



San Jose Federated City Employees' Retirement System

As of December 31, 2023

Quarterly Review

FCERS 3.21.24

1. Economic and Market Update
2. Executive Summary
 - Aggregate Plan Overview
 - Manager Highlights
 - Fourth Quarter Manager Summary
 - Watch List
 - Market Environment – 4Q23 Overview
3. 4Q23 Review
4. Glossary and Notes

Economic and Market Update

Data as of January 31, 2024

Commentary

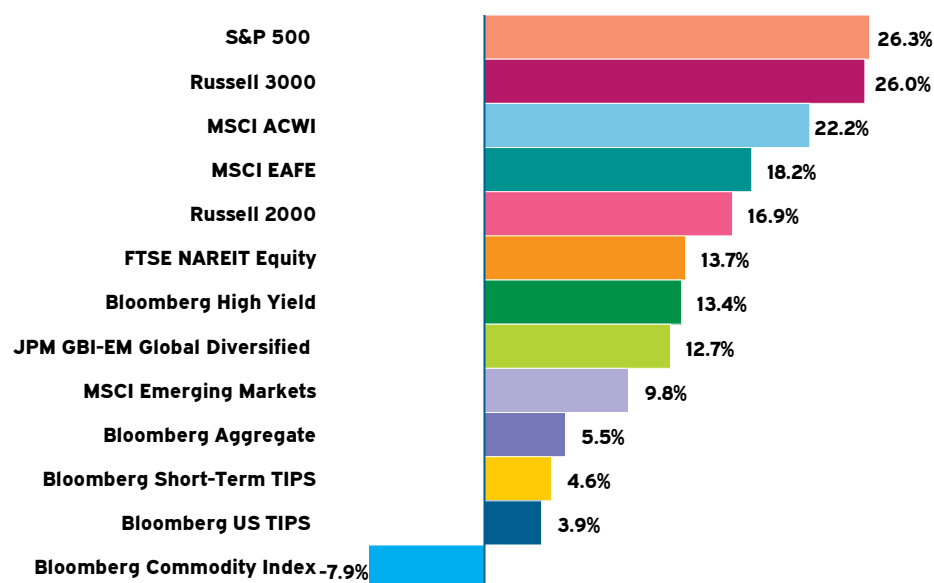
→ Markets were mixed in January after posting strong returns in 2023.

- Major central banks have largely paused interest rate hikes with expectations for many to cut rates this year. During the month there were signs though that many central banks, including the US, might not cut rates as soon as expected given strong economic data.
- In general inflation pressures have receded in most countries, but some uncertainty remains. Headline inflation fell in January in the US, but core inflation remained unchanged and elevated. China moved further into deflationary territory (-0.8%) in January.
- US equity markets (Russell 3000 index) rose 1.1% in January after a very strong 2023 (26.0%). There were mixed results across sectors, but technology continued to do well.
- Non-US developed equity markets gained 0.6% in January but 2.6% in local terms as the US dollar reversed course and strengthened during the month. The appreciation of the dollar was largely driven by strong economic data and related expectations that the Fed may delay policy rate cuts this year.
- Emerging market equity returns were also negatively influenced by the strong US dollar, but the biggest headwind in January was China (-10.6%). Emerging market equities had the weakest results for the month, down 4.6%.
- Bonds experienced selling pressure over the month, but ultimately finished the month nearly unchanged. The broad US bond market (Bloomberg Aggregate) declined (0.3%) in January.

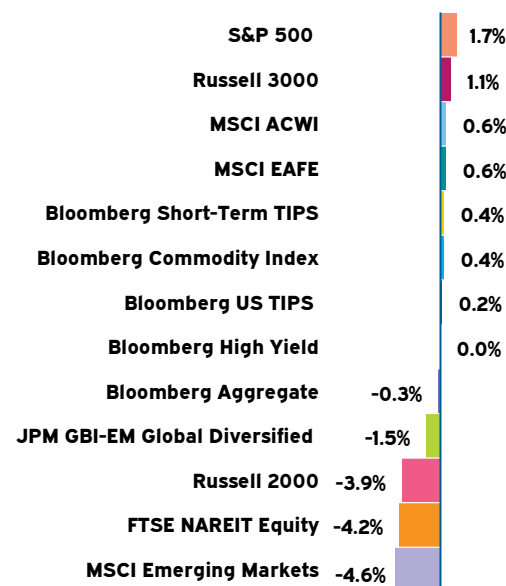
→ Looking to the rest of this year, the paths of inflation and monetary policy, China's economic disorder and slowing economic growth, the many looming elections, and the wars in Ukraine and Israel, will be key.

Index Returns¹

2023



January



→ After a strong market performance in 2023, the start of 2024 saw US large cap growth stocks continue their rally causing the S&P 500 to lead the way. Emerging market equity was the worst performer, dragged down by the continued sell-off of Chinese stocks.

→ Better than expected economic news in the US weighed on bond markets for the month with the broad US bond market (Bloomberg Aggregate) down slightly.

¹ Source: Bloomberg. Data is as of January 31, 2024.

Domestic Equity Returns¹

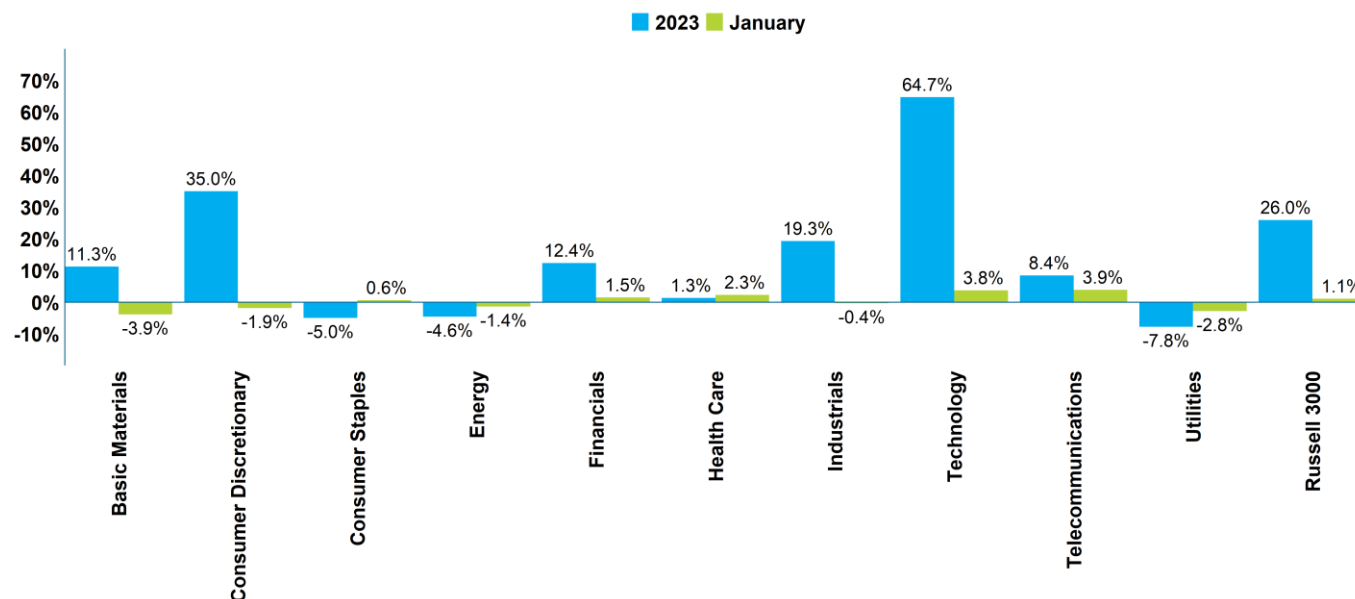
Domestic Equity	January (%)	Q4 2023 (%)	1 YR (%)	3 YR (%)	5 YR (%)	10 YR (%)
S&P 500	1.7	11.7	20.8	11.0	14.3	12.6
Russell 3000	1.1	12.1	19.1	9.1	13.5	12.0
Russell 1000	1.4	12.0	20.2	9.8	14.0	12.3
Russell 1000 Growth	2.5	14.2	35.0	10.0	18.0	15.5
Russell 1000 Value	0.1	9.5	6.1	9.2	9.3	8.8
Russell MidCap	-1.4	12.8	6.7	5.5	10.1	9.5
Russell MidCap Growth	-0.5	14.5	15.1	1.2	11.2	10.7
Russell MidCap Value	-1.8	12.1	2.4	7.8	8.6	8.2
Russell 2000	-3.9	14.0	2.4	-0.8	6.8	7.0
Russell 2000 Growth	-3.2	12.7	4.5	-6.0	6.2	7.0
Russell 2000 Value	-4.5	15.3	-0.1	4.5	6.7	6.7

US Equities: The Russell 3000 increased 1.1% in January with a one-year return of 19.1%.

- US equities built on their large gains from last year in January. Strong corporate earnings, economic data suggesting a soft landing might be achievable, and hopes for significant interest rate cuts (for most of the month) all drove results.
- Large cap stocks accounted for all the US equity market gains in January. NVIDIA, Microsoft, and Meta Platforms made up nearly 90% of the increase in the Russell 1000 index. Growth stocks outperformed value stocks across the market cap spectrum.
- While US equities advanced as a group, small and mid-cap stocks both declined in January. Banks contributed to this dynamic after a surprise loss at New York Community Bancorp rekindled fears regarding the banking system.

¹ Source: Bloomberg. Data is as of January 31, 2024.

Russell 3000 Sector Returns¹



- In January, telecommunications (3.9%), technology stocks (3.8%), and health care (2.3%) outperformed other sectors. Traditionally defensive sector utilities (-2.8%) trailed along with basic materials (-3.9%) and energy stocks (-1.4%).
- In 2023, technology (64.7%) and consumer discretionary (35.0%) sectors had the best results, helped respectively by artificial intelligence optimism and a healthy US consumer.

¹ Source: Bloomberg. Data is as of January 31, 2024.

Foreign Equity Returns¹

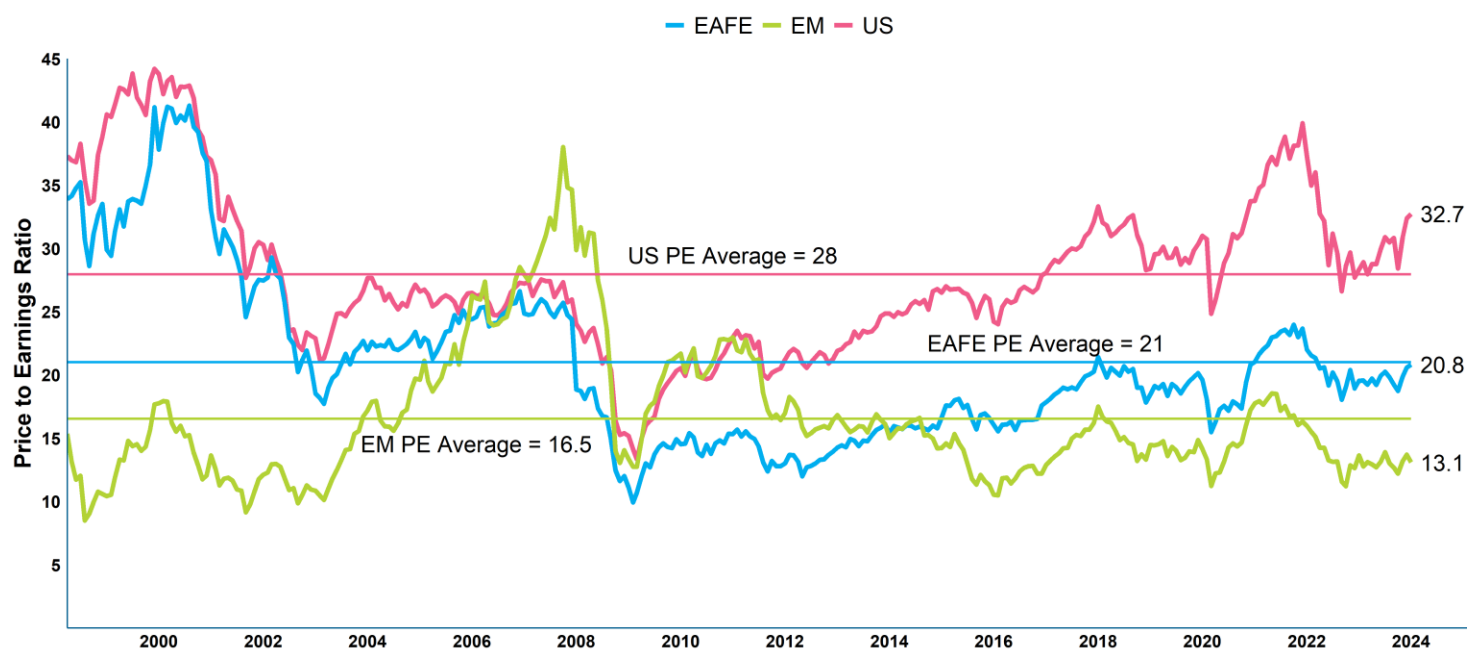
Foreign Equity	January (%)	Q4 2023 (%)	1 YR (%)	3 YR (%)	5 YR (%)	10 YR (%)
MSCI ACWI ex. US	-1.0	9.8	5.9	1.1	5.3	4.2
MSCI EAFE	0.6	10.4	10.0	4.6	6.9	4.8
MSCI EAFE (Local Currency)	2.6	5.0	12.1	9.7	8.9	7.2
MSCI EAFE Small Cap	-1.6	11.1	3.6	-1.1	4.6	4.8
MSCI Emerging Markets	-4.6	7.9	-2.9	-7.5	1.0	2.9
MSCI Emerging Markets (Local Currency)	-3.5	5.6	-0.5	-4.9	3.2	5.3
MSCI China	-10.6	-4.2	-29.0	-23.2	-6.9	0.4

Foreign Equity: Developed international equities (MSCI EAFE) gained 0.6% in January and had a one-year return of 10.0%. Emerging market equities (MSCI EM) fell -4.6% in January, and -2.9% for the trailing year.

- International developed equities saw slight gains for the month, while emerging market equities saw large losses for the same period; both were hampered by the US dollar reversing its sell-off from the end of last year. Outside of emerging markets, growth outperformed value for the month.
- Eurozone equities performed well, benefiting from ECB policy expectations, developments in the tech sector, and promising manufacturing data. U.K. equities stalled, as an unexpected increase in inflation pushed out the expected timing of rate cuts. Japan continues to see the highest returns globally over optimism on structural changes, January being no exception.
- EM equities continue to be bogged down by China (-10.6%) despite news of further stimulus by the PBOC.

¹ Source: Bloomberg. Data is as of January 31, 2024.

Equity Cyclically Adjusted P/E Ratios¹



- In January, the US equity price-to-earnings ratio increased further above its 21st century average.
- International market valuations were mixed in January and remain below the US. In the case of developed markets, valuations increased slightly to just below their long-term average, while emerging market valuations declined, remaining well below their average.

¹ US Equity Cyclically Adjusted P/E on S&P 500 Index. Source: Robert Shiller, Yale University, and Meketa Investment Group. Developed and Emerging Market Equity (MSCI EAFE and EM Index) Cyclically Adjusted P/E – Source: Bloomberg. Earnings figures represent the average of monthly “as reported” earnings over the previous ten years. Data is as of January 2023. The average line is the long-term average of the US, EM, and EAFE PE values from April 1998 to the recent month-end respectively.

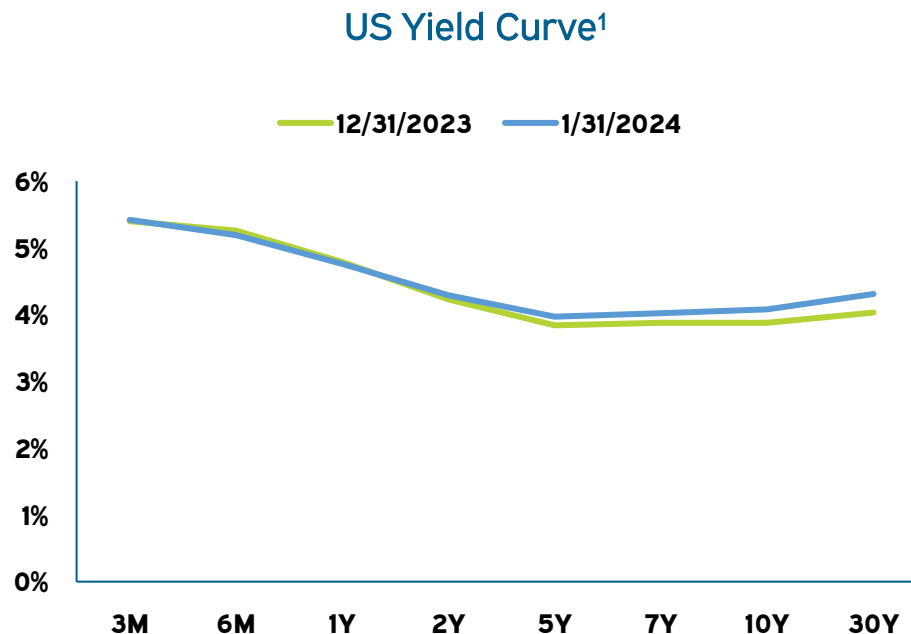
Fixed Income Returns¹

Fixed Income	January (%)	Q4 2023 (%)	1 YR (%)	3 YR (%)	5 YR (%)	10 YR (%)	Current Yield (%)	Duration (Years)
Bloomberg Universal	-0.2	6.8	2.7	-2.8	1.1	1.9	4.9	6.0
Bloomberg Aggregate	-0.3	6.8	2.1	-3.2	0.8	1.6	4.6	6.2
Bloomberg US TIPS	0.2	4.7	2.2	-1.0	2.9	2.2	4.2	6.9
Bloomberg Short-term TIPS	0.4	2.6	4.3	2.3	3.3	2.0	4.4	2.6
Bloomberg High Yield	0.0	7.2	9.3	1.9	4.4	4.5	7.8	3.7
JPM GBI-EM Global Diversified (USD)	-1.5	8.1	6.4	-3.3	-0.2	0.4	6.3	5.0

Fixed Income: The Bloomberg Universal index fell -0.2% in January but gained 2.7% on a one-year basis.

- Strong economic data in January and comments toward the end of the month by Federal Reserve Chair Jerome Powell hinting that rate cuts were not imminent drove rates up over the month, weighing on bonds.
- The broad US bond market (Bloomberg Aggregate) declined 0.3% for the month. The broader TIPS index rose 0.2%, while the less interest-rate-sensitive short-term TIPS index rose 0.4%.
- High yield bonds ended the month unchanged, while emerging market debt declined by 1.5%. Both asset classes produced double-digit gains last year.

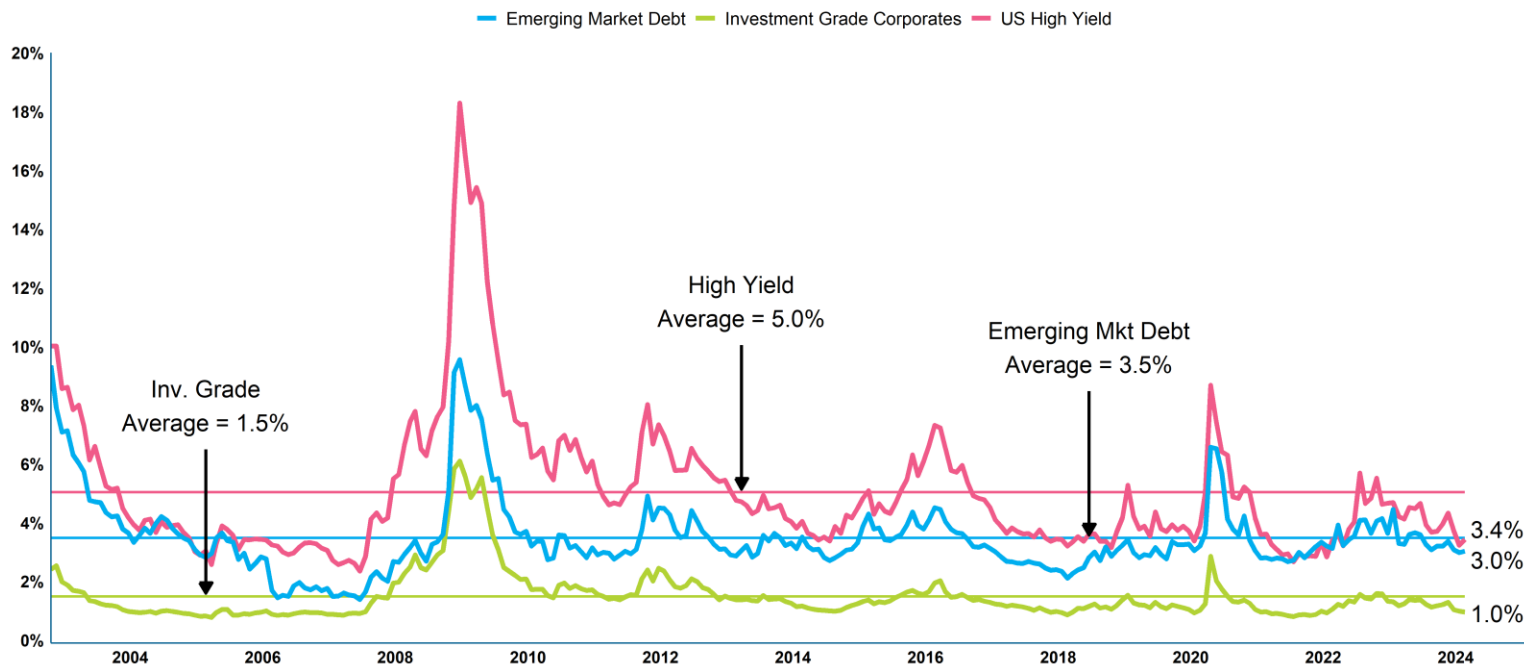
¹ Source: Bloomberg. JPM GBI-EM data is from InvestorForce. Data is as of January 31, 2024. The yield and duration data from Bloomberg is defined as the index's yield to worst and modified duration respectively.



