



IUOE Local No. 77 Annuity Fund

Master Consulting Services Report

**Period Ended
September 30, 2023**

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Market Discussion

3Q | 2023



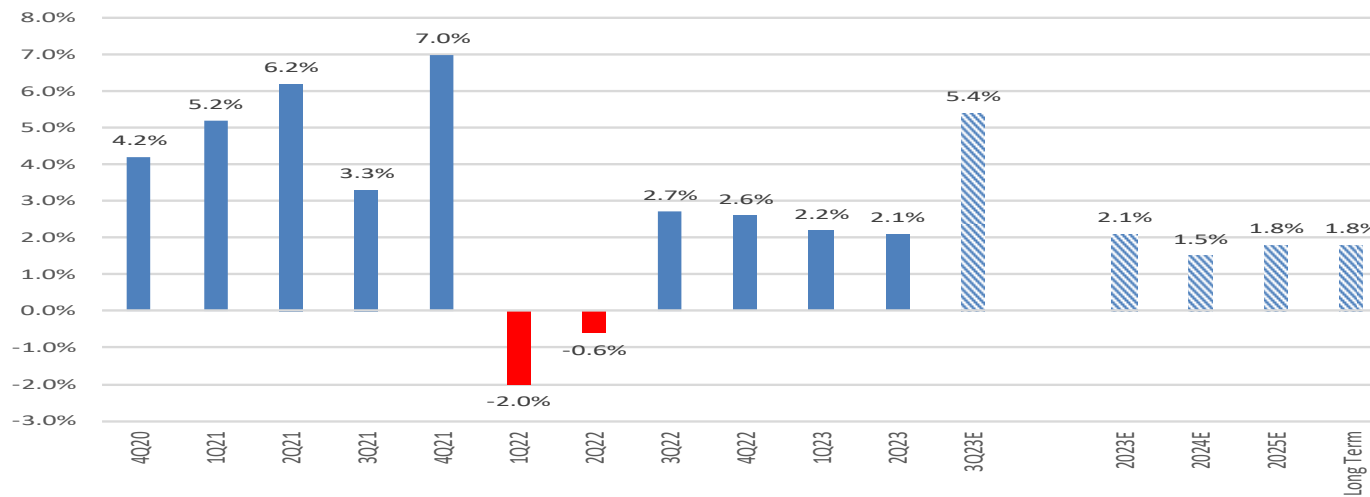
Financial Market Performance

Periods Ending September 30, 2023

Strategy	Sector	Index	QTR	YTD	2022	2021	2020	2019	2018	2017	1-Yr	3-Yr	5-Yr	10-Yr	20-Yr
Stocks	US Large Cap	S&P 500	-3.3%	13.1%	-18.1%	28.7%	18.4%	31.5%	-4.4%	21.8%	21.6%	10.1%	9.9%	11.9%	9.7%
	US Small Cap	Russell 2000	-5.1%	2.5%	-20.5%	14.8%	19.9%	25.5%	-11.0%	14.6%	8.9%	7.1%	2.4%	6.6%	8.1%
	All Country	MSCI All Country World (net)	-3.4%	10.1%	-18.4%	18.5%	16.3%	26.6%	-9.4%	24.0%	20.8%	6.9%	6.5%	7.6%	7.7%
	Non-US Developed	MSCI EAFE (net)	-4.1%	7.1%	-14.5%	11.3%	7.8%	22.0%	-13.8%	25.0%	25.6%	5.8%	3.2%	3.8%	5.9%
	Emerging Markets	MSCI EM (net)	-2.9%	1.8%	-20.1%	-2.5%	18.3%	18.4%	-14.6%	37.3%	11.7%	-1.7%	0.6%	2.1%	7.3%
	Int'l Small Cap	MSCI EAFE Small Cap (net)	-3.5%	1.8%	-21.4%	10.1%	12.3%	25.0%	-17.9%	33.0%	17.9%	1.1%	0.8%	4.3%	7.2%
Bonds	Treasury	Bloomberg US Govt	-3.0%	-1.4%	-12.3%	-2.3%	7.9%	6.8%	0.9%	2.3%	-0.7%	-5.7%	-0.0%	0.7%	2.4%
	Broad Market	Bloomberg Aggregate	-3.2%	-1.2%	-13.0%	-1.5%	7.5%	8.7%	0.0%	3.5%	0.6%	-5.2%	0.1%	1.1%	2.8%
	Intermediate	Bloomberg Gov/Credit Int.	-0.8%	0.7%	-8.2%	-1.4%	6.4%	6.8%	0.9%	2.1%	2.2%	-2.9%	1.0%	1.3%	2.7%
	High Yield	Bloomberg HY BaB 2% IC	0.2%	5.0%	-10.6%	4.6%	7.7%	15.2%	-1.9%	6.9%	9.8%	1.3%	3.3%	4.3%	6.1%
	Short Duration HY	ICE BofA 1-3 Yrs BB US Cash Pay HY	1.1%	4.7%	-3.1%	3.2%	5.4%	8.7%	1.3%	3.6%	7.5%	2.8%	3.6%	3.7%	5.4%
	Global Bonds	FTSE WGBI	-4.3%	-2.7%	-18.3%	-7.0%	10.1%	5.9%	-0.8%	7.5%	1.0%	-8.7%	-2.6%	-1.2%	1.8%
GTAA	Unconstrained	65% MSCI World /35% FTSE WGBI	-3.7%	6.1%	-18.1%	11.0%	14.6%	19.9%	-5.8%	17.0%	14.4%	2.1%	4.0%	5.1%	6.0%
Real Estate	Core	NCREIF ODCE Equal Weighted (net)	-2.1%	-8.5%	7.6%	21.9%	0.8%	5.2%	7.3%	6.9%	-13.1%	6.7%	5.2%	7.6%	6.6%
Hedge Fund of Funds	Diversified FOFs	HFRI FOF Composite	0.5%	2.8%	-5.3%	6.2%	10.9%	8.4%	-4.0%	7.8%	4.6%	3.8%	3.4%	3.3%	3.3%
	Equity Long-Short	HFRI Equity Hedge	-1.0%	4.7%	-10.1%	11.7%	17.9%	13.7%	-7.1%	13.3%	9.1%	6.5%	5.2%	5.1%	5.3%
Commodities	Commodities	Goldman Sachs Commodity	16.0%	7.2%	26.0%	40.4%	-23.7%	17.6%	-13.8%	5.8%	10.9%	29.5%	5.6%	-2.5%	-0.4%

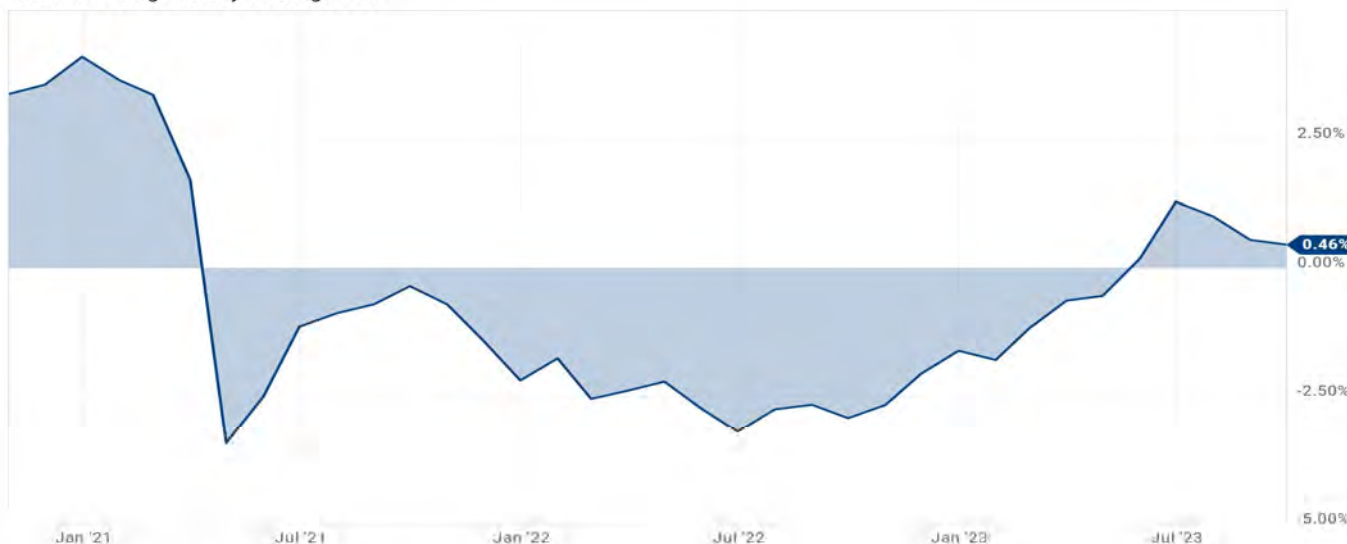
U.S. Economy

U.S. GDP Growth



Sources: U.S. Bureau of Economic Analysis, Federal Reserve, Atlanta Federal Reserve

US Real Average Hourly Earnings YoY



Date Range: 10/31/2020 - 09/30/2023

Source: BLS

Oct 17 2023, 3:20PM EDT, Powered by CHARTS

U.S Economy Remains Resilient

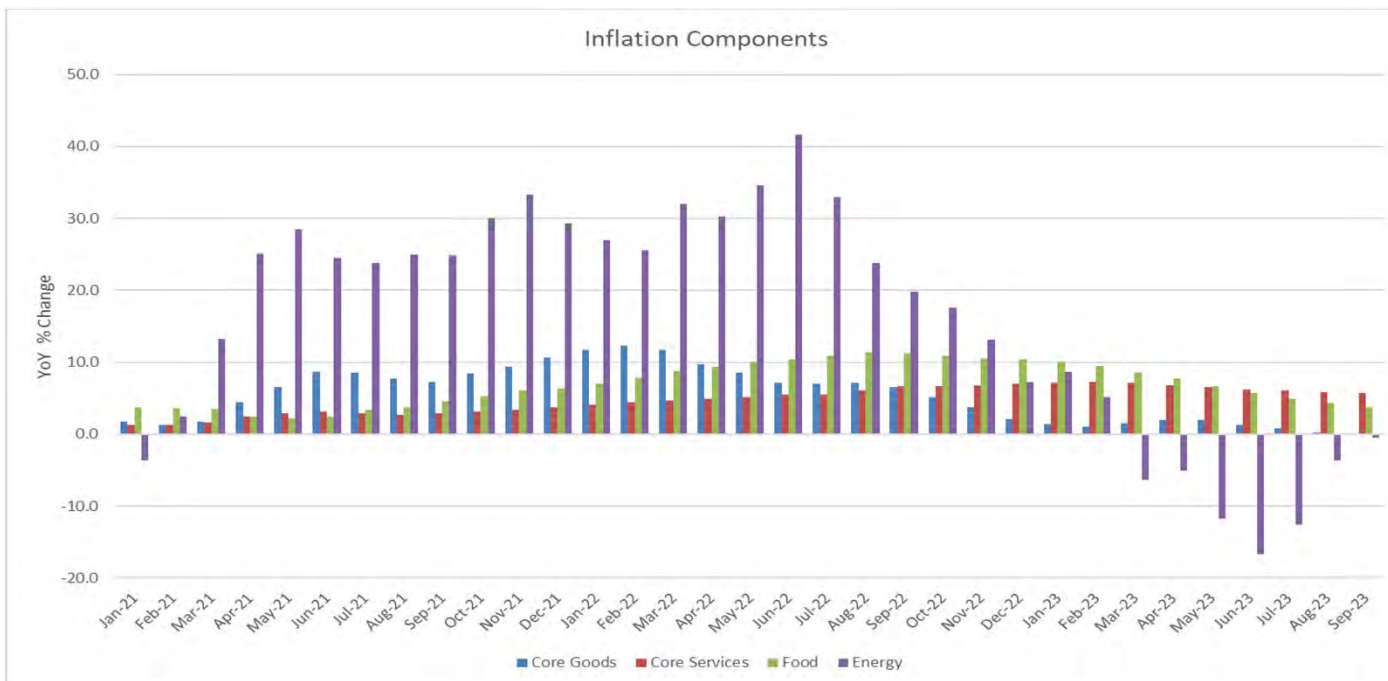
- Despite widespread predictions at the start of the year that a recession was imminent, U.S. economic growth has remained positive, with GDP increasing by over 2.0% in each of the first two quarters of 2023.
- Economic growth likely accelerated in Q3 2023 with the Atlanta Fed GDPNow model forecasting 5.4% growth for the quarter as of October 17, 2023.
- In their most recent projections, the U.S. Federal Reserve increased projected growth for 2023 from 1.0% to 2.1% and increased 2024 from 1.1% to 1.5%.
- Rising inflation resulted in 25 consecutive months of negative real wage growth for U.S. workers through early 2023. However, higher earnings and slowing inflation have resulted in five consecutive months of real wage growth more recently which has helped fuel stronger than expected economic growth.

