



**FIDUCIENT**  
Advisors

Helping Clients Prosper

## City of Burlington Employees Retirement System

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### Quarterly Investment Review - Fourth Quarter 2022

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# Fiducient Advisors Update



## Retirement Plans

### Featured Insights

- Webcast: Current Trends in Target Date Fund Litigation
- Blog: Final Rule Grants Fiduciaries Greater Flexibility When Considering ESG Options

### Coming Soon

- Plan Sponsor Newsletter
- Pension Healthcare Webcast



## Endowments & Foundations

### Featured Insights

- Nonprofit Investment Stewards Podcast

### Coming Soon

- Steward Newsletter
- Mission-Aligned Investing Update



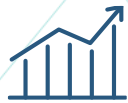
## The Wealth Office®

### Featured Insights

- 10 Planning Opportunities to Consider Before Year-End
- Blog: Cozy Up to a Good Book

### Coming Soon

- Financial Planning Considerations Paper
- Financial Planning Webcast



## Research Insights

- Monthly Market Recaps
- Monthly Market Updates
  - *A Pivot to Pause* – November
  - *Bear Hunting* – October
- *2023 Outlook – Goodbye TINA (there is no alternative)*
- Blog: FTX – Lessons Learned from a Lack of Due Diligence
- Webcast: Fiducient Speaker Series with Greg Valliere
- Video: Third Quarter 2022 Update

**SAVE THE DATE!**

**2023 Investor Conference**

**September 26-27**

**Boston**

**Westin Copley Center**

**Reserve your room today:**

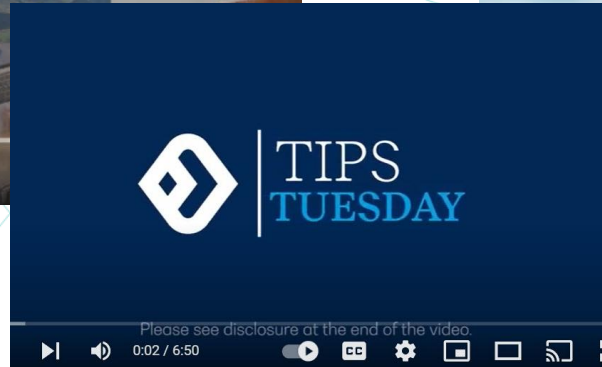
<https://book.passkey.com/event/50425437/owner/251/home>



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## 2022 New Associates – Welcome!

- Ikbir Bassi, Performance Analyst
- Ian Bradley, Senior Research Associate
- Lori Cahill, Finance Billing Specialist
- Celina Cheng, Performance Analyst
- Owen Graham, Performance Analyst
- Federico Lascano, Research Analyst
- Marycarmen Nevarez, Consultant
- Hamza Rangwala, Client Service Associate, The Wealth Office®
- Louis Ressler, Senior Consultant
- Colin Schorsch, Consulting Analyst
- Marc Seskin, Marketing Associate
- Krishma Sharma, Consulting Analyst, The Wealth Office®
- Michael Shevlin, Senior Accountant
- Eric Stanley, Data Operations Analyst
- Joel Urbina, Consulting Analyst

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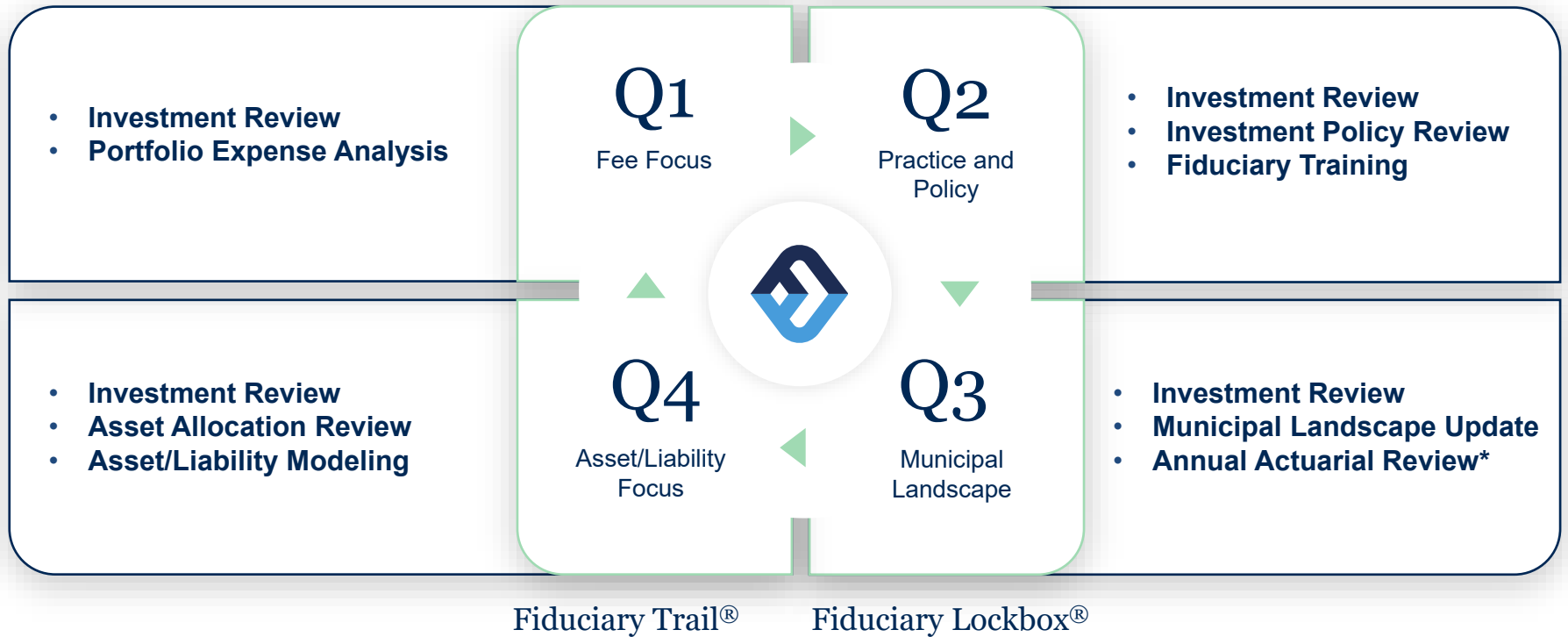
Section 1	Fiduciary Governance Calendar
Section 2	Capital Markets Overview
Section 3	Portfolio and Manager Review



## Fiduciary Governance Calendar



# Fiduciary Governance Calendar



\*Timing of actuarial review is dependent on client's individual plan and/or fiscal year and actuarial input.



# 2023 Themes

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- As captured in our [2023 Outlook – Goodbye TINA](#), the three themes we see driving the market in the coming year are persistent volatility, moderating inflation, and a bear market bottom.
  - **Persistent Volatility**
    - The 10+ years leading up to 2022 were characterized by low interest rates, low inflation, and low growth alongside accommodative policy. This environment resulted in abnormally low volatility.
    - The shifts we saw in 2022 will likely produce higher structural volatility on a go-forward basis.
  - **Moderating Inflation**
    - We have seen evidence that inflation is falling. While inflation is unlikely to drop to the Fed's target rate of 2% within the coming calendar year, a continued downward trajectory will likely have a positive impact on market sentiment.
  - **Bear Market Bottom**
    - We don't attempt to time the markets. That being said, the historical pattern of bear markets is multiple contraction first, followed by earnings contraction.
      - ✓ Multiple contraction accounted for more than 100% of the 2022 market pullback, as earnings remained modestly positive.
      - ✓ Late 2022 data is beginning to reflect negative earnings (ex-energy).
    - An earnings contraction, along with the expectation of a less hawkish Fed, suggests the current bear market may be nearer its end than its beginning.

# 2023-2042 Twenty-Year Outlook



		2023	2022	Y / Y Change	
Fixed Income	The 2022 pull back in fixed income was painful, but it has also sowed the seeds for opportunity going forward. Yields across many fixed income sectors are multiple times higher from year-end 2021 producing greater opportunity for meaningfully higher returns in the years to come. Additionally, the diversifying principles of fixed income with recharged yields makes owning fixed income and duration more compelling than it was in 2022 and doing so may add to portfolio resiliency going forward.	U.S. Bonds	5.0%	2.4%	2.6%
		TIPS	4.6%	2.1%	2.5%
		Dynamic Bonds <sup>1</sup>	5.6%	2.8%	2.8%
		High Yield Bonds	7.1%	5.6%	1.5%
		Global Bonds	5.1%	2.2%	2.9%
		Muni Bond <sup>2</sup>	5.8%	2.1%	3.7%
		Muni High Yield	9.9%	5.6%	4.3%
Global Equity	Our global equity outlook has improved, bolstered by more attractive valuations. U.S. valuations are near averages relative to history while International and Emerging Markets remains more attractive, but with elevated risks.	U.S. All Cap	6.7%	6.8%	-0.1%
		Intl Developed Equity	8.9%	8.6%	0.3%
		Emerging Markets	10.8%	10.5%	0.3%
Real Assets & Alternatives	A continued bid for inflationary assets and more attractive valuations across some subsets of assets contributed to higher forecasts.	Real Estate	6.4%	6.3%	0.1%
		Broad Real Assets <sup>3</sup>	6.8%	5.6%	1.2%
	The opportunity set for marketable alternatives rose with more attractive valuations in both global equities and fixed income.	Marketable Alts	8.1%	6.8%	1.3%
		Private Equity	9.7%	9.8%	-0.1%

1) Dynamic bonds are a blend of 33% Cash, 33% Corp HY, and 34% Global Bonds. 2) Tax Equivalent yield based on highest marginal Federal tax rate (37%). 3) Broad Real Assets is 20% REITS, 20% Global Infrastructure, 20% Commodities, 20% US Bonds, 15% Corp High Yield, 5% TIPS Outputs and opinions are as of the date referenced and are subject to change based on market or economic conditions. Information is intended for general information purposes only and does not represent any specific investment recommendation. Please consult with your advisor, attorney and accountant, as appropriate, regarding specific advice. There is no guarantee that any of these expectations will become actual results. For additional information on forecast methodologies, please speak with your advisor. Please see Index Proxy Summary slide at the end of this presentation for summary of indices used to represent each asset class. Past performance does not indicate future performance and there is a possibility of a loss. Please see the Frontier Engineer Hypothetical Performance Disclosures at the end of the presentation for additional information.





# Asset Allocation Analysis

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- We believe **Asset Allocation** is the primary determinant of long-term investment results.
- Our propriety **Frontier Engineer**<sup>®</sup> system is the cornerstone of asset allocation decisions.
- Our Capital Markets Group develops **Capital Market Assumptions** (CMAs) for each major asset class at least annually.
  - ✓ The Capital Markets Group considers and analyzes a wide variety of factors that we believe will have the greatest impact on future returns and risks for each asset class studied.
  - ✓ Our CMAs are not intended to predict the future return in any single year, but rather to reflect our median expected outcome over the next ten years.
  - ✓ Our forecasting efforts center on a **ten-year horizon**. Any adjustments made to extend the forecast horizon to **twenty years** or beyond are grounded in our expectation that asset classes ultimately mean revert towards longer term historical averages.
  - ✓ Fiducient Advisors' Capital Markets Team develop our CMAs based on a “building block” approach outlined in our white paper “Capital Market Forecasts”. (Copies are available upon requested.)
- **Correlations** (how asset classes behave in reference to one another) also significantly impact asset allocation analysis.
- **Fat Tails** (non-normal return elements of skewness & kurtosis) also meaningfully impact our asset allocation analysis.



## Capital Markets Overview

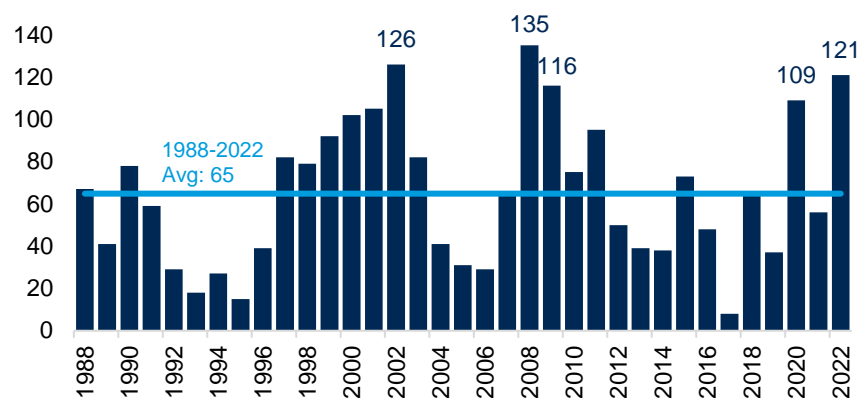


# Market Themes

1. High inflation, which catalyzed the Fed's hike campaign, fears of recession and geopolitical risks all contributed to the elevated volatility environment in 2022. We expect volatility to persist in 2023 and the abnormally low volatility regime of the last decade may be over.
2. Returns in 2022 were driven by multiple compression, which typically precede earnings declines in the business cycle. While difficult to call the bottom, we believe we are closer to the bear market end rather than the beginning.
3. The Bloomberg Agg Bond Index had its worst year on record, but the pain from falling prices pushed yields to levels not seen in nearly 15 years making prospective fixed income returns more compelling.

## Number Of Days With S&P 500 Return At Least +/- 1%

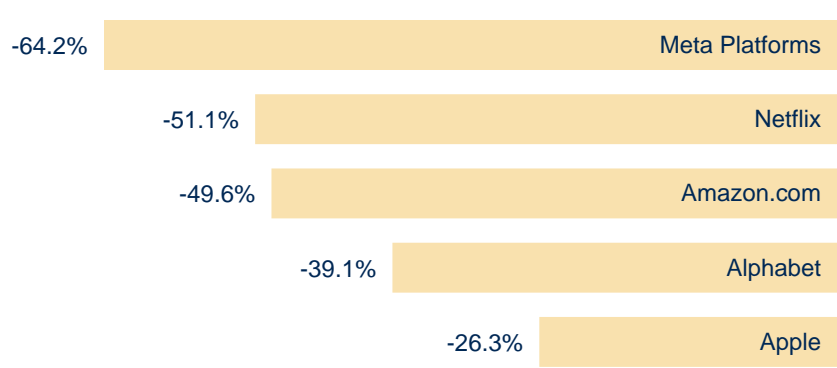
The S&P 500 had the most days of moving at least +/- one percent since the global financial crisis in 2008.



Sources: Fiducient Advisors analysis, Morningstar Direct. As of December 31, 2022.

## FAANG Stocks Performance 2022

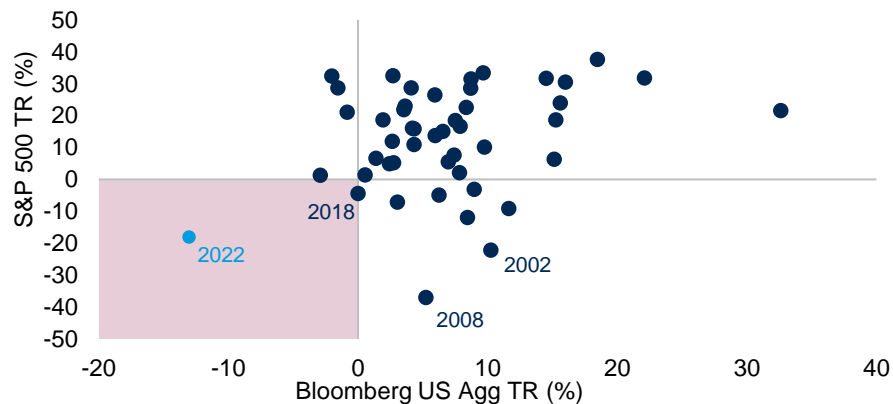
Multiple compression has been the driver of performance this year for equities and many higher P/E stocks have re-rated materially lower. The S&P 500 has seen modest earnings growth this year, however, if the energy component is removed, earnings for the S&P 500 are expected to decline by 1.8 percent in 2022.



Sources: Morningstar Direct, FactSet. As of December 31, 2022.

## Nowhere To Hide In 2022 – Equity vs. Fixed Income Returns

2022 was the first year on record where both the Bloomberg Agg and S&P 500 indices experienced negative returns. The traditional diversification benefits of fixed income were muted in 2022, but with interest rates higher we expect this paradigm to revert to historical norms.



Source: Morningstar Direct. Calendar year data 1976 to 2022.

See disclosures for list of indices representing each asset class. Past performance does not indicate future performance and there is a possibility of a loss.

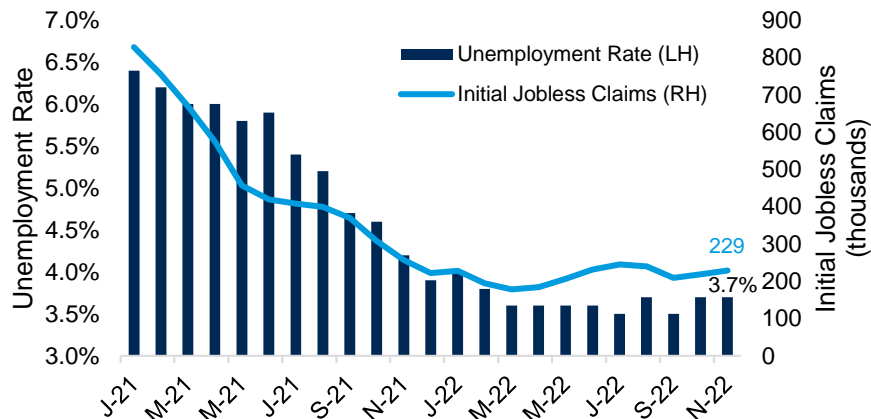
Indices cannot be invested in directly.