- Both short-term and longer-term maturities ended the month largely unchanged, however, yields were volatile over the month on surprisingly strong economic data and shifts in monetary policy expectations.
- For the month, two-year Treasury yields ended at 4.2% (around 1% below the peak from October) while 10-year Treasury yields ended at 3.9%.
- The yield curve remained inverted at month-end despite a recent flattening trend. The yield spread between the two-year and ten-year Treasury was -0.3% at the end of January.

¹ Source: Bloomberg. Data is as of January 31, 2024.

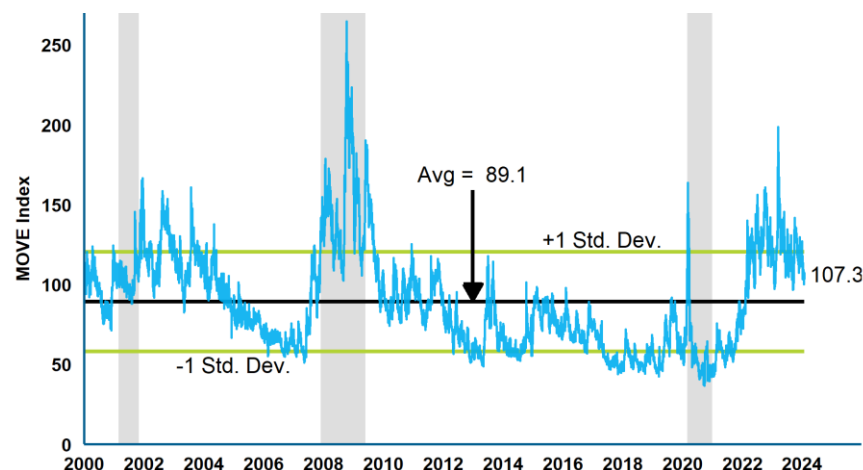
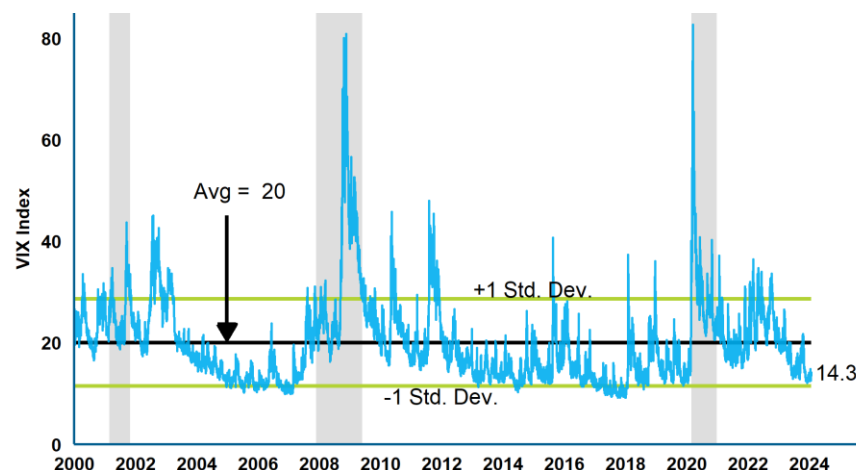
Credit Spreads vs. US Treasury Bonds¹



- Credit spreads widened slightly for high yield in January (3.2% to 3.4%) while spreads for investment grade corporate and emerging market bonds remained the same.
- Expectations of peaking policy rates and the corresponding increase in risk appetite has recently benefited credit, with spreads (the added yield above a comparable maturity Treasury) narrowing.
- All spreads remain below their respective long run averages, particularly within high yield.

¹ Sources: Bloomberg. Data is as of January 31, 2024. Average lines denote the average of the investment grade, high yield, and emerging market spread values from September 2002 to the recent month-end, respectively.

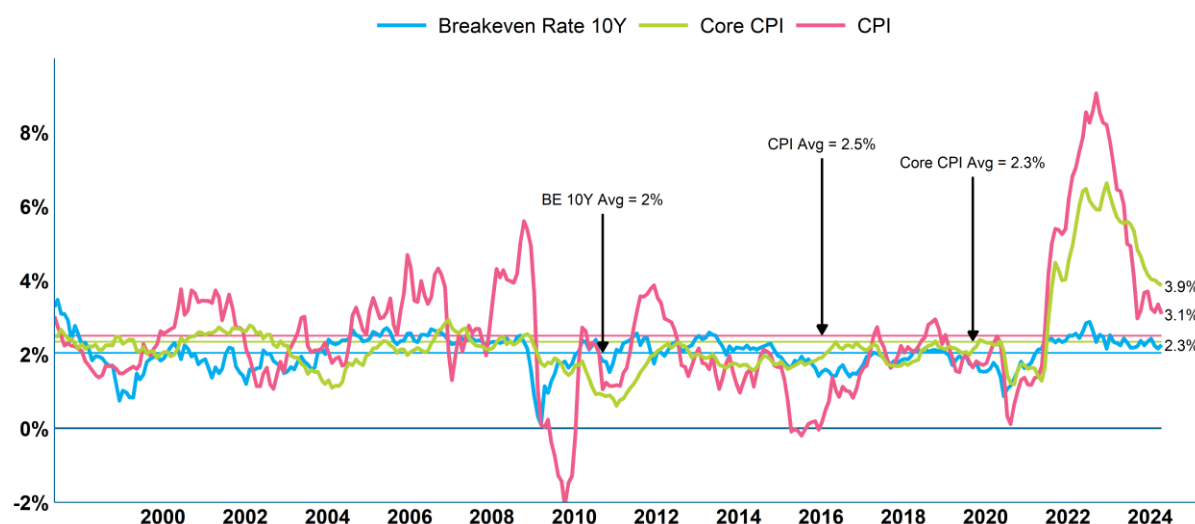
Equity and Fixed Income Volatility¹



- Volatility in equities (VIX) remains close to one standard deviation below the long-term average as the focus shifted late last year to peaking policy rates and the potential for a soft landing.
- Volatility in the bond market (MOVE) came down over the month (114.6 to 107.3) but remains elevated and well above its long-run average (89.1). The bond market remained on edge for most of 2023, driven largely by uncertainty about the ultimate path of monetary policy, as well as continued (and surprising) strength in economic data.

¹ Equity Volatility – Source: FRED. Fixed Income Volatility – Source: Bloomberg. Implied volatility as measured using VIX Index for equity markets and the MOVE Index to measure interest rate volatility for fixed income markets. Data is as of January 2024. The average line indicated is the average of the VIX and MOVE values between January 2000 and January 2024.

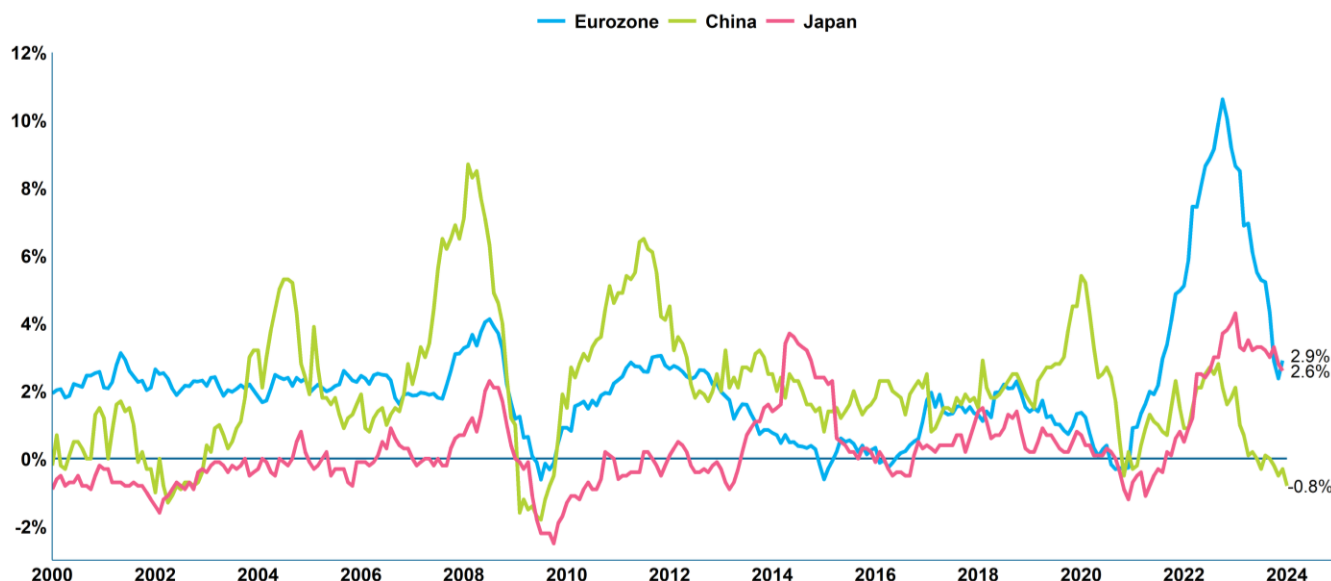
US Ten-Year Breakeven Inflation and CPI¹



- Year-over-year headline inflation declined in January (3.4% to 3.1%) but not by as much as expected (expectations were for a 2.9% reading). Month-over-month inflation came in at 0.3%, the same as last month and slightly above expectations of 0.2%. Shelter continues to keep inflation elevated, increasing 6.0% from a year prior. Food rose 2.6% over the same period, while downward pressure on energy prices continued, falling 4.6%.
- Core inflation - excluding food and energy - remained unchanged at 3.9% year-over-year (expectations were for a decline to 3.7%), with shelter costs again driving the total core index increase.
- Inflation expectations (breakevens) have remained relatively stable despite the recent significant volatility in inflation.

¹ Source: FRED. Data is as January 2024. The CPI and 10 Year Breakeven average lines denote the average values from February 1997 to the present month-end, respectively. Breakeven values represent month-end values for comparative purposes.

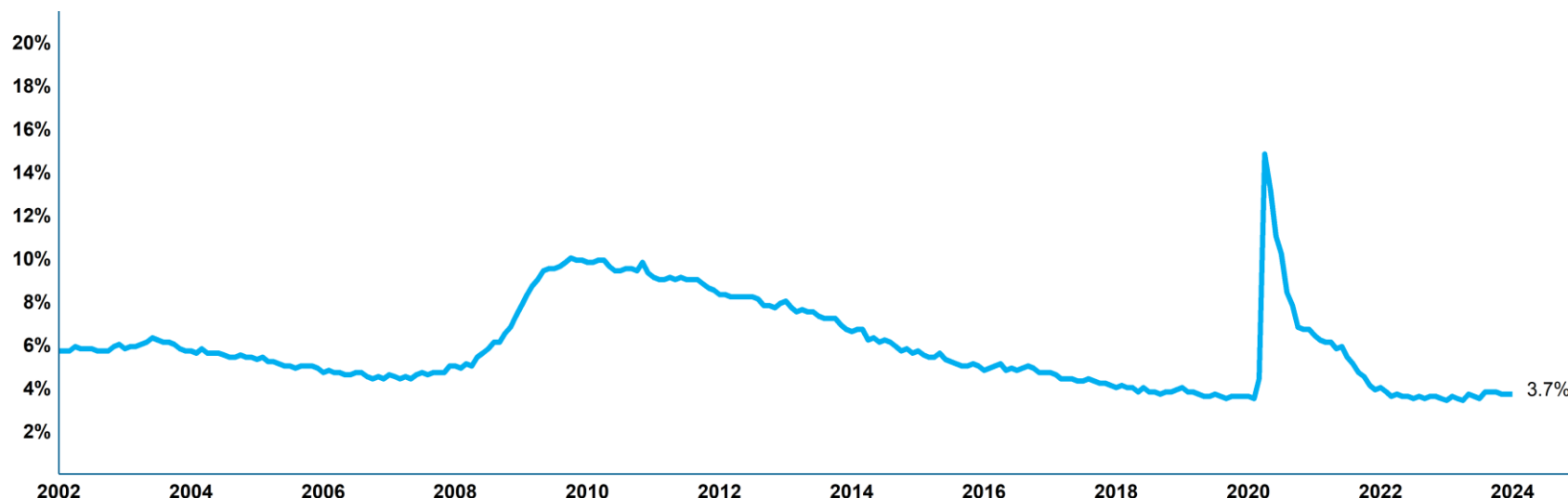
Global Inflation (CPI Trailing Twelve Months)¹



- Outside the US, inflation is also falling across major economies with China slipping further into deflation.
- In the eurozone, inflation experienced a dramatic decline last year. In January inflation rose slightly (2.8% to 2.9%) remaining below the 3.1% year-over-year level in the US.
- Inflation in Japan has slowly declined from the early 2023 peak, but it remains near levels not seen in almost a decade, largely driven by higher food prices.

¹ Source: FRED for United States CPI and Eurozone CPI. Source: Bloomberg for Japan CPI, China CPI, and Eurozone CPI. Data is as January 31, 2024, except Japan which is as of December 31, 2023.

US Unemployment¹

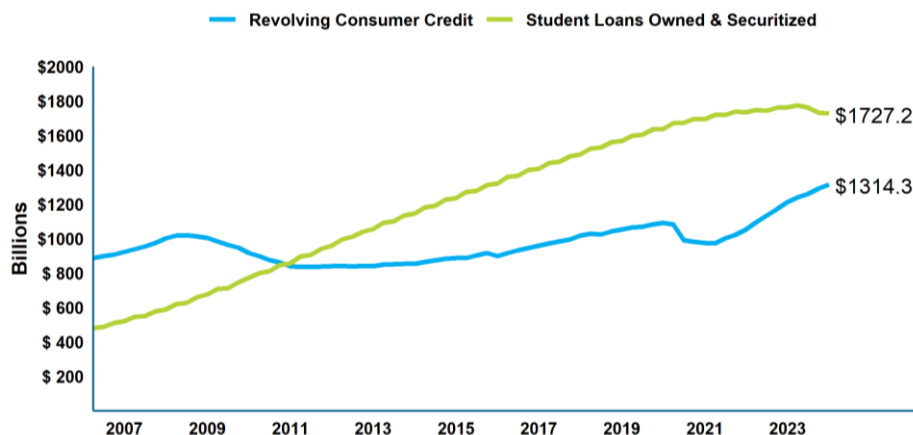


- Overall, the US labor market remains healthy with the unemployment rate relatively low, wage growth now positive in real terms, and initial claims for unemployment staying subdued.
- In January, the number of jobs added in the US were stronger than expected (353,000 versus 185,000) with the unemployment rate remaining at 3.7%. Payrolls from November and December of last year were also revised upward. Business and professional, health care, and retail sales jobs rose the most in January.
- The labor force participation remained relatively stable at 62.5%, well off the lows of the pandemic (60.1%) but not back to pre-pandemic levels (63.3%).
- The pace of hourly wage growth has declined from its peak of close to 6.0% but is above the 3.1% level of inflation. Wage growth rose at 4.5% year-on-year in January, an increase from the 4.1% level in December and above expectations of 4.1%.

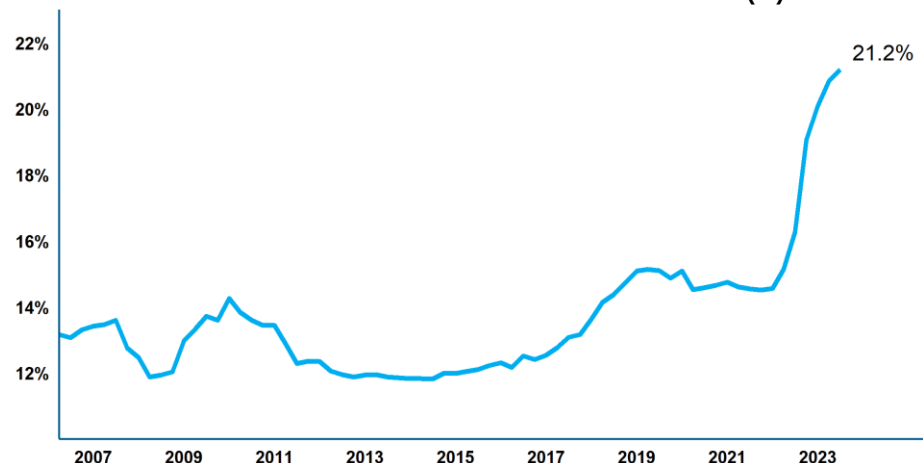
¹ Source: FRED. Data is as January 31, 2024.

US Consumer Under Stress?¹

Revolving Consumer Credit & Student Loans (\$B)



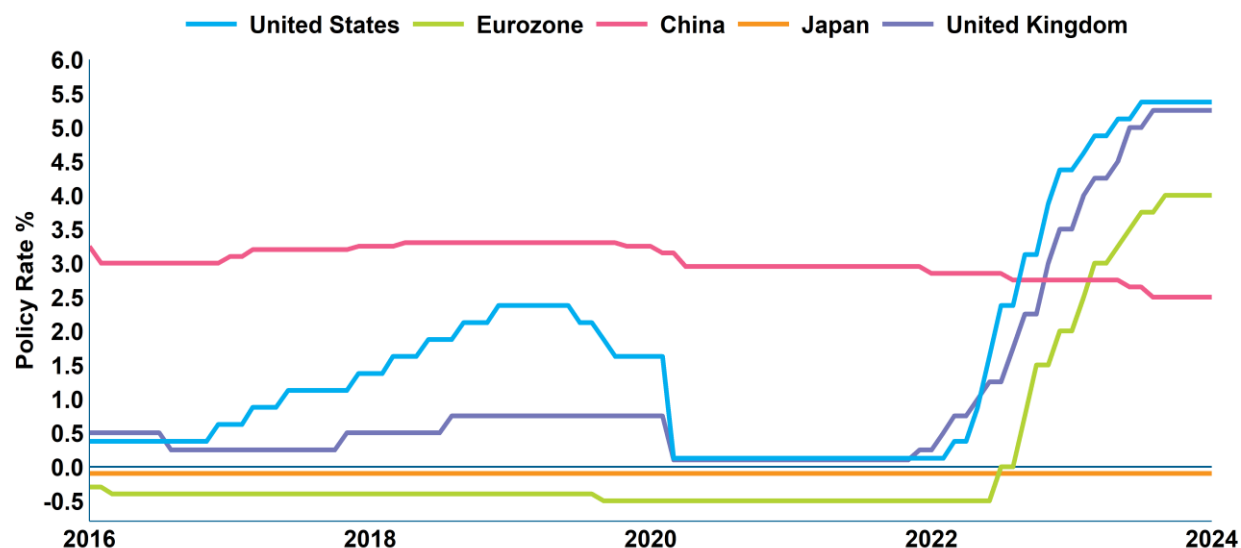
Consumer Credit Card Interest Rates (%)



- Despite the strong labor market and higher wages, pressures have started to build on the US consumer. This is an important consideration as consumer spending has been a key driver of economic growth.
- Revolving consumer credit surged to new highs in 2023 even as credit card interest rates hit levels not seen before (the prior peak was around 19% in the 1980s). Recently we have also seen payment delinquencies on credit cards start to increase.
- The return of student loan repayments after a three-year pandemic-related reprieve could add to pressures on consumers' budgets. This might be partially mitigated by recently initiated repayment and forgiveness programs.
- As we look ahead, the strength of the US consumer will remain key as this sector makes up most of the domestic economy (GDP).