U.S. Economy



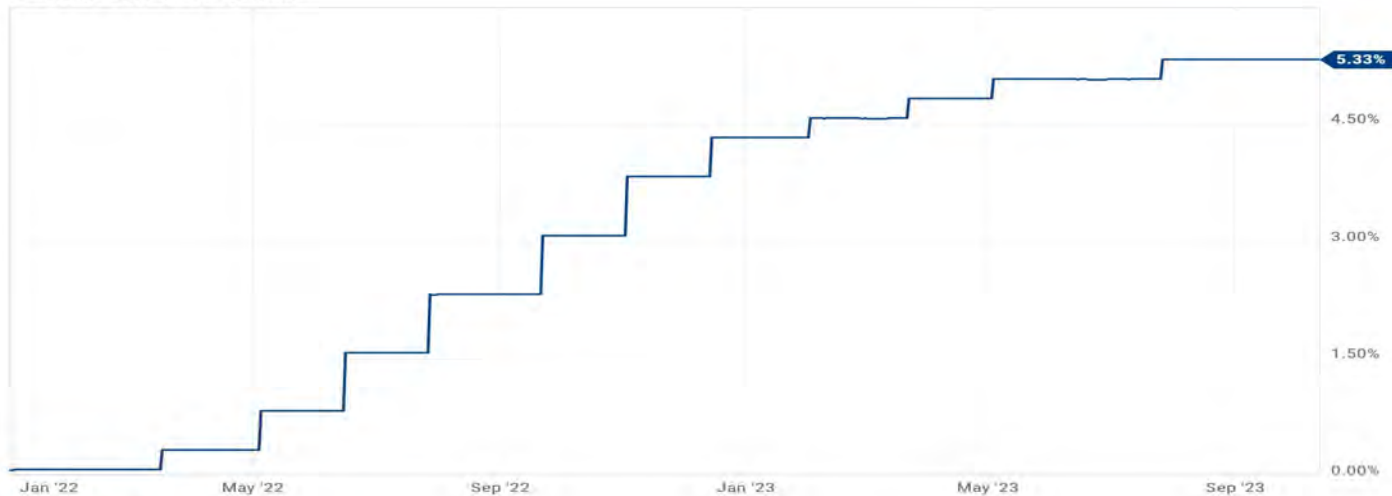
Inflation Continues Downward Trend but Remains Above Target

- Inflation continues to trend downward with year-over-year CPI of 3.7% in September, down from the peak of 9.1% in June 2022. The September CPI print was up from a 3.0% reading in July, primarily driven by a spike in energy prices in August.
- Excluding food and energy, core inflation increased by 4.2% vs. a year ago, down from 4.9% in June 2023.
- Year-over-year core goods inflation was flat in September, driven by falling used car prices.
- Service inflation remains elevated, driven by the shelter component, which tends to lag real time prices.
- PCE, the Fed's preferred inflation measure, increased by 3.9% over the last year through July, the lowest level since May of 2021.



U.S. Economy

Effective Federal Funds Rate



Date Range: 12/31/2021 - 10/13/2023

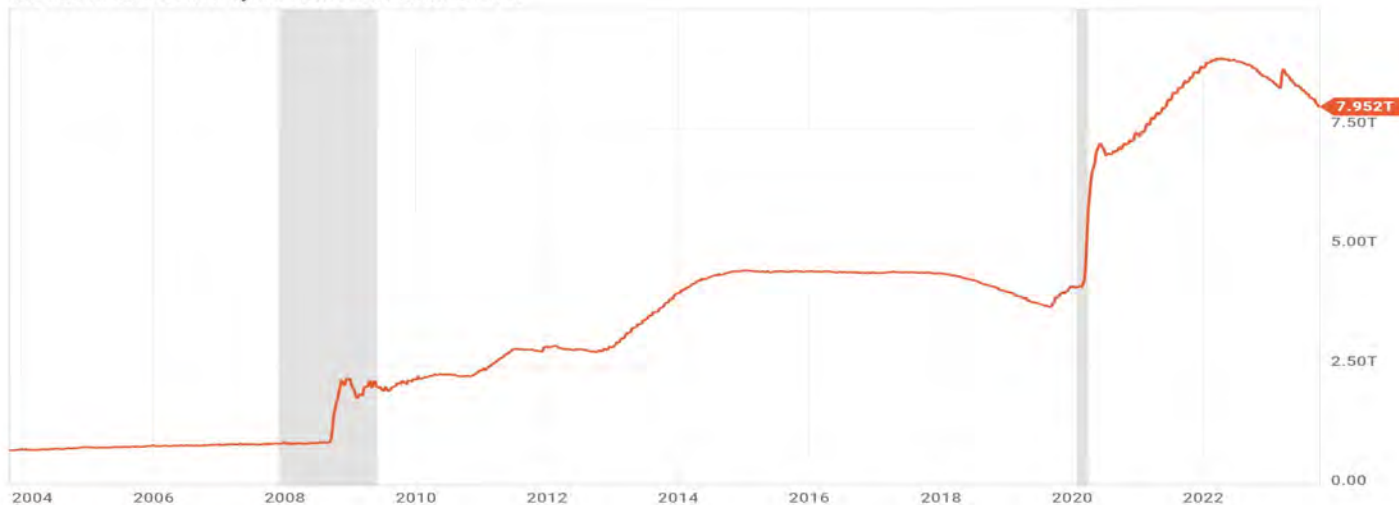
Source: Federal Reserve

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End of Rate Hikes on the Horizon

- The U.S. Federal Reserve raised rates from 0.0% to 5.25% since the beginning of 2022, with the most recent 0.25% increase occurring at the July meeting, leaving the effective Fed Funds Rate at 5.33%, the highest level since 2007.
- While the Fed paused at the September meeting, forward guidance alluded to the possibility of an additional hike before year end.
- The reduction in the size of the Fed's balance sheet that began in 2022 was briefly interrupted in March 2023 when the Fed provided a liquidity injection to banks following three of the four largest bank failures in history.
- By the end of Q2 2023, the increase was reversed and the quantitative tightening program resumed with the balance sheet at the lowest level since May 2021.

US Total Assets Held by All Federal Reserve Banks



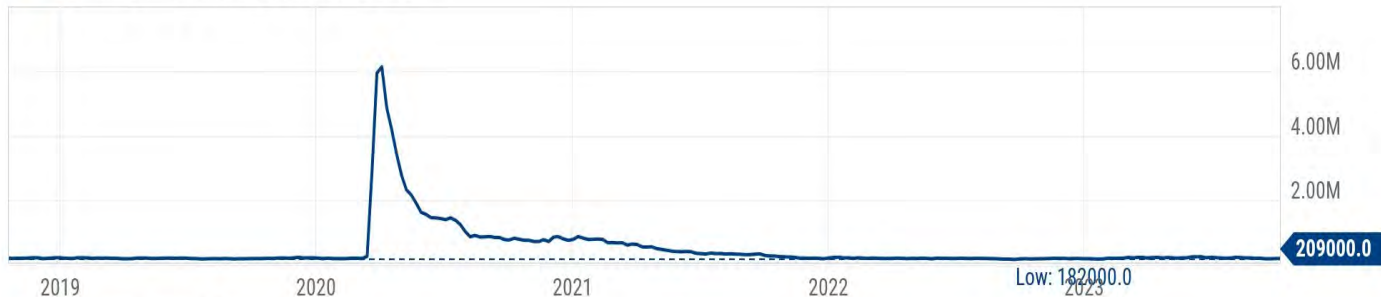
Date Range: 10/22/2003 - 10/11/2023

Source: Federal Reserve

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U.S. Economy

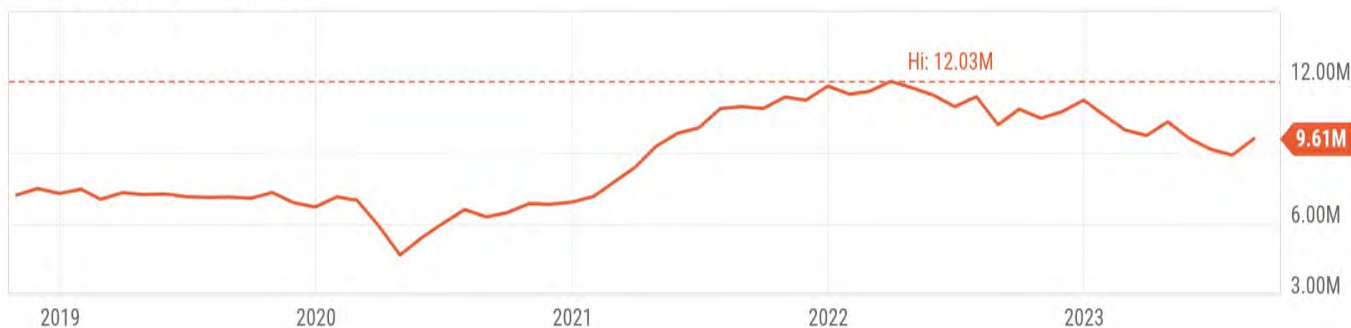
US Initial Claims for Unemployment Insurance



US Unemployment Rate



US Job Openings: Total Nonfarm



Date Range: 10/20/2018 - 10/07/2023

Sources: DoL, BLS

Employment Remains Robust

- Despite significant increases in the Fed Funds rate, various measures suggest the labor market remains strong.
- Weekly claims for unemployment averaged 232,000 in Q3 2023, compared to 240,000 in Q2 2023 and an average of 214,000 for calendar year 2022.
- The unemployment rate increased slightly from 2023 lows; however, increases were primarily driven by higher participation rates, and the unemployment rate remains close to historical lows.
- While off the highest levels of 2022, job openings in the U.S. remain elevated by historical standards.

Oct 17 2023, 10:45AM EDT. Powered by YCHARTS

U.S. Economy

30 Year Mortgage Rate



Date Range: 04/02/1971 - 10/19/2023

Oct 25 2023, 8:22AM EDT. Powered by YCHARTS

Skyrocketing Mortgage Rates Slow Home Sales

- Rising interest rates have resulted in the highest 30-year mortgage rates in over twenty years.
- Current mortgage rates are nearly five percentage points higher than the historical low in early 2021, but are in line with the long term average, which is heavily influenced by the double-digit rates of the 1970s and 1980s.
- Increasing mortgage rates have tempered home buying, with many current homeowners hesitant to part with sub-4% mortgages to purchase properties with higher mortgage rates. Consequently, monthly sales of existing homes declined to the lowest levels since 2010.

US Existing Home Sales



Date Range: 01/31/1999 - 09/30/2023

Oct 25 2023, 8:31AM EDT. Powered by YCHARTS

U.S. Equity Market

Sector	Index	3Q23	YTD	2022	2021	2020	2019	2018	2017	1-Year	3-Year	5-Year	10-Year
Large Cap	S&P 500	-3.3%	13.1%	-18.1%	28.7%	18.4%	31.5%	-4.4%	21.8%	21.6%	10.1%	9.9%	11.9%
	Russell 1000	-3.1%	13.0%	-19.1%	26.4%	21.0%	31.4%	-4.8%	21.7%	21.2%	9.5%	9.6%	11.6%
	Russell 1000 Value	-3.2%	1.8%	-7.6%	25.1%	2.8%	26.5%	-8.3%	13.6%	14.4%	11.0%	6.2%	8.4%
Mid Cap	Russell 1000 Growth	-3.1%	25.0%	-29.1%	27.6%	38.5%	36.4%	-1.5%	30.2%	27.7%	8.0%	12.4%	14.5%
	Russell Mid-Cap	-4.7%	3.9%	-17.3%	22.6%	17.1%	30.5%	-9.1%	18.5%	13.4%	8.1%	6.4%	9.0%
	Russell Mid-Cap Value	-4.5%	0.5%	-12.1%	28.3%	5.0%	27.0%	-12.3%	13.3%	11.0%	10.9%	5.2%	7.9%
Small Cap	Russell Mid-Cap Growth	-5.2%	9.9%	-26.7%	12.7%	35.6%	35.5%	-4.8%	25.3%	17.5%	2.6%	7.0%	9.9%
	Russell 2000	-5.1%	2.5%	-20.5%	14.8%	19.9%	25.5%	-11.0%	14.6%	8.9%	7.1%	2.4%	6.6%
	Russell 2000 Value	-3.0%	-0.6%	-14.5%	28.2%	4.6%	22.4%	-12.9%	7.8%	7.8%	13.3%	2.6%	6.2%
Total Market	Russell 2000 Growth	-7.3%	5.2%	-26.4%	2.8%	34.6%	28.4%	-9.3%	22.1%	9.6%	1.1%	1.5%	6.7%
	Wilshire 5000	-3.3%	12.5%	-19.0%	26.7%	20.8%	31.0%	-5.3%	21.0%	20.5%	9.7%	9.4%	11.5%
	Russell 3000	-3.3%	12.4%	-19.2%	25.6%	20.9%	31.0%	-5.2%	21.1%	20.4%	9.4%	9.1%	11.3%

Major Index Total Return as of September 30, 2023

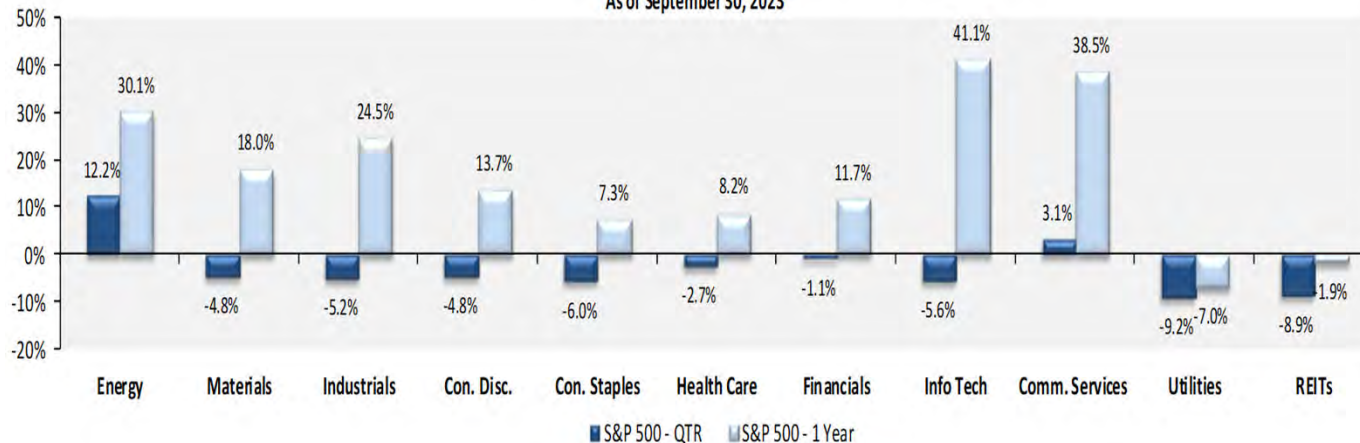
Asset Class	Name	2023 YTD	% off Low	% Off All Time High
U.S. Large Cap	S&P 500	13.1%	21.9%	-8.0%
U.S. Mid Cap	Russell Midcap	3.9%	16.6%	-16.1%
U.S. Smid Cap	Russell 2500	3.6%	11.7%	-19.4%
U.S. Small Cap	Russell 2000	2.5%	9.3%	-24.9%
International Large Cap	MSCI EAFE	7.1%	26.7%	-10.6%
International Small Cap	MSCI EAFE Small Cap (gross)	2.3%	20.5%	-23.5%
Emerging Markets	MSCI Emerging Markets	1.8%	16.0%	-29.2%
Global Equity	MSCI World (gross)	11.6%	23.1%	-8.7%

- Global equities declined in Q3 2023 following a strong H1 2023. Headwinds included rising bond yields, a stronger U.S. Dollar, and consumer spending worries due to higher energy prices resulting from oil supply cuts.
- The S&P 500, comprised of U.S. large-cap stocks, was negative in Q3 2023 for the first time in four quarters as investors conceded high interest rates could persist longer than anticipated.
- The S&P 500's 13.1% year-to-date gain has been mainly attributed to a handful of tech stocks boosted by optimism in artificial intelligence. However, in Q3 2023, most of the "Magnificent Seven" declined, impacting the overall market. Conversely, energy stocks displayed resilience, standing out as one of the few sectors that avoided losses in the quarter.