# Economic Review

## Tight Labor Market

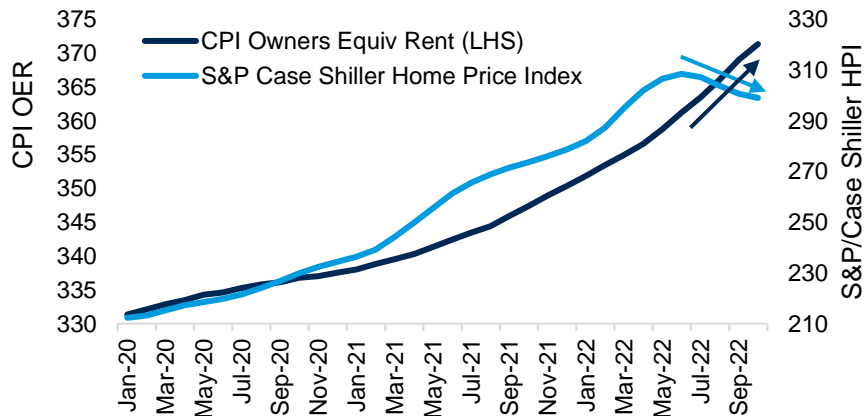
The U.S. labor market has been resilient, providing a solid foundation for the U.S. consumer, the backbone of the economy. However, strong labor data may support further Fed action in its effort to combat elevated inflation.



Sources: FactSet, DOL. As of November 30, 2022.

## Will Rents Follow Home Prices?

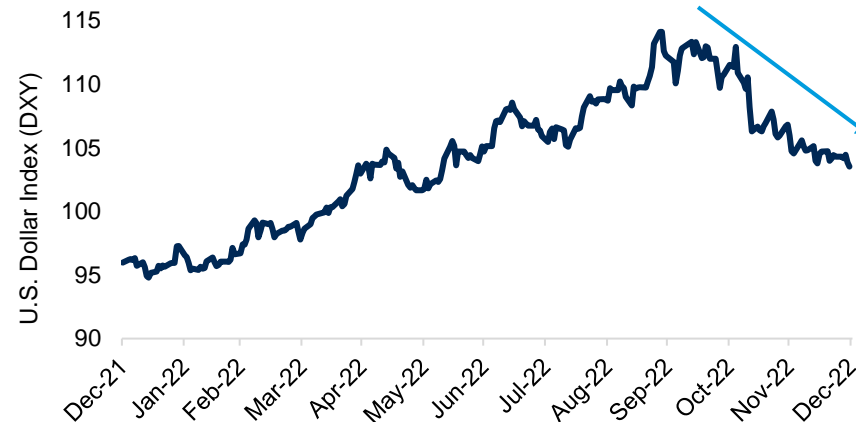
Tighter financial conditions have led to higher mortgages rates and subsequently lower home prices. However, owners equivalent rent, one of the primary components of CPI, has yet to show signs of slowing.



Sources: FactSet, BLS, S&P/Case Shiller. As of October 31, 2022

## U.S. Dollar Falls of Recent Highs

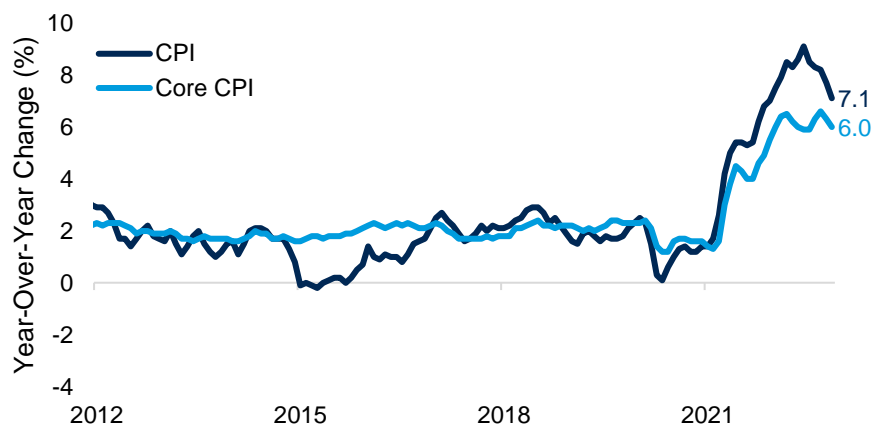
Softening inflation in the U.S., expectations for less hawkish Fed actions, and the BOJ shifting its yield curve control target higher led to a weakening U.S. dollar late in the year; DXY declined 7.7 percent in the fourth quarter.



Source: FactSet. As of December 31, 2022

## U.S. Inflation

Inflation is trending lower. Fed policy impacts prices on a lagged basis and we may see inflation moderate further as its actions work through the system. The shelter component remains a driving factor as rents remain elevated.



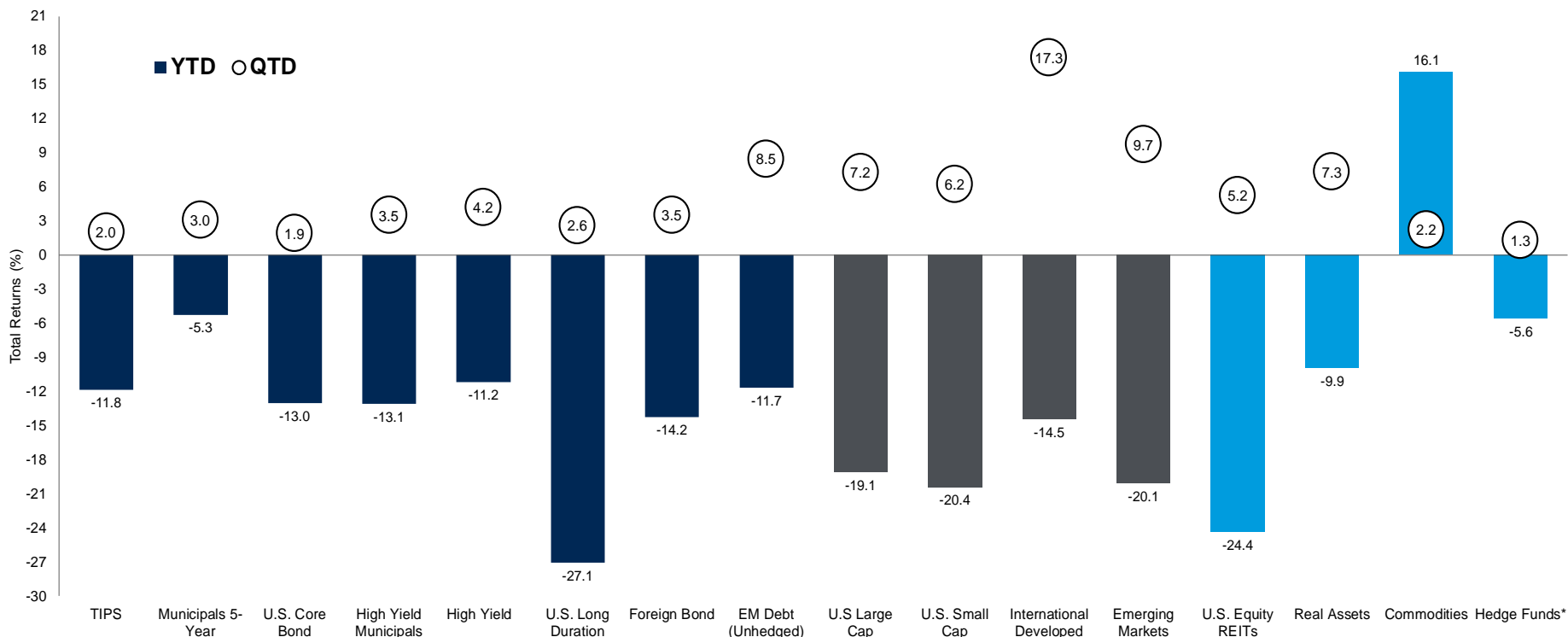
Sources: FactSet, BLS. As of November 30, 2022.

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# Asset Class Returns



Source: Morningstar Direct. As of December 31, 2022. \*Hedge fund returns as of November 30, 2022.

## Fixed Income (4Q)

+ Lower inflation readings mid-quarter pushed rates lower and helped drive fixed income returns for the quarter. The Fed raised rates by 50 basis points in December, marking its seventh increase of the year.

+ Spread sectors generally outpaced governments in the quarter in the risk-on environment. High yield generated favorable returns.

+ A weaker U.S. dollar and favorable news out of emerging countries, in particular China on “zero-Covid”, helped propel non-US bond prices higher.

## Equity (4Q)

+ Risk assets rallied in the fourth quarter, fueled by favorable inflation prints and expectations for subdued central bank action in 2023.

+ International developed markets had a standout quarter. Notable strength came from Europe as energy price concerns diminished and a weakening U.S. dollar provided further support.

+ Clarity around China’s “zero-Covid” policy provided a tailwind for the country and subsequently the broader EM space. Mexico also performed well on the back of positive economic news.

## Real Asset / Alternatives (4Q)

+ Commodity markets rose modestly in the quarter and remain the standout for the calendar year. Industrial and precious metals drove returns, while energy detracted as prices continued to moderate from post-Russia invasion peaks.

+ REITs had a strong quarter. Retail oriented and data centers were among the top contributors while residential REITs declined.

+ Hedge Funds were modestly positive in the quarter and continue to provide favorable results relative to traditional equities and fixed income.

See disclosures for list of indices representing each asset class. Past performance does not indicate future performance and there is a possibility of a loss.

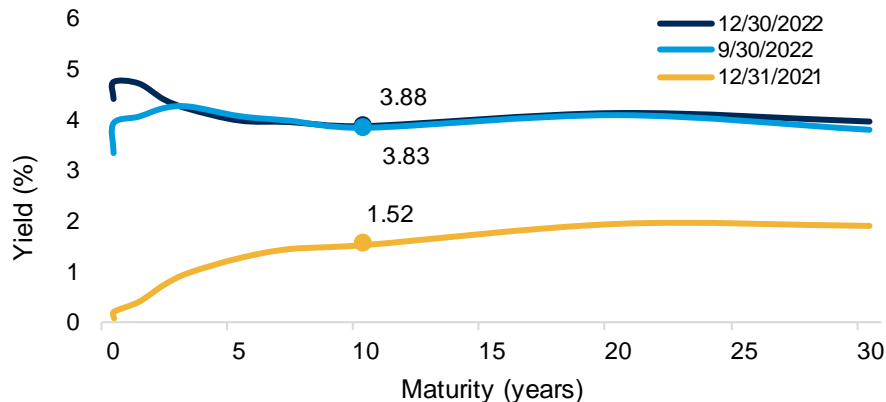
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# Fixed Income Market Update

## U.S. Treasury Yield Curve

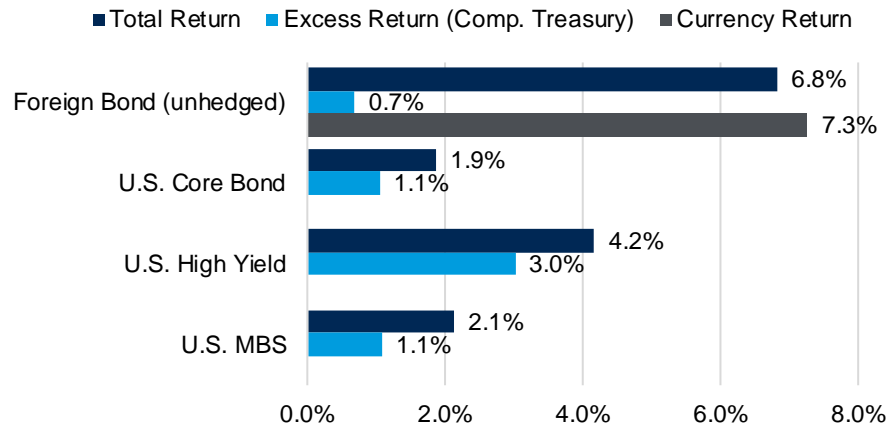
The Fed raised its target rate by 50 basis points in December, capping off the year with its seventh hike for a total of 425 basis points in 2022. Rates were volatile in the quarter as the 10-year pushed past 4.2 percent before falling below 3.7 percent and ultimately ending 5 basis points higher than it started.



Source: FactSet. As of December 30, 2022.

## Index Performance Attribution (4Q 2022)

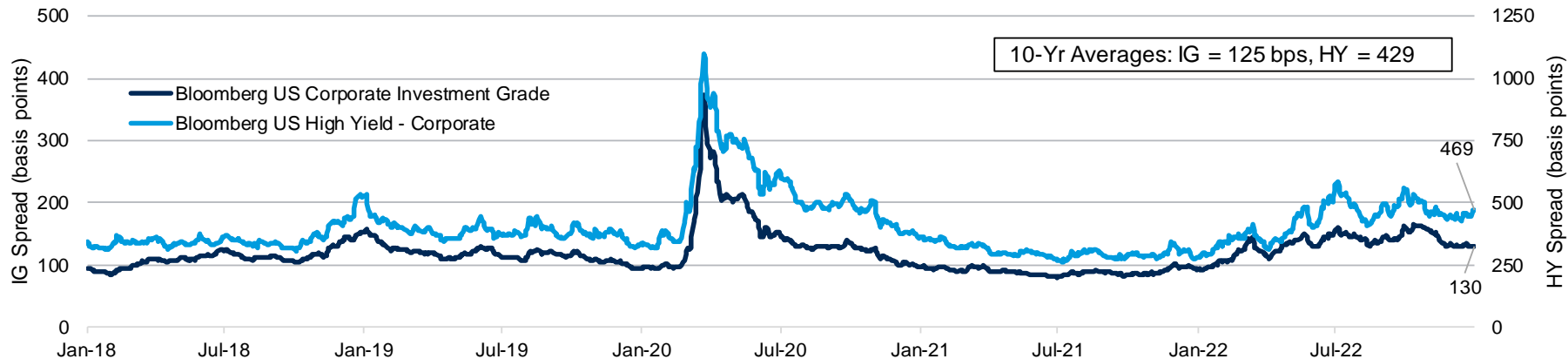
Spread sectors of the bond market outpaced Treasuries in the fourth quarter in the risk-on environment. A falling U.S. dollar against major currencies proved to be beneficial for non-U.S. bonds.



Source: FactSet. As of December 30, 2022.

## Corporate Market Spreads – Trailing 5 Years

Corporate credit spreads were tighter during the fourth quarter. Investment grade spreads compressed 34 basis points while high yield spreads were 92 basis points lower. Risk-on sentiment helped fuel the sector. Additionally, limited issuance in both quality segments provided a technical tailwind.



Source: FactSet. As of December 30, 2022.

See disclosures for list of indices representing each asset class. Past performance does not indicate future performance and there is a possibility of a loss.

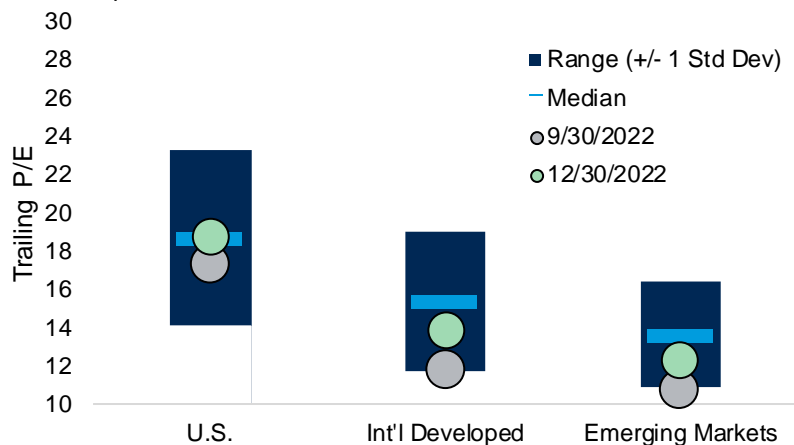
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# Equity Market Update

## Equity Valuations (Trailing PE – Last 15 Years)

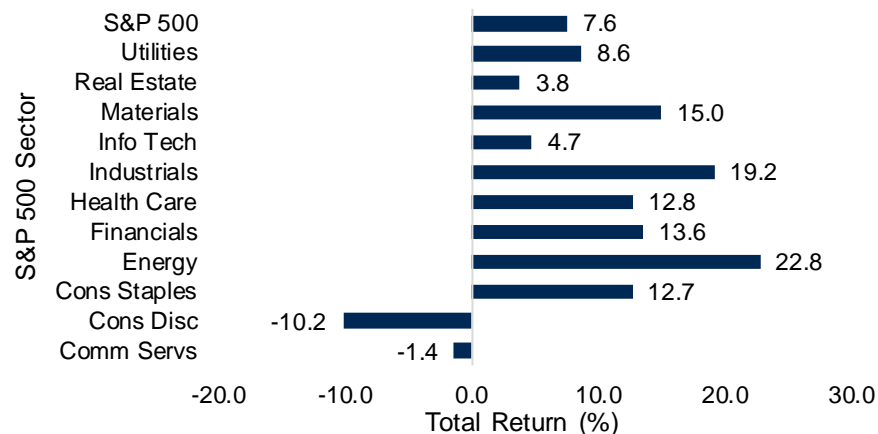
Positive equity markets in the fourth quarter shifted valuations slightly higher as earnings ticked lower. International markets look more attractive on a relative basis compared to the U.S.



Source: FactSet. As of December 30, 2022.

