	-	-	-	-3.85	07/01/2023	
Passive Commodities Custom Index		11.50	-4.94	-	-	-	-	-	-4.94		
Difference		11.50	-4.94	-	-	-	-	-	-4.94		
Cash Equivalent Composite	\$1,114.4	1.35	2.73	5.13	2.19	1.86	1.92	1.40	3.45	04/01/2000	N/A
ICE BofAML 3 Mo US T-Bill Index		1.37	2.70	5.02	2.15	1.88	1.73	1.25	1.74		
Difference		-0.02	0.03	0.11	0.04	-0.02	0.19	0.15	1.71		

- Please see the addendum for custom index definitions.
- All ranks are shown gross of fees.

Performance Related Comments

- Performance shown is gross of fees, except where noted.
- Performance and data are provided by Northern Trust.
- RVK began monitoring the assets of Los Angeles Fire and Police Pension System as of 03/31/2010.
- Expense Ratios shown in the Comparative Performance pages are estimated based on the fee schedules provided by the investment managers and provided by LAFPP staff. The Total Fund Composite expense ratio excludes Private Real Estate and Private Equity.
- Performance for the AllianceBernstein Passive Commodity funds may have a higher tracking error due to the foreign tax withholding effect.
- RVK calculates performance beginning with the first full month following inception. Since Inception performance will differ from Northern Trust as a result.

Custom Index Comments

- The passive **High Yield Custom Index** consists of the CS Hi Yld Index through 12/31/2011 and the ICE BofAML US Hi Yld Master II Cnst Index thereafter.
- The passive **Global Credit Custom Index** consists of 50% Bloomberg Gbl Agg Bond Index (USD) (Hedged), 16.67% Ice BofAML Developed Markets High Yield Constrained Index (USD) (Hedged), 16.67% JP Morgan Emerging Markets Bond Global Diversified Index (USD) (Total Return), and 16.67% Credit Suisse Leveraged Loan Index.
- The passive **Unconstrained Fixed Income Custom Index** consists of the ICE 3 Mo LIBOR+3% through 08/31/2020, and the ICE BofAML 3 Mo US T-Bill Index+1% thereafter.
- The passive **Real Estate Custom Index** consists of 100% NCREIF Property Index +1% through 3/31/2012, 85% NCREIF ODCE Index (Net)+0.50% and 15% DJ US Select RE Secr Index through 12/31/2013, 70% NCREIF ODCE Index (Net)+0.50%, 15% DJ US Select RE Secr Index, and 15% FTSE EPRA/NAREIT Dvl'd Index through 12/31/2019, and 70% NCREIF ODCE Index (Net)+0.50%, 15% FTSE NAREIT All Eq REITs Index (TR), and 15% FTSE EPRA/NAREIT Dvl'd Index thereafter.
- The passive **REITS Custom Index** consists of 100% DJ US Select RE Secr Index through 12/31/2013, 50% DJ US Select RE Secr Index and 50% FTSE EPRA/NAREIT Dvl'd Index thereafter through 12/31/2019, and 50% FTSE NAREIT All Eq REITs Index (TR) and 50% FTSE EPRA/NAREIT Dvl'd Index thereafter.
- The passive **US REITS Custom Index** consists of 100% DJ US Select RE Secr Index through 12/31/2019, and 100% FTSE NAREIT All Eq REITs Index (TR) thereafter.
- The active **Passive Commodities Custom Index** is calculated using beginning of month investment weights applied to each corresponding benchmark return and currently consists of the S&P Gbl Water Index (Net) and the S&P Gbl Clean Energy Index (Net).
- The passive **Target Allocation Index** is calculated monthly and currently consists of:
 - 23% S&P 500 Index (Cap Wtd), 6% Russell 2000 Index, 18% MSCI ACW Ex US Index (USD) (Gross), 9.9% Bloomberg US Agg Bond Index, 2.75% ICE BofAML US Hi Yld Master II Cnst Index, 4.4% Bloomberg US Gov't Infl Lnk'd Bond Index, 2.2% Unconstrained Fixed Income Custom Index, 2.75% Global Credit Custom Index, 3% Morningstar LSTA US Leveraged Loan Index+2%, 10% Real Estate Custom Index, 15% S&P 500 Index+2.5%, 2% Bloomberg Cmdty Index (TR), and 1% ICE BofAML 3 Mo US T-Bill Index.

PORTLAND

BOISE

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