U.S. Equity Market

S&P 500 Sector Performance

As of September 30, 2023

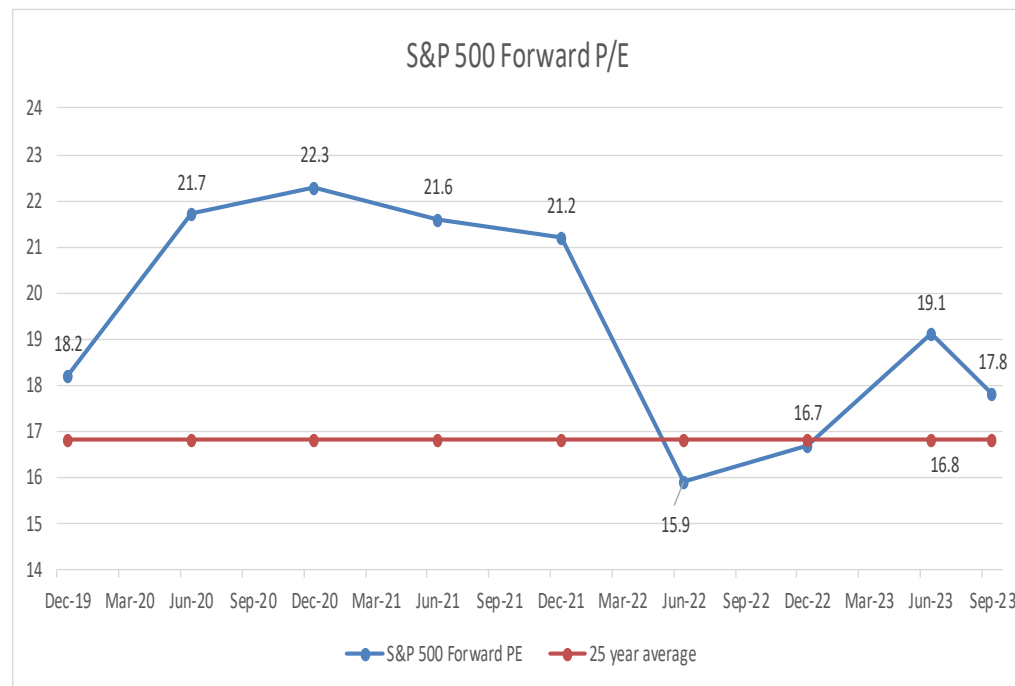


Tech and Comm. Services Lead YTD Gains; Defensive Sectors/Bond Proxies Struggle

- Sector performance displays a clear divide, with Comm. Services and Technology up +40% and +35% YTD, respectively, while defensive sectors like Utilities and Staples are down -14% and -5%, respectively. With some segments of the fixed income market offering their highest yields in 15 years, the attractiveness of "high-dividend" defensive sectors as bond alternatives has diminished relative to the period of near-zero interest rate policy (ZIRP).
- Buoyed by extended supply cuts from OPEC+ and Russia, oil prices, as measured by WTI crude, surged by 29% in Q3 2023, and are up 40% since late June. The energy sector, comprising just 4.4% of the S&P 500, outperformed all other sectors in Q3 2023.

Earnings Growth Returns?

- The S&P 500 is anticipated to post a modest 0.4% year-over-year earnings growth for Q3 2023, marking its first positive year-over-year growth since Q3 2022, albeit by a narrow margin. The S&P 500's forward P/E ratio decreased in the past quarter as stock prices fell and currently stands at 17.8x forward earnings, in the vicinity of its 25-year average.



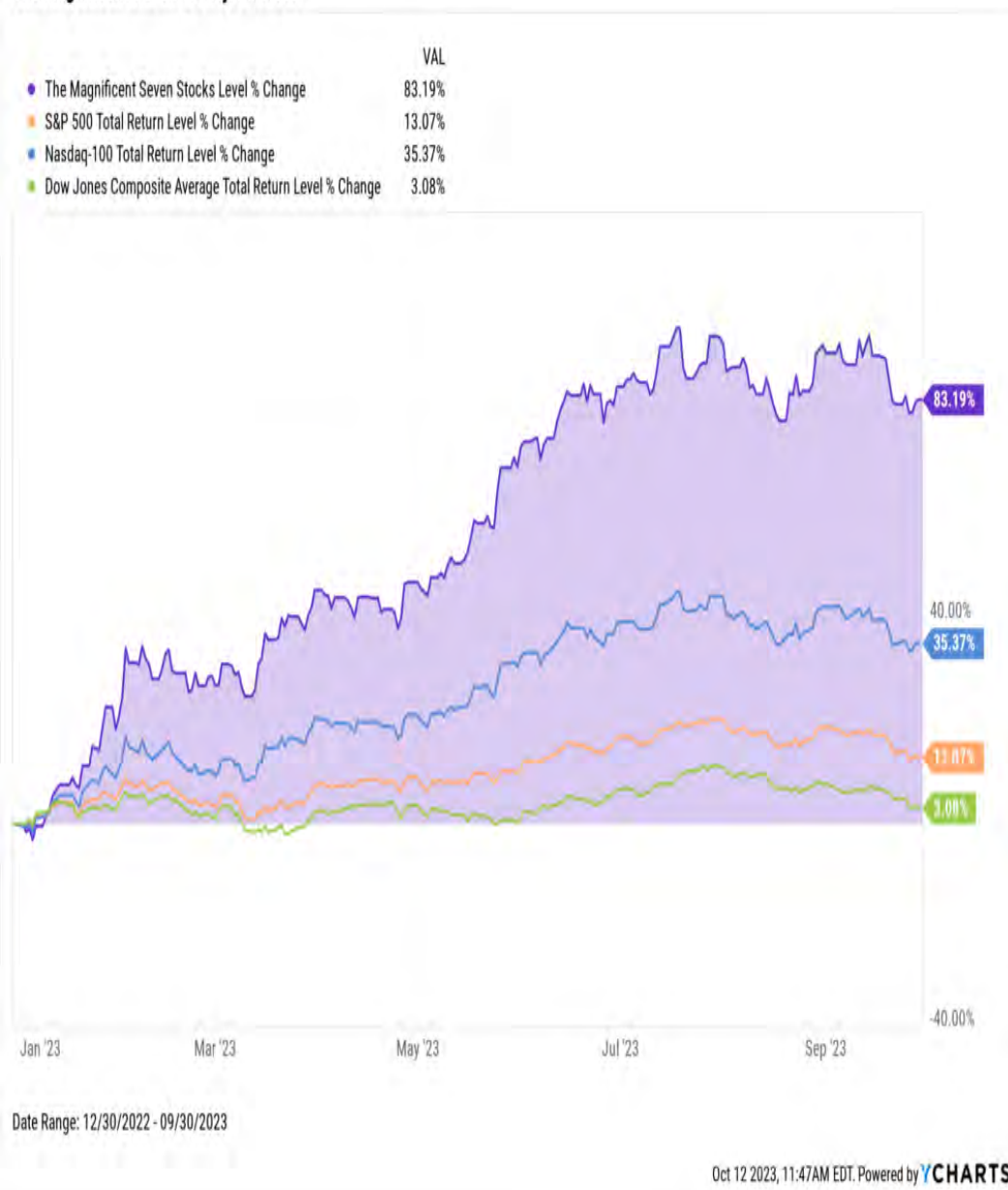
Source: J.P. Morgan Asset Management

U.S. Equity Market

Tech Giants Pull Back but Maintain Market Leadership

- The "Magnificent Seven," a term recently coined by investors, comprises high-growth technology giants Alphabet (Google), Amazon, Apple, Meta Platforms (formerly known as Facebook), Microsoft, NVIDIA, and Tesla. Representing about 28% of the S&P 500, this group is responsible for 84% of the S&P 500 index's 13.1% year-to-date gain.
- The concentrated nature of the S&P 500 expands beyond the Magnificent Seven as the top 50 stocks constitute an astonishing 57% of the total index value. Such a high degree of concentration is a rarity, occurring only twice in the past century, specifically in 1932 and 2000.

The Magnificent Seven vs Major Indices

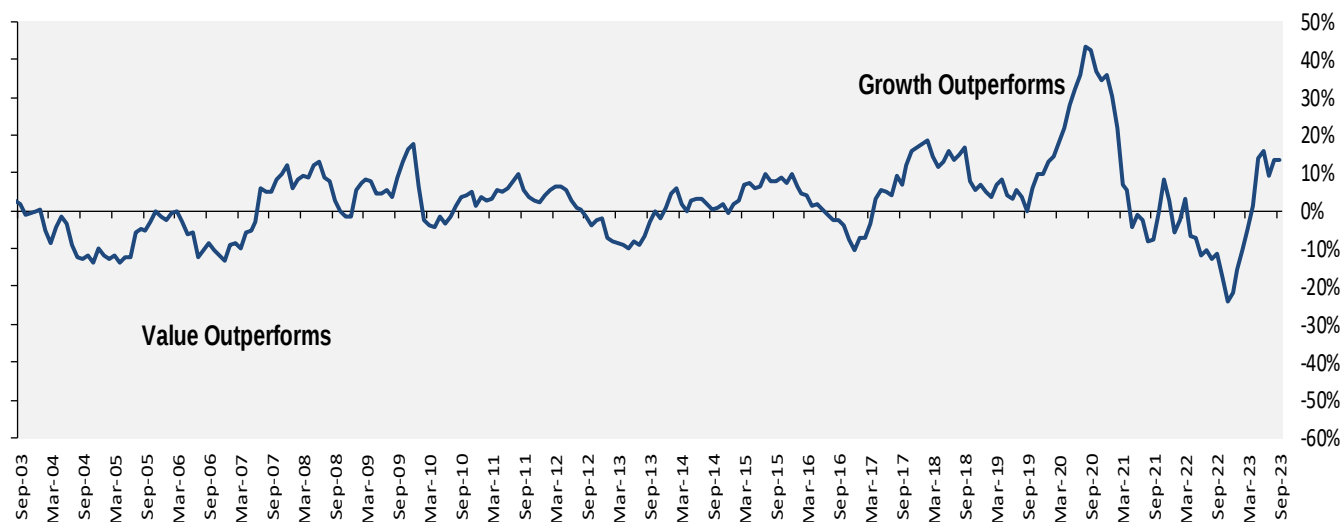


Mega-Cap Stocks Benefiting from Better Debt Profile

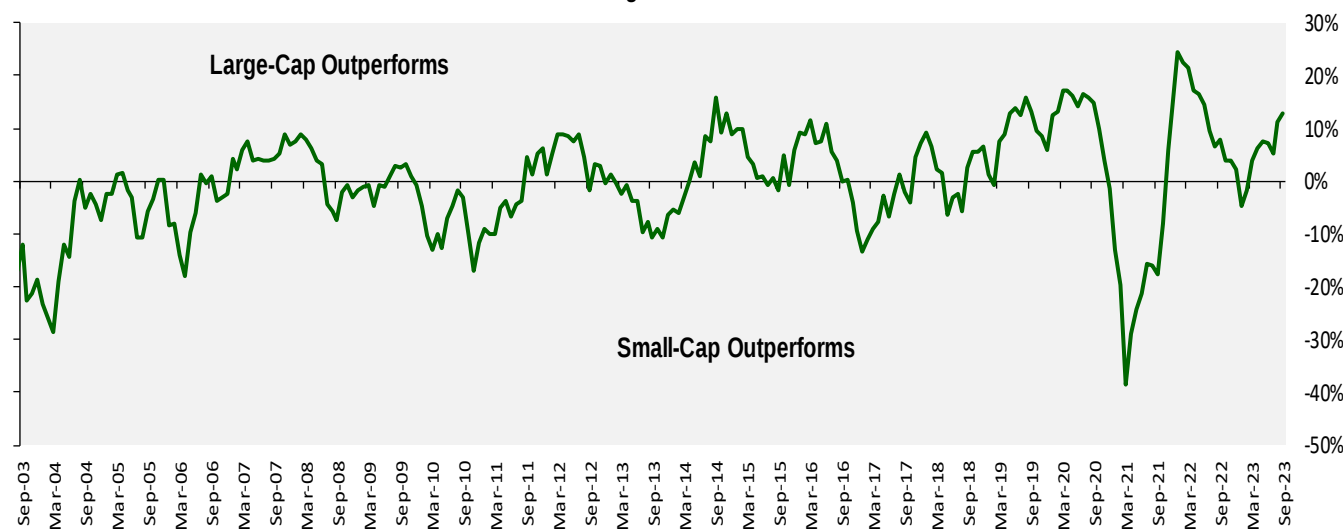
- The Q3 2023 equity market pullback led to losses across most equity categories and erased year-to-date gains in vulnerable areas like leveraged smaller companies.
- Mega-cap companies took advantage of pandemic-era low interest rates by securing long-term fixed-rate bonds, leading to increased cash reserves. Currently, S&P 500 companies pay an average effective interest rate of 3.3% on their long-term debt, with nearly half maturing after 2030, while their corporate cash reserves earn 5%.
- Conversely, smaller companies are grappling with the impact of rising floating rate debt and an impending refinance wall over the next few years.