## U.S. Equities – Return by Sector (4Q 2022)

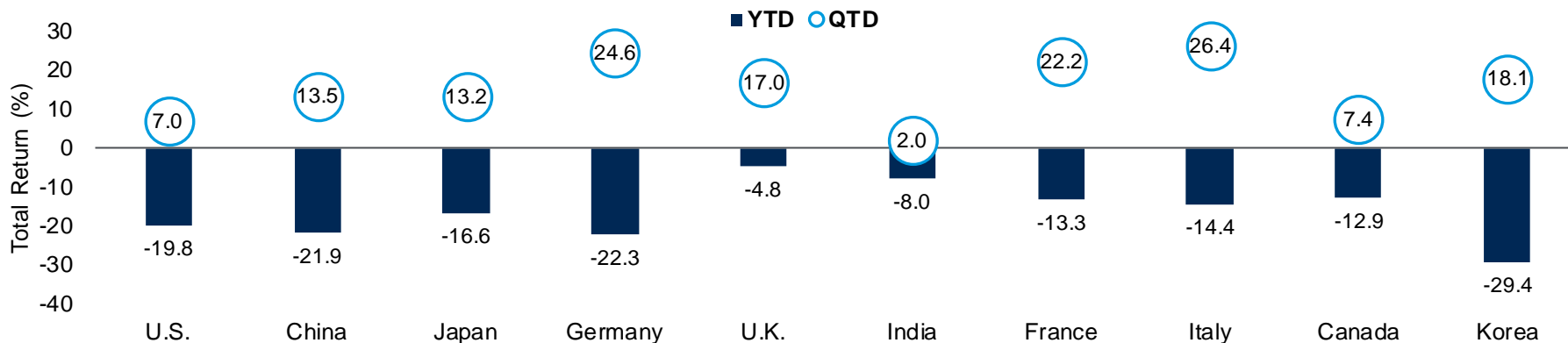
U.S. equities were broadly positive on the back of softening inflation data and the prospect of less aggressive Fed policy action in 2023. However, Amazon and Tesla, down over 20% and 50%, respectively, drove consumer discretionary lower.



Source: Morningstar Direct. As of December 31, 2022.

## Country Total Returns (%) – Top 10 Largest Economies

Equity markets around the globe benefited from the risk-on investor sentiment in the fourth quarter. A host of factors fueled strength across regions. The U.K. market jumped following the replacement of Prime Minister Truss and clarity around the country's budget. European countries broadly benefited as expectations for a warmer winter began to take hold and concerns about commodity prices abated. Chinese equities rallied on the reopening trade as "zero-Covid" restrictions were lifted.



Source: Morningstar Direct. As of December 31, 2022.

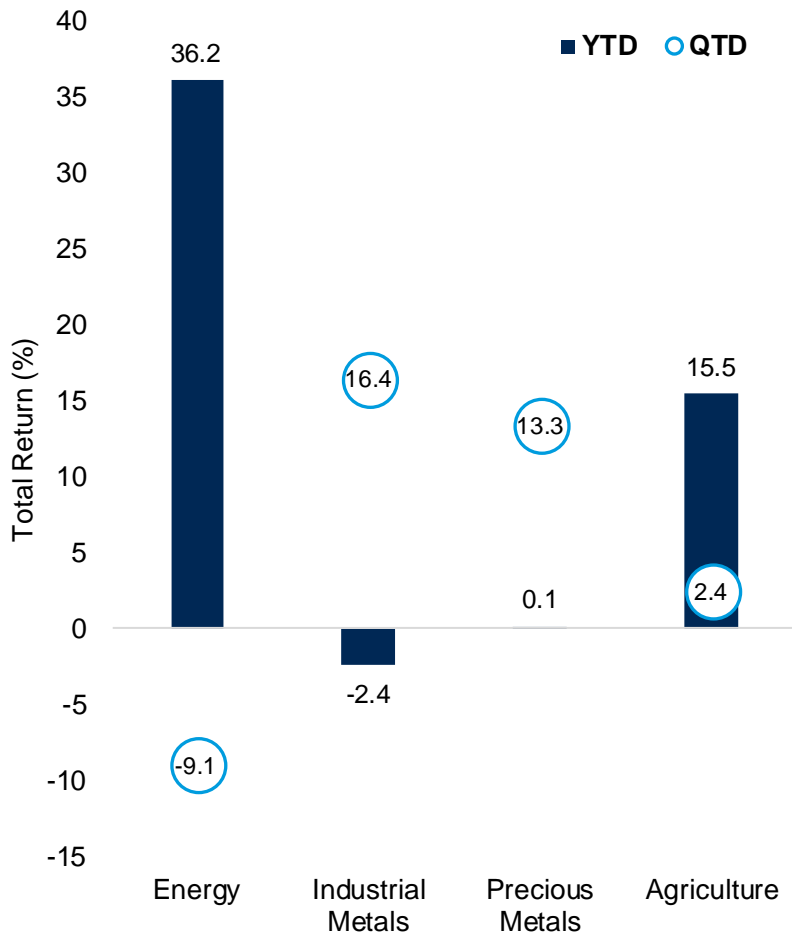
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# Real Assets Market Update

## Commodity Performance

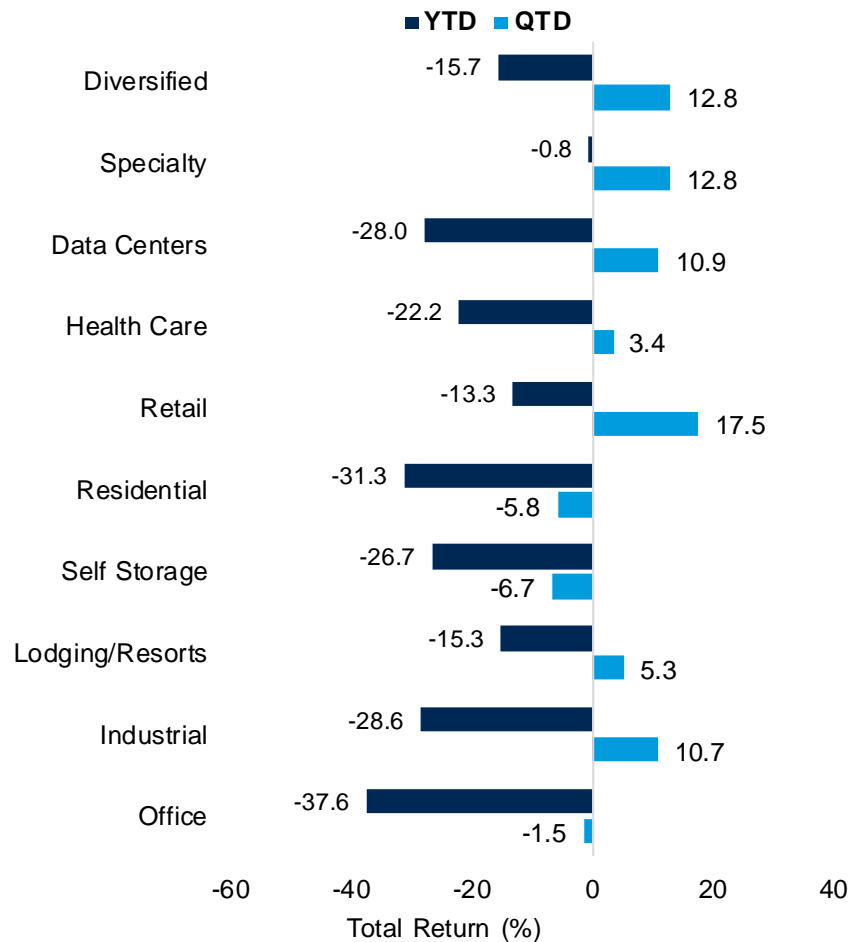
Commodities advanced during the fourth quarter, rounding out a strong year. Energy weakness was due to natural gas, whose prices retreated sharply on weaker demand from a warmer than anticipated start to the winter. Elsewhere, a weaker dollar supported industrial and precious metals.



Source: Morningstar Direct. As of December 31, 2022.

## REIT Sector Performance

REITs posted their first quarterly gain in 2022, benefiting from cooler than anticipated inflation data and expectations of a subsequent easing of Fed rate hikes. The retail segment was a notable outperformer, with particular strength from regional malls.



Source: Morningstar Direct. As of December 31, 2022.

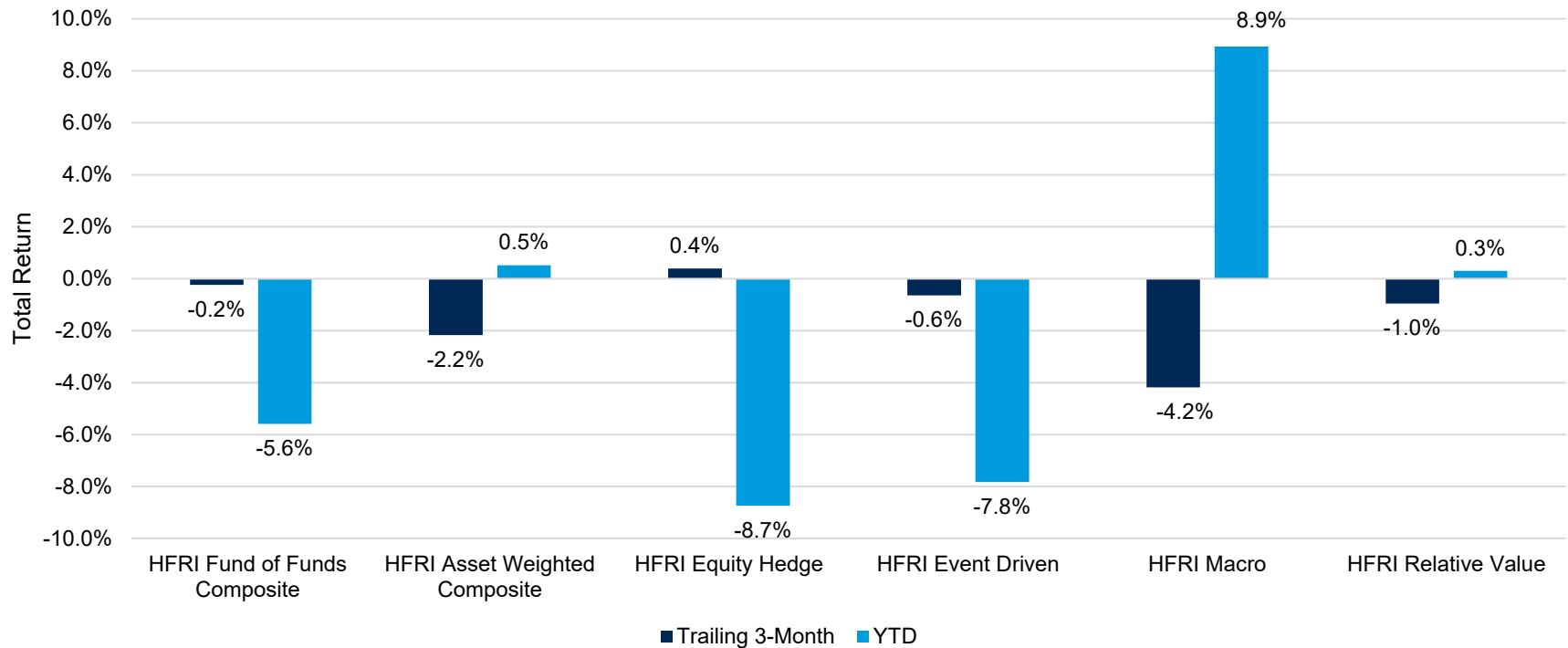
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# Marketable Alternatives



Source: Morningstar Direct. As of November 30, 2022.

## Fund of Funds / Asset Weighted (4Q)

- The HFRI Fund of Funds Composite returned -0.2% over the trailing 3-month period, keeping year-to-date returns in negative territory at -5.6%.

- The HFRI Asset Weighted Composite detracted -2.2% over the trailing 3-month period, bringing year-to-date returns to 0.5%.

+ Marketable alternatives broadly have served their purpose in portfolios, limiting drawdowns relative to equities and fixed income.

## Equity Hedge / Event Driven (4Q)

+ Equity hedge strategies added slightly during the period, led by Quantitative Directional strategies.

+/- Event driven strategies detracted slightly during the period. Activist and Special Situation strategies were the largest contributors during the period while Multi Strategy and Distressed Restructuring were the largest detractors.

- Equity hedge and event driven strategies have been the largest detractors year-to-date.

## Macro / Relative Value (4Q)

+/- Macro strategies were negative over the period but have still been the strongest performers year-to-date. All macro sub-strategies have generated positive returns year-to-date.

+/- Relative Value strategies returned -1.0% over the period but remain positive year-to-date. Fixed Income Sovereign strategies were the primary contributors over the period.

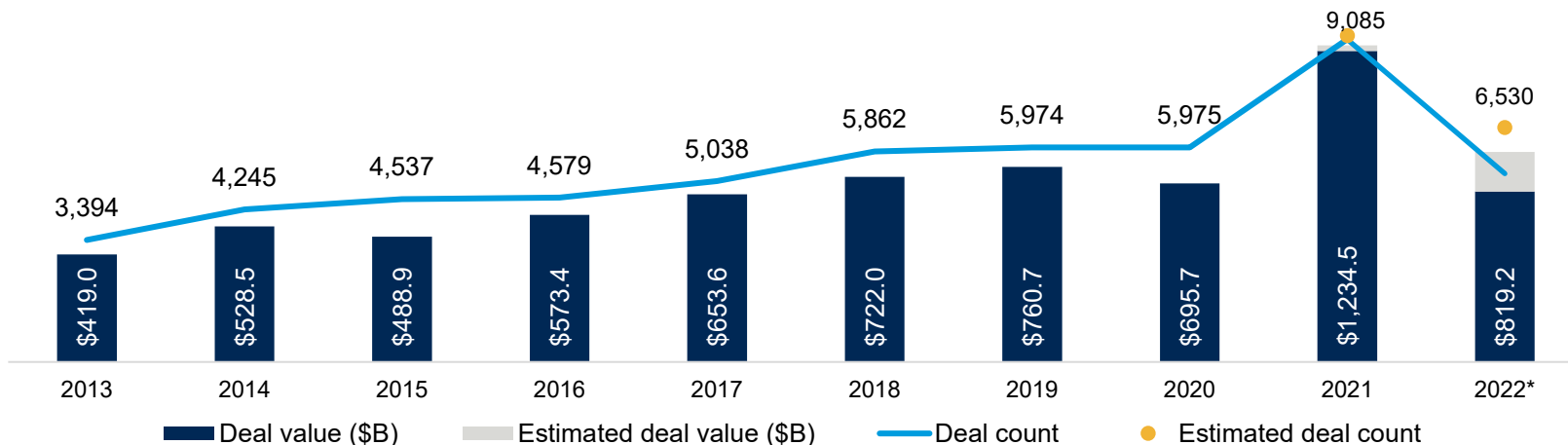
+ Volatility and Yield Alternatives strategies added slightly over the period, adding to strong year-to-date returns.



# Private Equity Market Update

## U.S. Private Equity Deal Activity

U.S. Private Equity deal activity, while still high historically, moderated during the first three quarters relative to the frantic environment that consumed investors throughout 2021.



Source: Pitchbook. As of September 30, 2022.

## Private Equity Performance (As of June 30, 2022)

Private equity performance was negative during the second quarter with US Growth and Venture leading the decline. Over longer time periods, performance remains strong with dispersion between asset classes normalizing in recent quarters.

Benchmark	1-YR	3-YR	5-YR	10-Y	15-Y
US Private Equity	6.7%	23.0%	20.6%	17.8%	12.6%
US Buyout Index	16.6%	24.2%	21.0%	18.5%	15.0%
US Growth Equity Index	0.4%	26.5%	24.7%	19.4%	15.1%
US Venture Capital Index	2.7%	30.5%	25.7%	19.3%	13.6%
S&P 500 Index	-10.6%	10.6%	11.3%	13.0%	8.5%

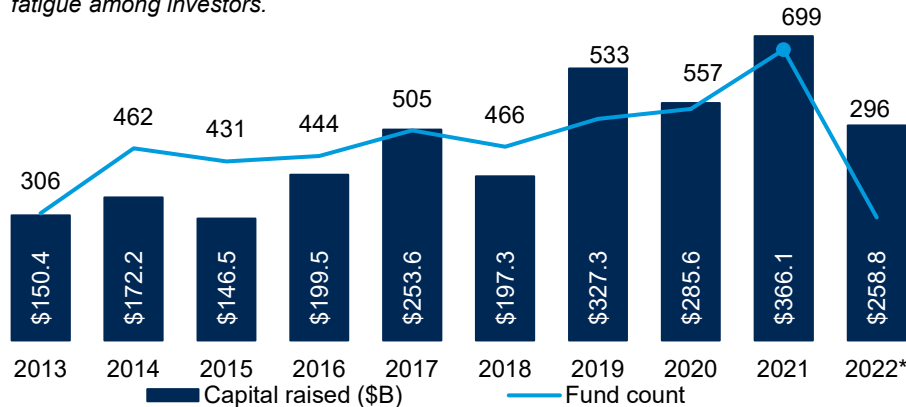
Source: Cambridge Associates. As of June 30, 2022. Returns presented as horizon pooled return, net of fees. S&P 500 Index as of June 30, 2022. Indices cannot be invested in directly.

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## U.S. Private Equity Fundraising Activity

The fundraising market showed signs of slowing in the second half of the year as the denominator effect and commitments from the two prior years began to create some fatigue among investors.



Source: Pitchbook. As of September 30, 2022.