¹ Source: FRED. Data is as of December 31, 2023. Consumer Credit Card Rate data is as of September 30, 2023. Revolving Consumer Credit data is seasonally adjusted to remove distortions during the holiday season.

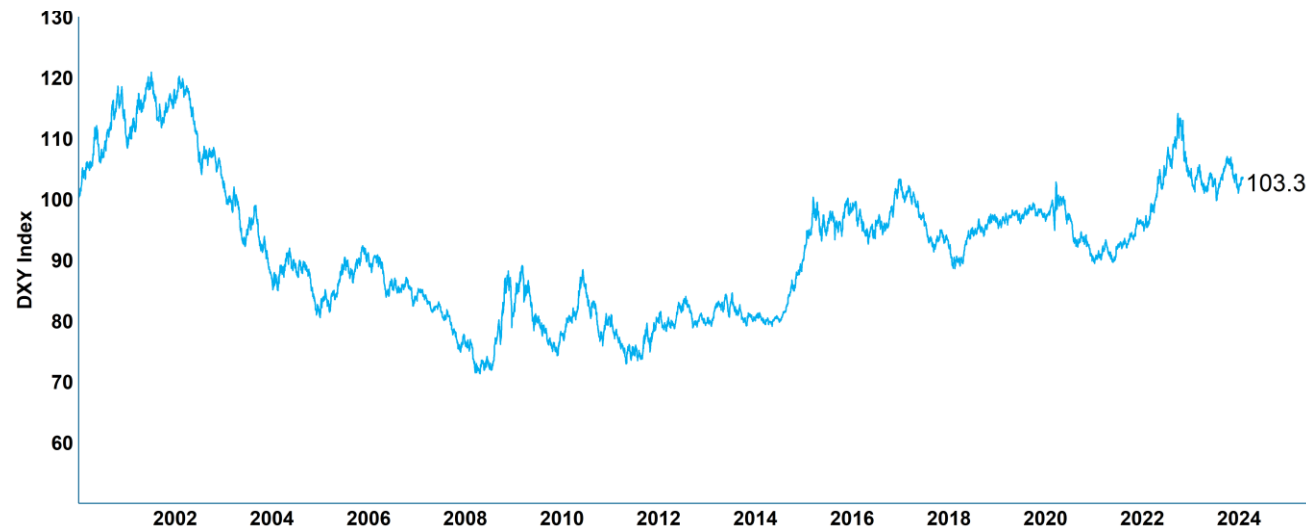
Policy Rates¹



- The Fed has been on hold since July 2023 when it raised rates to a range of 5.25%-5.50%. Markets are now pricing in around four rate cuts this year down from close to seven late last year as economic data has come in above expectations. There remains a gap between the amount of rate cuts the Fed is predicting compared to the market's expectations, but it has significantly narrowed.
- The European and UK central banks also recently paused their rate increases on slowing inflation with cuts likely to follow there too. In Japan, the BoJ has further relaxed its yield curve control on the 10-year bond, and expectations for further policy normalization are rising.
- The central bank in China has maintained interest rates at record low levels and continues to inject liquidity into the banking system, as weaker than expected economic data appears to indicate a widespread slowdown.

¹ Source: Bloomberg. Data is as of January 2024.

US Dollar vs. Broad Currencies¹



- Overall, the dollar finished last year only slightly below where it started but it was a volatile year for the US currency as expectations related to monetary policy evolved.
- Strong economic data in the US may delay policy rate cuts this year which could contribute to upward pressure on the dollar as other countries pivot to rate cuts.

¹ Source: Bloomberg. Data as of January 31, 2024.

Summary

Key Trends:

- The impact of inflation still above policy targets will remain important, with bond market volatility likely to stay high.
- Global monetary policies could diverge going forward. The risk of policy errors remains elevated as central banks try to further reduce inflation toward targets while not tipping their economies into recession. In the case of the US the resolution of the disparity between market expectations for the path of interest rates versus the Fed's dot plot will be key.
- Global growth is expected to slow this year, with some economies forecasted to tip into recession. However, optimism has been building that certain economies could experience soft landings. Inflation, monetary policy, and geopolitical issues will remain key in 2024.
- US consumers could feel pressure as certain components of inflation (e.g., shelter), remain high, borrowing costs are elevated, and the job market may weaken.
- A focus for US equities going forward, will be whether earnings can remain resilient if growth continues to slow. Also, the future paths of the large technology companies that have driven market gains will be important.
- Equity valuations remain lower in emerging and developed markets, but risks remain, including China's economic uncertainty and on-going weakness in the real estate sector which could spill over into key trading partners' economies. Japan's recent hint at potentially tightening monetary policy along with changes in corporate governance in the country could influence relative results.

Executive Summary

As of December 31, 2023

The value of the San Jose Federated City Employees' Retirement System assets on December 31, 2023 was \$3.0 billion, up from the end of the prior quarter (\$2.8 billion). The System had net cash inflows of \$3 million and \$156 million of investment gains during the quarter.

- The System's net of fees performance for the quarter was +5.5%, compared to the Policy Benchmark return of +6.4% and the Investable Benchmark Portfolio return of +5.8%. The peer median return was +6.6%. The Plan ranked in the 81st percentile of the peer group for the quarter. Private market fund valuations are one quarter lagged, and the third quarter of 2023 was a weak quarter in the markets. This timing mismatch was likely a reason for underperformance for the fourth quarter versus some peers.
- The Retirement System returned +11.4% over the trailing one-year period, compared to the Policy Benchmark return of +11.7% and the Investable Benchmark Portfolio return of +10.9%. The Retirement System's standard deviation of returns was 7.7% over the trailing one-year period, exhibiting lower volatility vs. the peer median (8.7%). Additionally, the System performed in the top quartile of peers over the 3- and 5- year periods.
 - Growth returned +6.5% for the quarter and +15.2% over the trailing one-year period, compared to the +7.4% and +15.3% returns for the Growth Benchmark over the same periods, respectively.
 - Low Beta returned +1.0% for the quarter and +4.0% over the trailing one-year period, compared to +2.3% and +5.3% returns for the Low Beta Benchmark over the same periods, respectively.
 - Other assets returned +3.4% for the quarter and -2.2% over the trailing one-year period, compared to the +3.9% and -0.5% returns for the Other Benchmark over the same periods, respectively.
- During the quarter, the System added five new investments and did not liquidate any investments. Scout Energy Partners VI, L.P. (Private Real Assets), Orion Mine Finance Fund IV, L.P. (Private Real Assets), Lime Rock IX (Private Real Assets), EQT Exeter Industrial Value VI (Growth Real Estate), and DRA Growth Income Fund XI (Growth Real Estate) were funded during the quarter.

GQG

→ GQG Partners Global Emerging Markets Equity returned +11.3% for the quarter, outperforming the MSCI Emerging Markets Index, which returned +7.9%, over the same period. Additionally, the strong fourth quarter performance ranked the strategy in the top 10 percentile of the eVestment Emerging Markets Equity peer universe. Outperformance versus the benchmark stems from the fund's underweight allocation to China (9.7% vs 29.1% as of December 2023). Stock selection within Utilities also helped relative performance where an investment in Adani Green Energy, based in India, posted a 61.3% return on the back of an upgrade from Moody's. Compared to peers, GQG ranks in the 7th percentile since inception in July 2017.

Artisan Global Value

→ Artisan global Value returned +12.3% for the quarter, outperforming the MSCI ACWI Value benchmark by 310 basis points, ranking in the 33rd percentile of its peer group. Top performers for the fund over the quarter were UBS, Samsung and BNY Mellon. UBS stock rose 26% over the quarter as the acquisition of Credit Suisse continues to smooth. Samsung rose 21% as the semiconductor supply glut has eased price pressure on memory chips. Compared to peers, Artisan Global Value ranks in the 16th percentile since inception in March 2011.

Payden EMD Blended Currency

→ Payden EMD Blended Currency returned +9.7% for the quarter, outperforming the 50/50 split JPM EMBI Global Debt and JPM GBI-EM index by 110 basis points. Emerging Market Debt rallied to end the year. Anticipation grew that key central banks would ease monetary policy in 2024 and rates compressed over the quarter. EM local debt markets also generally appreciated further against the U.S. dollar. Compared to peers, Payden EMD Blended Currency ranks in the 74th percentile since inception in December 2020.

Investment Manager	Asset Class	Changes/ Announcements	Meketa Recommendation ¹	Comments
Artisan Global Value	Global Equity	---	---	---
Artisan Global Opportunities	Global Equity	---	Hold	Watch List
Burgundy US Small Cap	US Equity	---	---	---
Oberweis International Opps	International Equity	---	Hold	Watch List
Morgan Stanley Int'l Equity	International Equity	Yes	Hold	Edward Pick Appointed CEO
First Eagle Int'l Equity	International Equity	---	---	---
Dimensional EM Value	Emerging Markets Equity	---	---	---
GQG Partners Global EM	Emerging Markets Equity	---	---	---
RWC Emerging Markets Equity	Emerging Markets Equity	---	Hold	Watch List
Wellington EM Systematic	Emerging Markets Equity	---	---	---
Kotak India Midcap	Emerging Markets Equity	---	---	---
Unifi India	Emerging Markets Equity	Yes	Hold	Compliance Officer departed
Mellon High Yield Beta	High Yield Bonds	--- ²	---	---
Columbia High Yield	High Yield Bonds	Yes	Hold	Global Head of Risk departed
Wellington Iguazu Partners LP	Emerging Markets Debt	--- ²	---	---
Payden EMD Blended Currency	Emerging Markets Debt	---	---	---
BlackRock Core Property	Core Real Estate	---	---	---
Clarion Lion Properties	Core Real Estate	---	---	---
TA Realty Core Property	Core Real Estate	---	---	---
Clarion Lion Industrial Trust	Core Real Estate	---	---	---
Voya Securitized Credit	Investment Grade Bonds	---	---	---
Invesco Core Bonds	Investment Grade Bonds	---	---	---

¹ The Meketa Investment Group recommendations are based on the noted organizational or resource changes at each manager.

² Firm has not yet responded to quarterly update questionnaire or information is not yet on file.

Watch List^{1,2}

Investment Manager	Asset Class	Watch List Status	Comments
Artisan Global Opportunities	Global Equity	Monitoring	Underperformance
Oberweis International Opps	International Equity	Monitoring	Underperformance
Redwheel Emerging Markets Equity	Emerging Markets Equity	Monitoring	Underperformance

¹ Watch List excludes Private Markets and Passive Funds.

² Placement on the Watch List includes qualitative reasons and manager underperformance versus the appropriate benchmark over a three- and or five-year period as outlined in the Investment Policy Statement.

Artisan Global Opportunities

→ Over the three-year period, Artisan (-0.4%) has underperformed the MSCI ACWI Growth NR by 410 basis points. Since inception in July 2017, Artisan has underperformed the benchmark by 120 basis points per year, on average, and ranked in the 25th percentile compared to peers.

Oberweis International Opps

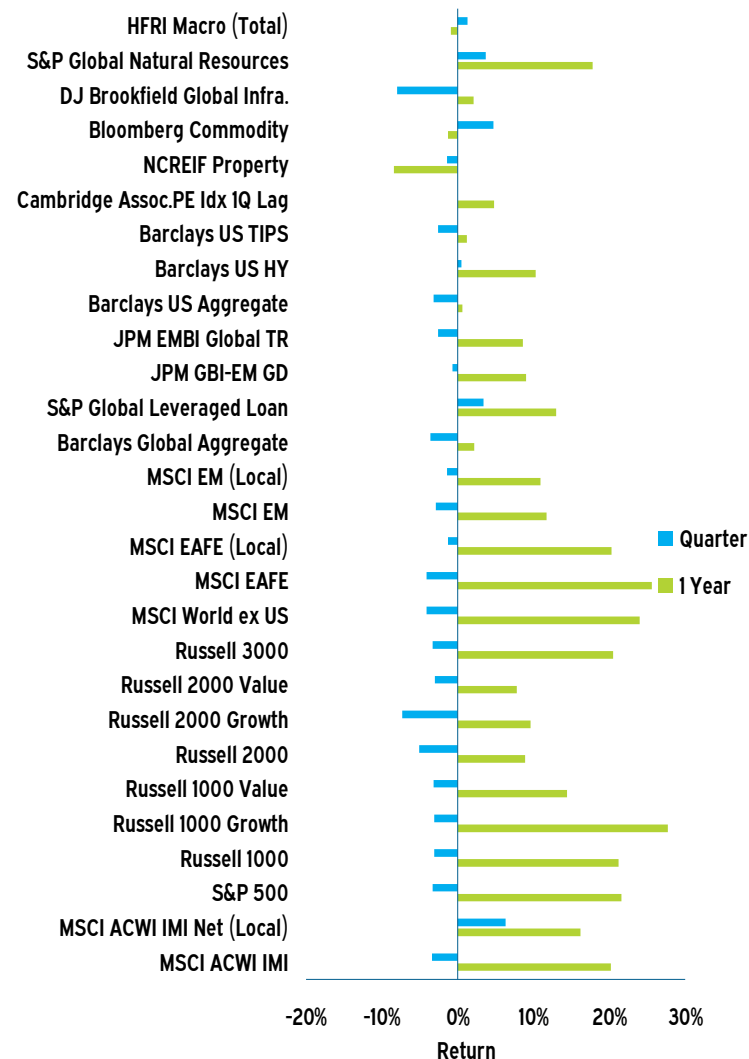
→ Over the three-year period, Oberweis (-11.1%) has underperformed the MSCI World ex USA Small Cap Growth NR by 690 basis points. Since inception in November 2015, Oberweis has outperformed the benchmark by 20 basis points per year, on average, and ranked in the 66th percentile compared to peers.

Redwheel Emerging Markets Equity

Over the three-year period, Redwheel (-8.3%) has underperformed the MSCI Emerging Markets Index by 3.2%. Since inception in September 2019, Redwheel has outperformed the benchmark by 70 basis points per year, on average, and ranked in the 57th percentile compared to peers.

Market Environment – 4Q23 Overview

Benchmark	Scope	4Q23 (%)	1 YR (%)	3 YR (%)	5 YR (%)	10 YR (%)
Global Equity						
MSCI ACWI IMI	World	11.1	21.6	5.5	11.5	7.8
MSCI ACWI IMI Net (Local) ¹	World (Local Currency)	6.3	16.2	11.9	8.5	9.7
Domestic Equity						
S&P 500	Large Core	11.7	26.3	10.0	15.7	12.0
Russell 1000	Large Core	12.0	26.5	9.0	15.5	11.8
Russell 1000 Growth	Large Growth	14.2	42.7	8.9	19.5	14.9
Russell 1000 Value	Large Value	9.5	11.5	8.9	10.9	8.4
Russell 2000	Small Core	14.0	16.9	2.2	10.0	7.2
Russell 2000 Growth	Small Growth	12.8	18.7	-3.5	9.2	7.2
Russell 2000 Value	Small Value	15.3	14.7	7.9	10.0	6.8
Russell 3000	All Cap Core	12.1	26.0	8.5	15.2	11.5
International Equity						
MSCI World ex US	World ex-US	10.5	17.9	4.4	8.5	4.3
MSCI EAFE	International Developed	10.4	18.2	4.0	8.2	4.3
MSCI EAFE (Local)	International Developed (Local Currency)	5.0	16.2	8.6	9.5	6.6
MSCI EM	Emerging Markets	7.9	9.8	-5.1	3.7	2.7
MSCI EM (Local)	Emerging Markets (Local Currency)	5.6	9.9	-2.5	5.4	5.2
Global Fixed Income						
Barclays Global Aggregate	Global Core Bonds	8.1	5.7	-5.5	-0.3	0.4
S&P Global Leveraged Loan	Bank Loans	2.9	13.3	5.8	5.5	3.9
JPM GBI-EM GD	Emerging Markets Bonds (Local Currency)	4.8	10.0	0.2	4.1	5.4
JPM EMBI Global TR	Emerging Market Bonds	9.3	10.5	-3.1	1.9	3.1
Domestic Fixed Income						
Barclays US Aggregate	Core Bonds	6.8	5.5	-3.3	1.1	1.8
Barclays US HY	High Yield	7.2	13.4	2.0	5.4	4.6
Barclays US TIPS	Inflation	4.7	3.9	-1.0	3.2	2.4
Other						
Cambridge AssociatesPE Index 1Qtr Lag	Private Equity	0.0	4.8	24.8	22.1	18.1
NCREIF Property	Real Estate	-3.0	-7.9	4.6	4.3	6.8
Bloomberg Commodity	Commodities	-4.6	-7.9	10.8	7.2	-1.1
DJ Brookfield Global Infrastructure	Infrastructure	12.2	4.6	5.4	7.0	5.3
S&P Global Natural Resources	Natural Resources	3.6	4.1	12.9	11.2	5.2
HFRI Macro	Hedge Funds	-0.8	-0.3	5.4	5.6	3.1



¹ Return is as of 9/30/2023.

4Q23 Review



	Current Balance (\$)	Current Allocation (%)	Russell Overlay Net position (%)	Policy (%)
Growth	2,252,182,123	76.1%	75.7%	75.0%
Public Equity	1,388,634,591	46.9%	46.5%	49.0%
Private Markets	711,189,133	24.0%	24.0%	21.0%
Emerging Markets Debt	89,099,084	3.0%	3.0%	3.0%
High Yield Bonds	63,259,314	2.1%	2.1%	2.0%
Low Beta	286,358,800	9.7%	8.2%	8.0%
Market Neutral Strategies	90,480,114	3.1%	3.1%	3.0%
Immunized Cash Flows	149,979,165	5.1%	5.1%	5.0%
Cash	45,899,521	1.6%	0.1%	0.0%
Other	419,606,890	14.2%	16.1%	17.0%
Core Real Estate	155,337,929	5.3%	5.3%	5.0%
TIPS	58,822,128	2.0%	2.0%	2.0%
Investment Grade Bonds	149,285,013	5.0%	6.9%	8.0%
Long Term Govt Bonds	56,161,821	1.9%	1.9%	2.0%
Total	2,958,147,813	100%	100%	100%

1. Data in the column titled "Russel Overlay Net Position" is based on physical exposures, adjusted for synthetic positions provided by Russell Investments.

2. Policy Targets represent approved asset allocation from March of 2021.

3. All data on this page is from Russell Investments. Data on subsequent pages is from the custodian.

Asset Class Net Performance Summary										
	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
Total Fund Aggregate	2,992,960,114	100.0	5.5	4.0	11.4	5.6	9.3	5.9	6.9	Jan-94
Policy Benchmark			6.4	4.5	11.7	5.5	9.0	5.9	7.1	
Investable Benchmark Portfolio			5.8	4.2	10.9	4.9	8.5	5.5	--	
Low-Cost Passive Portfolio			9.5	6.4	15.5	3.4	7.3	--	--	
60/40 MSCI ACWI IMI/BBgBarc Global Aggregate			9.9	6.1	15.1	1.1	6.9	5.0	--	
Liability Benchmark Portfolio			12.7	-0.6	3.1	-11.4	-1.2	--	--	
InvMetrics All Public DB Plans > \$1B Median			6.6	4.5	11.4	4.5	8.3	6.3	7.4	
InvMetrics All Public DB Plans > \$1B Rank			81	75	52	23	22	75	92	
Growth	2,270,898,458	75.9	6.5	5.1	15.2	7.1	11.6	--	8.1	Jul-15
Growth Benchmark			7.4	5.5	15.3	7.2	11.6	--	8.8	
Public Equity	1,402,853,586	46.9	10.7	7.2	21.8	4.2	10.5	7.1	8.1	May-10
Public Equity Benchmark			10.7	7.1	20.1	4.3	10.5	7.5	8.3	
Global Equity	261,019,877	8.7	12.6	8.2	26.0	4.6	12.5	--	9.4	Jul-15
MSCI AC World IMI (Net)			11.1	7.4	21.6	5.5	11.5	7.8	8.3	
eV All Global Equity Median			11.1	6.8	18.7	5.0	11.5	7.6	8.1	
eV All Global Equity Rank			30	28	17	54	35	--	29	
US Equity	550,572,715	18.4	11.9	8.3	26.1	8.8	14.4	--	10.8	Jul-15
MSCI USA IMI (Net)			12.0	8.2	25.6	8.3	14.8	11.0	11.3	
eV All US Equity Median			11.8	7.8	18.1	8.0	13.0	9.2	9.5	
eV All US Equity Rank			48	41	23	41	33	--	35	

Fiscal Year begins July 1.

Please see the Appendix for composition of the Policy Benchmark, Low-Cost Passive Portfolio, Liability Benchmark Portfolio, Growth Benchmark, and Public Equity Benchmark. Returns for the Equity Aggregate are gross of fees through June 2015 and net of fees thereafter.