U.S. Equity Market

Russell 1000 Growth vs. Russell 1000 Value
Rolling One-Year Returns



S&P 500 vs. Russell 2000
Rolling One-Year Returns



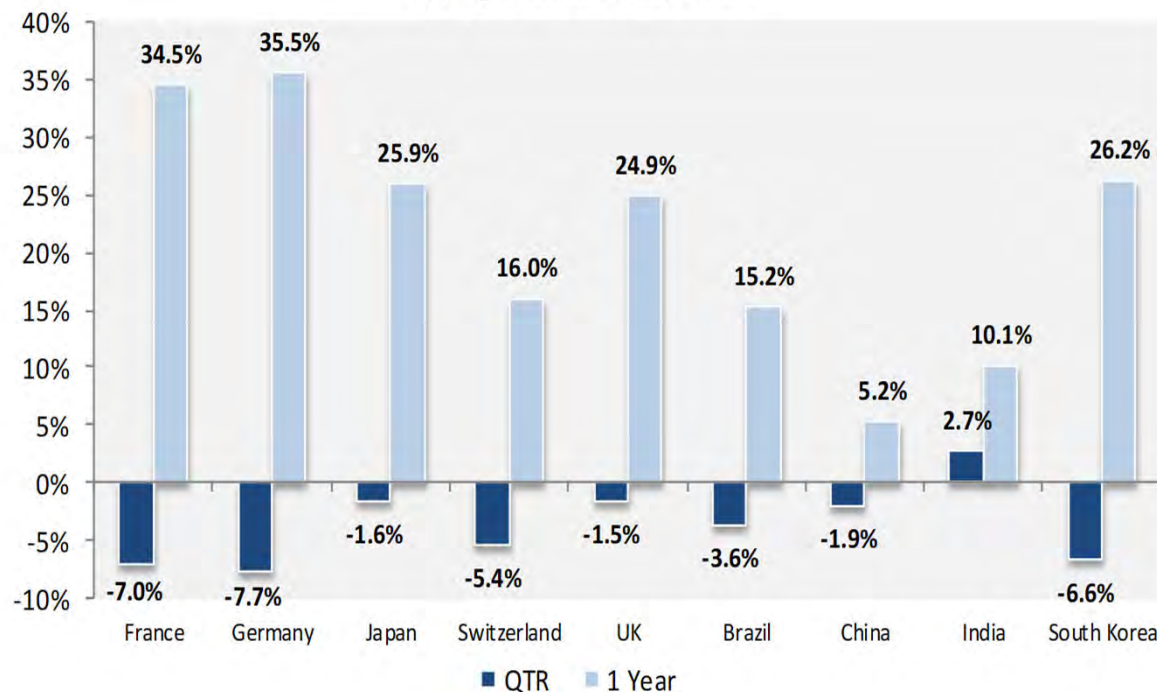
Growth and Quality Attributes Lead in 2023

- Q3 2023 proved to be a challenging period for equity assets, with few positive factors and lackluster performance from both growth and value segments. The quarter failed to narrow the gap between Russell Top 200 Growth (Mega Cap Growth) and Russell 2000 Value (Small Cap Value), leaving a substantial 30% spread in year-to-date returns.
- In the past quarter, high-beta securities pulled back after a strong start to the year. Companies with growth and quality attributes are still leading in 2023, while those stocks that display low volatility factors and high dividend factors are trailing.
- In 2023, the Russell 2000 index, representing U.S. small-cap stocks, initially rebounded before dropping 11% from mid-summer, highlighting the impact of rising interest rates on smaller firms. This marked a nearly two-year bear cycle for the asset class as it re-entered bear territory in Q3 2023, with a 25% decline from its peak on November 8, 2021.

International Equity Market

Sector	Index	3Q23	YTD	2022	2021	2020	2019	2018	1-Year	3-Year	5-Year	10-Year
Global	MSCI AC World Index (net)	-3.4%	10.1%	-18.4%	18.5%	16.3%	26.6%	-9.4%	20.8%	6.9%	6.5%	7.6%
	MSCI World Small Cap (net)	-4.4%	2.9%	-18.8%	15.8%	16.0%	26.2%	-13.9%	14.0%	6.2%	3.1%	6.3%
	MSCI World ex US (net)	-4.1%	6.7%	-14.3%	12.6%	7.6%	22.5%	-14.1%	24.0%	6.1%	3.4%	3.8%
Developed ex US	MSCI World ex US Small Cap (net)	-3.5%	1.8%	-20.6%	11.1%	12.8%	25.4%	-18.1%	17.3%	1.8%	1.3%	4.1%
	MSCI EAFE (net)	-4.1%	7.1%	-14.5%	11.3%	7.8%	22.0%	-13.8%	25.6%	5.8%	3.2%	3.8%
	MSCI EAFE Value (net)	0.6%	9.9%	-5.6%	10.9%	-2.6%	16.1%	-14.8%	31.5%	11.1%	2.8%	3.0%
	MSCI EAFE Growth (net)	-8.6%	4.3%	-22.9%	11.3%	18.3%	27.9%	-12.8%	20.0%	0.4%	3.2%	4.4%
Emerging Markets	MSCI EAFE Small Cap (net)	-3.5%	1.8%	-21.4%	10.1%	12.3%	25.0%	-17.9%	17.9%	1.1%	0.8%	4.3%
	MSCI Emerging Markets (net)	-2.9%	1.8%	-20.1%	-2.5%	18.3%	18.4%	-14.6%	11.7%	-1.7%	0.6%	2.1%

Foreign Markets Returns



- Due to concerns about the adverse impacts of rising interest rates on economic growth, most European markets declined in Q3 2023. Europe is grappling with persistent inflation, elevated interest rates, and recession concerns, with Germany expected to report negative economic growth for the full year 2023.
- Japanese equities displayed some resilience amid the Q3 2023 market correction, outperforming most developed nations. The weak yen and resurging inflation provided strong support, allowing Japanese companies to increase prices. Furthermore, Japan's attractiveness to global investors seeking Asian exposure without the geopolitical and regulatory risks of China has grown.
- Chinese stocks, a significant part of emerging markets, struggled due to declining retail sales, stagnant house prices, rising household debt, and sluggish private-sector investment.

International Equity Market

ICE US Dollar Index Level



Oct 10 2023, 11:24AM EDT. Powered by **YCHARTS**

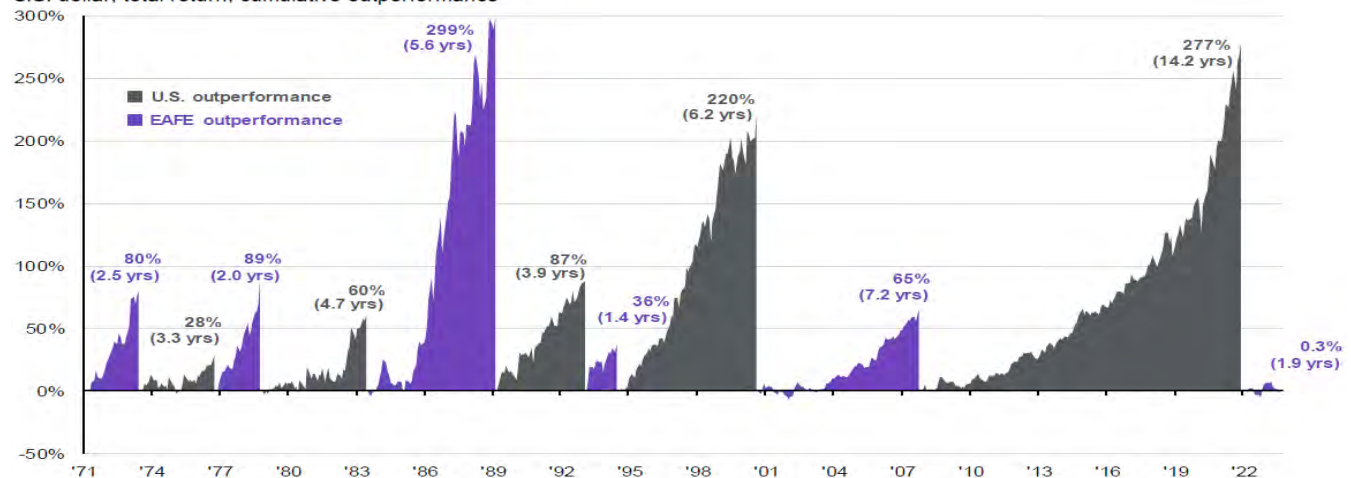
Dollar Index Soars on Expectations of Tight Monetary Policy

- As investors braced for prolonged high interest rates, the U.S. Dollar surged against major currencies, hitting its highest point since late 2022.
- The U.S. Dollar Index (DXY) ended Q3 with an impressive eleven-week winning streak, the second longest in over 50 years, and achieved new highs for 2023, strengthening against nine out of ten G10 currencies and most emerging market currencies.

Regime Change or Just a Pause?

- U.S. equity markets outperformed international markets by 277% in the past 14.2 years, marking the longest duration of outperformance in 50 years; however, this trend may have ended by the close of 2021.
- Over the last two years, international and U.S. markets had similar performance, with neither consistently overtaking the other.

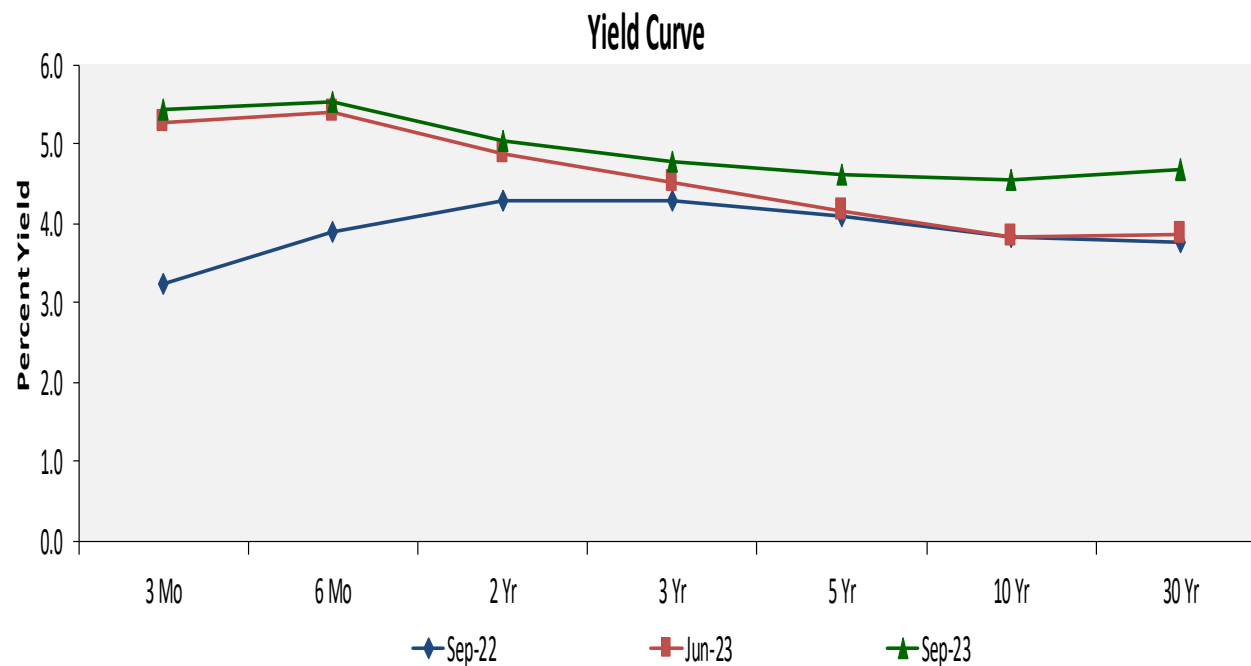
MSCI EAFE and MSCI USA relative performance
U.S. dollar, total return, cumulative outperformance



Source: J.P. Morgan Asset Management

Bond Market

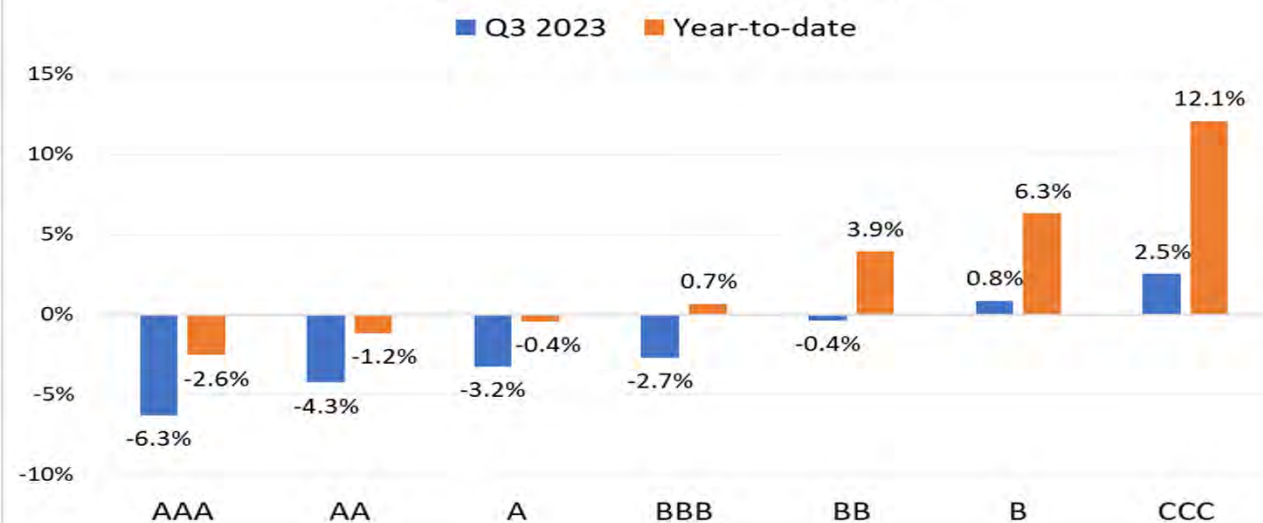
Index	Duration (years)	Yield	3Q23	YTD	2022	2021	2020	2019	2018	1-Year	3-Year	5-Year	10-Year
Bloomberg Aggregate	6.2	5.39%	-3.2%	-1.2%	-13.0%	-1.5%	7.5%	8.7%	0.0%	0.6%	-5.2%	0.1%	1.1%
Bloomberg Govt/Credit	6.3	5.30%	-3.0%	-0.9%	-13.6%	-1.7%	8.9%	9.7%	-0.4%	0.9%	-5.3%	0.4%	1.3%
Bloomberg Int Agg	4.7	5.36%	-1.9%	-0.3%	-9.5%	-1.3%	5.6%	6.7%	0.9%	1.4%	-3.7%	0.4%	1.1%
Bloomberg Int Govt/Credit	3.9	5.23%	-0.8%	0.7%	-8.2%	-1.4%	6.4%	6.8%	0.9%	2.2%	-2.9%	1.0%	1.3%
Bloomberg U.S. Corporate	7.0	6.04%	-3.1%	0.0%	-15.8%	-1.0%	9.9%	14.5%	-2.5%	3.6%	-4.9%	0.9%	2.2%
Bloomberg HY Ba/B 2% IC	4.1	8.26%	0.2%	5.0%	-10.6%	4.6%	7.7%	15.2%	-1.9%	9.8%	1.3%	3.3%	4.3%
ICE BofA 1-3 Yrs BB US Cash Pay HY	1.9	7.41%	1.1%	4.7%	-3.1%	3.2%	5.4%	8.7%	1.3%	7.5%	2.8%	3.6%	3.7%
Bloomberg Mortgage	6.3	5.57%	-4.1%	-2.3%	-11.8%	-1.0%	3.9%	6.4%	1.0%	-0.2%	-5.1%	-0.8%	0.6%
Bloomberg Treasury	6.0	4.85%	-3.1%	-1.5%	-12.5%	-2.3%	8.0%	6.9%	0.9%	-0.8%	-5.8%	-0.1%	0.6%
Bloomberg US TIPS	6.6	5.02%	-2.6%	-0.8%	-11.8%	6.0%	11.0%	8.4%	-1.3%	1.2%	-2.0%	2.1%	1.7%
BofA ML 91 day T-Bills	0.3	5.46%	1.3%	3.7%	1.5%	0.0%	0.7%	2.3%	1.9%	4.6%	1.8%	1.8%	1.1%



- The U.S. treasury yield curve shifted higher in Q3 2023 with yields on longer maturity bonds seeing the largest increase.
- The yield curve remains heavily inverted, reflecting a view that a slow-down in growth and/or lower levels of inflation will arrive at some point in the next 5-10 years.
- Returns for U.S. bond markets were mostly negative in Q3 2023. Riskier, higher yielding bonds outperformed while safer, longer duration bonds underperformed. High Yield and bonds with short maturities (under 3 years until maturity) generated positive returns in Q3 2023 while longer maturity bonds experienced losses.