# The Case for Diversification

2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	10 Years (Ann)
Emerging Markets 18.2	U.S. Small Cap 38.8	U.S. Equity REITs 30.1	U.S. Equity REITs 3.2	U.S. Small Cap 21.3	Emerging Markets 37.3	High Yield Munis 4.8	U.S. Large Cap 31.5	U.S. Small Cap 20.0	U.S. Equity REITs 43.2	Commodities 16.1	U.S. Large Cap 12.4
High Yield Munis 18.1	U.S. Large Cap 32.4	High Yield Munis 13.8	Municipals 5-Year 2.4	High Yield 17.1	International Dev. 25.0	Municipals 5-Year 1.7	U.S. Equity REITs 26.0	U.S. Large Cap 18.4	Commodities 27.1	Municipals 5-Year -5.3	U.S. Small Cap 9.0
U.S. Equity REITs 18.1	International Dev. 22.8	U.S. Large Cap 13.7	High Yield Munis 1.8	U.S. Large Cap 12.0	U.S. Large Cap 21.8	Foreign Bond 0.5	U.S. Small Cap 25.5	Emerging Markets 18.3	US Large Cap 26.5	Hedge Funds -5.6	U.S. Equity REITs 6.5
International Dev. 17.3	Balanced 12.2	Core Bond 6.0	U.S. Large Cap 1.4	Commodities 11.7	EM Debt (unhedged) 15.2	Core Bond 0.0	International Dev. 22.5	TIPS 11.0	US Small Cap 14.8	High Yield -11.2	International Developed 4.7
EM Debt (unhedged) 16.9	Hedge Funds 9.0	Balanced 5.1	Core Bond 0.6	Emerging Markets 11.2	U.S. Small Cap 14.6	TIPS -1.3	Emerging Markets 18.4	Balanced 8.8	International Dev. 11.3	EM Debt (unhedged) -11.7	Balanced 4.4
U.S. Small Cap 16.3	High Yield 7.4	U.S. Small Cap 4.9	Hedge Funds -0.3	EM Debt (unhedged) 9.9	Balanced 13.6	High Yield -2.1	Balanced 17.5	International Dev. 7.8	Balanced 9.8	TIPS -11.8	High Yield 4.0
U.S. Large Cap 16.0	U.S. Equity REITs 2.5	TIPS 3.6	International Dev. -0.8	U.S. Equity REITs 8.5	High Yield Munis 9.7	Hedge Funds -4.0	High Yield 14.3	Core Bond 7.5	High Yield Munis 7.8	U.S. Core Bond -13.0	Hedge Funds 3.6
High Yield 15.8	Municipals 5-Year 0.8	Hedge Funds 3.4	TIPS -1.4	Balanced 7.6	Hedge Funds 7.8	U.S. Large Cap -4.4	EM Debt (unhedged) 13.5	Hedge Funds 7.1	TIPS 6.0	High Yield Municipals -13.1	High Yield Municipals 3.5
Balanced 11.5	Foreign Bond -1.0	Municipals 5-Year 3.2	Foreign Bond -2.3	TIPS 4.7	High Yield 7.5	U.S. Equity REITs -4.6	High Yield Munis 10.7	High Yield 7.1	Hedge Funds 5.7	Foreign Bond -14.2	Municipals 5-Year 1.5
TIPS 7.0	Core Bond -2.0	Foreign Bond 2.9	Balanced -3.3	Foreign Bond 3.2	Foreign Bond 6.5	Balanced -5.8	Core Bond 8.7	Foreign Bond 7.0	High Yield 5.3	International Developed -14.5	Emerging Markets 1.4
Foreign Bond 5.3	Emerging Markets -2.6	High Yield 2.5	U.S. Small Cap -4.4	High Yield Munis 3.0	U.S. Equity REITs 5.2	EM Debt (unhedged) -6.2	TIPS 8.4	High Yield Munis 4.9	Municipals 5-Year 0.3	Balanced -14.9	TIPS 1.1
Hedge Funds 4.8	High Yield Munis -5.5	Emerging Markets -2.2	High Yield -4.5	Core Bond 2.6	Core Bond 3.5	U.S. Small Cap -11.0	Hedge Funds 7.8	Municipals 5-Year 4.3	Core Bond -1.5	U.S. Large Cap -19.1	U.S. Core Bond 1.1
Core Bond 4.2	TIPS -8.6	International Dev. -4.9	Emerging Markets -14.9	International Dev. 1.0	Municipals 5-Year 3.1	Commodities -11.2	Commodities 7.7	EM Debt (unhedged) 2.7	Emerging Markets -2.5	Emerging Markets -20.1	Foreign Bond 0.2
Municipals 5-Year 3.0	EM Debt (unhedged) -9.0	EM Debt (unhedged) -5.7	EM Debt (unhedged) -14.9	Hedge Funds 0.5	TIPS 3.0	International Dev. -13.8	Foreign Bond 6.3	Commodities -3.1	Foreign Bond -4.2	U.S. Small Cap -20.4	Commodities -1.3
Commodities -1.1	Commodities -9.5	Commodities -17.0	Commodities -24.7	Municipals 5-Year -0.4	Commodities 1.7	Emerging Markets -14.6	Municipals 5-Year 5.4	U.S. Equity REITs -8.0	EM Debt (unhedged) -8.7	U.S. Equity REITs -24.4	EM Debt (unhedged) -2.0

Sources: Morningstar, FactSet. As of December 31, 2022. \*Periods greater than one year are annualized. Total returns in U.S. dollars. Hedge Funds as of November 30, 2022.

See disclosures for list of indices representing each asset class. Past performance does not indicate future performance and there is a possibility of a loss. Indices cannot be invested in directly.



# Financial Markets Performance

Total Return as of December 31, 2022  
Periods greater than one year are annualized  
All returns are in U.S. dollar terms

	QTD	YTD	1YR	3YR	5YR	7YR	10YR	15YR
<b>Global Fixed Income Markets</b>								
Bloomberg 1-3-Month T-Bill	0.9%	1.5%	1.5%	0.7%	1.2%	1.0%	0.7%	0.6%
Bloomberg U.S. TIPS	2.0%	-11.8%	-11.8%	1.2%	2.1%	2.6%	1.1%	3.1%
Bloomberg Municipal Bond (5 Year)	3.0%	-5.3%	-5.3%	-0.3%	1.2%	1.3%	1.5%	2.8%
Bloomberg High Yield Municipal Bond	3.5%	-13.1%	-13.1%	-0.6%	2.6%	3.7%	3.5%	4.4%
Bloomberg U.S. Aggregate	1.9%	-13.0%	-13.0%	-2.7%	0.0%	0.9%	1.1%	2.7%
Bloomberg U.S. Corporate High Yield	4.2%	-11.2%	-11.2%	0.0%	2.3%	5.0%	4.0%	6.1%
Bloomberg Global Aggregate ex-U.S. Hedged	0.2%	-9.8%	-9.8%	-2.6%	0.5%	1.4%	2.1%	3.0%
Bloomberg Global Aggregate ex-U.S. Unhedged	6.8%	-18.7%	-18.7%	-5.9%	-3.1%	-0.6%	-1.6%	0.5%
Bloomberg U.S. Long Gov / Credit	2.6%	-27.1%	-27.1%	-6.2%	-1.2%	1.5%	1.6%	4.4%
JPMorgan GBI-EM Global Diversified	8.5%	-11.7%	-11.7%	-6.1%	-2.5%	1.6%	-2.0%	1.5%
<b>Global Equity Markets</b>								
S&P 500	7.6%	-18.1%	-18.1%	7.7%	9.4%	11.5%	12.6%	8.8%
Dow Jones Industrial Average	16.0%	-6.9%	-6.9%	7.3%	8.4%	12.1%	12.3%	9.0%
NASDAQ Composite	-0.8%	-32.5%	-32.5%	6.1%	9.7%	12.2%	14.4%	10.7%
Russell 3000	7.2%	-19.2%	-19.2%	7.1%	8.8%	11.0%	12.1%	8.7%
Russell 1000	7.2%	-19.1%	-19.1%	7.3%	9.1%	11.3%	12.4%	8.8%
Russell 1000 Growth	2.2%	-29.1%	-29.1%	7.8%	11.0%	12.9%	14.1%	10.3%
Russell 1000 Value	12.4%	-7.5%	-7.5%	6.0%	6.7%	9.1%	10.3%	7.0%
Russell Mid Cap	9.2%	-17.3%	-17.3%	5.9%	7.1%	9.6%	11.0%	8.4%
Russell Mid Cap Growth	6.9%	-26.7%	-26.7%	3.8%	7.6%	10.0%	11.4%	8.6%
Russell Mid Cap Value	10.5%	-12.0%	-12.0%	5.8%	5.7%	8.7%	10.1%	8.0%
Russell 2000	6.2%	-20.4%	-20.4%	3.1%	4.1%	7.9%	9.0%	7.2%
Russell 2000 Growth	4.1%	-26.4%	-26.4%	0.6%	3.5%	7.1%	9.2%	7.3%
Russell 2000 Value	8.4%	-14.5%	-14.5%	4.7%	4.1%	8.2%	8.5%	6.8%
MSCI ACWI	9.8%	-18.4%	-18.4%	4.0%	5.2%	8.1%	8.0%	4.8%
MSCI ACWI ex. U.S.	14.3%	-16.0%	-16.0%	0.1%	0.9%	4.8%	3.8%	1.5%
MSCI EAFE	17.3%	-14.5%	-14.5%	0.9%	1.5%	4.5%	4.7%	1.8%
MSCI EAFE Growth	15.0%	-22.9%	-22.9%	0.5%	2.5%	5.1%	5.6%	2.6%
MSCI EAFE Value	19.6%	-5.6%	-5.6%	0.6%	0.2%	3.7%	3.5%	0.8%
MSCI EAFE Small Cap	15.8%	-21.4%	-21.4%	-0.9%	0.0%	4.4%	6.2%	3.8%
MSCI Emerging Markets	9.7%	-20.1%	-20.1%	-2.7%	-1.4%	5.2%	1.4%	0.6%
<b>Alternatives</b>								
Consumer Price Index*	0.5%	6.5%	7.1%	5.0%	3.8%	3.3%	2.6%	2.3%
FTSE NAREIT Equity REITs	5.2%	-24.4%	-24.4%	-0.1%	3.7%	4.6%	6.5%	6.2%
S&P Real Assets	7.3%	-9.9%	-9.9%	1.7%	3.0%	5.2%	3.5%	4.0%
FTSE EPRA NAREIT Developed	7.1%	-24.4%	-24.4%	-4.1%	0.7%	2.8%	3.9%	2.9%
FTSE EPRA NAREIT Developed ex U.S.	10.5%	-23.8%	-23.8%	-8.2%	-2.3%	1.3%	1.5%	0.6%
Bloomberg Commodity Total Return	2.2%	16.1%	16.1%	12.6%	6.4%	6.5%	-1.3%	-2.6%
HFRI Fund of Funds Composite*	1.3%	-5.6%	-5.3%	4.1%	3.1%	3.2%	3.6%	1.7%
HFRI Asset Weighted Composite*	-2.4%	0.5%	2.3%	3.8%	3.4%	3.6%	4.1%	0.0%
Alerian MLP	10.1%	30.9%	30.9%	9.4%	4.1%	4.4%	2.0%	5.4%

Sources: Morningstar, FactSet. As of December 31, 2022. \*Consumer Price Index and HFRI indexes as of November 30, 2022.

See disclosures for list of indices representing each asset class. Past performance does not indicate future performance and there is a possibility of a loss.

Indices cannot be invested in directly.



## Portfolio and Manager Review



## Asset Allocation

Total Plan

As of December 31, 2022

	Asset Allocation (\$)	Asset Allocation (%)	Target Allocation (%)	Differences (%)
<b>Total Plan</b>	<b>207,996,568</b>	<b>100.0</b>	<b>100.0</b>	<b>0.0</b>
Prepaid Pension Benefits	-2,580,675	-1.2	0.0	-1.2
<b>Total Invested Assets</b>	<b>210,577,242</b>	<b>101.2</b>	<b>100.0</b>	<b>1.2</b>
<b>Short Term Liquidity</b>	<b>472,286</b>	<b>0.2</b>	<b>0.0</b>	<b>0.2</b>
Key Bank Cash Portfolio	432,647	0.2	0.0	0.2
First American Govt Oblig Fund Z	39,639	0.0	0.0	0.0
<b>Fixed Income</b>	<b>54,302,746</b>	<b>26.1</b>	<b>25.0</b>	<b>1.1</b>
JIC Core Bond Fund I	37,779,758	18.2	17.5	0.7
BlackRock Strategic Income Opportunities K	16,522,988	7.9	7.5	0.4
<b>Equity</b>	<b>144,480,573</b>	<b>69.5</b>	<b>68.0</b>	<b>1.5</b>
<b>Domestic Equity</b>	<b>84,668,058</b>	<b>40.7</b>	<b>40.0</b>	<b>0.7</b>
Mellon Large Cap Core	65,554,673	31.5	31.0	0.5
Mellon Smid Cap Core	19,113,385	9.2	9.0	0.2
<b>International Equity</b>	<b>59,061,659</b>	<b>28.4</b>	<b>27.5</b>	<b>0.9</b>
Mellon EAFE Fund	43,712,555	21.0	20.5	0.5
Mellon Emerging Markets	15,349,104	7.4	7.0	0.4
<b>Private Equity</b>	<b>750,856</b>	<b>0.4</b>	<b>0.5</b>	<b>-0.1</b>
Hamilton Lane II	24,774	0.0	-	-
Hamilton Lane VII A	507,323	0.2	-	-
Hamilton Lane VII B	218,759	0.1	-	-
<b>Real Assets</b>	<b>11,321,638</b>	<b>5.4</b>	<b>7.0</b>	<b>-1.6</b>
UBS Trumbull Property Fund	11,321,638	5.4	6.0	-0.6
Molpus SWF II	-	0.0	1.0	-1.0

Investments with a zero balance were held in the portfolio during the reporting period and will be removed once they no longer impact portfolio performance. Asset Allocation weightings may not add up to 100% due to rounding.

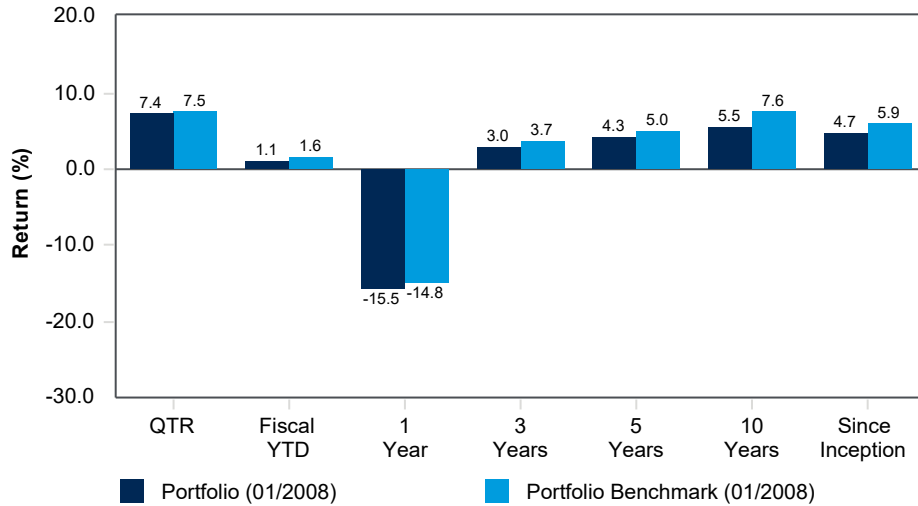


# Portfolio Dashboard

Total Invested Assets

As of December 31, 2022

## Historical Performance



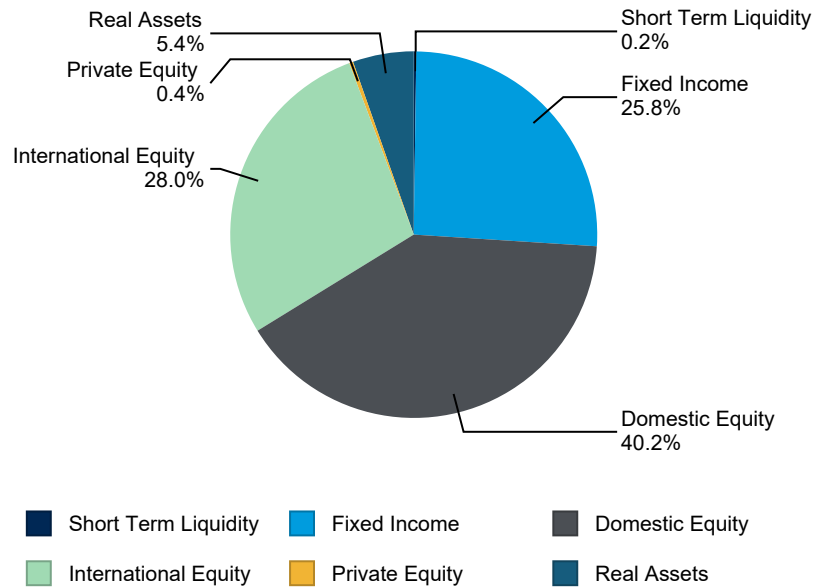
## Summary of Cash Flows

	QTR	Fiscal YTD	1 Year	Since Inception
<b>Total Invested Assets</b>				
Beginning Market Value	196,134,346	213,971,670	256,267,482	126,047,968
Net Contributions	-5,436	-5,786,831	-5,786,832	-38,164,329
Gain/Loss	14,448,333	2,392,403	-39,903,408	122,693,603
Ending Market Value	210,577,242	210,577,242	210,577,242	210,577,242