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
International Equity	283,081,528	9.5	9.7	3.5	15.1	0.4	7.9	--	4.6	Jul-15
MSCI World ex U.S. IMI Index (Net)			10.5	6.1	17.2	3.7	8.2	4.3	5.1	
eV ACWI ex-US All Cap Equity Median			10.2	4.7	16.7	1.4	8.1	4.6	5.3	
eV ACWI ex-US All Cap Equity Rank			60	72	66	59	57	--	78	
Emerging Markets Equity	308,179,466	10.3	7.8	7.5	16.7	-1.1	6.1	--	3.3	Jul-15
MSCI Emerging Markets IMI (Net)			8.0	5.7	11.7	-3.7	4.5	3.0	3.3	
eV Emg Mkts Equity Median			7.8	4.6	12.0	-3.4	5.0	3.3	3.9	
eV Emg Mkts Equity Rank			53	25	27	37	35	--	62	
Private Markets	714,916,076	23.9	-0.5	1.1	4.6	15.3	14.4	--	10.0	Jul-15
Private Markets Benchmark			-0.5	1.1	4.6	15.3	14.4	--	11.3	
MSCI ACWI IMI (Net) +1%			11.4	7.9	22.8	6.5	12.6	8.8	9.4	
Private Markets ex Russell 3000	714,916,076	23.9	-0.5	1.1	4.6	17.7	12.8	--	10.2	Jul-15
Private Equity	368,249,506	12.3	-1.2	1.5	6.9	21.5	16.7	14.1	10.0	Jan-06
San Jose Custom Private Equity Benchmark			0.6	3.4	7.2	16.8	14.5	13.9	12.2	
Venture Capital	20,724,161	0.7	-0.6	-3.5	-7.3	--	--	--	-3.5	Jun-21
Private Debt	129,803,657	4.3	2.3	3.1	5.4	14.6	8.5	4.7	5.3	Dec-10
S&P Global Leveraged Loan Index +2%			3.4	7.5	15.6	7.9	7.9	6.5	6.8	
Growth Real Estate	122,254,373	4.1	-1.0	-1.4	-1.9	12.2	9.8	--	13.7	Jul-15
NCREIF Property Index			-3.0	-4.3	-7.9	4.6	4.3	6.8	5.8	
Private Real Assets	73,884,378	2.5	-0.6	0.5	5.6	16.6	8.7	--	8.5	Jul-15

Returns for the Fixed income, Private Debt, and Real Assets Aggregates are gross of fees through June 2015 and net of fees thereafter.

Please see the Appendix for composition of the Private Markets Benchmark.

Private Equity composite includes Russell 3000 proxy performance history prior to October 1, 2018.

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
Emerging Markets Debt	89,869,567	3.0	3.6	4.0	5.0	2.4	5.8	--	3.8	Jul-15
50% JPM EMBI GD / 50% JPM GBI-EM			8.6	5.6	11.9	-3.3	1.4	1.7	2.1	
eV All Emg Mkts Fixed Inc Median			8.6	5.7	11.5	-2.2	2.3	2.6	2.7	
eV All Emg Mkts Fixed Inc Rank			97	86	98	3	2	--	9	
High Yield Bonds	63,259,229	2.1	7.0	7.3	13.1	2.4	3.6	--	2.0	Jun-14
Blmbg. U.S. Corp: High Yield Index			7.2	7.7	13.4	2.0	5.4	4.6	4.3	
Low Beta	297,960,514	10.0	1.0	2.4	4.0	4.6	4.2	--	3.2	Jul-15
Low Beta Benchmark			2.3	3.3	5.3	1.4	1.7	--	1.1	
Immunized Cash Flows	149,979,165	5.0	2.6	3.2	4.4	0.2	1.4	--	1.6	Oct-18
Blmbg. 1-3 Year Gov/Credit index			2.7	3.4	4.6	0.1	1.5	1.3	1.7	
Market Neutral Strategies	89,731,462	3.0	-1.5	1.4	3.8	13.1	10.2	6.4	6.3	Nov-12
Market Neutral Strategies Benchmark			1.7	3.4	6.7	3.2	2.5	1.9	1.7	
Relative Value	89,731,462	3.0	-1.5	1.4	3.8	13.1	8.8	--	6.5	Oct-14
HFRI Relative Value (Total) Index			2.6	4.3	7.0	4.6	4.9	4.0	3.8	
Cash	58,249,888	1.9	0.9	2.0	3.7	1.7	1.7	1.2	6.7	Jan-06
90 Day U.S. Treasury Bill			1.4	2.7	5.0	2.2	1.9	1.2	1.4	
Other	416,836,633	13.9	3.4	-0.2	-2.2	-0.4	1.0	1.3	1.6	Jul-04
Other Benchmark			3.9	0.5	-0.5	-0.3	0.6	--	--	
Investment Grade Bonds	149,431,607	5.0	6.3	4.0	6.5	-2.0	--	--	0.5	Dec-19
Custom IG Bonds Benchmark			5.9	3.4	5.3	-2.4	--	--	-0.3	

Cash composite includes the cash account, cash collateral in the Russell Investments Overlay program, and residuals from terminated manager assets.
Please see the Appendix for composition of the Low Beta Benchmark, Immunized Cash Flows Benchmark, Market Neutral Strategies Benchmark, and Other Benchmark.

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
TIPS	58,822,099	2.0	2.6	3.1	4.6	2.4	3.2	--	1.8	Jul-14
<i>Blmbg. U.S. TIPS 0-5 Year</i>			<i>2.6</i>	<i>3.0</i>	<i>4.6</i>	<i>2.3</i>	<i>3.4</i>	<i>2.0</i>	<i>1.9</i>	
Core Private Real Estate	152,538,009	5.1	-1.8	-4.9	-12.2	8.0	6.4	--	7.4	Jul-15
<i>Core Real Estate Benchmark</i>			<i>-2.1</i>	<i>-4.9</i>	<i>-12.9</i>	<i>5.8</i>	<i>4.4</i>	--	<i>5.9</i>	
Long-Term Government Bonds	56,044,918	1.9	12.5	-0.8	3.4	-11.4	--	--	-10.2	Jun-20
<i>Blmbg. U.S. Treasury: Long</i>			<i>12.7</i>	<i>-0.6</i>	<i>3.1</i>	<i>-11.4</i>	<i>-1.2</i>	<i>2.3</i>	<i>-10.4</i>	
Overlay	7,264,509	0.2								

Core Private Real Estate values are one quarter lagged.

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
Total Fund Aggregate	2,992,960,114	100.0	5.5	4.0	11.4	5.6	9.3	5.9	6.9	Jan-94
Policy Benchmark			6.4	4.5	11.7	5.5	9.0	5.9	7.1	
Investable Benchmark Portfolio			5.8	4.2	10.9	4.9	8.5	5.5	--	
Low-Cost Passive Portfolio			9.5	6.4	15.5	3.4	7.3	--	--	
60/40 MSCI ACWI IMI/BBgBarc Global Aggregate			9.9	6.1	15.1	1.1	6.9	5.0	--	
Liability Benchmark Portfolio			12.7	-0.6	3.1	-11.4	-1.2	--	--	
InvMetrics All Public DB Plans > \$1B Median			6.6	4.5	11.4	4.5	8.3	6.3	7.4	
InvMetrics All Public DB Plans > \$1B Rank			81	75	52	23	22	75	92	
Growth	2,270,898,458	75.9	6.5	5.1	15.2	7.1	11.6	--	8.1	Jul-15
Growth Benchmark			7.4	5.5	15.3	7.2	11.6	--	8.8	
Public Equity	1,402,853,586	46.9	10.7	7.2	21.8	4.2	10.5	7.1	8.1	May-10
Public Equity Benchmark			10.7	7.1	20.1	4.3	10.5	7.5	8.3	
Global Equity	261,019,877	8.7	12.6	8.2	26.0	4.6	12.5	--	9.4	Jul-15
MSCI AC World IMI (Net)			11.1	7.4	21.6	5.5	11.5	7.8	8.3	
eV All Global Equity Median			11.1	6.8	18.7	5.0	11.5	7.6	8.1	
eV All Global Equity Rank			30	28	17	54	35	--	29	
Artisan Global Value	137,739,919	4.6	12.3	9.3	28.3	9.5	12.7	8.6	10.5	Mar-11
MSCI AC World Index Value (Net)			9.2	7.2	11.8	7.3	8.2	5.5	6.0	
eV All Global Equity Median			11.1	6.8	18.7	5.0	11.5	7.6	8.2	
eV All Global Equity Rank			33	16	12	12	32	33	16	

Returns for the Equity Aggregate are gross of fees through June 2015 and net of fees thereafter.
Please see final page of the performance report for composition of the Policy Benchmark.
Throughout the report performance will be shown for funds after one full month of investment.

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
Artisan Global Opportunities	123,279,958	4.1	13.0	7.0	23.5	-0.4	13.6	--	10.4	Jul-17
<i>MSCI AC World Index Growth (Net)</i>			12.7	7.2	33.2	3.7	14.6	10.1	11.6	
<i>eV All Global Equity Median</i>			11.1	6.8	18.7	5.0	11.5	7.6	8.6	
<i>eV All Global Equity Rank</i>			26	48	27	84	21	--	25	
US Equity	550,572,715	18.4	11.9	8.3	26.1	8.8	14.4	--	10.8	Jul-15
<i>MSCI USA IMI (Net)</i>			12.0	8.2	25.6	8.3	14.8	11.0	11.3	
<i>eV All US Equity Median</i>			11.8	7.8	18.1	8.0	13.0	9.2	9.5	
<i>eV All US Equity Rank</i>			48	41	23	41	33	--	35	
Northern Trust Russell 3000 PE	517,198,076	17.3	12.1	8.5	26.0	8.7	--	--	19.7	Apr-20
<i>Russell 3000 Index</i>			12.1	8.4	26.0	8.5	15.2	11.5	19.6	
Burgundy US Small Cap	33,374,639	1.1	8.7	7.2	--	--	--	--	11.2	Jun-23
<i>Russell 2000 Value Index</i>			15.3	11.8	14.6	7.9	10.0	6.8	20.7	
<i>eV US Small Cap Value Equity Median</i>			12.6	9.3	16.2	9.7	11.6	7.3	18.3	
<i>eV US Small Cap Value Equity Rank</i>			92	76	--	--	--	--	94	

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
International Equity	283,081,528	9.5	9.7	3.5	15.1	0.4	7.9	--	4.6	Jul-15
MSCI World ex U.S. IMI Index (Net)			10.5	6.1	17.2	3.7	8.2	4.3	5.1	
eV ACWI ex-US All Cap Equity Median			10.2	4.7	16.7	1.4	8.1	4.6	5.3	
eV ACWI ex-US All Cap Equity Rank			60	72	66	59	57	--	78	
Oberweis Intl Opportunities	38,451,937	1.3	8.1	2.0	6.4	-11.1	7.7	--	5.8	Nov-15
MSCI World ex U.S. Small Cap Growth Index (Net)			11.2	4.6	10.6	-4.2	6.7	4.9	5.6	
eV ACWI ex-US All Cap Equity Median			10.2	4.7	16.7	1.4	8.1	4.6	5.9	
eV ACWI ex-US All Cap Equity Rank			87	85	100	99	64	--	66	
Northern Trust MSCI World ex US	159,518,202	5.3	10.5	6.1	18.2	5.1	9.1	--	7.6	Nov-16
MSCI World ex U.S. (Net)			10.5	6.0	17.9	4.4	8.5	4.3	7.0	
Morgan Stanley Intl Equity	34,082,391	1.1	13.4	-2.9	19.6	--	--	--	-5.7	Apr-21
MSCI AC World ex USA (Net)			9.8	5.6	15.6	1.5	7.1	3.8	0.4	
eV ACWI ex-US All Cap Equity Median			10.2	4.7	16.7	1.4	8.1	4.6	0.4	
eV ACWI ex-US All Cap Equity Rank			12	100	22	--	--	--	90	
First Eagle International Equity	51,028,997	1.7	6.5	1.8	10.4	--	--	--	8.3	Jun-22
MSCI World ex U.S. (Net)			10.5	6.0	17.9	4.4	8.5	4.3	7.9	
eV ACWI ex-US All Cap Equity Median			10.2	4.7	16.7	1.4	8.1	4.6	6.1	
eV ACWI ex-US All Cap Equity Rank			98	86	97	--	--	--	19	

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
Emerging Markets Equity	308,179,466	10.3	7.8	7.5	16.7	-1.1	6.1	--	3.3	Jul-15
MSCI Emerging Markets IMI (Net)			8.0	5.7	11.7	-3.7	4.5	3.0	3.3	
eV Emg Mkts Equity Median			7.8	4.6	12.0	-3.4	5.0	3.3	3.9	
eV Emg Mkts Equity Rank			53	25	27	37	35	--	62	
Dimensional Fund Adv EM Value	49,157,025	1.6	7.2	7.3	16.5	5.3	5.6	--	5.8	Nov-16
MSCI Emerging Markets Value (Net)			8.1	7.2	14.2	0.0	3.4	1.9	3.9	
eV Emg Mkts Equity Median			7.8	4.6	12.0	-3.4	5.0	3.3	4.8	
eV Emg Mkts Equity Rank			67	26	28	14	42	--	28	
GQG Global Emerging Markets	67,063,532	2.2	11.3	13.6	29.5	0.2	10.2	--	7.8	Jul-17
MSCI Emerging Markets (Net)			7.9	4.7	9.8	-5.1	3.7	2.7	2.7	
eV Emg Mkts Equity Median			7.8	4.6	12.0	-3.4	5.0	3.3	3.3	
eV Emg Mkts Equity Rank			10	4	5	30	10	--	7	
Northern Trust MSCI EM IMI	23,962,139	0.8	7.9	5.4	11.4	-3.8	4.4	--	2.6	Oct-18
MSCI Emerging Markets IMI (Net)			8.0	5.7	11.7	-3.7	4.5	3.0	2.7	
Redwheel Emerging Markets Equity	60,456,089	2.0	3.5	3.0	6.2	-8.3	--	--	4.0	Sep-19
MSCI Emerging Markets (Net)			7.9	4.7	9.8	-5.1	3.7	2.7	3.3	
eV Emg Mkts Equity Median			7.8	4.6	12.0	-3.4	5.0	3.3	4.4	
eV Emg Mkts Equity Rank			99	68	89	83	--	--	57	
Wellington Emerging Markets Systematic Equity	62,875,407	2.1	6.9	6.5	15.9	-0.3	--	--	5.6	Sep-19
MSCI Emerging Markets (Net)			7.9	4.7	9.8	-5.1	3.7	2.7	3.3	
eV Emg Mkts Equity Median			7.8	4.6	12.0	-3.4	5.0	3.3	4.4	
eV Emg Mkts Equity Rank			75	32	30	32	--	--	39	

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
Kotak India Midcap	17,393,623	0.6	12.0	18.0	30.5	--	--	--	8.8	Jul-21
MSCI India (Net)			11.9	14.9	20.8	12.0	11.8	9.9	9.3	
eV Emg Mkts Equity Median			7.8	4.6	12.0	-3.4	5.0	3.3	-7.6	
eV Emg Mkts Equity Rank			6	1	4	--	--	--	2	
Unifi India	27,271,651	0.9	10.4	16.7	--	--	--	--	32.0	Apr-23
MSCI India (Net)			11.9	14.9	20.8	12.0	11.8	9.9	29.0	
eV Emg Mkts Equity Median			7.8	4.6	12.0	-3.4	5.0	3.3	6.8	
eV Emg Mkts Equity Rank			14	1	--	--	--	--	1	
Private Markets	714,916,076	23.9	-0.5	1.1	4.6	15.3	14.4	--	10.0	Jul-15
Private Markets Benchmark			-0.5	1.1	4.6	15.3	14.4	--	11.3	
MSCI ACWI IMI (Net) +1%			11.4	7.9	22.8	6.5	12.6	8.8	9.4	
Private Markets ex Russell 3000	714,916,076	23.9	-0.5	1.1	4.6	17.7	12.8	--	10.2	Jul-15
Private Equity	368,249,506	12.3	-1.2	1.5	6.9	21.5	16.7	14.1	10.0	Jan-06
San Jose Custom Private Equity Benchmark			0.6	3.4	7.2	16.8	14.5	13.9	12.2	
Pathway Private Eq Fund VIII	308,217	0.0	-5.3	-6.4	-19.7	-5.8	-9.9	-2.4	2.9	Jul-09
Pantheon Global Secondary III	436,229	0.0	-0.6	-1.4	-1.5	-10.0	-7.3	-1.4	1.0	Jul-09
Great Hill Equity Partners IV	2,940,120	0.1	-17.7	-27.2	10.7	11.7	16.4	29.1	26.2	Jul-09
Partners Group Secondary 2008	291,689	0.0	-20.3	-17.7	-12.4	-2.0	0.3	2.8	6.3	Jul-09
Partners Group Secondary 2011	2,740,128	0.1	-5.8	-5.4	-8.2	5.6	3.3	8.7	12.7	Nov-12
PE Strategic Partnership, LP	335,977,624	11.2	-0.8	2.2	8.0	22.7	18.7	--	15.5	Aug-17
Innovation Endeavors III	12,731,806	0.4	-8.0	-5.1	-10.6	38.9	32.4	--	20.6	Jun-18

Returns for the Private Debt and Real Assets Aggregates are gross of fees through June 2015 and net of fees thereafter.

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
Crestline Portfolio Financing	7,431,871	0.2	5.4	7.9	9.0	8.0	9.2	--	9.3	Jul-18
Pantheon USA Fund VII, LP	5,391,823	0.2	-1.7	0.4	0.7	12.0	9.2	11.5	11.8	Jul-09
Venture Capital	20,724,161	0.7	-0.6	-3.5	-7.3	--	--	--	-3.5	Jun-21
Innovation Endeavors IV	1,980,708	0.1	-1.6	1.9	-0.7	--	--	--	-4.0	Jun-21
TI Platform SJFED LP	11,982,078	0.4	0.0	-3.5	-7.7	--	--	--	-2.9	Aug-21
Soma Capital Fund III LP	2,350,495	0.1	-1.6	-1.6	-2.2	--	--	--	2.9	Dec-21
Fin VC Horizons II	4,216,858	0.1	-0.2	-6.3	-11.4	--	--	--	-9.3	Apr-22
Cross Link Ventures X	194,022	0.0	-20.8	--	--	--	--	--	-20.8	Sep-23
Private Debt	129,803,657	4.3	2.3	3.1	5.4	14.6	8.5	4.7	5.3	Dec-10
<i>S&P Global Leveraged Loan Index +2%</i>			<i>3.4</i>	<i>7.5</i>	<i>15.6</i>	<i>7.9</i>	<i>7.9</i>	<i>6.5</i>	<i>6.8</i>	
White Oak Direct Lending	29,921,433	1.0	-1.6	-8.3	-12.9	23.8	26.3	9.1	8.2	Feb-11
Blackstone/GSO Cap Partners	4,379,824	0.1	-3.2	-2.9	9.8	-1.9	-14.5	-5.8	-1.3	Mar-11
Medley Opportunity Fund II LP	606,823	0.0	21.5	21.5	16.7	4.4	-5.1	-1.8	0.0	Jun-11
Cross Ocean USD ESS Fund II LP	2,242,022	0.1	0.8	0.5	0.0	6.6	5.4	--	7.6	Aug-16
Crestline Co-Investment	1,606,868	0.1	3.7	7.3	11.4	16.3	--	--	13.8	Apr-19
Cross Ocean USD ESS Fund III, L.P.	15,348,008	0.5	5.2	10.8	16.0	15.4	--	--	12.9	Jul-19
Arbour Lane Credit Opportunity Fund II, L.P.	9,041,662	0.3	1.5	4.6	11.0	12.8	--	--	16.1	May-20
Eagle Point Defensive Income Fund	7,459,909	0.2	1.3	6.0	8.7	2.0	--	--	4.0	Jul-20

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
HPS Special Situations Opportunity Fund	7,925,969	0.3	3.2	4.9	14.6	19.3	--	--	18.7	Dec-20
Crestline Portfolio Financing Fund II	4,019,885	0.1	2.9	5.3	13.6	10.2	--	--	9.9	Dec-20
SVP Special Situations V	4,720,146	0.2	4.3	9.4	17.7	--	--	--	8.5	Jun-21
Arbour Lane COF III	6,178,728	0.2	3.8	7.4	14.4	--	--	--	1.6	Nov-21
Angelo Gordon CS II	7,178,222	0.2	3.4	11.7	13.9	--	--	--	3.9	Feb-22
Octagon CLO Opp Fund IV	9,106,922	0.3	7.8	11.5	19.3	--	--	--	9.7	Mar-22
Eagle Point DIF II	8,629,896	0.3	2.0	6.1	14.8	--	--	--	8.2	Sep-22
HPS SP SIT OPP II	3,253,497	0.1	2.6	8.9	11.0	--	--	--	10.1	Dec-22
Octagon CLO Opportunity Fund V, L.P.	8,183,841	0.3	2.3	2.3	--	--	--	--	2.3	Jul-23
Growth Real Estate	122,254,373	4.1	-1.0	-1.4	-1.9	12.2	9.8	--	13.7	Jul-15
DRA Growth & Income Fund VII	65,155	0.0	-3.0	-24.1	-11.6	25.3	38.8	33.0	30.1	Apr-12
DRA Growth & Income Fund VIII	3,273,121	0.1	-14.0	-15.9	-37.8	-7.3	-5.4	--	2.0	Jan-15
Tristan - EPISO IV	12,746,533	0.4	2.3	-0.2	-1.8	4.5	6.8	--	7.1	Jan-16
DRA Growth & Income Fund IX	11,892,088	0.4	-5.5	-4.9	-4.2	19.9	14.7	--	15.0	Feb-17
GEM Realty Fund VI	5,181,436	0.2	-0.3	-1.6	-10.1	14.8	6.1	--	5.9	Dec-17
Torchlight Debt Opportunity VI	22,499,037	0.8	0.6	1.4	3.6	10.6	3.7	--	5.9	May-18
Tristan - EPISO V	10,735,430	0.4	1.4	-0.7	4.1	6.0	--	--	-25.5	May-19
DRA Growth & Income Fund X	9,890,269	0.3	0.0	0.0	1.9	20.9	--	--	20.3	Apr-20

Returns for the Private Debt and Real Assets Aggregates are gross of fees through June 2015 and net of fees thereafter.