Bond Market

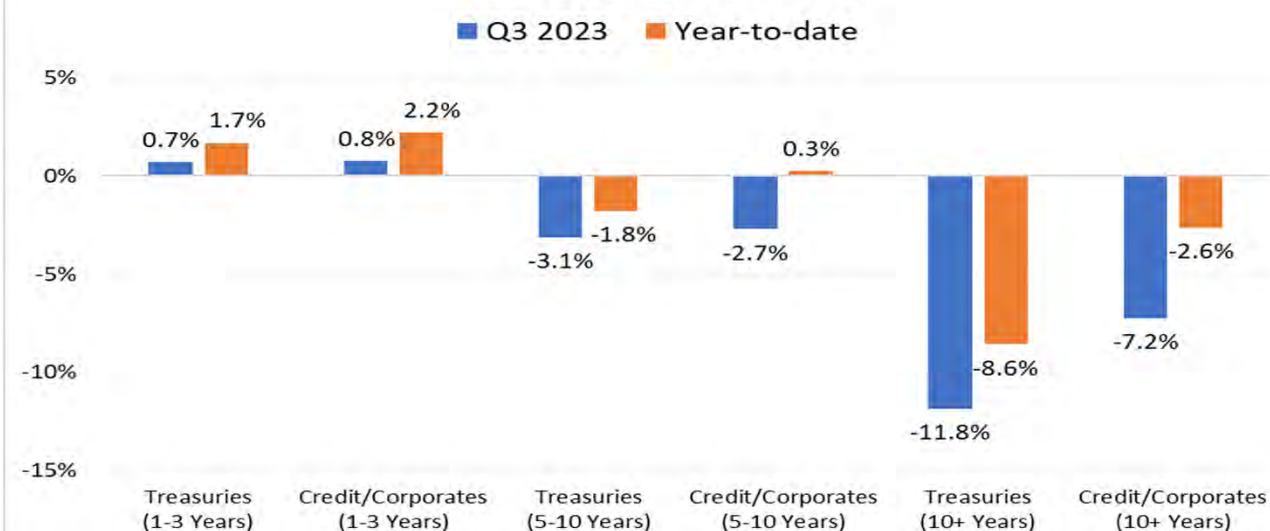
Returns by Credit Rating



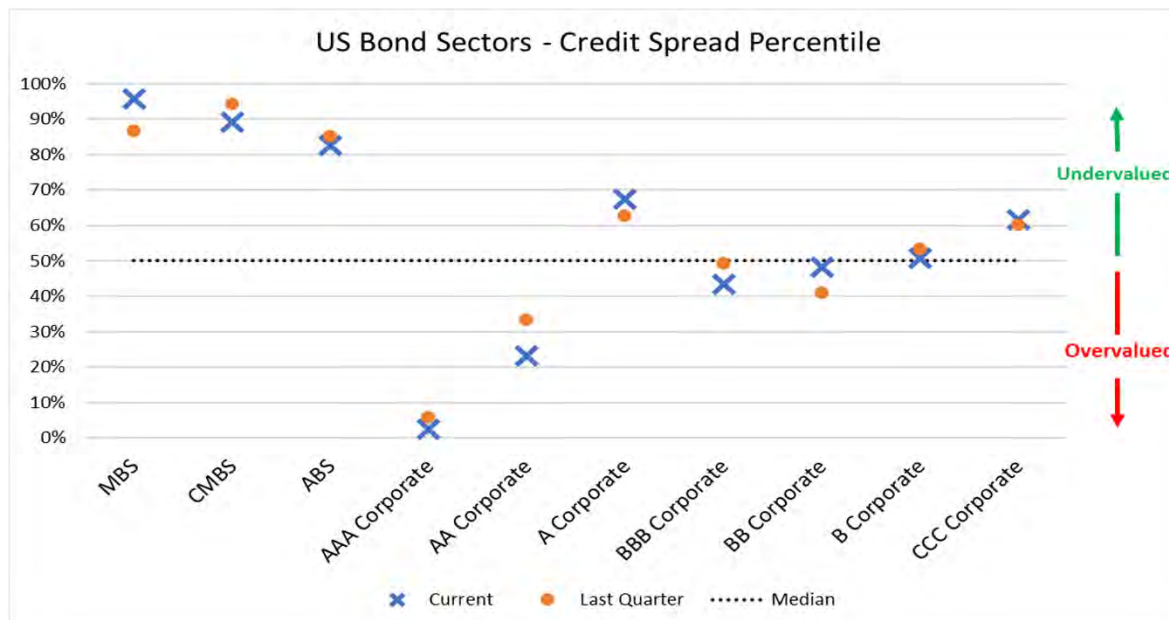
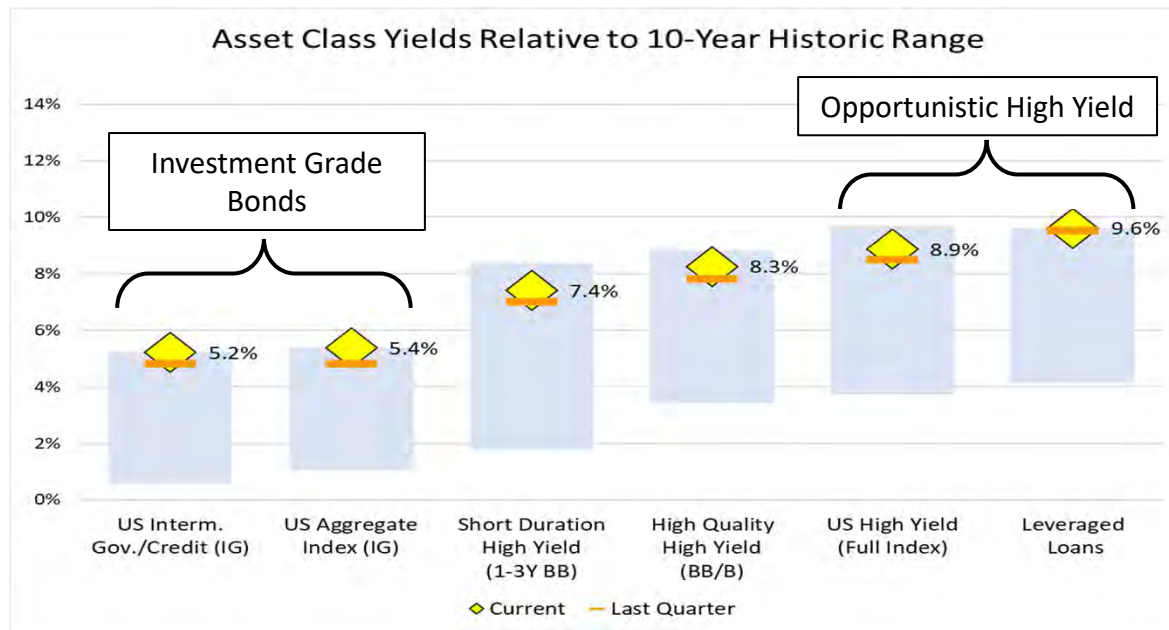
Lower Quality & Shorter Maturity Bonds Continue to Outperform

- High Yield corporate bonds generated positive returns in Q3 2023 while investment grade corporate bonds experienced losses for the quarter.
- Credit spreads held steady with some tightening (bond prices increasing) in Q3 2023.
- Rising interest rates across the yield curve were the primary driver of returns in Q3 2023. Longer maturity bonds experienced a greater increase in yields.
- The rise in interest rates put pressure on high quality credit (AAA-BBB) and longer maturity bonds. Long maturity bonds with little credit risk (US Treasuries, 10+ Year AAA-rated corporate bonds) experienced the largest losses in Q3 2023.
- Year-to-date, the riskiest bonds are outperforming by a wide margin due to high levels of interest income and relatively low levels of defaults. Shorter maturity bonds outperformed longer maturity bonds due to lower sensitivity to rising interest rates.

Returns by Maturity



Bond Market



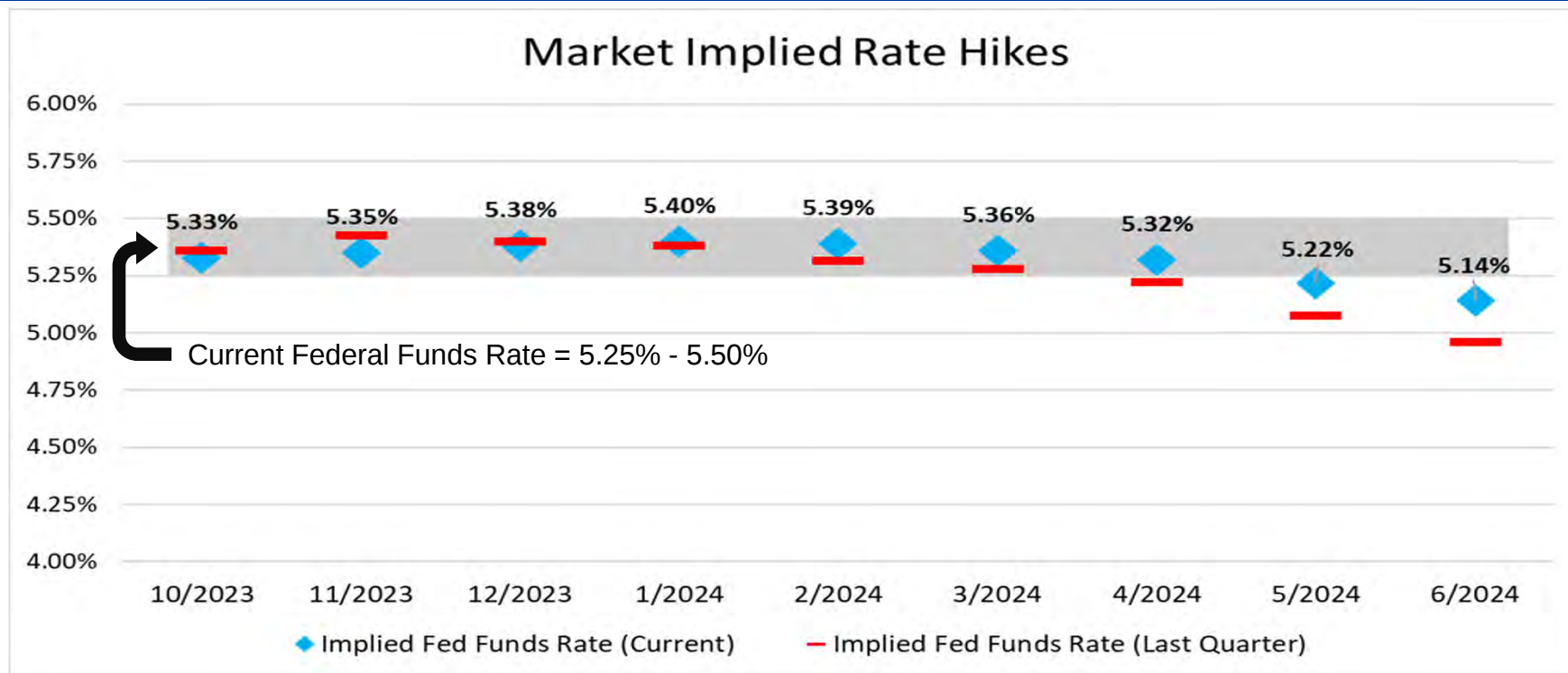
Bond Yields

- due to the move higher in U.S. interest rates, yields across bond sectors moved slightly higher in Q3 2023.
- Investment grade bonds are currently yielding more than 5% with investment grade corporates yielding closer to 6%.
- Investors can earn an additional yield pick-up of 200 to 300 bps in higher-quality high yield bonds relative to U.S. investment grade bonds.
- The broader high yield & leveraged loan universes are currently yielding ~9%, offering the potential for equity-like returns in future years.

Credit Spreads/Valuations

- Credit spreads were mixed in a volatile quarter.
- Most corporate bonds offer spreads in-line with their 10-year median. AAA/AA-rated corporates offer less value versus their 10-year history, suggesting investors are more defensively positioned.
- Spreads in structured credit (MBS, CMBS, ABS) remain well above their pre-2022 lows. MBS remains just below the widest spreads experienced in the past decade.