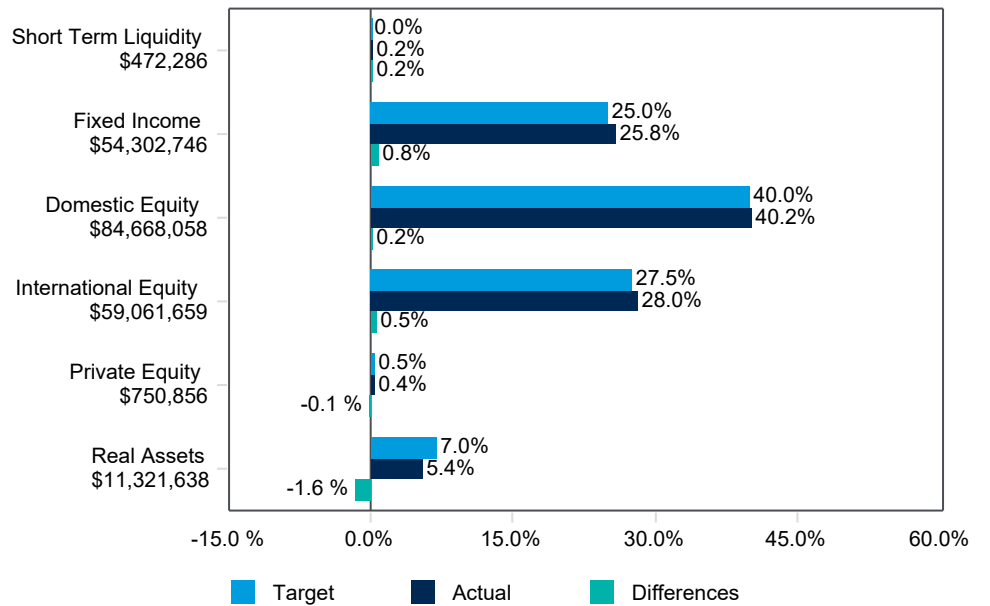
## Current Benchmark Composition

From Date	To Date	Composition
09/2022	Present	25.00% Blmbg. U.S. Aggregate, 31.50% S&P 500, 9.00% Russell 2500 Index, 20.50% MSCI EAFE (Net), 7.00% MSCI Emerging Markets (Net), 6.00% NCREIF Fund Index - ODCE (net), 1.00% NCREIF Timberland Index

## Portfolio Allocation



## Actual vs. Target Allocations



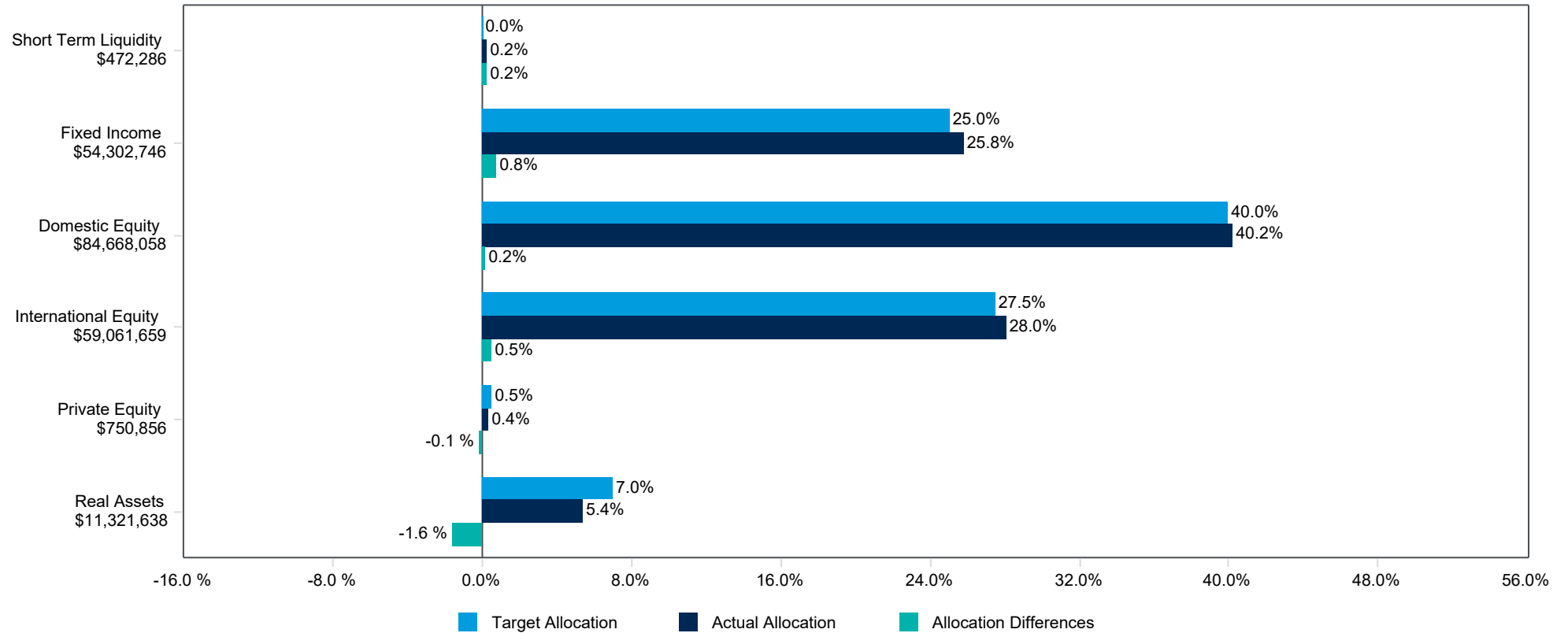


# Asset Allocation

Total Invested Assets

As of December 31, 2022

## Actual vs. Target



	Asset Allocation (\$)	Asset Allocation (%)	Target Allocation (%)	Differences (%)
Short Term Liquidity	472,286	0.2	0.0	0.2
Fixed Income	54,302,746	25.8	25.0	0.8
Domestic Equity	84,668,058	40.2	40.0	0.2
International Equity	59,061,659	28.0	27.5	0.5
Private Equity	750,856	0.4	0.5	-0.1
Real Assets	11,321,638	5.4	7.0	-1.6
<b>Total Invested Assets</b>	<b>210,577,242</b>	<b>100.0</b>	<b>100.0</b>	<b>0.0</b>



# Asset Allocation

Total Invested Assets

As of December 31, 2022

	Asset Allocation (\$)	Asset Allocation (%)	Target Allocation (%)	Differences (%)
<b>Total Invested Assets</b>	<b>210,577,242</b>	<b>100.0</b>	<b>100.0</b>	<b>0.0</b>
<b>Short Term Liquidity</b>	<b>472,286</b>	<b>0.2</b>	<b>0.0</b>	<b>0.2</b>
Key Bank Cash Portfolio	432,647	0.2	0.0	0.2
First American Govt Oblig Fund Z	39,639	0.0	0.0	0.0
<b>Fixed Income</b>	<b>54,302,746</b>	<b>25.8</b>	<b>25.0</b>	<b>0.8</b>
JIC Core Bond Fund I	37,779,758	17.9	17.5	0.4
BlackRock Strategic Income Opportunities K	16,522,988	7.8	7.5	0.3
<b>Equity</b>	<b>144,480,573</b>	<b>68.6</b>	<b>68.0</b>	<b>0.6</b>
<b>Domestic Equity</b>	<b>84,668,058</b>	<b>40.2</b>	<b>40.0</b>	<b>0.2</b>
Mellon Large Cap Core	65,554,673	31.1	31.0	0.1
Mellon Smid Cap Core	19,113,385	9.1	9.0	0.1
<b>International Equity</b>	<b>59,061,659</b>	<b>28.0</b>	<b>27.5</b>	<b>0.5</b>
Mellon EAFE Fund	43,712,555	20.8	20.5	0.3
Mellon Emerging Markets	15,349,104	7.3	7.0	0.3
<b>Private Equity</b>	<b>750,856</b>	<b>0.4</b>	<b>0.5</b>	<b>-0.1</b>
Hamilton Lane II	24,774	0.0	-	-
Hamilton Lane VII A	507,323	0.2	-	-
Hamilton Lane VII B	218,759	0.1	-	-
<b>Real Assets</b>	<b>11,321,638</b>	<b>5.4</b>	<b>7.0</b>	<b>-1.6</b>
UBS Trumbull Property Fund	11,321,638	5.4	6.0	-0.6
Molpus SWF II	-	0.0	1.0	-1.0



## Performance Overview

Total Invested Assets

As of December 31, 2022

### Trailing Performance Summary

	Current Quarter	Fiscal YTD	1 Year	3 Years	5 Years	7 Years	10 Years	Since Inception	Inception Date
<b>Total Invested Assets</b>	7.4	1.1	-15.5	3.0	4.3	6.6	5.5	4.7	01/2008
<i>Policy Benchmark</i>	7.5	1.6	-14.8	3.7	5.0	7.2	7.6	5.9	01/2008

### Calendar Year Performance Summary

	2021	2020	2019	2018	2017	2016	2015	2014	2013	2012
<b>Total Invested Assets</b>	14.7	12.7	19.1	-5.2	17.0	8.7	-2.2	4.0	7.7	12.5
<i>Policy Benchmark</i>	14.3	14.5	20.6	-5.2	16.9	9.0	-0.2	7.3	19.0	13.8

### Plan Reconciliation

	QTR	Fiscal YTD	1 Year	3 Years	5 Years	10 Years	Since Inception	Inception Date
<b>Total Invested Assets</b>								01/2008
Beginning Market Value	196,134,346	213,971,670	256,267,482	206,539,559	190,681,965	145,336,072	126,047,968	
Net Contributions	-5,436	-5,786,831	-5,786,832	-15,079,073	-23,619,678	-35,413,863	-38,164,329	
Gain/Loss	14,448,333	2,392,403	-39,903,408	19,116,756	43,514,955	100,655,033	122,693,603	
Ending Market Value	210,577,242	210,577,242	210,577,242	210,577,242	210,577,242	210,577,242	210,577,242	

### Benchmark Composition

	Weight (%)
<b>Sep-2022</b>	
Blmbg. U.S. Aggregate	25.0
S&P 500	31.5
Russell 2500 Index	9.0
MSCI EAFE (Net)	20.5
MSCI Emerging Markets (Net)	7.0
NCREIF Fund Index - ODCE (net)	6.0
NCREIF Timberland Index	1.0



## Manager Performance

Total Invested Assets (excluding Prepaid)

As of December 31, 2022

	Allocation		Performance(%)								Manager Status
	Market Value (\$)	%	QTR	Fiscal YTD	1 Year	3 Years	5 Years	10 Years	Since Inception	Inception Date	
<b>Total Invested Assets (excluding Prepaid)</b>	<b>210,577,242</b>	<b>100.0</b>	<b>7.4</b>	<b>1.1</b>	<b>-15.5</b>	<b>3.0</b>	<b>4.3</b>	<b>5.5</b>	<b>4.7</b>	<b>01/2008</b>	
Policy Benchmark			7.5	1.6	-14.8	3.7	5.0	7.6	5.9		
Secondary Benchmark			7.5	1.4	-15.2	3.3	4.6	7.3	5.7		
<b>Short Term Liquidity</b>	<b>472,286</b>	<b>0.2</b>	<b>0.1</b>	<b>0.1</b>	<b>0.2</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>0.1</b>	<b>01/2021</b>	
90 Day U.S. Treasury Bill			0.8	1.3	1.5	0.7	1.3	0.8	0.7		
<b>Key Bank Cash Portfolio</b>	<b>432,647</b>	<b>0.2</b>	<b>0.0</b>	<b>0.0</b>	<b>0.0</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>0.0</b>	<b>01/2021</b>	
90 Day U.S. Treasury Bill			0.8	1.3	1.5	0.7	1.3	0.8	0.7		
<b>First American Govt Oblig Fund Z</b>	<b>39,639</b>	<b>0.0</b>	<b>0.6</b>	<b>1.1</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>1.2</b>	<b>03/2022</b>	
90 Day U.S. Treasury Bill			0.8	1.3	1.5	0.7	1.3	0.8	1.4		
<b>Fixed Income</b>	<b>54,302,746</b>	<b>25.8</b>	<b>1.7</b>	<b>-2.6</b>	<b>-12.7</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-7.5</b>	<b>01/2021</b>	
Blmbg. U.S. Aggregate			1.9	-3.0	-13.0	-2.7	0.0	1.1	-7.5		
<b>JIC Core Bond Fund I</b>	<b>37,779,758</b>	<b>17.9</b>	<b>1.9</b>	<b>-3.0</b>	<b>-13.7</b>	<b>-2.5</b>	<b>0.2</b>	<b>1.4</b>	<b>-4.1</b>	<b>03/2020</b>	<b>Maintain</b>
Blmbg. U.S. Aggregate			1.9	-3.0	-13.0	-2.7	0.0	1.1	-4.1		
IM U.S. Broad Market Core Fixed Income (MF) Median			1.7	-3.1	-13.7	-2.7	-0.1	1.0	-4.1		
JIC Core Bond Fund I Rank			32	44	52	36	27	15	53		
<b>BlackRock Strategic Income Opportunities K</b>	<b>16,522,988</b>	<b>7.8</b>	<b>1.6</b>	<b>-0.2</b>	<b>-5.6</b>	<b>0.8</b>	<b>1.9</b>	<b>2.4</b>	<b>-3.5</b>	<b>03/2022</b>	<b>Discuss</b>
Blmbg. U.S. Aggregate			1.9	-3.0	-13.0	-2.7	0.0	1.1	-10.1		
IM Alternative Credit Focus (MF) Median			2.4	0.7	-7.6	0.4	1.0	1.4	-5.9		
BlackRock Strategic Income Opportunities K Rank			55	75	41	45	26	22	43		

Manager performance for mutual funds and ETFs is based on NAV and provided by Lipper. Performance for non-mutual fund or ETF investments is based on the returns provided by managers, calculations based on a manager statement, or calculations based on a statement or data from the client's custodian. Funds may include returns of an equivalent share class with a longer return history if period includes dates prior to the fund's inception. Returns are net of fees unless otherwise stated. The fund's inception date represents the first month the client made the investment. Composite performance includes all funds held in the composite since inception. Inception dates for asset class composites reflect the start date at which these returns could be calculated using historical and existing system capabilities and may vary from the inception dates of underlying component strategies.



## Manager Performance

Total Invested Assets (excluding Prepaid)

As of December 31, 2022

	Allocation		Performance(%)								Manager Status
	Market Value (\$)	%	QTR	Fiscal YTD	1 Year	3 Years	5 Years	10 Years	Since Inception	Inception Date	
<b>Equity</b>	<b>144,480,573</b>	<b>68.6</b>	<b>10.6</b>	<b>3.1</b>	<b>-17.2</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-0.9</b>	<b>01/2021</b>	
<i>MSCI AC World Index (Net)</i>			9.8	2.3	-18.4	4.0	5.2	8.0	-1.6		
<b>Domestic Equity</b>	<b>84,668,058</b>	<b>40.2</b>	<b>7.5</b>	<b>2.9</b>	<b>-18.1</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>1.6</b>	<b>01/2021</b>	
<i>Domestic Equity Benchmark</i>			7.5	2.8	-18.1	7.3	8.5	11.8	1.8		
<b>Mellon Large Cap Core</b>	<b>65,554,673</b>	<b>31.1</b>	<b>7.6</b>	<b>2.3</b>	<b>-18.1</b>	<b>7.6</b>	<b>9.4</b>	<b>-</b>	<b>11.7</b>	<b>04/2016</b>	<b>Maintain</b>
<i>S&amp;P 500</i>			7.6	2.3	-18.1	7.7	9.4	12.6	11.7		
IM U.S. Large Cap Core Equity (MF) Median			7.8	2.4	-18.7	6.9	8.8	11.7	11.0		
Mellon Large Cap Core Rank			56	52	45	29	30	-	24		
<b>Mellon Smid Cap Core</b>	<b>19,113,385</b>	<b>9.1</b>	<b>7.4</b>	<b>4.5</b>	<b>-18.3</b>	<b>5.1</b>	<b>6.0</b>	<b>-</b>	<b>9.4</b>	<b>04/2016</b>	<b>Maintain</b>
<i>Russell 2500 Index</i>			7.4	4.4	-18.4	5.0	5.9	10.0	9.3		
IM U.S. SMID Cap Equity (MF) Median			8.4	4.6	-18.6	4.8	5.6	9.7	9.0		
Mellon Smid Cap Core Rank			61	53	49	46	41	-	38		
<b>International Equity</b>	<b>59,061,659</b>	<b>28.0</b>	<b>15.2</b>	<b>3.8</b>	<b>-15.8</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-5.7</b>	<b>01/2021</b>	
<i>International Equity Benchmark</i>			15.4	4.1	-15.7	0.6	1.0	3.6	-5.2		
<b>Mellon EAFE Fund</b>	<b>43,712,555</b>	<b>20.8</b>	<b>17.3</b>	<b>6.4</b>	<b>-14.1</b>	<b>1.3</b>	<b>2.0</b>	<b>-</b>	<b>5.6</b>	<b>04/2016</b>	<b>Maintain</b>
<i>MSCI EAFE (Net)</i>			17.3	6.4	-14.5	0.9	1.5	4.7	5.2		
IM International Large Cap Core Equity (MF) Median			17.1	5.2	-15.1	0.8	1.2	3.8	4.7		
Mellon EAFE Fund Rank			50	23	29	37	22	-	19		
<b>Mellon Emerging Markets</b>	<b>15,349,104</b>	<b>7.3</b>	<b>9.7</b>	<b>-3.2</b>	<b>-20.6</b>	<b>-2.9</b>	<b>-1.5</b>	<b>-</b>	<b>4.4</b>	<b>04/2016</b>	<b>Maintain</b>
<i>MSCI Emerging Markets (Net)</i>			9.7	-3.0	-20.1	-2.7	-1.4	1.4	4.5		
IM Emerging Markets Equity (MF) Median			9.9	-2.3	-22.4	-3.2	-1.7	1.2	4.1		
Mellon Emerging Markets Rank			55	61	35	46	45	-	42		
<b>Private Equity</b>	<b>750,856</b>	<b>0.4</b>	<b>0.0</b>	<b>-6.3</b>	<b>-12.1</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>2.2</b>	<b>01/2021</b>	
<b>Hamilton Lane II</b>	<b>24,774</b>	<b>0.0</b>	<b>0.0</b>	<b>3.5</b>	<b>-4.6</b>	<b>-2.8</b>	<b>8.8</b>	<b>11.5</b>	<b>14.4</b>	<b>03/2009</b>	<b>Maintain</b>
<b>Hamilton Lane VII A</b>	<b>507,323</b>	<b>0.2</b>	<b>0.0</b>	<b>-7.5</b>	<b>-13.4</b>	<b>9.9</b>	<b>11.7</b>	<b>12.3</b>	<b>11.6</b>	<b>07/2011</b>	<b>Maintain</b>
<b>Hamilton Lane VII B</b>	<b>218,759</b>	<b>0.1</b>	<b>0.0</b>	<b>-4.5</b>	<b>-9.7</b>	<b>2.4</b>	<b>4.5</b>	<b>8.2</b>	<b>8.6</b>	<b>07/2011</b>	<b>Maintain</b>

Manager performance for mutual funds and ETFs is based on NAV and provided by Lipper. Performance for non-mutual fund or ETF investments is based on the returns provided by managers, calculations based on a manager statement, or calculations based on a statement or data from the client's custodian. Funds may include returns of an equivalent share class with a longer return history if period includes dates prior to the fund's inception. Returns are net of fees unless otherwise stated. The fund's inception date represents the first month the client made the investment. Composite performance includes all funds held in the composite since inception. Inception dates for asset class composites reflect the start date at which these returns could be calculated using historical and existing system capabilities and may vary from the inception dates of underlying component strategies.