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
Rockpoint Real Estate Fund VI, L.P.	5,973,321	0.2	-0.6	-2.1	-4.1	15.2	--	--	10.6	Jun-20
Exeter Industrial Value Fund V	8,088,113	0.3	-2.0	0.1	5.9	25.3	--	--	23.2	Oct-20
Torchlight Debt Fund VII	3,191,391	0.1	0.1	0.2	2.6	--	--	--	3.4	Feb-21
H.I.G. Realty Partners IV, L.P.	8,330,737	0.3	-0.1	-0.5	7.1	--	--	--	50.7	Feb-22
Praedium X MidInc	5,184,300	0.2	-4.0	-5.4	-19.1	--	--	--	-11.8	Apr-22
AIGGRE Fund IV	7,272,010	0.2	-2.8	-4.0	-5.3	--	--	--	15.4	Jun-22
GCP SecureSpace Property Partners, L.P	2,424,311	0.1	5.8	18.8	-14.1	--	--	--	-8.5	Sep-22
Centerbridge RE II	3,452,735	0.1	-0.8	-1.2	5.8	--	--	--	-6.3	Jul-22
EQT Exeter Industrial Value VI	800,000	0.0	--	--	--	--	--	--	0.0	Dec-23
DRA Growth Income Fund XI	1,254,386	0.0	--	--	--	--	--	--	0.0	Dec-23

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
Private Real Assets	73,884,378	2.5	-0.6	0.5	5.6	16.6	8.7	--	8.5	Jul-15
Global Infra Part III-A/B, LP	25,261,809	0.8	0.1	0.4	8.3	15.8	9.1	--	6.4	Sep-16
Lime Rock Partners VIII	3,509,829	0.1	10.0	11.9	11.8	27.7	11.2	--	11.0	Dec-18
Kimmeridge Energy Fund V, L.P.	5,706,171	0.2	9.8	12.3	33.1	41.7	--	--	16.8	Aug-19
Global Infra Partners IV	2,864,962	0.1	1.2	2.0	4.3	0.4	--	--	-70.6	Oct-19
Lime Rock New Energy, L.P.	2,935,930	0.1	3.1	7.9	34.6	8.6	--	--	7.5	Aug-20
Orion Mine Finance III	4,832,746	0.2	-4.3	5.9	21.6	10.8	--	--	11.6	Sep-20
Real Assets Coinvest I	45,000	0.0	0.0	0.0	-96.3	-66.5	--	--	-63.6	Oct-20
Crestline Co-Investment II	1,134,679	0.0	-60.8	-66.7	-67.9	-15.9	--	--	-15.9	Jan-21
Tembo Cap Mining III	3,542,501	0.1	10.3	18.1	45.0	--	--	--	10.2	Oct-21
Mountain Capital II	2,358,871	0.1	-0.8	-1.9	-7.9	--	--	--	0.3	Jan-22
Aether Seed Partners I	4,831,880	0.2	4.7	4.7	2.8	--	--	--	174.8	May-22
Hull Street Energy II	3,916,671	0.1	-0.6	-2.0	-35.8	--	--	--	-25.6	Jul-22
Kimmeridge Fund VI	5,683,249	0.2	0.8	1.7	7.8	--	--	--	6.2	Oct-22
HIG Infrastructure Partners	1,908,669	0.1	3.6	35.3	-21.7	--	--	--	-21.7	Jan-23
Paine Schwartz Food Chain Fund VI	1,285,982	0.0	3.0	-2.0	--	--	--	--	-7.1	Apr-23
Ridgewood Water & Strategic Infrastructure Fund II, L.P.	1,636,813	0.1	-22.0	--	--	--	--	--	-24.0	Sep-23
Orion Mine Finance Fund IV, L.P.	865,287	0.0	0.0	--	--	--	--	--	0.0	Oct-23

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
Scout Energy Partners VI, L.P.	1,043,380	0.0	0.0	--	--	--	--	--	0.0	Oct-23
Lime Rock IX	519,947	0.0	--	--	--	--	--	--	0.0	Dec-23
Emerging Markets Debt	89,869,567	3.0	3.6	4.0	5.0	2.4	5.8	--	3.8	Jul-15
50% JPM EMBI GD / 50% JPM GBI-EM			8.6	5.6	11.9	-3.3	1.4	1.7	2.1	
eV All Emg Mkts Fixed Inc Median			8.6	5.7	11.5	-2.2	2.3	2.6	2.7	
eV All Emg Mkts Fixed Inc Rank			97	86	98	3	2	--	9	
Wellington Iguazu Partners LP Fund	38,520,890	1.3	-3.6	-0.4	-1.5	4.8	--	--	7.4	May-19
50% JPM EMBI GD / 50% JPM GBI-EM			8.6	5.6	11.9	-3.3	1.4	1.7	0.5	
eV All Emg Mkts Fixed Inc Median			8.6	5.7	11.5	-2.2	2.3	2.6	1.3	
eV All Emg Mkts Fixed Inc Rank			100	100	100	1	--	--	1	
Payden EMD Blended Currency	51,348,677	1.7	9.7	6.2	12.2	-2.8	--	--	-2.4	Dec-20
50% JPM EMBI GD / 50% JPM GBI-EM			8.6	5.6	11.9	-3.3	1.4	1.7	-2.4	
eV All Emg Mkts Fixed Inc Median			8.6	5.7	11.5	-2.2	2.3	2.6	-1.4	
eV All Emg Mkts Fixed Inc Rank			23	40	40	65	--	--	74	

Cash composite includes the cash account, cash collateral in the Russell Investments Overlay program, and residuals from terminated manager assets.

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
High Yield Bonds	63,259,229	2.1	7.0	7.3	13.1	2.4	3.6	--	2.0	Jun-14
<i>Blmbg. U.S. Corp: High Yield Index</i>			7.2	7.7	13.4	2.0	5.4	4.6	4.3	
Mellon High Yield Beta	5,772,490	0.2	7.5	7.8	13.8	2.3	--	--	5.3	Jul-20
<i>Blmbg. U.S. Corp: High Yield Index</i>			7.2	7.7	13.4	2.0	5.4	4.6	4.9	
<i>eV US High Yield Fixed Inc Median</i>			6.5	7.0	12.2	2.1	5.1	4.2	4.7	
<i>eV US High Yield Fixed Inc Rank</i>			9	15	11	42	--	--	32	
Columbia High Yield	57,486,739	1.9	6.9	7.2	13.0	2.4	--	--	2.8	Dec-20
<i>Blmbg. U.S. Corp: High Yield Index</i>			7.2	7.7	13.4	2.0	5.4	4.6	2.5	
<i>eV US High Yield Fixed Inc Median</i>			6.5	7.0	12.2	2.1	5.1	4.2	2.6	
<i>eV US High Yield Fixed Inc Rank</i>			24	40	29	41	--	--	44	
Low Beta	297,960,514	10.0	1.0	2.4	4.0	4.6	4.2	--	3.2	Jul-15
<i>Low Beta Benchmark</i>			2.3	3.3	5.3	1.4	1.7	--	1.1	
Immunized Cash Flows	149,979,165	5.0	2.6	3.2	4.4	0.2	1.4	--	1.6	Oct-18
<i>Blmbg. 1-3 Year Gov/Credit index</i>			2.7	3.4	4.6	0.1	1.5	1.3	1.7	
Insight Immunized Cash Flow	149,979,165	5.0	2.6	3.2	4.4	0.2	--	--	1.0	Jul-19
<i>Blmbg. 1-3 Year Gov/Credit index</i>			2.7	3.4	4.6	0.1	1.5	1.3	1.1	
Market Neutral Strategies	89,731,462	3.0	-1.5	1.4	3.8	13.1	10.2	6.4	6.3	Nov-12
<i>Market Neutral Strategies Benchmark</i>			1.7	3.4	6.7	3.2	2.5	1.9	1.7	

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
Relative Value	89,731,462	3.0	-1.5	1.4	3.8	13.1	8.8	--	6.5	Oct-14
<i>HFRI Relative Value (Total) Index</i>			2.6	4.3	7.0	4.6	4.9	4.0	3.8	
Pine River Fund, Ltd	284,377	0.0	0.5	0.6	-6.4	-2.6	4.9	2.4	3.1	Jan-13
<i>HFRI Relative Value (Total) Index</i>			2.6	4.3	7.0	4.6	4.9	4.0	4.3	
DE Shaw Composite Fund, LLC	46,139,895	1.5	3.0	7.3	10.6	18.9	17.8	14.2	14.0	Apr-13
<i>HFRI Fund Weighted Composite Index</i>			4.2	4.6	8.1	4.5	7.1	4.6	4.8	
Hudson Bay	10,345,375	0.3	1.1	2.5	4.5	7.5	10.1	--	9.0	Aug-17
<i>HFRI Relative Value (Total) Index</i>			2.6	4.3	7.0	4.6	4.9	4.0	4.0	
Crabel Advanced Trend	32,961,815	1.1	-7.8	-6.2	-4.5	--	--	--	5.2	Jul-21
<i>Barclay CTA Index</i>			-1.6	-0.9	-0.4	3.9	4.4	2.4	2.9	
Cash	58,249,888	1.9	0.9	2.0	3.7	1.7	1.7	1.2	6.7	Jan-06
<i>90 Day U.S. Treasury Bill</i>			1.4	2.7	5.0	2.2	1.9	1.2	1.4	
Other	416,836,633	13.9	3.4	-0.2	-2.2	-0.4	1.0	1.3	1.6	Jul-04
<i>Other Benchmark</i>			3.9	0.5	-0.5	-0.3	0.6	--	--	
Investment Grade Bonds	149,431,607	5.0	6.3	4.0	6.5	-2.0	--	--	0.5	Dec-19
<i>Custom IG Bonds Benchmark</i>			5.9	3.4	5.3	-2.4	--	--	-0.3	
Voya Securitized Credit	42,387,089	1.4	4.8	4.2	8.0	-1.1	--	--	0.8	Jun-20
<i>Blmbg. U.S. Securitized: MBS, ABS, and CMBS</i>			7.3	3.2	5.1	-2.8	0.4	1.4	-2.2	
Invesco Core Bonds	107,044,518	3.6	6.9	3.8	5.6	--	--	--	-3.0	Mar-21
<i>Blmbg. U.S. Aggregate Index</i>			6.8	3.4	5.5	-3.3	1.1	1.8	-2.8	

Cash composite includes the cash account, cash collateral in the Russell Investments Overlay program, and residuals from terminated manager assets.

Total Fund | As of December 31, 2023

	Market Value \$	% of Portfolio	3 Mo (%)	FYTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)	Inception (%)	Inception Date
TIPS	58,822,099	2.0	2.6	3.1	4.6	2.4	3.2	--	1.8	Jul-14
Blmbg. U.S. TIPS 0-5 Year			2.6	3.0	4.6	2.3	3.4	2.0	1.9	
Northern Trust 0-5 Year TIPS	58,822,099	2.0	2.6	3.1	4.6	2.4	3.2	--	1.8	Jul-14
Blmbg. U.S. TIPS 0-5 Year			2.6	3.0	4.6	2.3	3.4	2.0	1.9	
Core Private Real Estate	152,538,009	5.1	-1.8	-4.9	-12.2	8.0	6.4	--	7.4	Jul-15
Core Real Estate Benchmark			-2.1	-4.9	-12.9	5.8	4.4	--	5.9	
BlackRock Core Property Fund	27,011,648	0.9	-3.9	-8.2	-15.4	7.3	--	--	5.9	Feb-19
Core Real Estate Benchmark 2			-2.1	-4.9	-12.9	5.8	4.3	--	4.4	
Clarion Lion Properties Fund	53,588,617	1.8	-1.3	-7.3	-17.0	6.0	--	--	4.7	May-19
Core Real Estate Benchmark 2			-2.1	-4.9	-12.9	5.8	4.3	--	4.5	
Clarion Lion Industrial Trust	14,575,119	0.5	0.7	-0.1	-2.4	--	--	--	14.0	Oct-21
Core Real Estate Benchmark 3			-2.1	-4.9	-12.9	--	--	--	2.4	
TA Realty Core Property Fund	57,362,626	1.9	-1.9	-1.6	-7.7	--	--	--	6.7	Oct-21
Core Real Estate Benchmark 3			-2.1	-4.9	-12.9	--	--	--	2.4	
Long-Term Government Bonds	56,044,918	1.9	12.5	-0.8	3.4	-11.4	--	--	-10.2	Jun-20
Blmbg. U.S. Treasury: Long			12.7	-0.6	3.1	-11.4	-1.2	2.3	-10.4	
BlackRock Long-Term Gov Bonds	56,044,918	1.9	12.5	-0.8	3.4	-11.4	--	--	-10.2	Jun-20
Blmbg. U.S. Treasury: Long			12.7	-0.6	3.1	-11.4	-1.2	2.3	-10.4	
Overlay	7,264,509	0.2								
Russell Investments Overlay	7,257,199	0.2								

Cash Flow Summary Quarter Ending December 31, 2023						
	Beginning Market Value	Contributions	Distributions	Net Cash Flow	Net Investment Change	Ending Market Value
Aether Seed Partners I	4,614,071	0	0	0	217,809	4,831,880
AIGGRE Fund IV	7,246,728	231,444	0	231,444	-206,161	7,272,010
Angelo Gordon CS II	5,995,903	1,125,000	-149,341	975,659	206,660	7,178,222
Arbour Lane COF III	5,017,653	950,908	0	950,908	210,167	6,178,728
Arbour Lane Credit Opportunity Fund II, L.P.	9,542,365	0	-644,430	-644,430	143,727	9,041,662
Artisan Global Opportunities	109,076,110	0	0	0	14,203,849	123,279,958
Artisan Global Value	122,660,414	0	0	0	15,079,505	137,739,919
BlackRock Core Property Fund	28,266,377	0	-152,117	-152,117	-1,102,612	27,011,648
BlackRock Long-Term Gov Bonds	49,818,787	0	0	0	6,226,131	56,044,918
Blackstone/GSO Cap Partners	4,525,826	0	0	0	-146,002	4,379,824
Burgundy US Small Cap	30,694,301	0	0	0	2,680,338	33,374,639
Cash Account	61,569,303	125,574,353	-129,514,577	-3,940,224	620,808	58,249,888
Centerbridge RE II	3,480,123	0	0	0	-27,388	3,452,735
Clarion Lion Industrial Trust	14,536,706	0	-56,303	-56,303	94,716	14,575,119
Clarion Lion Properties Fund	54,656,255	0	-384,419	-384,419	-683,219	53,588,617
Columbia High Yield	53,774,230	1,645	-1,645	0	3,712,509	57,486,739
Crabel Advanced Trend	35,752,482	0	0	0	-2,790,667	32,961,815
Crestline Co-Investment	1,549,556	0	0	0	57,312	1,606,868
Crestline Co-Investment II	2,891,853	0	0	0	-1,757,174	1,134,679
Crestline Portfolio Financing	7,053,224	0	0	0	378,646	7,431,871
Crestline Portfolio Financing Fund II	3,904,723	0	0	0	115,162	4,019,885
Cross Link Ventures X	245,000	0	0	0	-50,978	194,022
Cross Ocean USD ESS Fund II LP	2,457,746	0	-235,627	-235,627	19,903	2,242,022
Cross Ocean USD ESS Fund III, L.P.	18,725,092	0	-4,315,458	-4,315,458	938,374	15,348,008

Total Fund | As of December 31, 2023

	Beginning Market Value	Contributions	Distributions	Net Cash Flow	Net Investment Change	Ending Market Value
DE Shaw Composite Fund, LLC	44,806,667	0	0	0	1,333,228	46,139,895
Dimensional Fund Adv EM Value	45,866,586	0	0	0	3,290,439	49,157,025
DRA Growth Income Fund XI	0	1,254,386	0	1,254,386	0	1,254,386
DRA Growth & Income Fund IX	13,098,181	0	-496,525	-496,525	-709,568	11,892,088
DRA Growth & Income Fund VII	487,691	0	-408,000	-408,000	-14,536	65,155
DRA Growth & Income Fund VIII	3,805,026	0	0	0	-531,905	3,273,121
DRA Growth & Income Fund X	9,892,969	78,947	-81,647	-2,700	0	9,890,269
Eagle Point Defensive Income Fund	7,500,112	0	-136,080	-136,080	95,877	7,459,909
Eagle Point DIF II	5,830,054	2,640,000	0	2,640,000	159,842	8,629,896
EQT Exeter Industrial Value VI	0	800,000	0	800,000	0	800,000
Exeter Industrial Value Fund V	8,254,065	0	0	0	-165,952	8,088,113
Fin VC Horizons II	4,119,740	107,289	0	107,289	-10,171	4,216,858
First Eagle International Equity	47,922,602	0	0	0	3,106,395	51,028,997
GCP SecureSpace Property Partners, L.P	2,291,716	0	0	0	132,595	2,424,311
GEM Realty Fund VI	5,196,781	0	0	0	-15,345	5,181,436
Global Infra Part III-A/B, LP	25,635,384	0	-395,130	-395,130	21,555	25,261,809
Global Infra Partners IV	2,851,702	0	-22,047	-22,047	35,307	2,864,962
GQG Global Emerging Markets	60,228,910	0	0	0	6,834,622	67,063,532
Great Hill Equity Partners IV	3,965,213	0	-339,150	-339,150	-685,943	2,940,120
H.I.G. Realty Partners IV, L.P.	7,757,443	584,496	0	584,496	-11,202	8,330,737
HIG Infrastructure Partners	1,841,878	0	0	0	66,791	1,908,669
HPS SP SIT OPP II	3,225,526	0	-57,371	-57,371	85,342	3,253,497
HPS Special Situations Opportunity Fund	7,830,127	0	-152,249	-152,249	248,091	7,925,969
Hudson Bay	10,236,149	0	0	0	109,226	10,345,375
Hull Street Energy II	3,407,094	534,648	0	534,648	-25,071	3,916,671
Innovation Endeavors III	13,831,814	0	0	0	-1,100,008	12,731,806
Innovation Endeavors IV	2,013,572	0	0	0	-32,864	1,980,708