Bond Market

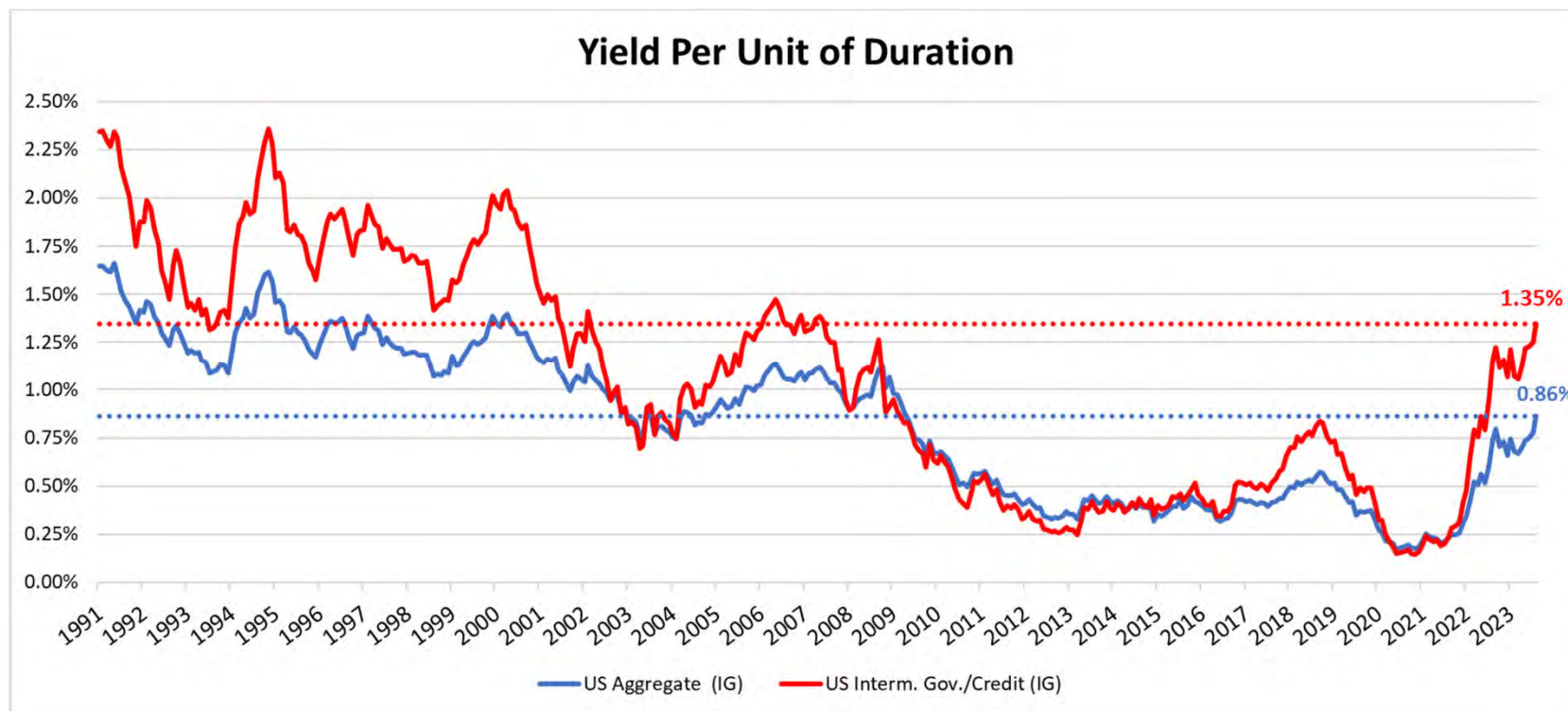


As of 10/11/23

- The FOMC raised interest rates by another 25 bps in late July, but elected to pause at their September meeting. The current target federal funds rate is now at 5.25-5.50%, up from 5.00-5.25% at the end of Q2 2023 and up from 4.25-4.50% in Q4 2022.
- The Fed Funds Rate futures market is currently pricing in no additional rate hikes for the next two quarters, indicating the Federal Reserve is done raising rates for the near term.
- The Fed Funds futures market continues to price in the potential for a 25 bps rate-cut in the 1st half of 2024; however, we have seen these pricings dissipate over time as Federal Reserve members continue to emphasize that the probability of future rate cuts is extremely low.
- Market expectations based on Fed Fund futures align with the sentiment and views of most bond managers. The general consensus is that the Federal Reserve is likely done raising short-term interest rates, but uncertainty remains around how long the Federal Reserve will keep rates at this level and under what circumstances would they feel obligated to lower interest rates.

Bond Market

Investment Grade Investors Are Now Compensated For Duration Risk



- Investment grade bond returns were susceptible to a rise in interest rates for most of the past decade. With the recent surge higher in bond yields, investment grade bond investors are now being adequately compensated for duration risk.
- Interest rates can now move ~85 bps higher before core bond investors (US Aggregate Index) start to realize negative returns on their portfolio in the near-term while intermediate investment grade investors can withstand a ~135 bps rise in interest rates before realizing losses on their portfolio.
- Given yields are equal for the US Intermediate Gov./Credit Index and the US Aggregate Index, intermediate investment grade bonds (US Interm. Gov./Credit) are seemingly better positioned to limit downside risk in the near-term while core bonds (US Aggregate) can provide more upside if interest rates fall, but have less protection in the event interest rates continue to rise.

Bond Market

Interest Rate Sensitivity

12 Month Holding Period - Annualized Returns as of 9/30/2023

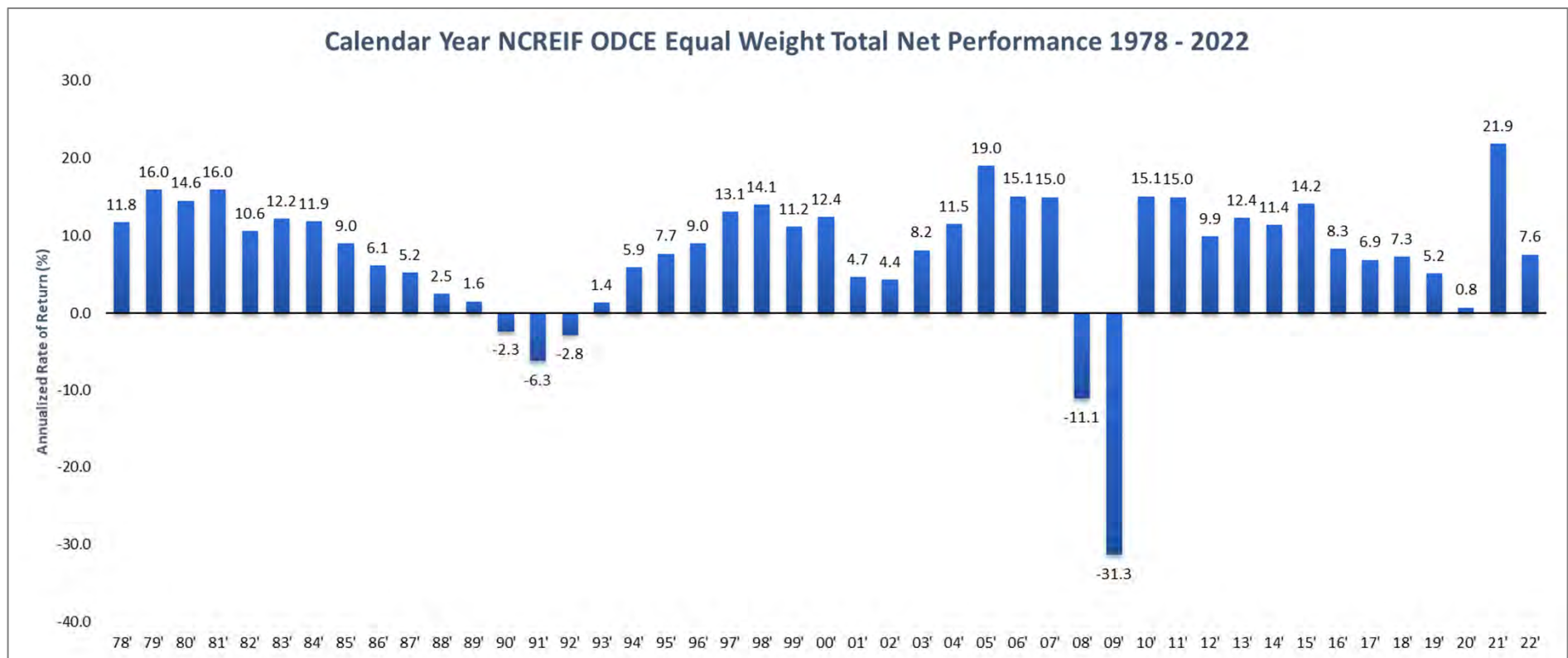
Yield Change (bps)	10 Year Treasury	Bloomberg Aggregate	Bloomberg Int Govt/Credit	ICE BofA Gov/Corp Master	ICE BofA 1-3 yr Gov/Corp	Defensive ICE BofA US HY BB/B ND	Short Duration ICE BofA US HY BB/B 1-3 yr
-300	28.62	24.09	16.87	23.89	10.89	19.92	13.72
-250	24.62	20.98	14.93	20.79	9.97	17.96	12.80
-200	20.61	17.86	12.99	17.70	9.06	15.99	11.87
-150	16.60	14.74	11.05	14.60	8.14	14.02	10.94
-100	12.59	11.62	9.11	11.51	7.22	12.06	10.02
-75	10.59	10.06	8.14	9.96	6.76	11.07	9.55
-50	8.58	8.50	7.17	8.41	6.30	10.09	9.09
-25	6.58	6.95	6.20	6.86	5.84	9.11	8.63
0	4.58	5.39	5.23	5.31	5.38	8.12	8.17
25	2.57	3.83	4.26	3.77	4.92	7.14	7.70
50	0.57	2.27	3.29	2.22	4.46	6.16	7.24
75	-1.44	0.71	2.32	0.67	4.00	5.17	6.78
100	-3.44	-0.85	1.35	-0.88	3.55	4.19	6.31
150	-7.45	-3.97	-0.59	-3.98	2.63	2.22	5.39
200	-11.46	-7.08	-2.53	-7.07	1.71	0.26	4.46
250	-15.47	-10.20	-4.47	-10.17	0.79	-1.71	3.54
300	-19.47	-13.32	-6.42	-13.26	-0.13	-3.68	2.61
Duration	8.02	6.24	3.88	6.19	1.84	3.93	1.85

FOR ILLUSTRATIVE PURPOSES ONLY: For each index the current yield to worst as of 9/30/2023 was used as the base case annualized return. The annualized return sensitivity to a uniform increase or decrease in the yield curve was calculated by taking the index's Option-Adjusted Duration as of 9/30/2023 multiplied by the percentage point change in the yield curve (basis point change divided by 100) and then appropriately adding or subtracting this implied percentage change in the value of the index (due to the shift in the yield curve) to the base case annualized return. This is a rough approximation of the annual return sensitivity to parallel shifts in the yield curve.

Real Estate Market

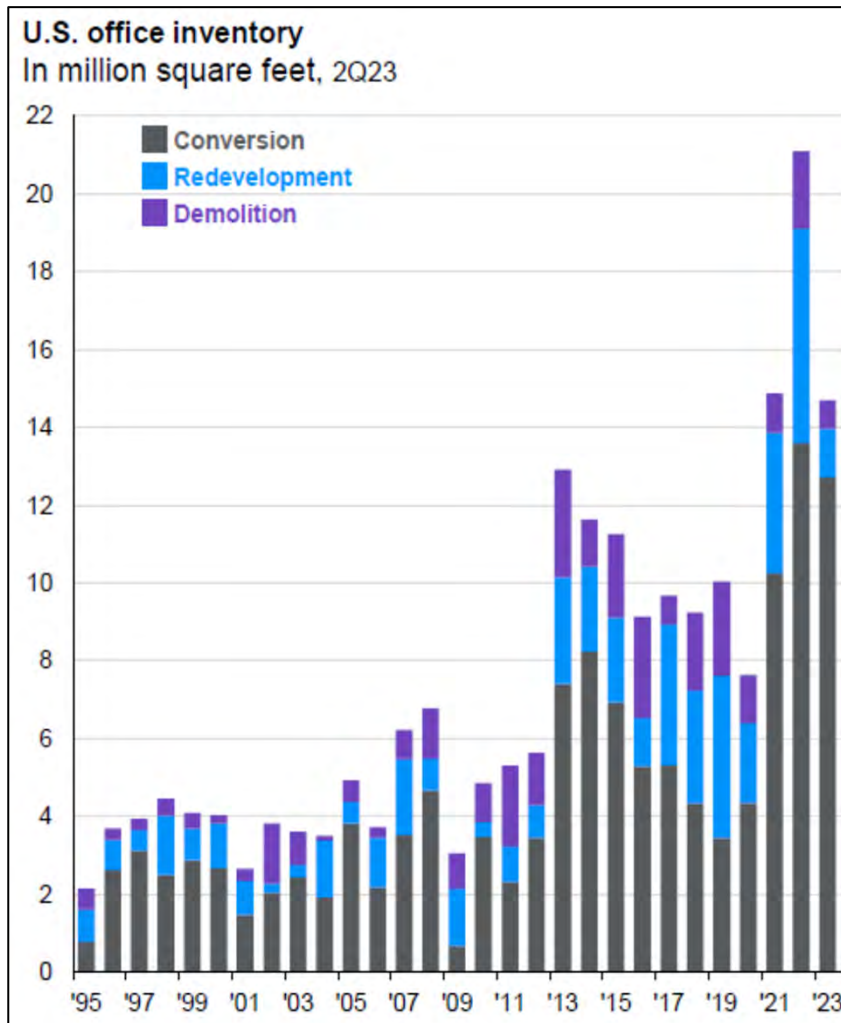
Sector	Index	3Q23	YTD	2022	2021	2020	2019	2018	1-Year	3-Year	5-Year	10-Year
US Private	NCREIF ODCE Equal Weighted (net)	-2.1%	-8.5%	7.6%	21.9%	0.8%	5.2%	7.3%	-13.1%	6.7%	5.2%	7.6%
	NCREIF ODCE EW Income Index	0.9%	2.6%	3.5%	4.1%	3.6%	3.5%	3.5%	3.4%	3.7%	3.7%	3.8%
	NCREIF ODCE EW Appreciation Index	-2.8%	-10.4%	4.8%	18.3%	-2.4%	1.7%	3.7%	-15.4%	3.7%	2.1%	4.0%

- The NCREIF ODCE Equal Weighted Index (net) declined for the fourth quarter in a row, generating a return of -2.1% in Q3 2023 and -8.5% YTD through the third quarter.
- 2023 is expected to be just the sixth negative calendar year for the index since 1978 and first since 2009, when the index declined by more than -31%.