## Manager Performance

Total Invested Assets (excluding Prepaid)

As of December 31, 2022

	Allocation		Performance(%)								Manager Status
	Market Value (\$)	%	QTR	Fiscal YTD	1 Year	3 Years	5 Years	10 Years	Since Inception	Inception Date	
<b>Real Assets</b>	<b>11,321,638</b>	<b>5.4</b>	<b>-5.3</b>	<b>-8.2</b>	<b>-1.9</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>6.5</b>	<b>01/2021</b>	
<i>Real Assets Benchmark</i>			<i>-4.4</i>	<i>-3.8</i>	<i>6.8</i>	<i>-</i>	<i>-</i>	<i>-</i>	<i>12.9</i>		
<b>UBS Trumbull Property Fund</b>	<b>11,321,638</b>	<b>5.4</b>	<b>-5.4</b>	<b>-8.3</b>	<b>1.9</b>	<b>3.7</b>	<b>2.8</b>	<b>-</b>	<b>3.5</b>	<b>07/2016</b>	<b>Terminate</b>
<i>NCREIF Fund Index - ODCE (net)</i>			<i>-5.1</i>	<i>-4.8</i>	<i>6.6</i>	<i>9.0</i>	<i>7.7</i>	<i>9.1</i>	<i>7.6</i>		
<b>Molpus SWF II</b>	<b>-</b>	<b>0.0</b>	<b>-0.2</b>	<b>-0.2</b>	<b>-15.8</b>	<b>0.0</b>	<b>-0.4</b>	<b>1.3</b>	<b>1.6</b>	<b>03/2009</b>	<b>Maintain</b>
<i>NCREIF Timberland Index</i>			<i>0.0</i>	<i>2.4</i>	<i>7.6</i>	<i>5.8</i>	<i>4.4</i>	<i>5.1</i>	<i>4.0</i>		

### Valuations data as of:

Hamilton Lane VII - 9/30/2022

Hamilton Lane II - 9/30/2022

UBS Trumbull Property Fund - 12/31/2022

All private equity and real estate assets are adjusted for any capital activity.

Manager performance for mutual funds and ETFs is based on NAV and provided by Lipper. Performance for non-mutual fund or ETF investments is based on the returns provided by managers, calculations based on a manager statement, or calculations based on a statement or data from the client's custodian. Funds may include returns of an equivalent share class with a longer return history if period includes dates prior to the fund's inception. Returns are net of fees unless otherwise stated. The fund's inception date represents the first month the client made the investment. Composite performance includes all funds held in the composite since inception. Inception dates for asset class composites reflect the start date at which these returns could be calculated using historical and existing system capabilities and may vary from the inception dates of underlying component strategies.



## Calendar Year Performance

Total Invested Assets (excluding Prepaid)

As of December 31, 2022

	Performance(%)									
	2021	2020	2019	2018	2017	2016	2015	2014	2013	2012
<b>Total Invested Assets (excluding Prepaid)</b>	<b>14.7</b>	<b>12.7</b>	<b>19.1</b>	<b>-5.2</b>	<b>17.0</b>	<b>8.7</b>	<b>-2.2</b>	<b>4.0</b>	<b>7.7</b>	<b>12.5</b>
<i>Policy Benchmark</i>	14.3	14.5	20.6	-5.2	16.9	9.0	-0.2	7.3	19.0	13.8
<i>Secondary Benchmark</i>	14.1	14.0	19.8	-5.3	16.7	9.1	-0.2	7.1	19.0	13.8
<b>Short Term Liquidity</b>	<b>0.0</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>
<i>90 Day U.S. Treasury Bill</i>	0.0	0.7	2.3	1.9	0.9	0.3	0.0	0.0	0.0	0.1
<b>Key Bank Cash Portfolio</b>	<b>0.0</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>
<i>90 Day U.S. Treasury Bill</i>	0.0	0.7	2.3	1.9	0.9	0.3	0.0	0.0	0.0	0.1
<b>First American Govt Oblig Fund Z</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>
<i>90 Day U.S. Treasury Bill</i>	0.0	0.7	2.3	1.9	0.9	0.3	0.0	0.0	0.0	0.1
<b>Fixed Income</b>	<b>-2.0</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>
<i>Blmbg. U.S. Aggregate</i>	-1.5	7.5	8.7	0.0	3.5	2.6	0.5	6.0	-2.0	4.2
<b>JIC Core Bond Fund I</b>	<b>-2.0</b>	<b>9.7</b>	<b>8.9</b>	<b>0.1</b>	<b>3.7</b>	<b>3.7</b>	<b>1.2</b>	<b>6.8</b>	<b>-1.9</b>	<b>5.0</b>
<i>Blmbg. U.S. Aggregate</i>	-1.5	7.5	8.7	0.0	3.5	2.6	0.5	6.0	-2.0	4.2
IM U.S. Broad Market Core Fixed Income (MF) Median	-1.3	8.2	8.8	-0.6	3.6	2.9	0.0	5.5	-2.0	6.0
JIC Core Bond Fund I Rank	84	14	45	13	46	29	5	10	46	72
<b>BlackRock Strategic Income Opportunities K</b>	<b>1.0</b>	<b>7.3</b>	<b>7.8</b>	<b>-0.5</b>	<b>5.0</b>	<b>3.6</b>	<b>-0.6</b>	<b>3.6</b>	<b>3.0</b>	<b>9.6</b>
<i>Blmbg. U.S. Aggregate</i>	-1.5	7.5	8.7	0.0	3.5	2.6	0.5	6.0	-2.0	4.2
IM Alternative Credit Focus (MF) Median	1.9	3.9	7.3	-1.9	4.5	4.9	-1.6	1.0	-0.1	9.2
BlackRock Strategic Income Opportunities K Rank	58	17	43	29	43	64	25	21	31	44



## Calendar Year Performance

Total Invested Assets (excluding Prepaid)

As of December 31, 2022

	Performance(%)									
	2021	2020	2019	2018	2017	2016	2015	2014	2013	2012
<b>Equity</b>	<b>18.7</b>	-	-	-	-	-	-	-	-	-
<i>MSCI AC World Index (Net)</i>	18.5	16.3	26.6	-9.4	24.0	7.9	-2.4	4.2	22.8	16.1
<b>Domestic Equity</b>	<b>26.1</b>	-	-	-	-	-	-	-	-	-
<i>Domestic Equity Benchmark</i>	26.5	19.3	30.1	-6.6	19.9	14.2	-0.1	11.3	34.0	16.7
<b>Mellon Large Cap Core</b>	<b>28.7</b>	<b>18.3</b>	<b>31.4</b>	<b>-4.4</b>	<b>21.8</b>	-	-	-	-	-
<i>S&amp;P 500</i>	28.7	18.4	31.5	-4.4	21.8	12.0	1.4	13.7	32.4	16.0
IM U.S. Large Cap Core Equity (MF) Median	26.9	18.4	30.6	-5.4	21.4	9.7	0.5	11.5	31.8	15.4
Mellon Large Cap Core Rank	25	52	38	32	45	-	-	-	-	-
<b>Mellon Smid Cap Core</b>	<b>18.4</b>	<b>20.0</b>	<b>27.9</b>	<b>-9.9</b>	<b>17.0</b>	-	-	-	-	-
<i>Russell 2500 Index</i>	18.2	20.0	27.8	-10.0	16.8	17.6	-2.9	7.1	36.8	17.9
IM U.S. SMID Cap Equity (MF) Median	20.2	17.6	27.6	-9.6	18.0	15.4	-3.2	5.7	36.6	16.3
Mellon Smid Cap Core Rank	56	47	47	52	55	-	-	-	-	-
<b>International Equity</b>	<b>5.6</b>	-	-	-	-	-	-	-	-	-
<i>International Equity Benchmark</i>	6.7	13.2	20.3	-14.1	31.1	6.2	-8.0	-3.5	9.5	17.9
<b>Mellon EAFE Fund</b>	<b>11.5</b>	<b>8.6</b>	<b>22.3</b>	<b>-13.3</b>	<b>25.7</b>	-	-	-	-	-
<i>MSCI EAFE (Net)</i>	11.3	7.8	22.0	-13.8	25.0	1.0	-0.8	-4.9	22.8	17.3
IM International Large Cap Core Equity (MF) Median	10.7	9.1	22.1	-15.0	25.0	0.0	-1.9	-6.0	20.4	18.0
Mellon EAFE Fund Rank	36	57	46	13	40	-	-	-	-	-
<b>Mellon Emerging Markets</b>	<b>-2.5</b>	<b>18.3</b>	<b>18.4</b>	<b>-14.6</b>	<b>37.2</b>	-	-	-	-	-
<i>MSCI Emerging Markets (Net)</i>	-2.5	18.3	18.4	-14.6	37.3	11.2	-14.9	-2.2	-2.6	18.2
IM Emerging Markets Equity (MF) Median	-1.6	17.7	20.2	-16.5	35.7	8.3	-13.7	-3.0	-1.5	18.8
Mellon Emerging Markets Rank	58	47	63	29	44	-	-	-	-	-
<b>Private Equity</b>	<b>18.8</b>	-	-	-	-	-	-	-	-	-
<b>Hamilton Lane II</b>	<b>-22.9</b>	<b>24.7</b>	<b>32.7</b>	<b>25.5</b>	<b>13.6</b>	<b>8.9</b>	<b>17.2</b>	<b>10.4</b>	<b>21.0</b>	<b>10.7</b>
<b>Hamilton Lane VII A</b>	<b>33.9</b>	<b>14.6</b>	<b>13.9</b>	<b>14.7</b>	<b>9.9</b>	<b>9.0</b>	<b>8.5</b>	<b>16.8</b>	<b>20.6</b>	<b>9.4</b>
<b>Hamilton Lane VII B</b>	<b>0.4</b>	<b>18.6</b>	<b>6.8</b>	<b>8.3</b>	<b>10.7</b>	<b>9.1</b>	<b>12.1</b>	<b>9.0</b>	<b>20.3</b>	<b>13.4</b>



## Calendar Year Performance

Total Invested Assets (excluding Prepaid)

As of December 31, 2022

	Performance(%)									
	2021	2020	2019	2018	2017	2016	2015	2014	2013	2012
<b>Real Assets</b>	<b>15.7</b>	-	-	-	-	-	-	-	-	-
<i>Real Assets Benchmark</i>	19.3	-	-	-	-	-	-	-	-	-
<b>UBS Trumbull Property Fund</b>	<b>15.2</b>	<b>-5.1</b>	<b>-3.0</b>	<b>6.0</b>	<b>5.2</b>	-	-	-	-	-
<i>NCREIF Fund Index - ODCE (net)</i>	21.0	0.3	4.4	7.4	6.7	7.8	14.0	11.5	12.9	9.8
<b>Molpus SWF II</b>	<b>18.6</b>	<b>0.2</b>	<b>-3.0</b>	<b>1.1</b>	<b>-2.6</b>	<b>1.1</b>	<b>6.3</b>	<b>2.2</b>	<b>8.7</b>	<b>5.6</b>
<i>NCREIF Timberland Index</i>	9.2	0.8	1.3	3.2	3.6	0.6	5.0	10.5	9.7	7.7





# Manager Status Commentary

City of Burlington Employees Retirement System

As of December 31, 2022

Manager	Recommendation	Comments
<b>Fixed Income</b>		
JIC Core Bond Fund I	Maintain	
BlackRock Strategic Income Opportunities K	Discuss 3Q 2022	BlackRock Strategic Income Opportunities remains on Discuss. BlackRock announced that Bob Miller, one of the portfolio managers on the strategy, will be retiring at the end of March 2023. Rick Rieder, CIO of Global Fixed Income, and David Rogal will remain as portfolio managers on the strategy. In addition, Russ Brownback has been named a portfolio manager alongside Mr. Rieder and Mr. Rogal.
<b>Equity</b>		
<b>Domestic Equity</b>		
Mellon Large Cap Core	Maintain	
Mellon Smid Cap Core	Maintain	
<b>International Equity</b>		
Mellon EAFE Fund	Maintain	
Mellon Emerging Markets	Maintain	
<b>Private Equity</b>		
Hamilton Lane II	Maintain	
Hamilton Lane VII A	Maintain	
Hamilton Lane VII B	Maintain	
<b>Real Assets</b>		
UBS Trumbull Property Fund	Terminate	Following the departures of two key team members in 2020, Matt Lynch, Head of US Real Estate, and Jack Connelly, Head of Transactions, the UBS Trumbull Property Fund was evaluated for potential impacts and conversation with the team took place. Following this due diligence the Trumbull Property Fund was moved to terminate status. A significant redemption queue remains for the Fund. Redemptions are paid out on a pro-rata basis according to the ratio of the requesting investor's units to the total units of all investors requesting redemptions. It is anticipated that satisfying the pool will be a multi-year process.



# Investment Gain/Loss Summary

City of Burlington Employees Retirement System

1 Quarter Ending December 31, 2022

	Market Value as of 10/01/2022	Net Contributions	Gain/Loss	Market Value As of 12/31/2022
<b>Total Plan</b>	<b>195,000,450</b>	<b>-1,452,216</b>	<b>14,448,333</b>	<b>207,996,568</b>
Prepaid Pension Benefits	-1,133,896	-1,446,779	-	-2,580,675
<b>Total Invested Assets</b>	<b>196,134,346</b>	<b>-5,436</b>	<b>14,448,333</b>	<b>210,577,242</b>
<b>Short Term Liquidity</b>	<b>6,728,561</b>	<b>-6,262,188</b>	<b>5,913</b>	<b>472,286</b>
Key Bank Cash Portfolio	3,189,398	-2,756,751	-	432,647
First American Govt Oblig Fund Z	3,539,163	-3,505,436	5,913	39,639
<b>Fixed Income</b>	<b>40,735,819</b>	<b>12,750,000</b>	<b>816,927</b>	<b>54,302,746</b>
JIC Core Bond Fund I	32,013,808	5,150,000	615,950	37,779,758
BlackRock Strategic Income Opportunities K	8,722,011	7,600,000	200,977	16,522,988
<b>Equity</b>	<b>136,031,920</b>	<b>-5,828,711</b>	<b>14,277,364</b>	<b>144,480,573</b>
<b>Domestic Equity</b>	<b>79,194,282</b>	<b>-450,000</b>	<b>5,923,776</b>	<b>84,668,058</b>
Mellon Large Cap Core	60,160,736	850,000	4,543,937	65,554,673
Mellon Smid Cap Core	19,033,546	-1,300,000	1,379,839	19,113,385
<b>International Equity</b>	<b>56,058,071</b>	<b>-5,350,000</b>	<b>8,353,588</b>	<b>59,061,659</b>
Mellon EAFE Fund	40,894,698	-4,150,000	6,967,857	43,712,555
Mellon Emerging Markets	15,163,373	-1,200,000	1,385,731	15,349,104
<b>Private Equity</b>	<b>779,567</b>	<b>-28,711</b>	<b>-</b>	<b>750,856</b>
Hamilton Lane II	24,774	-	-	24,774
Hamilton Lane VII A	525,512	-18,189	-	507,323
Hamilton Lane VII B	229,281	-10,522	-	218,759
<b>Real Assets</b>	<b>12,638,046</b>	<b>-664,538</b>	<b>-651,870</b>	<b>11,321,638</b>
UBS Trumbull Property Fund	12,315,875	-342,884	-651,354	11,321,638
Molpus SWF II	322,171	-321,654	-517	-



## Portfolio Statistics

Total Invested Assets

As of December 31, 2022

	QTD	1 Year	3 Years	5 Years	10 Years	Since Inception	Inception Date
Return	7.4	-15.5	3.0	4.3	5.5	4.7	01/2008
Standard Deviation	3.9	16.0	18.5	15.8	11.9	13.4	
Upside Risk	4.3	2.7	13.4	11.7	9.1	10.2	
Downside Risk	1.7	13.7	12.9	10.8	7.9	8.8	
<b>vs. Policy Benchmark</b>							
Alpha	0.0	-0.7	0.6	1.1	1.1	2.8	
Beta	1.0	1.0	0.8	0.7	0.6	0.4	
Information Ratio	-0.3	-2.0	0.0	0.0	-0.2	-0.1	
Tracking Error	0.1	0.4	13.6	12.8	10.6	14.2	
<b>vs. 90 Day U.S. Treasury Bill</b>							
Sharpe Ratio	0.6	-1.1	0.2	0.3	0.4	0.4	

Calculation based on monthly periodicity.