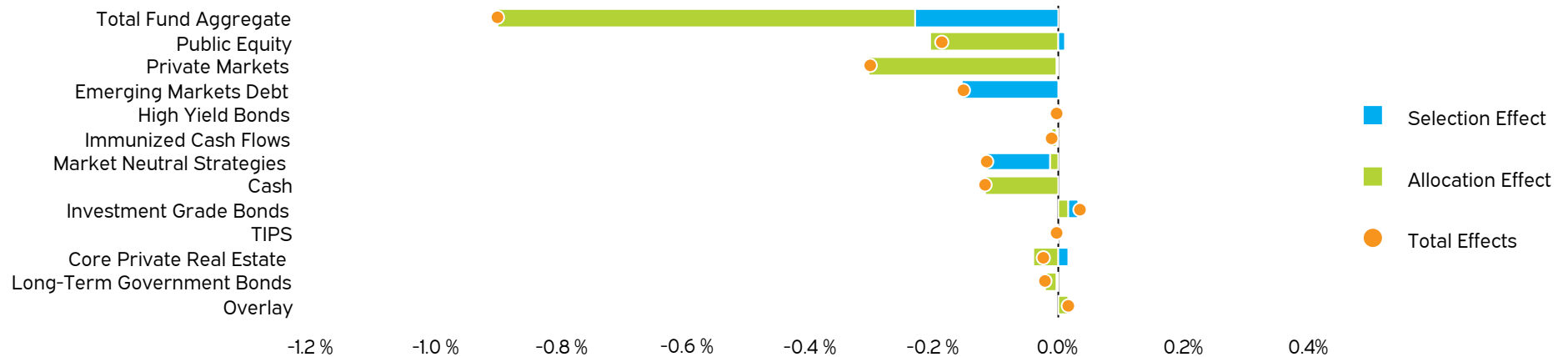
Total Fund | As of December 31, 2023

	Beginning Market Value	Contributions	Distributions	Net Cash Flow	Net Investment Change	Ending Market Value
Insight Immunized Cash Flow	152,891,528	0	-6,828,194	-6,828,194	3,915,831	149,979,165
Invesco Core Bonds	100,170,265	452	-452	0	6,874,253	107,044,518
Kimmeridge Energy Fund V, L.P.	5,343,554	0	-163,528	-163,528	526,145	5,706,171
Kimmeridge Fund VI	4,858,177	782,211	0	782,211	42,861	5,683,249
Kotak India Midcap	15,524,170	0	0	0	1,869,453	17,393,623
Lime Rock New Energy, L.P.	2,867,930	0	-21,494	-21,494	89,494	2,935,930
Lime Rock Partners VIII	3,317,540	0	-139,978	-139,978	332,267	3,509,829
Lime Rock IX	0	519,947	0	519,947	0	519,947
Medley Opportunity Fund II LP	1,221,623	0	-877,763	-877,763	262,963	606,823
Mellon High Yield Beta	5,371,186	0	0	0	401,304	5,772,490
Morgan Stanley Intl Equity	30,065,619	0	0	0	4,016,772	34,082,391
Mountain Capital II	2,353,035	25,886	0	25,886	-20,050	2,358,871
Northern Trust 0-5 Year TIPS	57,359,036	0	0	0	1,463,063	58,822,099
Northern Trust MSCI EM IMI	41,410,280	0	-19,009,317	-19,009,317	1,561,176	23,962,139
Northern Trust MSCI World ex US	138,803,826	6,000,000	-10,410	5,989,590	14,724,787	159,518,202
Northern Trust Russell 3000 PE	466,859,785	0	-6,029,179	-6,029,179	56,367,470	517,198,076
Oberweis Intl Opportunities	35,583,559	0	0	0	2,868,378	38,451,937
Octagon CLO Opp Fund IV	8,790,734	0	-364,051	-364,051	680,239	9,106,922
Octagon CLO Opportunity Fund V, L.P.	8,000,000	0	0	0	183,841	8,183,841
Orion Mine Finance III	4,987,166	70,274	-9,077	61,196	-215,616	4,832,746
Orion Mine Finance Fund IV, L.P.	0	865,287	0	865,287	0	865,287
Paine Schwartz Food Chain Fund VI	1,050,318	240,702	-36,848	203,854	31,810	1,285,982
Pantheon Global Secondary III	438,897	0	0	0	-2,668	436,229
Pantheon USA Fund VII, LP	5,484,001	0	0	0	-92,178	5,391,823
Partners Group Secondary 2008	492,609	0	-104,989	-104,989	-95,932	291,689
Partners Group Secondary 2011	3,119,430	0	-203,508	-203,508	-175,794	2,740,128
Pathway Private Eq Fund VIII	536,317	0	-217,270	-217,270	-10,830	308,217

Total Fund | As of December 31, 2023

	Beginning Market Value	Contributions	Distributions	Net Cash Flow	Net Investment Change	Ending Market Value
Payden EMD Blended Currency	36,782,584	10,002,314	0	10,002,314	4,563,779	51,348,677
PE Strategic Partnership, LP	338,313,264	3,475,000	-2,973,282	501,718	-2,837,358	335,977,624
Pine River Fund, Ltd	283,030	0	0	0	1,347	284,377
Praedium X MidInc	5,443,033	0	-41,204	-41,204	-217,529	5,184,300
Real Assets Coinvest I	45,000	0	0	0	0	45,000
Redwheel Emerging Markets Equity	58,435,074	0	0	0	2,021,015	60,456,089
Ridgewood Water & Strategic Infrastructure Fund II, L.P.	591,422	1,175,512	0	1,175,512	-130,121	1,636,813
Rockpoint Real Estate Fund VI, L.P.	5,759,175	249,776	0	249,776	-35,630	5,973,321
Russell Investments Overlay	6,408,070	0	0	0	849,128	7,257,199
Scout Energy Partners VI, L.P.	0	1,097,742	-54,440	1,043,302	78	1,043,380
Soma Capital Fund III LP	2,387,900	0	0	0	-37,405	2,350,495
State Street Terminated Managers	7,019	0	0	0	291	7,310
SVP Special Situations V	4,348,205	187,500	-3,750	183,750	188,191	4,720,146
TA Realty Core Property Fund	59,050,850	13,003	-582,423	-569,420	-1,118,804	57,362,626
Tembo Cap Mining III	3,047,392	171,388	0	171,388	323,721	3,542,501
TI Platform SJFED LP	10,928,156	1,053,922	0	1,053,922	0	11,982,078
Torchlight Debt Fund VII	3,189,208	0	0	0	2,183	3,191,391
Torchlight Debt Opportunity VI	22,357,576	0	0	0	141,461	22,499,037
Tristan - EPISO IV	12,455,280	0	0	0	291,253	12,746,533
Tristan - EPISO V	10,766,907	0	-176,374	-176,374	144,897	10,735,430
Unifi India	15,449,400	10,000,000	0	10,000,000	1,822,251	27,271,651
Voya Securitized Credit	40,464,913	0	0	0	1,922,175	42,387,089
Wellington Emerging Markets Systematic Equity	39,841,259	19,000,000	-287,735	18,712,265	4,321,883	62,875,407
Wellington Iguazu Partners LP Fund	49,950,503	0	-10,000,000	-10,000,000	-1,429,613	38,520,890
White Oak Direct Lending	30,312,489	90,615	0	90,615	-481,671	29,921,433
Total	2,833,470,126	188,904,648	-185,677,380	3,227,268	156,262,720	2,992,960,114

Attribution Summary Chart
3 Months Ending December 31, 2023

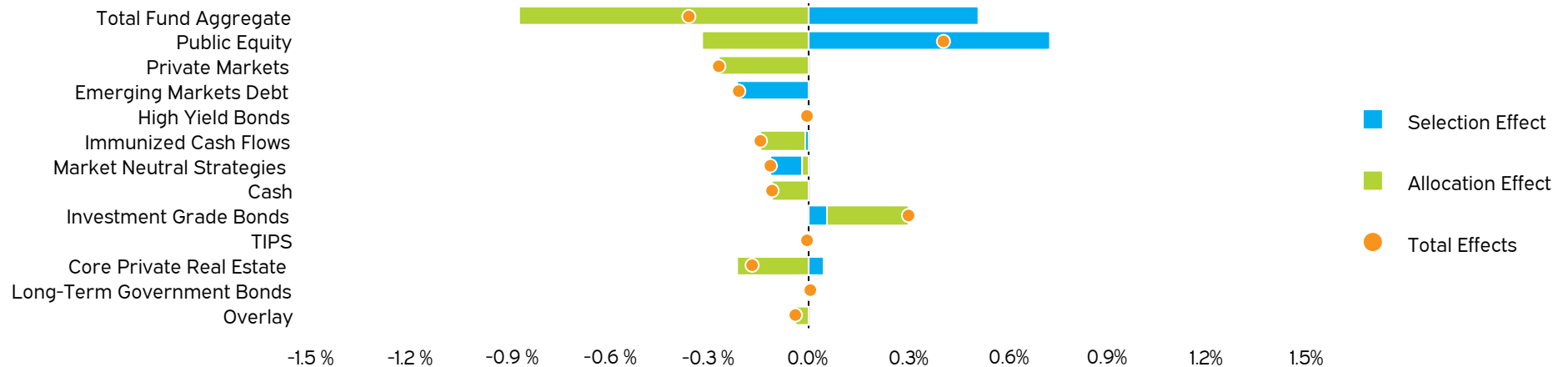


Attribution Summary
3 Months Ending December 31, 2023

	Wtd. Actual Return	Wtd. Index Return	Excess Return	Selection Effect	Allocation Effect	Total Effect
Public Equity	10.7	10.7	0.0	0.0	-0.2	-0.2
Private Markets	-0.5	-0.5	0.0	0.0	-0.3	-0.3
Emerging Markets Debt	3.6	8.6	-5.0	-0.2	0.0	-0.2
High Yield Bonds	7.0	7.2	-0.2	0.0	0.0	0.0
Immunized Cash Flows	2.6	2.7	-0.1	0.0	0.0	0.0
Market Neutral Strategies	-1.5	1.7	-3.2	-0.1	0.0	-0.1
Cash	0.9	1.4	-0.5	0.0	-0.1	-0.1
Investment Grade Bonds	6.3	5.9	0.4	0.0	0.0	0.0
TIPS	2.6	2.6	0.0	0.0	0.0	0.0
Core Private Real Estate	-1.8	-2.1	0.3	0.0	0.0	0.0
Long-Term Government Bonds	12.5	12.7	-0.2	0.0	0.0	0.0
Overlay	13.2	1.4	11.9	0.0	0.0	0.0
Total Fund Aggregate	5.5	6.4	-0.9	-0.2	-0.7	-0.9

Difference in attribution returns and returns in performance summary may occur as a result of the different calculation methodologies that are applied by Paris. Selection effect for each asset class includes prorated residual effects of total portfolio timing and trading.

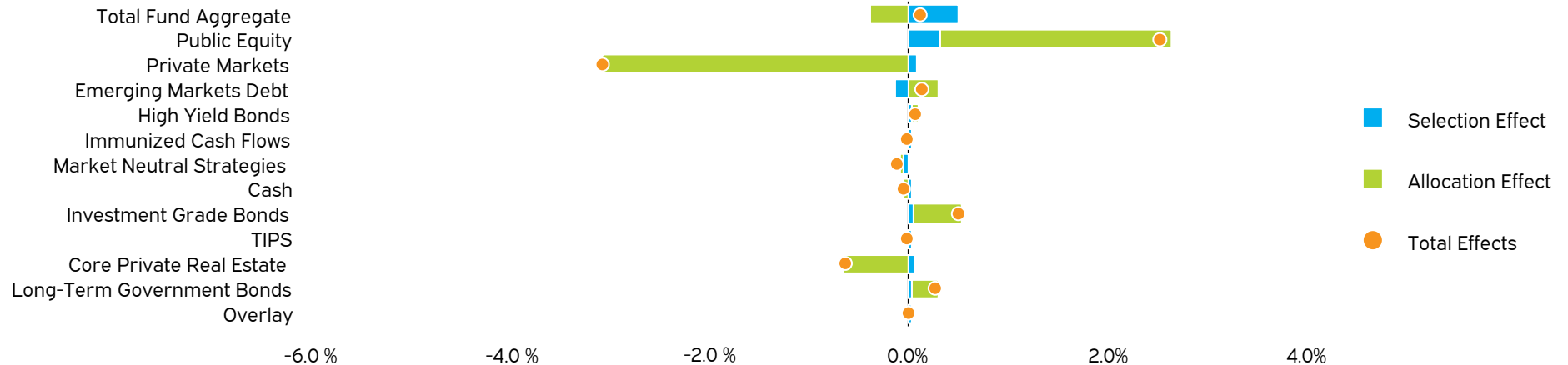
Attribution Summary Chart
1 Year Ending December 31, 2023



Attribution Summary
1 Year Ending December 31, 2023

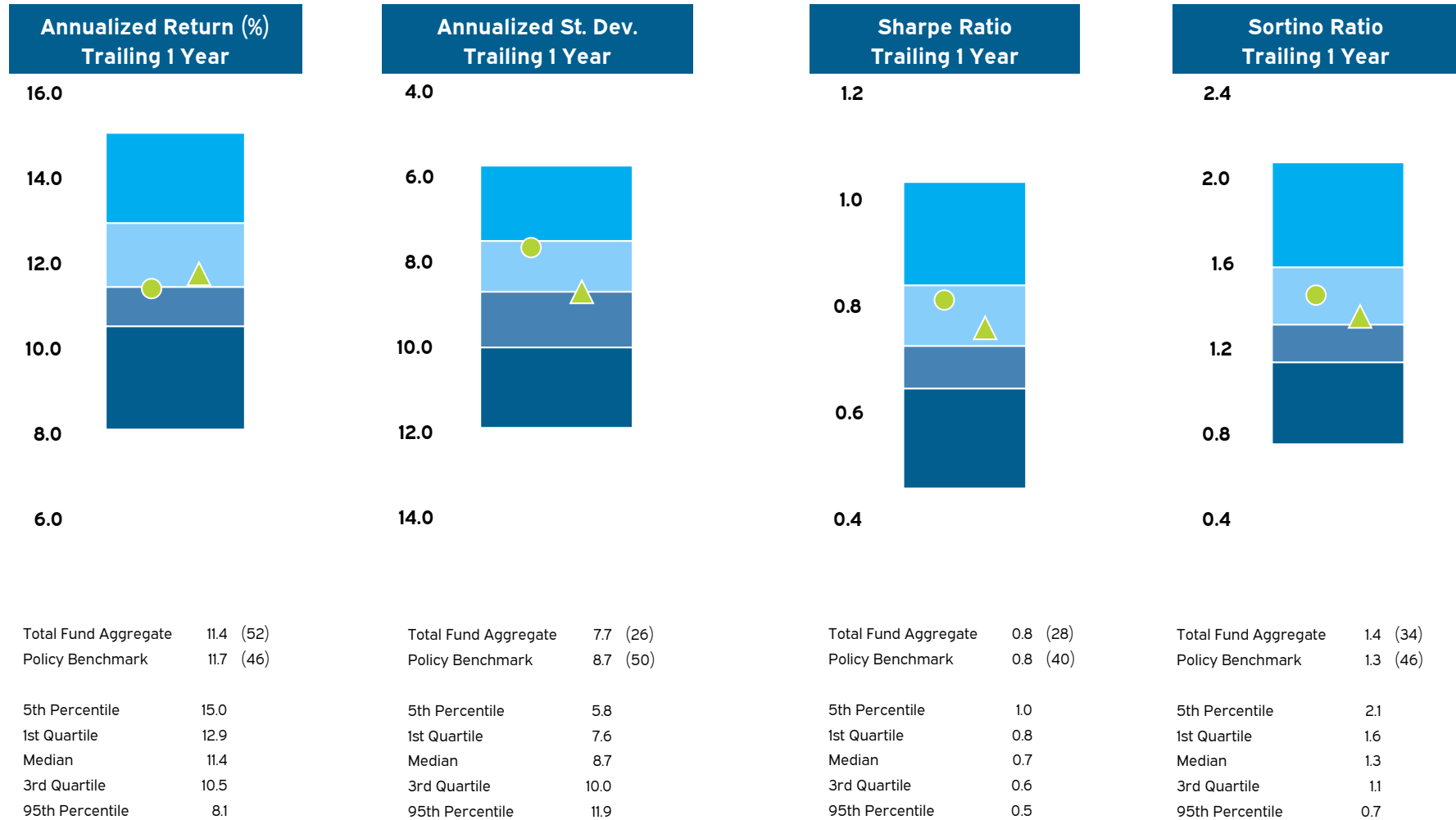
	Wtd. Actual Return	Wtd. Index Return	Excess Return	Selection Effect	Allocation Effect	Total Effect
Public Equity	21.8	20.1	1.7	0.7	-0.3	0.4
Private Markets	4.6	4.6	0.0	0.0	-0.3	-0.3
Emerging Markets Debt	5.0	11.9	-7.0	-0.2	0.0	-0.2
High Yield Bonds	13.1	13.4	-0.4	0.0	0.0	0.0
Immunized Cash Flows	4.4	4.6	-0.2	0.0	-0.1	-0.1
Market Neutral Strategies	3.8	6.7	-2.9	-0.1	0.0	-0.1
Cash	3.7	5.0	-1.3	0.0	-0.1	-0.1
Investment Grade Bonds	6.5	5.3	1.2	0.1	0.2	0.3
TIPS	4.6	4.6	0.0	0.0	0.0	0.0
Core Private Real Estate	-12.2	-12.9	0.6	0.0	-0.2	-0.2
Long-Term Government Bonds	3.4	3.1	0.3	0.0	0.0	0.0
Overlay	-3.0	5.0	-8.0	0.0	0.0	0.0
Total Fund Aggregate	11.4	11.7	-0.4	0.5	-0.9	-0.4

Attribution Summary Chart
3 Years Ending December 31, 2023



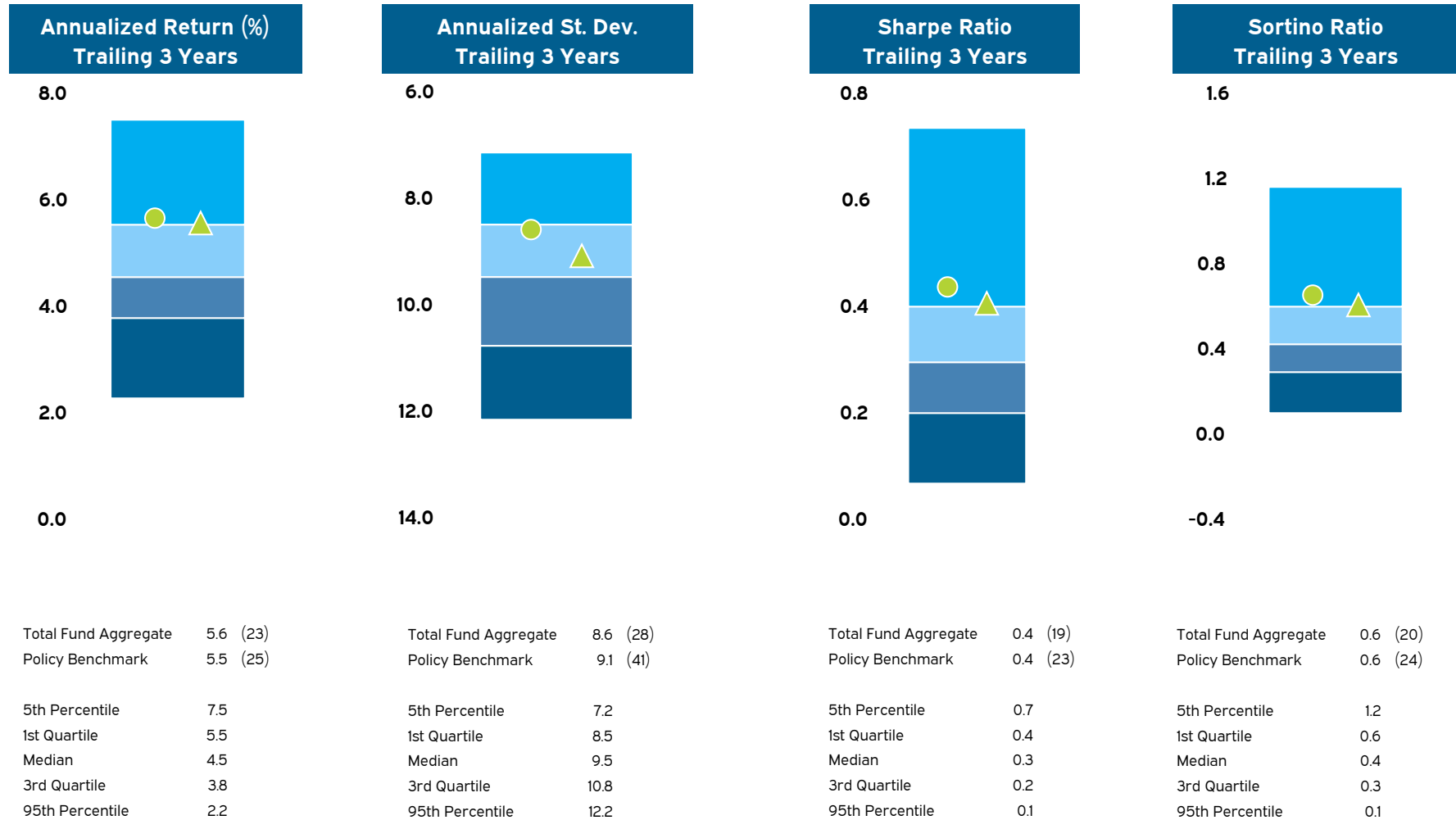
Attribution Summary
3 Years Ending December 31, 2023