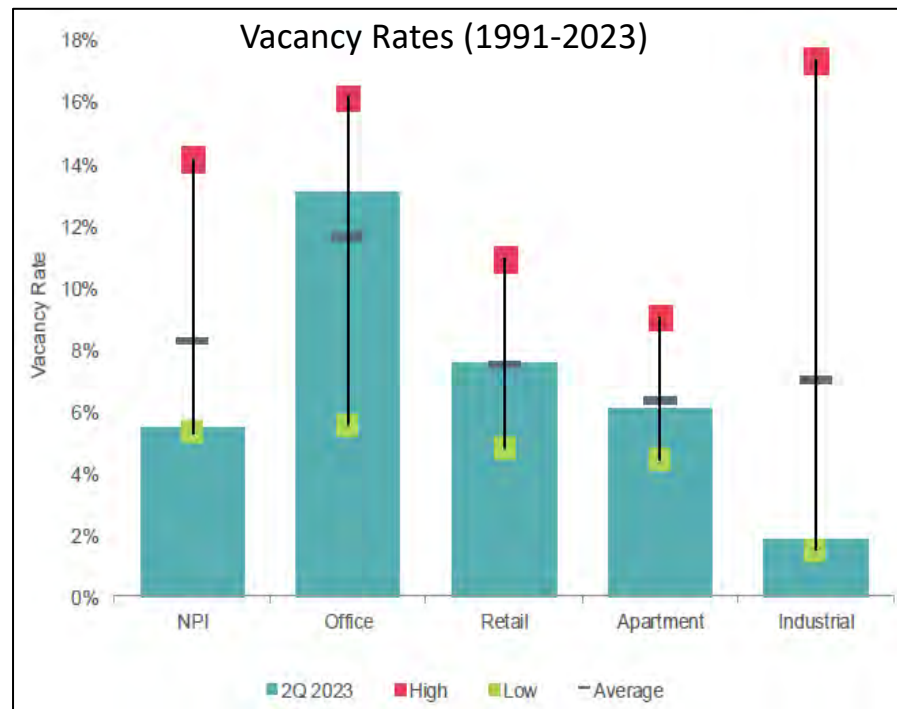


Real Estate Market

- Vacancy rates have largely declined from their early pandemic (2020) peaks in apartment, industrial and retail assets, while remaining elevated in U.S. office assets at approximately 13%. Industrial and apartment vacancies are below their long-term averages, as shown to the right.



Source: J.P. Morgan Asset Management, August 2023.



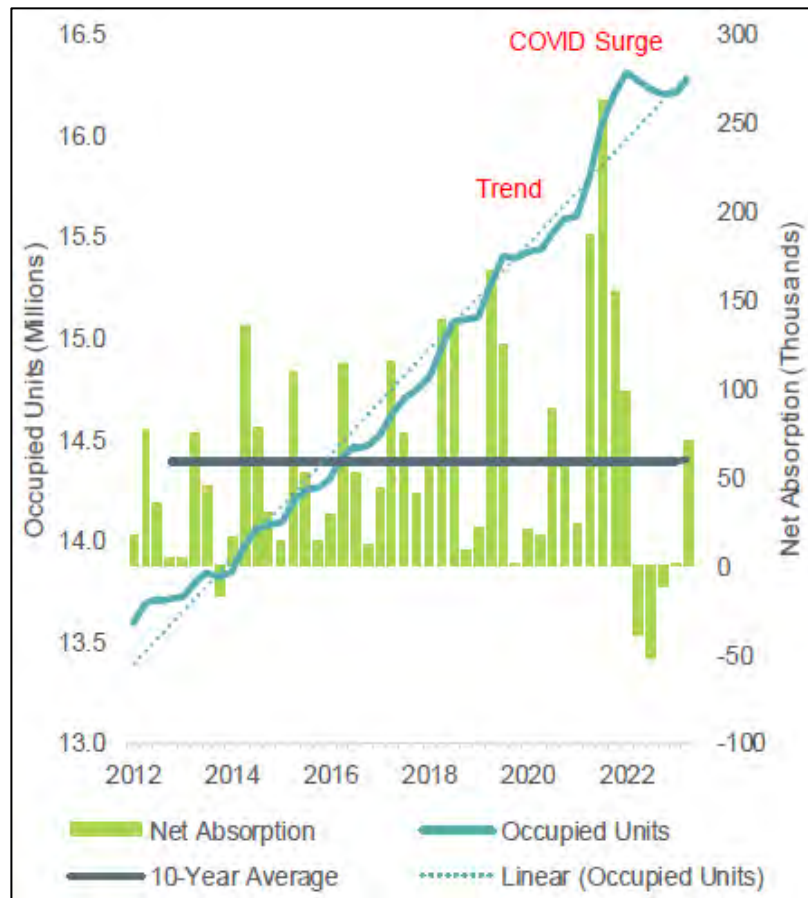
Source: NCREIF, via DWS, as of June 2023.

- Office properties were again the largest contributor to valuation declines in Q3. Office owners are attempting to keep existing tenants in place (though potentially at reduced footprints) and sign new leases on vacant space, which continues to be challenging due to companies' changing need for office space amid higher levels of remote work. This environment has put downward pressure on office rents, and often owners need to provide lease concessions to attract tenants. Lower rents, combined with high vacancy rates and higher borrowing costs, continue to put downward pressure on office valuations.
- A significant amount of office assets, relative to historical norms, have been slated to be repurposed, redeveloped or demolished since the onset of the COVID-19 pandemic, as shown in the chart to the left.

Real Estate Market

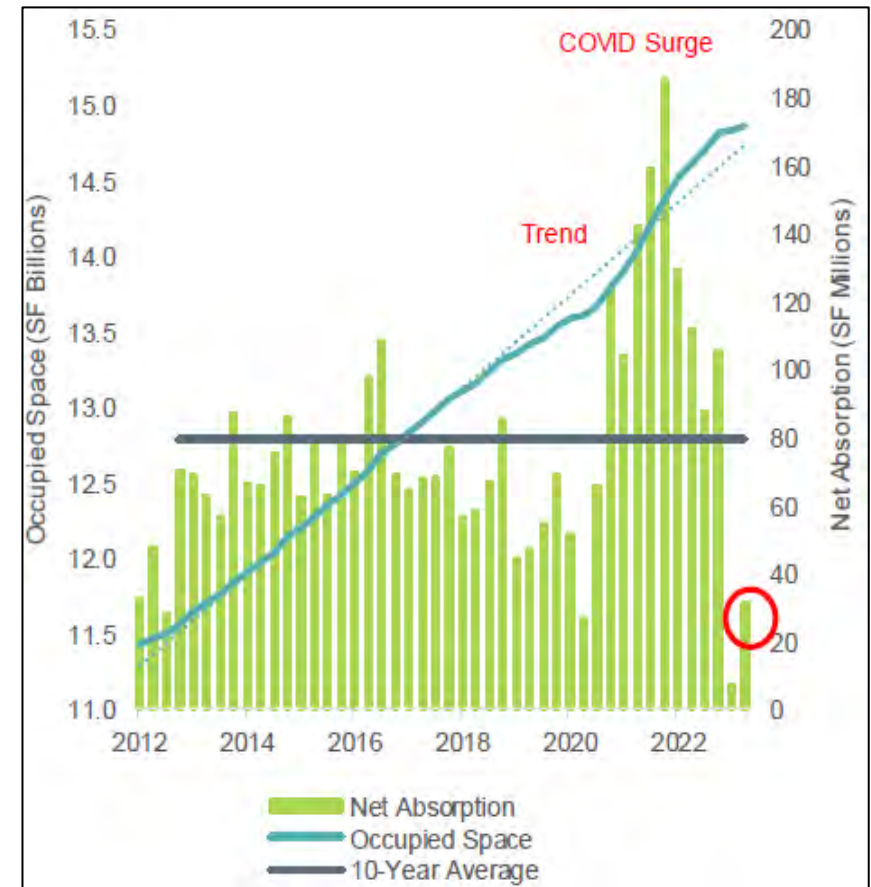
- Though valuation writedowns have occurred in other real estate sectors outside of the office sector, fundamentals in these sectors appear stronger relative to office and should recover faster.
- Apartments had negative net absorption following the pandemic surge, but net absorption has again turned positive in 2023, with strong demand for apartments driven by high mortgage rates, lower levels of development and a reduced supply of existing homes for sale.
- Industrial demand has softened from its pandemic peak, though net absorption remains positive.
- Retail vacancy rates have declined from their pandemic highs, and new supply remains limited.

Apartment Demand



Source: CBRE (via DWS), as of June 2023.

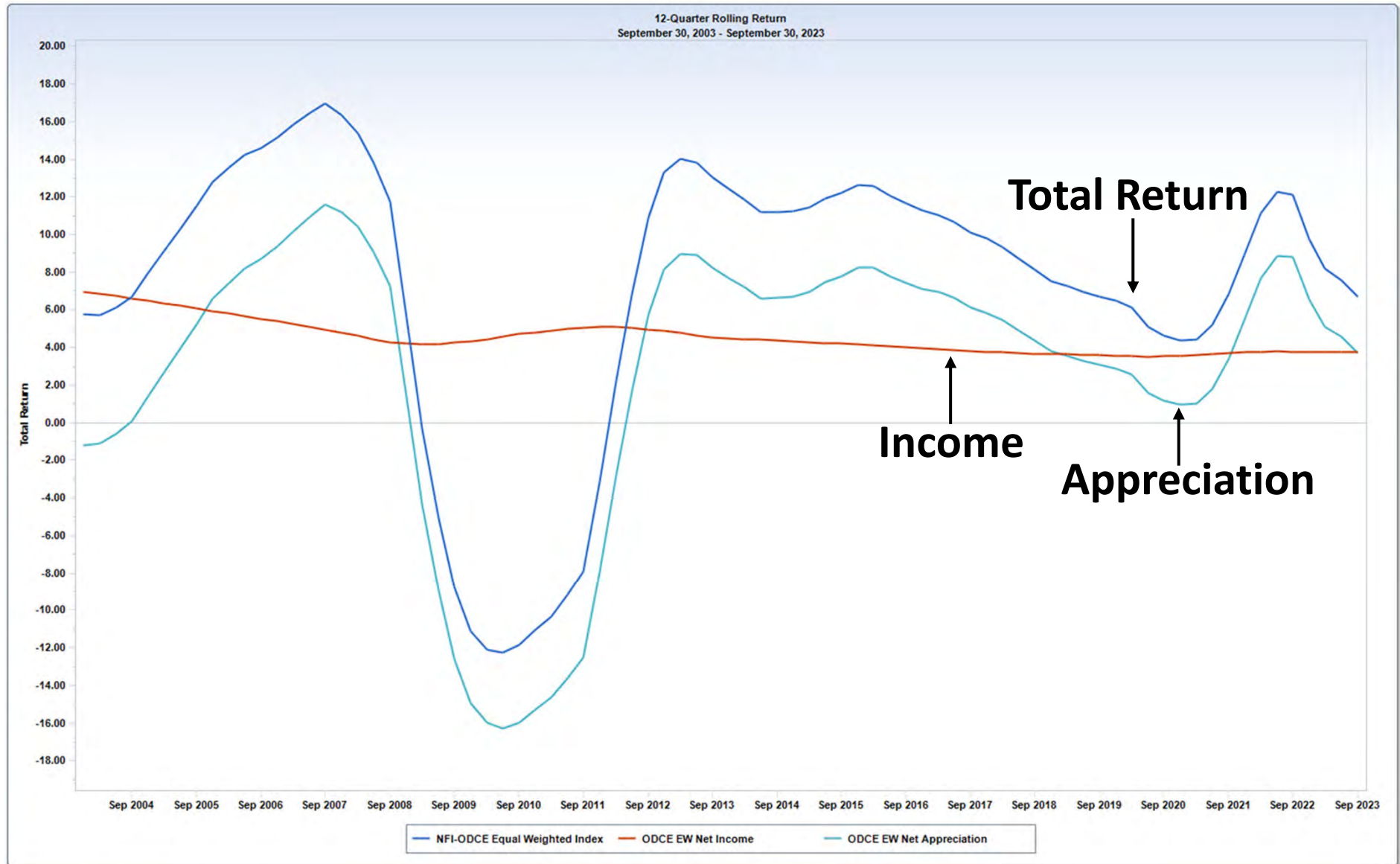
Industrial Demand



Source: CBRE, DWS as of June 2023.

Real Estate Market

- The income component of real estate returns continues to remain stable, providing a buffer against the recent periods of negative appreciation. Appreciation was positive in the first half of 2022 and drove the positive calendar year return for the index last year but was flat in Q3 2022 and has been negative since Q4 2022, driving the negative returns for the ODCE index over the last four quarters.



Hedge Fund Market

Strategy	Index	3Q23	YTD	2022	2021	2020	2019	2018	1-Year	3-Year	5-Year	10-Year
Fund of Funds	HFRI FOF Composite	0.5%	2.8%	-5.3%	6.2%	10.9%	8.4%	-4.0%	4.6%	3.8%	3.4%	3.3%
Equity Long-Short	HFRI Equity Hedge	-1.0%	4.7%	-10.1%	11.7%	17.9%	13.7%	-7.1%	9.1%	6.5%	5.2%	5.1%
Event Driven	HFRI Event Driven	2.4%	4.9%	-4.8%	12.4%	9.3%	7.5%	-2.1%	8.2%	7.8%	4.6%	4.5%
Global Macro	HFRI Macro Index	1.4%	0.6%	9.0%	7.7%	5.4%	6.5%	-4.1%	-0.7%	7.4%	5.3%	3.4%
Relative Value	HFRI Relative Value	1.5%	4.1%	-0.7%	7.6%	3.4%	7.4%	-0.4%	5.6%	5.4%	3.6%	4.0%
Credit	HFRI Credit Index	1.6%	4.4%	-2.6%	7.9%	6.3%	6.5%	-0.0%	5.8%	5.3%	3.8%	4.1%

Hedge Fund Strategy Performance



- Hedge fund strategies were mostly positive in Q3 2023, providing a safe haven to investors amid a period of losses for global stocks and investment grade bonds. The HFRI Fund of Funds Composite generated a 0.51% return in Q3 2023 and is up 2.81% YTD.
- Gains during the quarter were broad-based, as event-driven, global macro, relative value and credit strategies all generated positive performance. Hedge funds seemingly found opportunities amidst choppy markets during the quarter that saw an increase in interest rates, slowing inflation, mostly higher commodity prices (particularly in energy) and a strengthening U.S. Dollar.
- Long-short equity strategies were negative during the quarter, as the HFRI Equity Hedge Index returned -0.97% but remains up 4.65% YTD. Fundamental stock pickers have been challenged by a market lacking breadth; while technology and AI stocks have been the winners this year, they largely stumbled through Q3. Hedge funds with exposures in energy and financials fared better during the quarter.