## Estimated Fee Analysis

Total Invested Assets

As of December 31, 2022

	Market Value (\$)	Estimated Annual Fee (\$)	Estimated Annual Fee (%)	Fee Schedule Details (Ex. Mutual Fund Investments)
<b>Total Invested Assets</b>	<b>210,577,242</b>	<b>330,922</b>	<b>0.16</b>	
<b>Short Term Liquidity</b>	<b>472,286</b>	-	-	
Key Bank Cash Portfolio	432,647	-	-	
First American Govt Oblig Fund Z	39,639	-	-	
<b>Fixed Income</b>	<b>54,302,746</b>	<b>191,935</b>	<b>0.35</b>	
JIC Core Bond Fund I	37,779,758	94,449	0.25	
BlackRock Strategic Income Opportunities K	16,522,988	97,486	0.59	
<b>Equity</b>	<b>144,480,573</b>	<b>32,584</b>	<b>0.02</b>	
<b>Domestic Equity</b>	<b>84,668,058</b>	<b>8,658</b>	<b>0.01</b>	
Mellon Large Cap Core	65,554,673	6,555	0.01	0.01 % of Assets
Mellon Smid Cap Core	19,113,385	2,102	0.01	0.01 % of Assets
<b>International Equity</b>	<b>59,061,659</b>	<b>16,417</b>	<b>0.03</b>	
Mellon EAFE Fund	43,712,555	8,743	0.02	0.02 % of Assets
Mellon Emerging Markets	15,349,104	7,675	0.05	0.05 % of Assets
<b>Private Equity</b>	<b>750,856</b>	<b>7,509</b>	<b>1.00</b>	
Hamilton Lane II	24,774	248	1.00	1.00 % of Assets
Hamilton Lane VII A	507,323	5,073	1.00	1.00 % of Assets
Hamilton Lane VII B	218,759	2,188	1.00	1.00 % of Assets
<b>Real Assets</b>	<b>11,321,638</b>	<b>106,404</b>	<b>0.94</b>	
UBS Trumbull Property Fund	11,321,638	106,404	0.94	0.96 % of First \$10 M 0.83 % Thereafter

The figures on this page have been obtained from sources we deem to be reliable. Fiducient Advisors has not independently verified this information.

Fee calculations for mutual funds represent fees at the net expense level. Fee calculations for commingled funds and/or alternative investments reflect base management fees and exclude underlying fund expenses captured at the NAV level, any applicable performance-based fees, or incentive fees. Fees for fund of funds are shown at the fund of fund level and do not include fees charged by underlying investment managers/funds.



## Liquidity Schedule

### Total Invested Assets

As of December 31, 2022

Investments	Inception	Subscriptions	Redemptions	Market Value (\$)	Liquid (\$)	Semi Liquid (\$)	Illiquid (\$)
Key Bank Cash Portfolio	09/2015	Daily	Liquid	432,647	432,647	-	-
First American Govt Oblig Fund Z	02/2022	Daily	Liquid	39,639	39,639	-	-
JIC Core Bond Fund I	02/2020	Daily	Liquid	37,779,758	37,779,758	-	-
BlackRock Strategic Income Opportunities K	02/2022	Daily	Liquid	16,522,988	16,522,988	-	-
Mellon Large Cap Core	03/2016	Daily	Liquid	65,554,673	65,554,673	-	-
Mellon Smid Cap Core	03/2016	Daily	Liquid	19,113,385	19,113,385	-	-
Mellon EAFE Fund	03/2016	Daily	Liquid	43,712,555	43,712,555	-	-
Mellon Emerging Markets	03/2016	Daily	Liquid	15,349,104	15,349,104	-	-
Hamilton Lane II	03/2009	Illiquid	Illiquid	24,774	-	-	24,774
Hamilton Lane VII A	09/2011	Illiquid	Illiquid	507,323	-	-	507,323
Hamilton Lane VII B	09/2011	Illiquid	Illiquid	218,759	-	-	218,759
UBS Trumbull Property Fund	09/2016	Quarterly	Semi Liquid	11,321,638	-	11,321,638	-
<b>Total (\$)</b>				<b>210,577,242</b>	<b>198,504,749</b>	<b>11,321,638</b>	<b>750,856</b>

Liquid – daily to monthly | Semi-Liquid – greater than monthly and up to one year | Illiquid – greater than one year

The figures on this page have been obtained from sources we deem to be reliable. Fiducient Advisors has not independently verified this information.



## Liquidity Schedule

Total Invested Assets

As of December 31, 2022

Redemptions	Market Value (\$)	% of Total Plan
Illiquid	750,856	0.4
Semi Liquid	11,321,638	5.4
Liquid	198,504,749	94.3
<b>Total</b>	<b>210,577,242</b>	<b>100.0</b>

Liquid – daily to monthly | Semi-Liquid – greater than monthly and up to one year | Illiquid – greater than one year

The figures on this page have been obtained from sources we deem to be reliable. Fiducient Advisors has not independently verified this information.



# Definitions & Disclosures

Please note: Due to rounding methodologies of various data providers, certain returns in this report might differ slightly when compared to other sources

## REGULATORY DISCLOSURES

**Offer of ADV Part 2A:** Rule 204-3 under the Investment Advisers Act of 1940 requires that we make an annual offer to clients to send them, without charge, a written disclosure statement meeting the requirements of such rule. We will be glad to send a copy of our ADV Part 2A to you upon your written request to [compliance@fiducient.com](mailto:compliance@fiducient.com).

## INDEX DEFINITIONS

- **Citigroup 3 Month T-Bill** measures monthly return equivalents of yield averages that are not marked to market. The Three-Month Treasury Bill Indexes consist of the last three three-month Treasury bill issues.
- **Ryan 3 Yr. GIC** is an arithmetic mean of market rates of \$1 million Guaranteed Interest Contracts held for three years.
- **Bloomberg Treasury U.S. T-Bills-1-3 Month Index** includes aged U.S. Treasury bills, notes and bonds with a remaining maturity from 1 up to (but not including) 3 months. It excludes zero coupon strips.
- **Bloomberg Capital US Treasury Inflation Protected Securities Index** consists of Inflation-Protection securities issued by the U.S. Treasury.
- **Bloomberg Muni Index** is a rules-based, market-value-weighted index engineered for the long-term tax-exempt bond market. Bonds must be rated investment-grade by at least two ratings agencies.
- **Bloomberg Muni 1 Year Index** is the 1-year (1-2) component of the Municipal Bond index.
- **Bloomberg Muni 3 Year Index** is the 3-year (2-4) component of the Municipal Bond index.
- **Bloomberg Muni 5 Year Index** is the 5-year (4-6) component of the Municipal Bond index.
- **Bloomberg Muni 7 Year Index** is the 7-year (6-8) component of the Municipal Bond index.
- **Bloomberg Intermediate U.S. Gov't/Credit** is the Intermediate component of the U.S. Government/Credit index, which includes securities in the Government and Credit Indices. The Government Index includes treasuries and agencies, while the credit index includes publicly issued U.S. corporate and foreign debentures and secured notes that meet specified maturity, liquidity, and quality requirements.
- **Bloomberg U.S. Aggregate Index** covers the U.S. investment grade fixed rate bond market, with index components for government and corporate securities, mortgage pass-through securities, and asset-backed securities.
- **Bloomberg Global Aggregate ex. USD Indices** represent a broad-based measure of the global investment-grade fixed income markets. The two major components of this index are the Pan-European Aggregate and the Asian-Pacific Aggregate Indices. The index also includes Eurodollar and Euro-Yen corporate bonds and Canadian government, agency and corporate securities.
- **Bloomberg U.S. Corporate High Yield Index** covers the universe of fixed rate, non-investment grade debt. Eurobonds and debt issues from countries designated as emerging markets (sovereign rating of Baa1/BBB+/BBB+ and below using the middle of Moody's, S&P, and Fitch) are excluded, but Canadian and global bonds (SEC registered) of issuers in non-EMG countries are included.
- **JP Morgan Government Bond Index-Emerging Market (GBI-EM) Index** is a comprehensive, global local emerging markets index, and consists of regularly traded, liquid fixed-rate, domestic currency government bonds to which international investors can gain exposure.
- **The S&P 500** is a capitalization-weighted index of 500 stocks designed to measure performance of the broad domestic economy through changes in the aggregate market value of 500 stocks representing all major industries.
- **The Dow Jones Industrial Index** is a price-weighted average of 30 blue-chip stocks that are generally the leaders in their industry.
- **The NASDAQ** is a broad-based capitalization-weighted index of stocks in all three NASDAQ tiers: Global Select, Global Market and Capital Market.
- **Russell 3000** is a market-cap-weighted index which consists of roughly 3,000 of the largest companies in the U.S. as determined by market capitalization. It represents nearly 98% of the investable U.S. equity market.
- **Russell 1000** consists of the largest 1000 companies in the Russell 3000 Index.
- **Russell 1000 Growth** measures the performance of those Russell 1000 companies with higher P/B ratios and higher forecasted growth values.
- **Russell 1000 Value** measures the performance of those Russell 1000 companies with lower P/B ratios and lower forecasted growth values.
- **Russell Mid Cap** measures the performance of the 800 smallest companies in the Russell 1000 Index.
- **Russell Mid Cap Growth** measures the performance of those Russell Mid Cap companies with higher P/B ratios and higher forecasted growth values.
- **Russell Mid Cap Value** measures the performance of those Russell Mid Cap companies with lower P/B ratios and lower forecasted growth values.
- **Russell 2000** consists of the 2,000 smallest U.S. companies in the Russell 3000 index.
- **Russell 2000 Growth** measures the performance of the Russell 2000 companies with higher P/B ratios and higher forecasted growth values.
- **Russell 2000 Value** measures the performance of those Russell 2000 companies with lower P/B ratios and lower forecasted growth values.
- **Russell 2500** consists of the 2,500 smallest U.S. companies in the Russell 3000 index.
- **Russell 2500 Growth** measures the performance of the Russell 2500 companies with higher P/B ratios and higher forecasted growth values.
- **Russell 2500 Value** measures the performance of those Russell 2500 companies with lower P/B ratios and lower forecasted growth values.
- **MSCI World** captures large and mid-cap representation across 23 Developed Markets countries. With 1,645 constituents, the index covers approximately 85% of the free float-adjusted market capitalization in each country.
- **MSCI ACWI (All Country World Index) ex. U.S. Index** captures large and mid-cap representation across 22 of 23 Developed Markets countries (excluding the United States) and 23 Emerging Markets countries. With 1,859 constituents, the index covers approximately 85% of the global equity opportunity set outside the US.
- **MSCI ACWI (All Country World Index) ex. U.S. Small Cap Index** captures small cap representation across 22 of 23 Developed Markets countries (excluding the US) and 23 Emerging Markets countries. With 4,368 constituents, the index covers approximately 14% of the global equity opportunity set outside the US.
- **MSCI EAFE** is an equity index which captures large and mid-cap representation across Developed Markets countries around the world, excluding the US and Canada. With 930 constituents, the index covers approximately 85% of the free float-adjusted market capitalization in each country.



- **MSCI EAFE Value** captures large and mid-cap securities exhibiting overall value style characteristics across Developed Markets countries around the world, excluding the US and Canada. The value investment style characteristics for index construction are defined using three variables: book value to price, 12-month forward earnings to price and dividend yield. With 507 constituents, the index targets 50% coverage of the free float-adjusted market capitalization of the MSCI EAFE Index.
- **MSCI EAFE Growth** captures large and mid-cap securities exhibiting overall growth style characteristics across Developed Markets countries around the world, excluding the US and Canada. The growth investment style characteristics for index construction are defined using five variables: long-term forward EPS growth rate, short-term forward EPS growth rate, current internal growth rate and long-term historical EPS growth trend and long-term historical sales per share growth trend. With 542 constituents, the index targets 50% coverage of the free float-adjusted market capitalization of the MSCI EAFE Index.
- **MSCI Emerging Markets** captures large and mid-cap representation across 23 Emerging Markets countries. With 836 constituents, the index covers approximately 85% of the free-float adjusted market capitalization in each country.
- **Consumer Price Index** is a measure of prices paid by consumers for a market basket of consumer goods and services. The yearly (or monthly) growth rates represent the inflation rate.
- **FTSE NAREIT Equity REITs Index** contains all Equity REITs not designed as Timber REITs or Infrastructure REITs.
- **S&P Developed World Property** defines and measures the investable universe of publicly traded property companies domiciled in developed markets. The companies in the index are engaged in real estate related activities, such as property ownership, management, development, rental and investment.
- **S&P Developed World Property x U.S.** defines and measures the investable universe of publicly traded property companies domiciled in developed countries outside of the U.S. The companies included are engaged in real estate related activities, such as property ownership, management, development, rental and investment.
- **Fund Specific Broad Real Asset Benchmarks:**
  - **DWS Real Assets:** 30%: Dow Jones Brookfield Infrastructure Index, 30%: FTSE EPRA/NAREIT Developed Index, 15%: Bloomberg Commodity Index, 15%: S&P Global Natural Resources Index, 10%: U.S. Treasury Inflation Notes Total Return Index
  - **PIMCO Inflation Response Multi Asset Fund:** 45% Bloomberg U.S. TIPS, 20% Bloomberg Commodity Index, 15% JP Morgan Emerging Local Markets Plus, 10% Dow Jones Select REIT, 10% Bloomberg Gold Subindex Total Return
  - **Principal Diversified Real Assets:** 35% BbgBarc U.S. Treasury TIPS Index, 20% S&P Global Infrastructure Index NTR, 20% S&P Global Natural Resources Index NTR, 15% Bloomberg Commodity Index, and 10% FTSE EPRA/NAREIT Developed Index NTR
  - **Wellington Diversified Inflation H:** 50% MSCI ACWI Commodity Producers Index, 25% Bloomberg Commodity Index, and 25% Bloomberg Bloomberg US TIPS 1 – 10 Year Index
- **Bloomberg Commodity Index** is calculated on an excess return basis and reflects commodity futures price movements. The index rebalances annually weighted 2/3 by trading volume and 1/3 by world production and weight-caps are applied at the commodity, sector and group level for diversification.
- **HFRI Fund Weighted Composite Index** is a global, equal-weighted index of over 2,000 single-manager funds that report to HFR Database. Constituent funds report monthly net of all fees performance in US Dollar and have a minimum of \$50 Million under management or a twelve (12) month track record of active performance. The HFRI Fund Weighted Composite Index does not include Funds of Hedge Funds.
- **The Alerian MLP Index** is the leading gauge of energy Master Limited Partnerships (MLPs). The float adjusted, capitalization-weighted index, whose constituents represent approximately 85% of total float-adjusted market capitalization, is disseminated real-time on a price-return basis (AMZ) and on a total-return basis.
- **The Adjusted Alerian MLP Index** is commensurate with 65% of the monthly returns of the Alerian MLP Index to incorporate the effect of deferred tax liabilities incurred by MLP entities.
- **Cambridge Associates U.S. Private Equity Index** is based on data compiled from more than 1,200 institutional-quality buyout, growth equity, private equity energy, and mezzanine funds formed between 1986 and 2015.
- **Cambridge Associates U.S. Venture Capital Index** is based on data compiled from over 1,600 institutional-quality venture capital funds formed between 1986 and 2015.
- **Vanguard Spliced Bloomberg US1-5Yr Gov/Cr Flt Adj Index:** Bloomberg U.S. 1–5 Year Government/Credit Bond Index through December 31, 2009; Bloomberg U.S. 1–5 Year Government/Credit Float Adjusted Index thereafter.
- **Vanguard Spliced Bloomberg US5-10Yr Gov/Cr Flt Adj Index:** Bloomberg U.S. 5–10 Year Government/Credit Bond Index through December 31, 2009; Bloomberg U.S. 5–10 Year Government/Credit Float Adjusted Index thereafter.
- **Vanguard Spliced Bloomberg US Agg Flt Adj Index:** Bloomberg U.S. Aggregate Bond Index through December 31, 2009; Bloomberg U.S. Aggregate Float Adjusted Index thereafter.
- **Vanguard Spliced Bloomberg US Long Gov/Cr Flt Adj Index:** Bloomberg U.S. Long Government/Credit Bond Index through December 31, 2009; Bloomberg U.S. Long Government/Credit Float Adjusted Index thereafter.
- **Vanguard Balanced Composite Index:** Made up of two unmanaged benchmarks, weighted 60% Dow Jones U.S. Total Stock Market Index (formerly the Dow Jones Wilshire 5000 Index) and 40% Bloomberg U.S. Aggregate Bond Index through May 31, 2005; 60% MSCI US Broad Market Index and 40% Bloomberg U.S. Aggregate Bond Index through December 31, 2009; 60% MSCI US Broad Market Index and 40% Bloomberg U.S. Aggregate Float Adjusted Index through January 14, 2013; and 60% CRSP US Total Market Index and 40% Bloomberg U.S. Aggregate Float Adjusted Index thereafter.
- **Vanguard Spliced Intermediate-Term Tax-Exempt Index:** Bloomberg 1–15 Year Municipal Bond Index.
- **Vanguard Spliced Extended Market Index:** Dow Jones Wilshire 4500 Index through June 17, 2005; S&P Transitional Completion Index through September 16, 2005; S&P Completion Index thereafter.
- **Vanguard Spliced Value Index:** S&P 500 Value Index (formerly the S&P 500/Barra Value Index) through May 16, 2003; MSCI US Prime Market Value Index through April 16, 2013; CRSP US Large Cap Value Index thereafter.
- **Vanguard Spliced Large Cap Index:** Consists of MSCI US Prime Market 750 Index through January 30, 2013, and the CRSP US Large Cap Index thereafter.
- **Vanguard Spliced Growth Index:** S&P 500 Growth Index (formerly the S&P 500/Barra Growth Index) through May 16, 2003; MSCI US Prime Market Growth Index through April 16, 2013; CRSP US Large Cap Growth Index thereafter.
- **Vanguard Spliced Mid Cap Value Index:** MSCI US Mid Cap Value Index through April 16, 2013; CRSP US Mid Cap Value Index thereafter.
- **Vanguard Spliced Mid Cap Index:** S&P MidCap 400 Index through May 16, 2003; the MSCI US Mid Cap 450 Index through January 30, 2013; and the CRSP US Mid Cap Index thereafter.
- **Vanguard Spliced Mid Cap Growth Index:** MSCI US Mid Cap Growth Index through April 16, 2013; CRSP US Mid Cap Growth Index thereafter.
- **Vanguard Spliced Total Stock Market Index:** Dow Jones U.S. Total Stock Market Index (formerly known as the Dow Jones Wilshire 5000 Index) through April 22, 2005; MSCI US Broad Market Index through June 2, 2013; and CRSP US Total Market Index thereafter.
- **Vanguard Spliced Small Cap Value Index:** SmallCap 600 Value Index (formerly the S&P SmallCap 600/Barra Value Index) through May 16, 2003; MSCI US Small Cap Value Index through April 16, 2013; CRSP US Small Cap Value Index thereafter.