	Wtd. Actual Return	Wtd. Index Return	Excess Return	Selection Effect	Allocation Effect	Total Effect
Public Equity	4.2	4.3	-0.1	0.3	2.3	2.5
Private Markets	15.3	15.3	0.0	0.1	-3.1	-3.1
Emerging Markets Debt	2.4	-3.3	5.7	-0.1	0.3	0.1
High Yield Bonds	2.4	2.0	0.4	0.0	0.1	0.1
Immunized Cash Flows	0.2	0.1	0.1	0.0	0.0	0.0
Market Neutral Strategies	13.1	3.2	9.8	0.0	0.0	-0.1
Cash	1.7	2.2	-0.4	0.0	0.0	0.0
Investment Grade Bonds	-2.0	-2.4	0.3	0.0	0.5	0.5
TIPS	2.4	2.3	0.0	0.0	0.0	0.0
Core Private Real Estate	8.0	5.8	2.2	0.1	-0.7	-0.6
Long-Term Government Bonds	-11.4	-11.4	0.0	0.0	0.3	0.3
Overlay	-28.8	2.2	-31.0	0.0	0.0	0.0
Total Fund Aggregate	5.6	5.5	0.1	0.2	-0.4	0.1



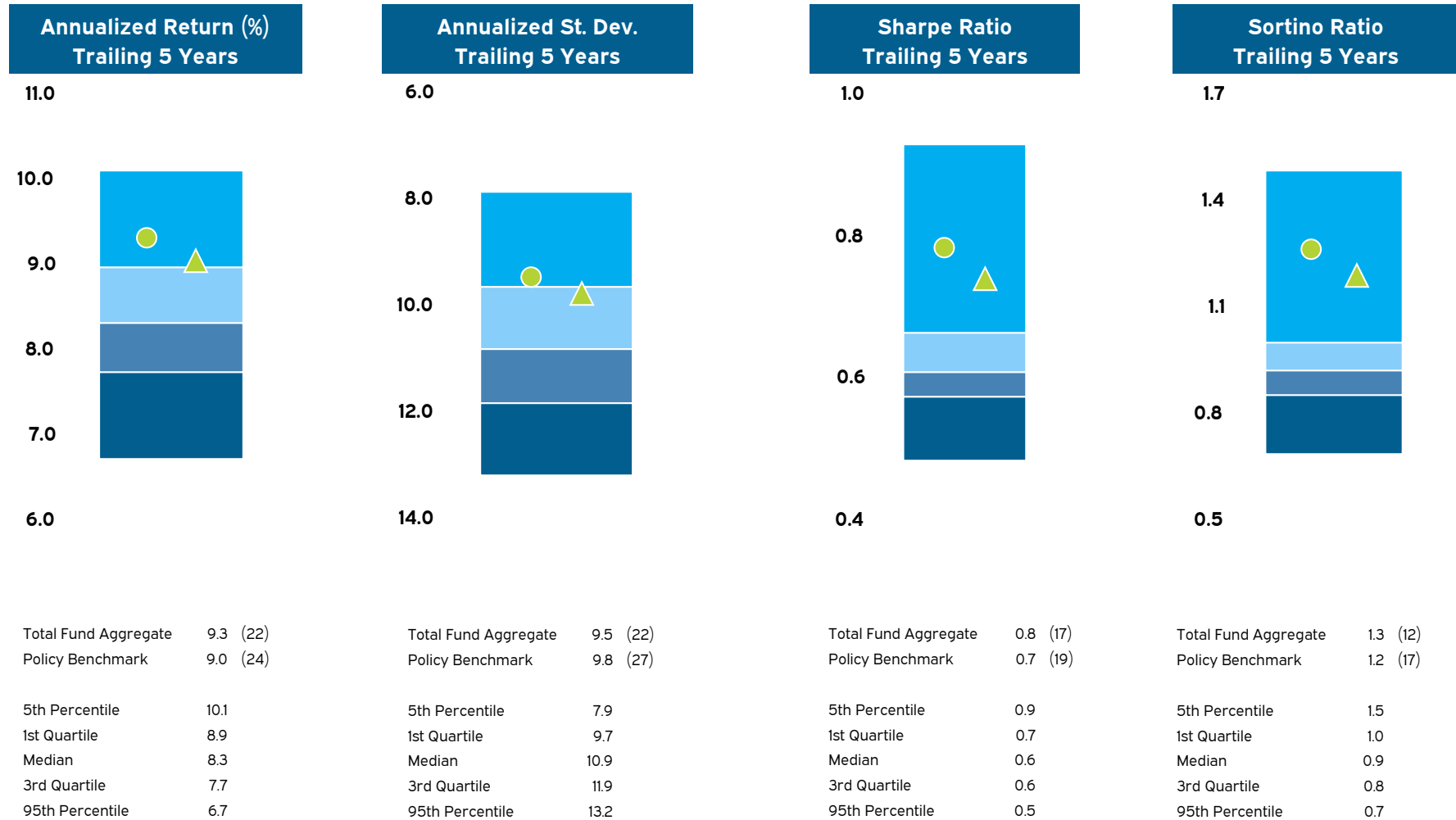
Data are compared to the InvMetrics Public DB >\$1B Net Universe. Parentheses contain percentile rankings.

Total Fund | As of December 31, 2023



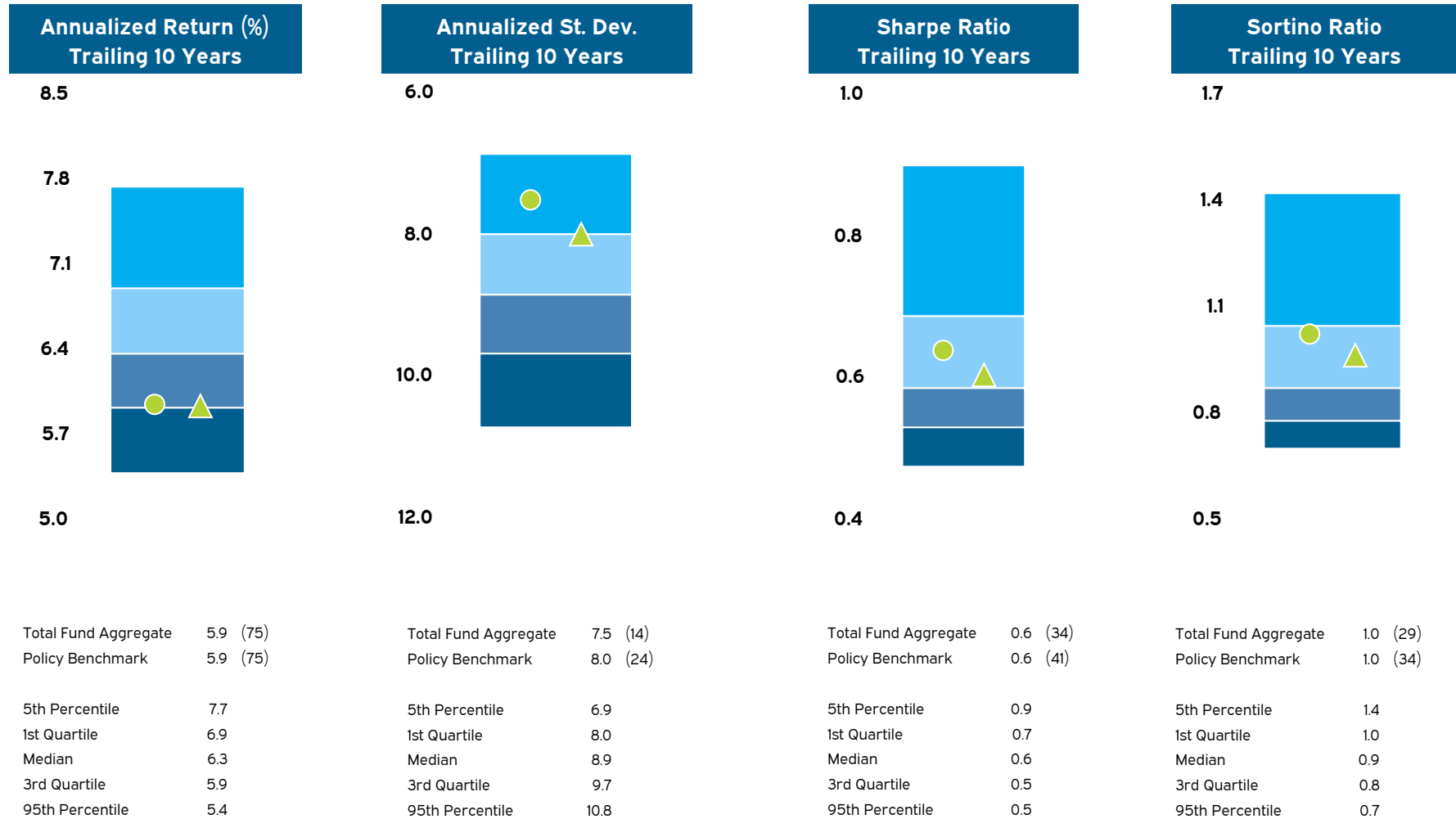
Data are compared to the InvMetrics Public DB >\$1B Net Universe. Parentheses contain percentile rankings.

Total Fund | As of December 31, 2023



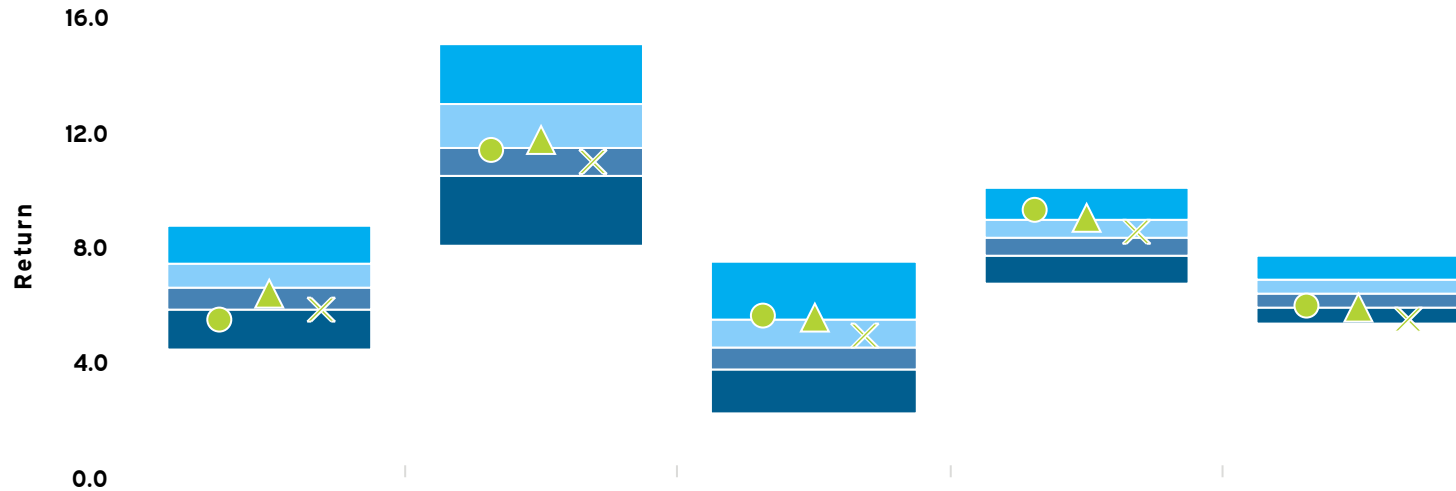
Data are compared to the InvMetrics Public DB >\$1B Net Universe. Parentheses contain percentile rankings.

Total Fund | As of December 31, 2023



Data are compared to the InvMetrics Public DB >\$1B Net Universe. Parentheses contain percentile rankings.

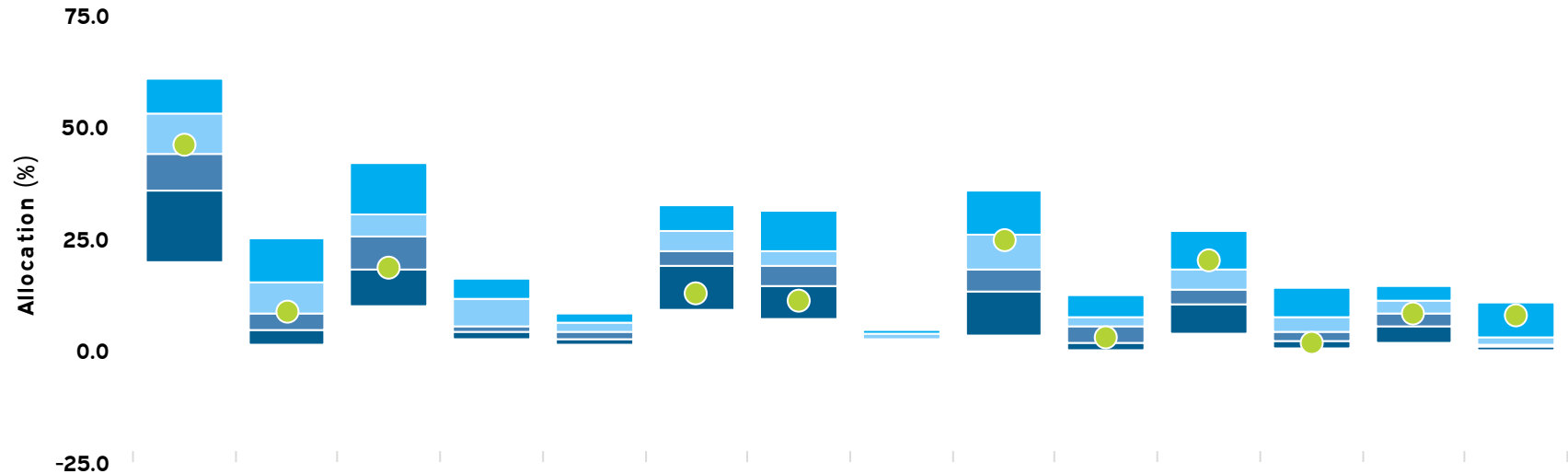
InvMetrics All Public DB Plans > \$1B (net of fees) Return Comparison Ending December 31, 2023



	QTD (%)	1 Yr (%)	3 Yrs (%)	5 Yrs (%)	10 Yrs (%)
● Total Fund Aggregate	5.5 (81)	11.4 (52)	5.6 (23)	9.3 (22)	5.9 (75)
▲ Policy Benchmark	6.4 (58)	11.7 (46)	5.5 (25)	9.0 (24)	5.9 (75)
✕ Investable Benchmark Portfolio	5.8 (76)	10.9 (63)	4.9 (37)	8.5 (45)	5.5 (92)
5th Percentile	8.8	15.0	7.5	10.1	7.7
1st Quartile	7.4	12.9	5.5	8.9	6.9
Median	6.6	11.4	4.5	8.3	6.3
3rd Quartile	5.8	10.5	3.8	7.7	5.9
95th Percentile	4.4	8.1	2.2	6.7	5.4
Population	95	86	74	70	64

Parentheses contain percentile rankings.
Calculation based on monthly periodicity.

Total Plan Allocation vs. InvMetrics All Public DB Plans > \$1B
As of December 31, 2023



	Total Equity	Global Equity	US Equity	Dev'd ex-US Equity	Emg Mkt Equity	Total Fixed Income	US Fixed	Emg Mkt Fixed	Alternat ives	Hedge Funds	Private Equity	Real Assets/Commo d	Total Real Estate	Cash & Equival ents
● Total Fund Aggregate	46.0 (42)	8.7 (46)	18.4 (75)	-	-	12.7 (90)	10.9 (89)	-	24.7 (28)	3.0 (62)	20.0 (19)	1.7 (84)	8.0 (50)	7.7 (9)
5th Percentile	60.7	25.1	41.8	15.9	8.2	32.5	31.0	4.5	35.6	12.1	26.7	13.9	14.2	10.6
1st Quartile	53.1	15.1	30.5	11.4	6.1	26.8	22.3	3.7	25.7	7.6	17.9	7.4	11.2	2.8
Median	44.0	8.3	25.6	5.5	4.1	22.2	18.9	2.5	18.0	5.2	13.3	4.2	8.0	1.4
3rd Quartile	35.7	4.6	18.2	4.1	2.4	18.7	14.2	2.4	12.9	1.7	10.2	2.1	5.2	0.7
95th Percentile	19.6	1.4	9.7	2.7	1.2	9.2	7.1	2.1	3.3	0.0	3.8	0.4	1.5	0.2
Population	94	34	92	23	43	95	88	7	80	45	70	52	74	79

Parentheses contain percentile rankings.

Benchmark History

Total Fund Aggregate

3/1/2022	Present	25% MSCI USA IMI NR USD / 12% MSCI World ex USA IMI NR USD / 12% MSCI Emerging Markets IMI NR USD / 21% Private Markets Benchmark / 5% NCREIF-ODCE NR USD / 3% 50% JPM EMBI GD / 50% JPM GBI-EM / 2% Bloomberg US Corporate High Yield TR / 3% SOFR +1.5% / 5% Immunized Cash Flow Benchmark / 2% Bloomberg US Treasury TIPS 0-5 Yr TR / 8% Custom IG Bonds Benchmark / 2% Bloomberg US Treasury Long TR
6/1/2021	2/28/2022	25% MSCI USA IMI NR USD / 12% MSCI World ex USA IMI NR USD / 12% MSCI Emerging Markets IMI NR USD / 21% Private Markets Benchmark / 5% NCREIF-ODCE NR USD / 3% 50% JPM EMBI GD / 50% JPM GBI-EM / 2% Bloomberg US Corporate High Yield TR / 3% LIBOR 3-Month +1.5% / 5% Immunized Cash Flow Benchmark / 2% Bloomberg US Treasury TIPS 0-5 Yr TR / 8% Custom IG Bonds Benchmark / 2% Bloomberg US Treasury Long TR
4/1/2020	5/31/2021	25% MSCI USA IMI NR USD / 12% MSCI World ex USA IMI NR USD / 12% MSCI Emerging Market IMI Net / 21% Private Markets Benchmark / 3% 50% JPM EMBI GD / 50% JPM GBI-EM / 2% Bloomberg US Corporate High Yield TR / 5% Immunized Cash Flows Benchmark / 3% Market Neutral Strategies Benchmark / 5% NCREIF-ODCE / 2% Bloomberg US Govt Long TR / 2% Bloomberg US Treasury TIPS 0-5 Yr TR / 8% Custom IG Bonds Benchmark
12/1/2019	3/31/2020	13% MSCI USA IMI NR USD / 10% MSCI World ex USA IMI NR USD / 12% MSCI Emerging Market IMI Net / 23% Private Markets Benchmark / 3% 50% JPM EMBI GD / 50% JPM GBI-EM / 15% ICE BofA 91 Days T-Bills TR / 5% Immunized Cash Flows Benchmark / 7% Market Neutral Strategies Benchmark / 5% NCREIF-ODCE / 2% Bloomberg Commodity Index TR USD / 2% Bloomberg US Treasury TIPS 0-5 Yr TR / 3% BBgBarc Global Aggregate TR
11/1/2019	11/30/2019	13% MSCI USA IMI NR USD / 10% MSCI World ex USA IMI NR USD / 12% MSCI Emerging Market IMI Net / 23% Private Markets Benchmark / 3% 50% JPM EMBI GD / 50% JPM GBI-EM / 18% ICE BofA 91 Days T-Bills TR / 5% Immunized Cash Flows Benchmark / 7% Market Neutral Strategies Benchmark / 5% NCREIF-ODCE / 2% Bloomberg Commodity Index TR USD / 2% Bloomberg US Treasury TIPS 0-5 Yr TR
10/1/2019	10/31/2019	13% MSCI USA IMI NR USD / 7% MSCI World ex USA IMI NR USD / 10% MSCI Emerging Market IMI Net / 25% Private Markets Benchmark / 5% 50% JPM EMBI GD / 50% JPM GBI-EM / 18% ICE BofA 91 Days T-Bills TR / 5% Immunized Cash Flows Benchmark / 7% Market Neutral Strategies Benchmark / 5% NCREIF-ODCE / 3% Bloomberg Commodity Index TR USD / 2% Bloomberg US Treasury TIPS 0-5 Yr TR
10/1/2018	9/30/2019	13% MSCI USA IMI NR USD / 7% MSCI World ex USA IMI NR USD / 10% MSCI Emerging Market IMI Net / 25% Private Markets Benchmark / 3% 50% JPM EMBI GD / 50% JPM GBI-EM / 20% ICE BofA 91 Days T-Bills TR / 5% Immunized Cash Flows Benchmark / 7% Market Neutral Strategies Benchmark / 5% NCREIF-ODCE / 3% Bloomberg Commodity Index TR USD / 2% Bloomberg US Treasury TIPS 0-5 Yr TR
11/1/2017	9/30/2018	28% MSCI ACWI IMI Net USD / 9% Cambridge PE Composite BM / 33% Fixed Income Custom Benchmark / 6% S&P Global Leveraged Loan Index +2% / 8% NCREIF Property Index / 4% Bloomberg Commodity Index TR USD / 1% DJ Brookfield Global Infrastructure Net TR USD / 11% HFRI Macro (Total) Index
7/1/2015	10/31/2017	28% MSCI ACWI IMI Net USD / 9% Cambridge Associates Private Equity Composite / 19% Fixed Income Custom Benchmark / 5% S&P Global Leveraged Loan Index +2% / 7% NCREIF Property Index / 6% Bloomberg Commodity Index TR USD / 5% DJ Brookfield Global Infrastructure Net TR USD / 5% S&P Global LargeMidCap Commodity and Resources GR USD / 11% HFRI Macro (Total) Index / 5% 60/40 MSCI ACWI IMI/BC Global