- **Vanguard Spliced Small Cap Index:** Russell 2000 Index through May 16, 2003; the MSCI US Small Cap 1750 Index through January 30, 2013; and the CRSP US Small Cap Index thereafter.
- **Vanguard Spliced Small Cap Growth Index:** S&P SmallCap 600 Growth Index (formerly the S&P SmallCap 600/Barra Value Index) through May 16, 2003; MSCI US Small Cap Growth Index through April 16, 2013; CRSP US Small Cap Growth Index thereafter.
- **Vanguard Spliced Total International Stock Index:** Consists of the Total International Composite Index through August 31, 2006; the MSCI EAFE + Emerging Markets Index through December 15, 2010; the MSCI AC USA IMI Index through June 2, 2013; and FTSE Global All Cap ex US Index thereafter. Benchmark returns are adjusted for withholding taxes.
- **Vanguard Spliced Developed Markets Index:** MSCI EAFE Index through May 28, 2013; FTSE Developed ex North America Index through December 20, 2015; FTSE Developed All Cap ex US Transition Index through May 31, 2016; FTSE Developed All Cap ex US Index thereafter. Benchmark returns are adjusted for withholding taxes.
- **Vanguard Spliced Emerging Markets Index:** Select Emerging Markets Index through August 23, 2006; MSCI Emerging Markets Index through January 9, 2013; FTSE Emerging Transition Index through June 27, 2013; FTSE Emerging Index through November 1, 2015; and FTSE Emerging Markets All Cap China A Transition Index thereafter. Benchmark returns are adjusted for withholding taxes.
- **Vanguard REIT Spliced Index:** MSCI US REIT Index adjusted to include a 2% cash position (Lipper Money Market Average) through April 30, 2009; MSCI US REIT Index through January 31, 2018; MSCI US Investable Market Real Estate 25/50 Transition Index through July 24, 2018; MSCI US Investable Market Real Estate 25/50 Index thereafter.

#### **Additional:**

- Equity sector returns are calculated by Russell and MSCI for domestic and international markets, respectively. MSCI sector definitions correspond to the MSCI GICS® classification (Global Industry Classification System); Russell uses its own sector and industry classifications.
- MSCI country returns are calculated by MSCI and are free float-adjusted market capitalization indices that are designed to measure equity market performance in each specific country.
- Currency returns are calculated using Bloomberg's historical spot rate indices and are calculated using the U.S. dollar as the base currency.
- The Index of Leading Economic Indicators, calculated by The Conference Board, is used as a barometer of economic activity over a range of three to six months. The index is used to determine the direction and stability of the economy. The composite index of leading indicators, which is derived from 10 leading indicators, helps to signal turning points in the economy and forecast economic cycles. The leading indicators are the following: average weekly hours, average weekly initial claims, manufacturers' new orders, both consumer and non-defense capital goods, vendor performance, building permits, stock prices, money supply (M2), the interest rate spread and the index of consumer expectations.
- S&P Target Date Indexes are constructed using a survey method of current target date investments with \$100 million or more in assets under management. Allocations for each vintage are comprised of exchange-traded funds that represent respective asset classes used in target date portfolios. The indexes are designed to represent a market consensus glide path.

#### **DEFINITION OF KEY STATISTICS AND TERMS**

- **Returns:** A percentage figure used when reporting historical average compounded rate of investment return. All returns are annualized if the period for which they are calculated exceeds one year.
- **Universe Comparison:** The universe compares the fund's returns to a group of other investment portfolios with similar investment strategies. The returns for the fund, the index and the universe percentiles are displayed. A percentile ranking of 1 is the best, while a percentile ranking of 100 is the worst. For example, a ranking of 50 indicates the fund outperformed half of the universe. A ranking of 25 indicates the fund was in the top 25% of the universe, outperforming 75%.
- **Returns In Up/Down Markets:** This measures how the fund performed in both up and down markets. The methodology is to segregate the performance for each time period into the quarters in which the market, as defined by the index, was positive and negative. Quarters with negative index returns are treated as down markets, and quarters with positive index returns are treated as up markets. Thus, in a 3 year or 12 quarter period, there might be 4 down quarters and 8 up quarters. A simple arithmetic average of returns is calculated for the fund and the index based on the up quarters. A simple arithmetic average of returns is calculated for the fund and the index based on the down quarters. The up market capture ratio is the ratio of the fund's return in up markets to the index. The down market capture ratio is the ratio of the fund's return in down markets to the index. Ideally, the fund would have a greater up market capture ratio than down market capture ratio.
- **Standard Deviation:** Standard deviation is a statistical measure of the range of performance within which the total returns of a fund fall. When a fund has a high standard deviation, the range of performance is very wide, meaning there is a greater volatility. Approximately 68% of the time, the total return of any given fund will differ from the average total return by no more than plus or minus the standard deviation figure. Ninety-five percent of the time, a fund's total return will be within a range of plus or minus two times the standard deviation from the average total return. If the quarterly or monthly returns are all the same the standard deviation will be zero. The more they vary from one another, the higher the standard deviation. Standard deviation can be misleading as a risk indicator for funds with high total returns because large positive deviations will increase the standard deviation without a corresponding increase in the risk of the fund. While positive volatility is welcome, negative is not.
- **R-Squared:** This reflects the percentage of a fund's movements that are explained by movements in its benchmark index. An R-squared of 100 means that all movements of a fund are completely explained by movements in the index. Conversely, a low R-squared indicates very few of the fund's movements are explained by movements in the benchmark index. R-squared can also be used to ascertain the significance of a particular beta. Generally, a higher R-squared will indicate a more reliable beta figure. If the R-squared is lower, then the beta is less relevant to the fund's performance. A measure of diversification, R-squared indicates the extent to which fluctuations in portfolio returns are explained by market. An R-squared = 0.70 implies that 70% of the fluctuation in a portfolio's return is explained by the fluctuation in the market. In this instance, overweighting or underweighting of industry groups or individual securities is responsible for 30% of the fund's movement.
- **Beta:** This is a measure of a fund's market risk. The beta of the market is 1.00. Accordingly, a fund with a 1.10 beta is expected to perform 10% better than the market in up markets and 10% worse than the market in down markets. It is important to note, however, a low fund beta does not imply the fund has a low level of volatility; rather, a low beta means only that the fund's market-related risk is low. Because beta analyzes the market risk of a fund by showing how responsive the fund is to the market, its usefulness depends on the degree to which the markets determine the fund's total risk (indicated by R-squared).
- **Alpha:** The Alpha is the nonsystematic return, or the return that can't be attributed to the market. It can be thought of as how the manager performed if the market's return was zero. A positive alpha implies the manager added value to the return of the portfolio over that of the market. A negative alpha implies the manager did not contribute any value over the performance of the market.
- **Sharpe Ratio:** The Sharpe ratio is the excess return per unit of total risk as measured by standard deviation. Higher numbers are better, indicating more return for the level of risk experienced. The ratio is a fund's return minus the risk-free rate of return (30-day T-Bill rate) divided by the fund's standard deviation. The higher the Sharpe ratio, the more reward you are receiving per unit of total risk. This measure can be used to rank the performance of mutual funds or other portfolios.
- **Treynor Ratio:** The Treynor ratio measures returns earned in excess of that which could have been earned on a riskless investment per each unit of market risk. The ratio relates excess return over the risk-free rate to the additional risk taken; however, systematic risk is used instead of total risk. The Treynor ratio is similar to the Sharpe ratio, except in the fact that it uses the beta to evaluate the returns rather than the standard deviation of portfolio returns. High values mean better return for risk taken.



- **Tracking Error:** Tracking error measures the volatility of the difference in annual returns between the manager and the index. This value is calculated by measuring the standard deviation of the difference between manager and index returns. For example, a tracking error of +/- 5 would mean there is about a 68% chance (1 standard deviation event) that the manager's returns will fall within +/- 5% of the benchmark's annual return.
- **Information Ratio:** The information ratio is a measure of the consistency of excess return. This value is determined by taking the annualized excess return over a benchmark (style benchmark by default) and dividing the standard deviation of excess return.
- **Consistency:** Consistency shows the percent of the periods the fund has beaten the index and the percent of the periods the index has beat the fund. A high average for the fund (e.g., over 50) is desirable, indicating the fund has beaten the index frequently.
- **Downside Risk:** Downside risk is a measure similar to standard deviation but focuses only on the negative movements of the return series. It is calculated by taking the standard deviation of the negative quarterly set of returns. The higher the factor, the riskier the product.
- **M-Squared:** M-squared, or the Modigliani risk-adjusted performance measure is used to characterize how well a portfolio's return rewards an investor for the amount of risk taken, relative to that of some benchmark portfolio and to the risk-free rate.

#### DEFINITION OF KEY PRIVATE EQUITY TERMS

- **PIC (Paid in Capital):** The amount of committed capital that has been transferred from the limited partner to the general partner.
- **TVPI (Total Value to Paid in Capital):** Money returned to limited partners plus the fund's unrealized investments, divided by money paid-in to the partnership. The TVPI should equal RVPI plus DPI.
- **DPI (Distribution to Paid In Capital):** Money returned (distributions) to limited partners divided by money paid in to the partnership. Also called cash-on-cash multiple.
- **RVPI (Residual Value to Paid In Capital):** The value of a fund's unrealized investments divided by money paid-in to the partnership.
- **Internal rate of return (IRR):** This is the most appropriate performance benchmark for private equity investments. It is a time-weighted return expressed as a percentage. IRR uses the present sum of cash drawdowns (money invested), the present value of distributions (money returned from investments) and the current value of unrealized investments and applies a discount.
- **Commitment:** Every investor in a private equity fund commits to investing a specified sum of money in the fund partnership over a specified period of time. The fund records this as the limited partnership's capital commitment. The sum of capital commitments is equal to the size of the fund.
- **Capital Distribution:** These are the returns that an investor in a private equity fund receives. It is the income and capital realized from investments less expenses and liabilities. Once a limited partner has had their cost of investment returned, further distributions are actual profit. The partnership agreement determines the timing of distributions to the limited partner. It will also determine how profits are divided among the limited partners and general partner.
- **Carried Interest:** The share of profits that the fund manager is due once it has returned the cost of investment to investors. Carried interest is normally expressed as a percentage of the total profits of the fund.
- **Co-Investment:** Co-Investments are minority investments made alongside a private equity investor in an LBO, a recapitalization, or an expansion capital transaction. It is a passive, non-controlling investment, as the private equity firm involved will typically exercise control and perform monitoring functions.
- **General Partner (GP):** This can refer to the top-ranking partners at a private equity firm as well as the firm managing the private equity fund.
- **GP Commitments:** It is normal practice for the GP managing a private equity fund to also make a financial commitment to the fund on the same basis as the LPs in the fund, and this is seen as an important factor driving the alignment of GP and LP interests. The historic benchmark for GP commitments has been 1% of the total fund size, but this is by no means universal, and many GPs commit significantly larger amounts. Furthermore, there has been a marked trend towards GPs making larger commitments to their funds over recent years.
- **Leveraged Buy-Out (LBO):** The acquisition of a company using debt and equity finance.
- **Limited Partner (LP):** Institutions or high-net-worth individuals/sophisticated investors that contribute capital to a private equity fund.
- **Public Market Equivalent (PME):** Performance measure used to evaluate performance relative to the market. It is calculated as the ratio of the discounted value of the LP's inflows divided by the discounted value of outflows, with the discounting performed using realized market returns.
- **Primaries:** An original investment vehicle that invests directly into a company or asset.

#### VALUATION POLICY

Fiducient Advisors does not engage an independent third-party pricing service to value securities. Our reports are generated using the security prices provided by custodians used by our clients. Our custodial pricing hierarchy is available upon request. If a client holds a security not reported by the first custodian within the hierarchy, the valuation is generated from the next custodian within the hierarchy, and so forth. Each custodian uses pricing services from outside vendors, where the vendors may generate nominally different prices. Therefore, this report can reflect minor valuation differences from those contained in a custodian's report. In rare instances where FA overrides a custodial price, prices are taken from Bloomberg.

#### REPORTING POLICY

This report is intended for the exclusive use of the client listed within the report. Content is privileged and confidential. Any dissemination or distribution is strictly prohibited. Information has been obtained from a variety of sources believed to be reliable though not independently verified. Any forecast represents median expectations and actual returns, volatilities and correlations will differ from forecasts. Please note each client has customized investment objectives and constraints and the investment strategy for each portfolio is based on a client-specific asset allocation model. Past performance does not indicate future performance and there is a possibility of a loss. Performance calculated net of investment fees. Certain portfolios presented may be gross of Fiducient Advisors' fees and actual performance would be reduced by investment advisory fees. This report does not represent a specific investment recommendation. Please consult with your advisor, attorney, and accountant, as appropriate, regarding specific advice.



Custodian reports are the reports that govern the account. There will be different account values between Fiducient Advisors' reports and the custodian reports based on whether the report utilizes trade date or date to calculate value. Additionally, difference between values contained on reports may be caused by different accrued income values. Any forecasts represent future expectations and actual returns, volatilities and will differ from forecasts. This report does not represent a specific investment recommendation. Please consult with your advisor, attorney, and accountant, as appropriate, regarding specific advice. Past performance does not indicate future performance and there is a possibility of a loss.

Manager performance for mutual funds and ETFs is based on NAV and provided by Lipper. Performance for non-mutual fund or ETF investments is based on the returns provided by managers, calculations based on a manager statement, or calculations based on a statement or data from the client's custodian. Unless specified otherwise, all returns are net of individual manager fees, represent total returns and are annualized for periods greater than one year. The deduction of fees produces a compounding effect that reduces the total rate of return over time. As an example, the effect of investment management fees on the total value of a client's portfolio assuming (a) quarterly fee assessment, (b) \$1,000,000 investment, (c) portfolio return of 8% a year, and (d) 0.50% annual investment advisory fee would be \$5,228 in the first year, and cumulative effects of \$30,342 over five years and \$73,826 over ten years. Additional information on advisory fees charged by Fiducient Advisors are described in Part 2 of the Form ADV.

## **MATERIAL RISKS & LIMITATIONS**

**Fixed Income** securities are subject to interest rate risks, the risk of default and liquidity risk. U.S. investors exposed to non-U.S. fixed income may also be subject to currency risk and fluctuations.  
-Liability Driven Investing (LDI) Assets

**Cash** may be subject to the loss of principal and over longer period of time may lose purchasing power due to inflation.  
-Short Term Liquidity

**Domestic Equity** can be volatile. The rise or fall in prices take place for a number of reasons including, but not limited to changes to underlying company conditions, sector or industry factors, or other macro events. These may happen quickly and unpredictably.

**International Equity** can be volatile. The rise or fall in prices take place for a number of reasons including, but not limited to changes to underlying company conditions, sector or industry impacts, or other macro events. These may happen quickly and unpredictably. International equity allocations may also be impacted by currency and/or country specific risks which may result in lower liquidity in some markets.

**Real Assets** can be volatile and may include asset segments that may have greater volatility than investment in traditional equity securities. Such volatility could be influenced by a myriad of factors including, but not limited to overall market volatility, changes in interest rates, political and regulatory developments, or other exogenous events like weather or natural disaster.

**Private Equity** involves higher risk and is suitable only for sophisticated investors. Along with traditional equity market risks, private equity investments are also subject to higher fees, lower liquidity and the potential for leverage that may amplify volatility and/or the potential loss of capital.

**Private Credit** involves higher risk and is suitable only for sophisticated investors. These assets are subject to interest rate risks, the risk of default and limited liquidity. U.S. investors exposed to non-U.S. private credit may also be subject to currency risk and fluctuations.

**Private Real Estate** involves higher risk and is suitable only for sophisticated investors. Real estate assets can be volatile and may include unique risks to the asset class like leverage and/or industry, sector or geographical concentration. Declines in real estate value may take place for a number of reasons including, but are not limited to economic conditions, change in condition of the underlying property or defaults by the borrower.

**Marketable Alternatives** involves higher risk and is suitable only for sophisticated investors. Along with traditional market risks, marketable alternatives are also subject to higher fees, lower liquidity and the potential for leverage that may amplify volatility or the potential for loss of capital. Additionally, short selling involved certain risks including, but not limited to additional costs, and the potential for unlimited loss on certain short sale positions.

## **OTHER**

By regulation, closed-end funds utilizing debt for leverage must report their interest expense, as well as their income tax expense, as part of their total expense ratio. To make for a useful comparison between closed-end funds and both open-end funds and exchange-traded funds, adjusted expense ratios excluding interest and income tax expenses are utilized for closed-end funds within this report. See disclosure on closed-end fund fact sheets for information regarding the total expense ratio of each closed-end fund.

Please advise us of any changes in your objectives or circumstances.

## **CUSTODIAN STATEMENTS**

Please remember to review the periodic statements you receive from your custodian. If you do not receive periodic statements from your custodian or notice issues with the activity reported in those statements, please contact FA or your custodian immediately.