Low Cost Passive Benchmark

6/1/2021	Present	25% MSCI USA IMI NR USD / 12% MSCI World ex USA IMI NR USD / 12% MSCI Emerging Markets IMI NR USD / 12% Russell 3000 / 3% BBgBarc US Aggregate TR / 3% S&P Global Natural Resources / 3% 50% JPM EMBI GD / 50% JPM GBI-EM / 2% BBgBarc US Corporate High Yield TR / 8% FTSE EPRA/NAREIT Global NR USD / 2% BBgBarc US Treasury Long TR / 5% BBgBarc Gov/Credit 1-3 Yr / 3% LIBOR 3-Month / 2% BBgBarc US Treasury TIPS 0-5 Yr TR / 8% Custom IG Bonds Benchmark
4/1/2020	5/31/2021	25% MSCI USA IMI NR USD / 12% MSCI World ex USA IMI NR USD / 12% MSCI Emerging Market IMI Net / 10% Russell 3000 / 11% BBgBarc US Aggregate TR / 2% BBgBarc US Corporate High Yield TR 8% / 3% FTSE EPRA/NAREIT Global NR USD / 2% BBgBarc US Govt Long TR / 5% ICE BofAML 91 Days T-Bills TR / 3% 3-Month Libor +1% / 2% BBgBarc US Treasury TIPS 0-5 Yr TR
12/1/2019	3/31/2020	13% MSCI USA IMI NR USD / 10% MSCI World ex USA IMI NR USD / 12% MSCI Emerging Market IMI Net / 13% Russell 3000 / 7% BBgBarc US Aggregate TR / 8% FTSE EPRA/NAREIT Global NR USD / 3% S&P Global Natural Resources Net USD / 5% 50% JPM EMBI GD / 50% JPM GBI-EM / 5% ICE BofAML 91 Days T-Bills TR / 7% 3-Month Libor +1% / 2% BBgBarc US Treasury TIPS 0-5 Yr TR / 2% Bloomberg Commodity Index TR USD / 15% BBgBarc US Govt/Credit 1-3 Yr. TR
11/1/2019	11/30/2019	13% MSCI USA IMI NR USD / 10% MSCI World ex USA IMI NR USD / 12% MSCI Emerging Market IMI Net / 13% Russell 3000 / 7% BBgBarc US Aggregate TR / 8% FTSE EPRA/NAREIT Global NR USD / 3% S&P Global Natural Resources Net USD / 5% 50% JPM EMBI GD / 50% JPM GBI-EM / 5% ICE BofAML 91 Days T-Bills TR / 7% 3-Month Libor +1% / 2% BBgBarc US Treasury TIPS 0-5 Yr TR / 2% Bloomberg Commodity Index TR USD / 18% BBgBarc US Govt/Credit 1-3 Yr. TR
10/1/2019	10/31/2019	13% MSCI USA IMI NR USD / 7% MSCI World ex USA IMI NR USD / 10% MSCI Emerging Market IMI Net / 15% Russell 3000 / 4% BBgBarc US Aggregate TR / 8% FTSE EPRA/NAREIT Global NR USD / 3% S&P Global Natural Resources Net USD / 5% 50% JPM EMBI GD / 50% JPM GBI-EM / 5% ICE BofAML 91 Days T-Bills TR / 7% 3-Month Libor +1% / 2% BBgBarc US Treasury TIPS 0-5 Yr TR / 3% Bloomberg Commodity Index TR USD / 18% BBgBarc US Govt/Credit 1-3 Yr. TR
10/1/2018	9/30/2019	13% MSCI USA IMI NR USD / 10% MSCI World ex USA IMI NR USD / 13% MSCI Emerging Market IMI Net / 12% Russell 3000 / 4% BBgBarc US Aggregate TR / 8% FTSE EPRA/NAREIT Global NR USD / 3% S&P Global Natural Resources Net USD / 3% 50% JPM EMBI GD / 50% JPM GBI-EM / 5% ICE BofAML 91 Days T-Bills TR / 5% 3-Month Libor +1% / 2% BBgBarc US Treasury TIPS 0-5 Yr TR / 2% Bloomberg Commodity Index TR USD / 3% FTSE WGBI ex US TR/17% BBgBarc US Govt/Credit 1-3 Yr. TR

Growth		
6/1/2021	Present	65.33% Public Equity Benchmark / 28.0% Private Markets Benchmark / 4.0% 50% JPM EMBI GD / 50% JPM GBI-EM / 2.67% BBgBarc US Corporate High Yield TR
4/1/2020	5/31/2021	65.33% Public Equity Benchmark / 28% Private Markets Benchmark / 6.67% 50% JPM EMBI GD / 50% JPM GBI-EM / 4.08% BBgBarc US Corporate High Yield TR
11/1/2019	3/31/2020	57.38% Public Equity Benchmark / 37.7% Private Markets Benchmark / 4.92% 50% JPM EMBI GD / 50% JPM GBI-EM
10/1/2019	10/31/2019	50% Public Equity Benchmark / 41.67% Private Markets Benchmark / 8.33% 50% JPM EMBI GD / 50% JPM GBI-EM
10/1/2018	9/30/2019	51.73% Public Equity Benchmark / 43.1% Private Markets Benchmark / 5.17% 50% JPM EMBI GD / 50% JPM GBI-EM
11/1/2017	9/30/2018	51.29% MSCI ACWI IMI Net USD / 16.48% Cambridge PE Composite BM / 10.99% S&P Global Leveraged Loan Index +2% / 7.33% NCREIF Property Index / 60.4% 50% JPM EMBI GD (US) / 50% JPM GBIEM GD (Lcl) / 60.4% 50% BAML Global HY / 50% S&P Global Leveraged Loan / 1.83% DJ Brookfield Global Infrastructure Net TR USD
7/1/2015	10/31/2017	47.23% MSCI ACWI IMI Net USD / 15.18% Cambridge PE Composite BM / 8.43% S&P Global Leveraged Loan Index +2% / 8.43% DJ Brookfield Global Infrastructure Net TR USD / 8.43% S&P Global Natural Resources Index TR USD / 5.9% NCREIF Property Index / 3.2% 50% JPM EMBI GD (US) / 50% JPM GBIEM GD (Lcl) / 3.2% 50% BAML Global HY / 50% S&P Global Leveraged Loan
Public Equity		
6/1/2021	Present	51.02% MSCI USA IMI NR USD / 24.49% MSCI World ex USA IMI NR USD / 24.49% MSCI Emerging Market IMI NR USD
4/1/2020	5/31/2021	51.02% MSCI USA IMI NR USD / 24.49% MSCI World ex USA IMI NR USD / 24.49% MSCI Emerging Market IMI Net
11/1/2019	3/31/2020	37.14% MSCI USA IMI NR USD / 28.57% MSCI World ex USA IMI NR USD / 34.29% MSCI Emerging Market IMI Net
10/1/2018	10/31/2019	43.33% MSCI USA IMI NR USD / 23.33% MSCI World ex USA IMI NR USD / 33.33% MSCI Emerging Market IMI Net
5/1/2010	9/30/2018	MSCI ACWI IMI Net USD
Global Equity		
7/1/2015	Present	MSCI ACWI IMI NR USD
US Equity		
7/1/2015	Present	MSCI USA IMI NR USD
International Equity		
7/1/2015	Present	MSCI World ex USA IMI NR USD
Emerging Markets Equity		
7/1/2015	Present	MSCI Emerging Markets IMI NR USD

Marketable Alternative Equity		
10/1/2014	Present	HFRI Equity Hedge (Total) Index
Private Markets		
7/1/2015	Present	Private Markets
Private Markets ex Russell 3000		
No Benchmark Selected		
Private Equity		
10/1/2023	Present	Custom Private Equity BM (100% Cambridge US PE)
1/1/2006	9/30/2023	Burgiss PE
Private Equity ex Russell 3000		
7/1/2018	9/30/2021	Cambridge Associates Global Private Equity Index
Northern Trust Russell 3000		
6/1/2018	Present	Russell 3000
Private Debt		
12/1/2010	Present	S&P Global Leveraged Loan Index +2%
Growth Real Estate		
7/1/2015	Present	NCREIF Property Index
Private Real Assets		
No Benchmark Selected		
Emerging Markets Debt		
7/1/2015	Present	50% JP Morgan GBI EM Global Diversified TR USD / 50% JP Morgan EMBI Global Diversified
High Yield Bonds		
6/1/2020	Present	BBgBarc US Corporate High Yield TR
Low Beta		
4/1/2020	Present	62.5% Immunized Cash Flows Benchmark / 37.5% Market Neutral Strategies Benchmark
12/1/2019	3/31/2020	55.56% ICE BofA 91 Days T-Bills TR / 25.93% Immunized Cash Flows Benchmark / 18.52% Market Neutral Strategies Benchmark
10/1/2019	11/30/2019	60% ICE BofA 91 Days T-Bills TR / 23.33% Immunized Cash Flows Benchmark / 6.67% Market Neutral Strategies Benchmark
10/1/2018	9/30/2019	62.5% ICE BofA 91 Days T-Bills TR / 15.62% Immunized Cash Flows Benchmark / 21.88% Market Neutral Strategies Benchmark
7/1/2015	9/30/2018	HFRI Macro (Total) Index

Short-Term IG Bonds		
10/1/2018	Present	91 Day T-Bills
Immunized Cash Flows		
10/1/2018	Present	Immunized Cash Flows
Market Neutral Strategies		
3/1/2022	Present	SOFR + 1.5%
6/1/2021	2/28/2022	LIBOR 3-Month +1.5%
10/1/2018	5/31/2021	3-Month Libor Total Return USD
11/1/2012	9/30/2018	HFRI Macro (Total) Index
Macro		
10/1/2014	Present	HFRI Macro (Total) Index
Relative Value		
10/1/2014	Present	HFRI Relative Value (Total) Index
Cash		
1/1/2006	Present	ICE BofA 91 Days T-Bills TR
Other		
6/1/2021	Present	29.41% NCREIF ODCE Value Weighted (Net) (1 Qtr Lag) / 47.06% Custom IG Bonds Benchmark / 11.76% BBgBarc US Treasury Long TR / 11.76% BBgBarc US Treasury TIPS 0-5 Yr TR
4/1/2020	5/31/2021	29.41% NCREIF ODCE Equal Weighted / 47.06% Custom IG Bonds Benchmark / 11.76% BBgBarc US Govt Long TR / 11.76% BBgBarc US Treasury TIPS 0-5 Yr TR
12/1/2019	3/31/2020	41.67% NCREIF-ODCE / 16.67% Bloomberg Commodity Index TR USD / 16.67% BBgBarc U.S. TIPS 0-5 Years / 25% BBgBarc Global Aggregate TR
11/1/2019	11/30/2019	55.55% NCREIF-ODCE / 22.22% Bloomberg Commodity Index TR USD / 22.22% BBgBarc U.S. TIPS 0-5 Years
10/1/2018	10/31/2019	50% NCREIF-ODCE / 30% Bloomberg Commodity Index TR USD / 20% BBgBarc U.S. TIPS 0-5 Years
11/1/2017	9/30/2018	76.74% BBgBarc Global Aggregate TR / 11.63% NCREIF Property Index / 11.63% Bloomberg Commodity Index TR USD
7/1/2015	10/31/2017	51.18% BBgBarc Global Aggregate TR / 11.78% NCREIF Property Index / 20.2% Bloomberg Commodity Index TR USD / 16.84% 60/40 MSCI ACWI/BBgBarc Global Aggregate
Investment Grade Bonds		
12/1/2019	Present	Custom IG Bonds Benchmark (25% BBgBarc 1-3 Year Government/Credit, 56% US Aggregate, 19% US Securitized MBS/ABS/CMBS)
TIPS		
3/1/2017	Present	100% BBgBarc US Treasury TIPS 0-5 Yr TR

Core Private Real Estate		
6/1/2021	Present	NCREIF ODCE Value Weighted (Net) (1 Qtr Lag)
7/1/2004	5/31/2021	NCREIF ODCE Equal Weighted (Net)
Commodities		
5/1/2010	Present	Bloomberg Commodity Index TR USD
Long Term Government Bonds		
5/1/2020	Present	BBgBarc US Govt Long TR
Core Bonds		
7/1/2015	Present	BBgBarc Global Aggregate TR
Overlay		
11/1/2011	Present	91 Day T-Bills

Glossary and Notes

Credit Risk: Refers to the risk that the issuer of a fixed income security may default (i.e., the issuer will be unable to make timely principal and/or interest payments on the security.)

Duration: Measure of the sensitivity of the price of a bond to a change in its yield to maturity. Duration summarizes, in a single number, the characteristics that cause bond prices to change in response to a change in interest rates. For example, the price of a bond with a duration of three years will rise by approximately 3% for each 1% decrease in its yield to maturity. Conversely, the price will decrease 3% for each 1% increase in the bond's yield. Price changes for two different bonds can be compared using duration. A bond with a duration of six years will exhibit twice the percentage price change of a bond with a three-year duration. The actual calculation of a bond's duration is somewhat complicated, but the idea behind the calculation is straightforward. The first step is to measure the time interval until receipt for each cash flow (coupon and principal payments) from a bond. The second step is to compute a weighted average of these time intervals. Each time interval is measured by the present value of that cash flow. This weighted average is the duration of the bond measured in years.

Information Ratio: This statistic is a measure of the consistency of a portfolio's performance relative to a benchmark. It is calculated by subtracting the benchmark return from the portfolio return (excess return), and dividing the resulting excess return by the standard deviation (volatility) of this excess return. A positive information ratio indicates outperformance versus the benchmark, and the higher the information ratio, the more consistent the outperformance.

Jensen's Alpha: A measure of the average return of a portfolio or investment in excess of what is predicted by its beta or "market" risk. $\text{Portfolio Return} - [\text{Risk Free Rate} + \text{Beta} \times (\text{market return} - \text{Risk Free Rate})]$.

Market Capitalization: For a firm, market capitalization is the total market value of outstanding common stock. For a portfolio, market capitalization is the sum of the capitalization of each company weighted by the ratio of holdings in that company to total portfolio holdings; thus it is a weighted-average capitalization. Meketa Investment Group considers the largest 65% of the broad domestic equity market as large capitalization, the next 25% of the market as medium capitalization, and the smallest 10% of stocks as small capitalization.

Market Weighted: Stocks in many indices are weighted based on the total market capitalization of the issue. Thus, the individual returns of higher market-capitalization issues will more heavily influence an index's return than the returns of the smaller market-capitalization issues in the index.

Maturity: The date on which a loan, bond, mortgage, or other debt/security becomes due and is to be paid off.

Prepayment Risk: The risk that prepayments will increase (homeowners will prepay all or part of their mortgage) when mortgage interest rates decline; hence, investors' monies will be returned to them in a lower interest rate environment. Also, the risk that prepayments will slow down when mortgage interest rates rise; hence, investors will not have as much money as previously anticipated in a higher interest rate environment. A prepayment is any payment in excess of the scheduled mortgage payment.

Price-Book Value (P/B) Ratio: The current market price of a stock divided by its book value per share. Meketa Investment Group calculates P/B as the current price divided by Compustat's quarterly common equity. Common equity includes common stock, capital surplus, retained earnings, and treasury stock adjusted for both common and nonredeemable preferred stock. Similar to high P/E stocks, stocks with high P/B's tend to be riskier investments.

Price-Earnings (P/E) Ratio: A stock's market price divided by its current or estimated future earnings. Lower P/E ratios often characterize stocks in low growth or mature industries, stocks in groups that have fallen out of favor, or stocks of established blue chip companies with long records of stable earnings and regular dividends. Sometimes a company that has good fundamentals may be viewed unfavorably by the market if it is an industry that is temporarily out of favor. Or a business may have experienced financial problems causing investors to be skeptical about its future. Either of these situations would result in lower relative P/E ratios. Some stocks exhibit above-average sales and earnings growth or expectations for above average growth. Consequently, investors are willing to pay more for these companies' earnings, which results in elevated P/E ratios. In other words, investors will pay more for shares of companies whose profits, in their opinion, are expected to increase faster than average. Because future events are in no way assured, high P/E stocks tend to be riskier and more volatile investments. Meketa Investment Group calculates P/E as the current price divided by the I/B/E/S consensus of twelve-month forecast earnings per share.

Quality Rating: The rank assigned a security by such rating services as Fitch, Moody's, and Standard & Poor's. The rating may be determined by such factors as (1) the likelihood of fulfillment of dividend, income, and principal payment of obligations; (2) the nature and provisions of the issue; and (3) the security's relative position in the event of liquidation of the company. Bonds assigned the top four grades (AAA, AA, A, BBB) are considered investment grade because they are eligible bank investments as determined by the controller of the currency.

Sharpe Ratio: A commonly used measure of risk-adjusted return. It is calculated by subtracting the risk free return (usually three-month Treasury bill) from the portfolio return and dividing the resulting excess return by the portfolio's total risk level (standard deviation). The result is a measure of return per unit of total risk taken. The higher the Sharpe ratio, the better the fund's historical risk adjusted performance.

STIF Account: Short-term investment fund at a custodian bank that invests in cash-equivalent instruments. It is generally used to safely invest the excess cash held by portfolio managers.

Standard Deviation: A measure of the total risk of an asset or a portfolio. Standard deviation measures the dispersion of a set of numbers around a central point (e.g., the average return). If the standard deviation is small, the distribution is concentrated within a narrow range of values. For a normal distribution, about two thirds of the observations will fall within one standard deviation of the mean, and 95% of the observations will fall within two standard deviations of the mean.

Style: The description of the type of approach and strategy utilized by an investment manager to manage funds. For example, the style for equities is determined by portfolio characteristics such as price-to-book value, price-to-earnings ratio, and dividend yield. Equity styles include growth, value, and core.

Tracking Error: A divergence between the price behavior of a position or a portfolio and the price behavior of a benchmark, as defined by the difference in standard deviation.

Yield to Maturity: The yield, or return, provided by a bond to its maturity date; determined by a mathematical process, usually requiring the use of a “basis book.” For example, a 5% bond pays \$5 a year interest on each \$100 par value. To figure its current yield, divide \$5 by \$95—the market price of the bond—and you get 5.26%. Assume that the same bond is due to mature in five years. On the maturity date, the issuer is pledged to pay \$100 for the bond that can be bought now for \$95. In other words, the bond is selling at a discount of 5% below par value. To figure yield to maturity, a simple and approximate method is to divide 5% by the five years to maturity, which equals 1% pro rata yearly. Add that 1% to the 5.26% current yield, and the yield to maturity is roughly 6.26%.

$$\frac{5\% \text{ (discount)}}{5 \text{ (yrs. to maturity)}} = 1\% \text{ pro rata, plus } 5.26\% \text{ (current yield)} = 6.26\% \text{ (yield to maturity)}$$

Yield to Worst: The lowest potential yield that can be received on a bond without the issuer actually defaulting. The yield to worst is calculated by making worst-case scenario assumptions on the issue by calculating the returns that would be received if provisions, including prepayment, call, or sinking fund, are used by the issuer.

NCREIF Property Index (NPI): Measures unleveraged investment performance of a very large pool of individual commercial real estate properties acquired in the private market by tax-exempt institutional investors for investment purposes only. The NPI index is capitalization-weighted for a quarterly time series composite total rate of return.

NCREIF Fund Index - Open End Diversified Core Equity (NFI-ODCE): Measures the investment performance of 28 open-end commingled funds pursuing a core investment strategy that reflects funds' leverage and cash positions. The NFI-ODCE index is equal-weighted and is reported gross and net of fees for a quarterly time series composite total rate of return.

Sources: Investment Terminology, International Foundation of Employee Benefit Plans, 1999.

The Handbook of Fixed Income Securities, Fabozzi, Frank J., 1991

The Russell Indices®, TM, SM are trademarks/service marks of the Frank Russell Company.

Throughout this report, numbers may not sum due to rounding.

Returns for periods greater than one year are annualized throughout this report.

Values shown are in millions of dollars, unless noted otherwise.