IUOE Local No. 77 Annuity Fund

Master Consulting Services Report

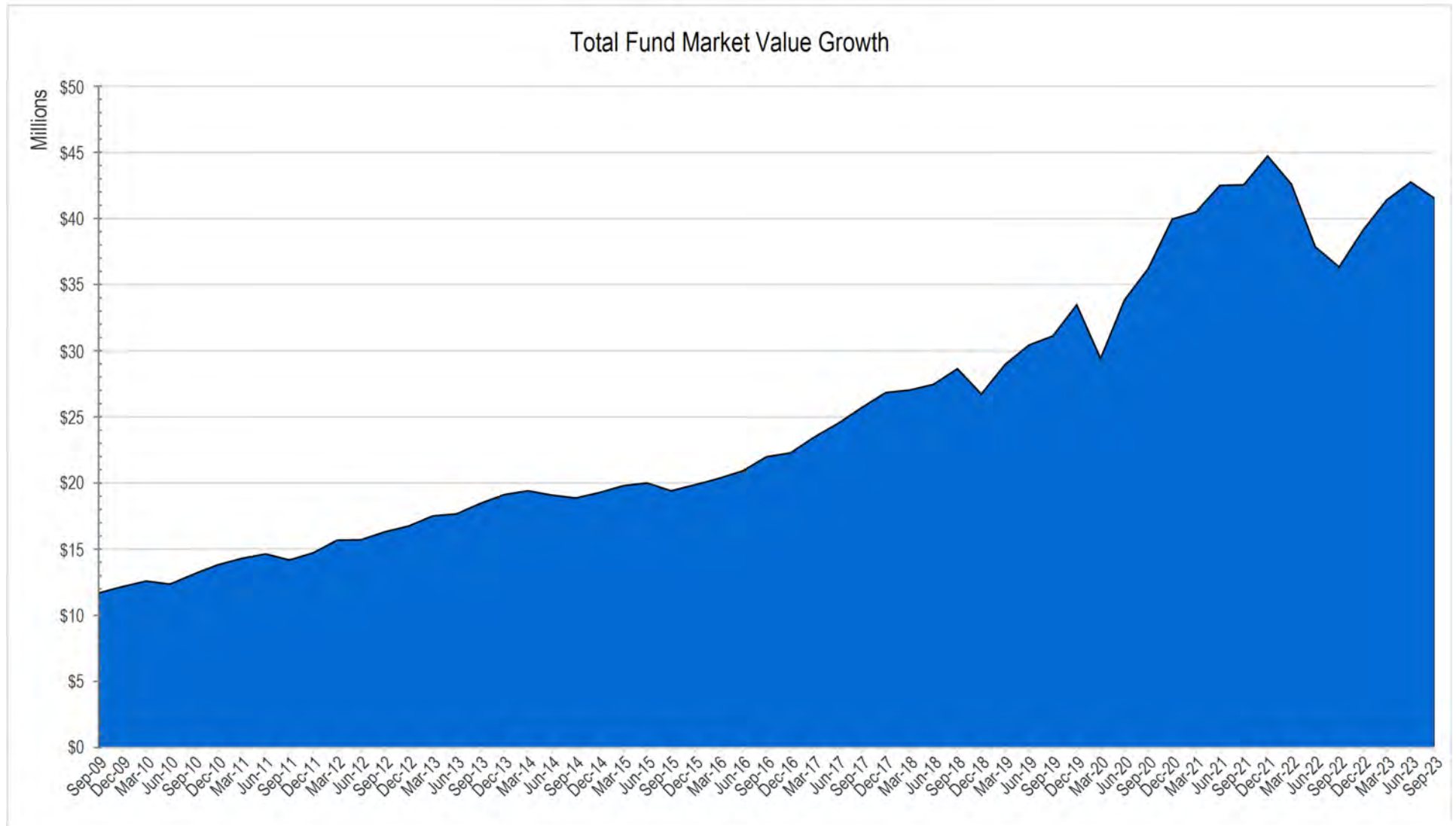
Period Ended

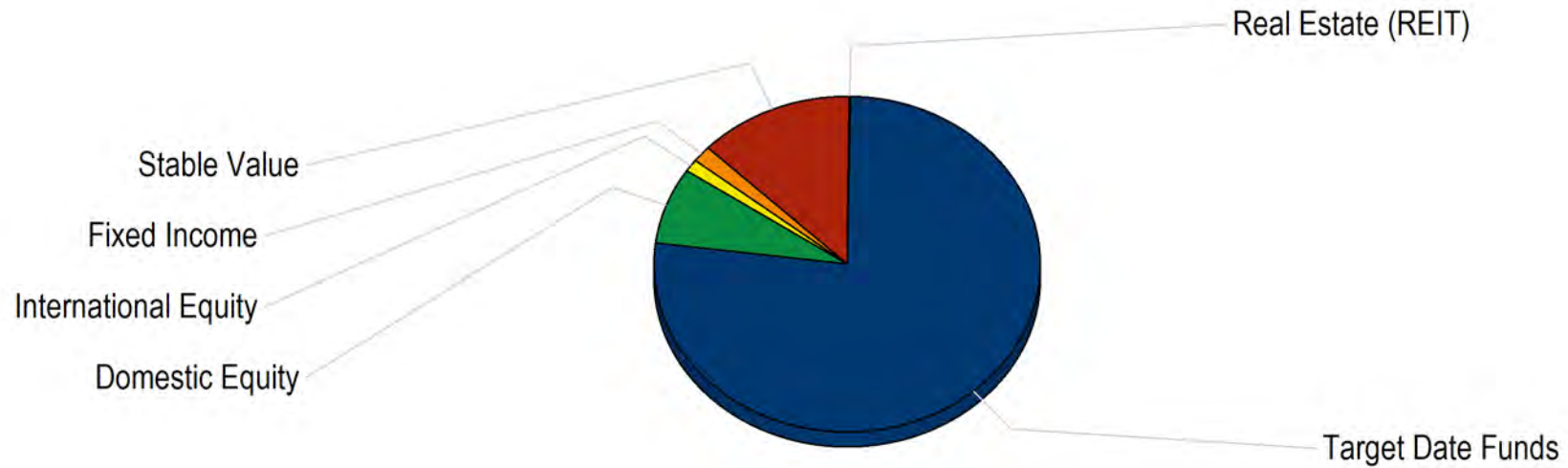
September 30, 2023

IUOE Local No. 77 Annuity Fund
Master Consulting Services Report as of September 30, 2023

Total Fund Growth of Assets

	Quarter Ending March 31	Quarter Ending June 30	Quarter Ending September 30	Quarter Ending December 31
2023	\$41,406,753	\$42,753,166	\$41,519,175	-
2022	\$42,590,150	\$37,848,557	\$36,332,422	\$39,114,841
2021	\$40,486,314	\$42,500,221	\$42,541,556	\$44,720,977
2020	\$29,413,529	\$33,829,564	\$36,219,895	\$39,945,311
2019	\$28,965,507	\$30,429,058	\$31,114,044	\$33,471,332
2018	\$27,025,726	\$27,457,905	\$28,639,222	\$26,726,290
2017	\$23,468,954	\$24,510,754	\$25,713,956	\$26,840,656
2016	\$20,348,414	\$20,917,578	\$21,987,483	\$22,274,102
2015	\$19,798,253	\$19,997,614	\$19,407,137	\$19,867,667
2014	\$19,411,611	\$19,082,997	\$18,865,153	\$19,278,079
2013	\$17,509,679	\$17,661,805	\$18,453,388	\$19,122,441
2012	\$15,681,014	\$15,709,815	\$16,307,675	\$16,749,139
2011	\$14,298,684	\$14,638,327	\$14,180,615	\$14,718,540
2010	\$12,588,726	\$12,354,846	\$13,122,426	\$13,819,325
2009	\$10,219,710	\$10,904,803	\$11,682,969	\$12,167,061

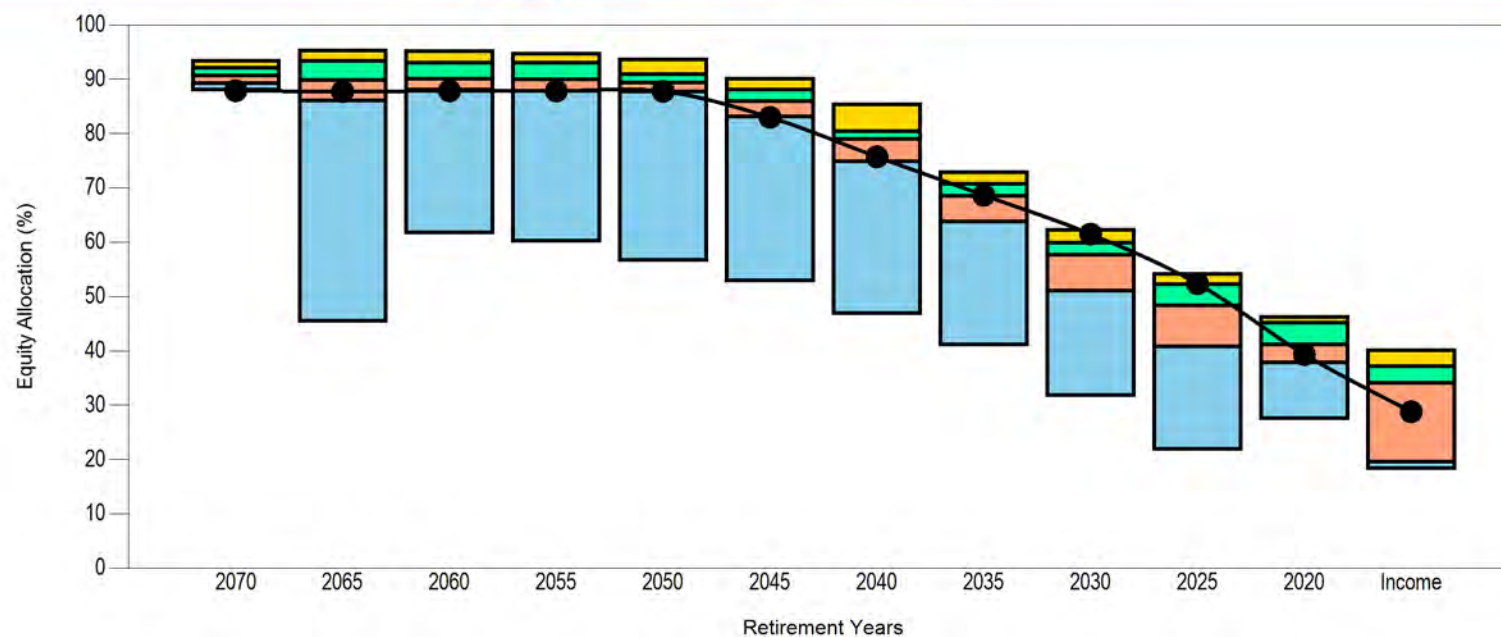




**Total Fund Asset Allocation
As Of September 30, 2023**

	Current	%
 Target Date Funds	\$31,887,379	76.8%
 Domestic Equity	\$3,053,052	7.4%
 International Equity	\$517,894	1.2%
 Fixed Income	\$657,089	1.6%
 Stable Value	\$5,379,330	13.0%
 Real Estate (REIT)	\$24,430	0.1%
Total	\$41,519,175	100.0%

Vanguard Target Date Investments Equity Allocation vs. Universe of Target Date Families As of September 30, 2023



	Allocation (Rank)											
5th Percentile	88.2	45.6	61.9	60.3	56.9	53.0	47.0	41.2	31.9	22.0	27.7	18.5
25th Percentile	89.3	86.2	88.1	87.9	87.9	83.2	74.9	63.8	51.1	40.9	38.0	19.7
Median	90.8	90.0	90.2	90.0	89.5	86.1	79.1	68.6	57.7	48.4	41.2	34.2
75th Percentile	92.2	93.5	93.1	93.1	91.0	88.1	80.5	70.9	60.0	52.3	45.2	37.2
95th Percentile	93.4	95.2	95.1	94.6	93.6	90.0	85.4	72.8	62.2	54.2	46.2	40.0
# of Portfolios	2	19	30	30	30	30	29	30	29	30	20	21
● Vanguard Inv	87.9 (1)	87.8 (34)	87.9 (21)	87.9 (25)	87.8 (25)	83.0 (25)	75.7 (29)	68.7 (52)	61.5 (86)	52.4 (76)	39.3 (37)	28.8 (40)

Note: The above chart illustrates the Vanguard target date funds' total equity allocation by retirement fund year relative to the peer universe. A higher Rank indicates a greater allocation to equities relative to peers. For example, a Rank of 100 indicates the highest equity allocation among peers and a Rank of 1 indicates the lowest equity allocation.

Manager Roster

Name	Ticker	Account Type	Benchmark	Market Value	% of Portfolio
Vanguard Target Retirement Income Fund - Investor	VTINX	Target Date Fund	Target Retirement Income Composite	\$397,764	0.96%
Vanguard Target Retirement 2020 - Investor	VTWNX	Target Date Fund	Target Retirement 2020 Composite	\$1,925,888	4.64%
Vanguard Target Retirement 2025 - Investor	VTTVX	Target Date Fund	Target Retirement 2025 Composite	\$6,453,738	15.54%
Vanguard Target Retirement 2030 - Investor	VTHRX	Target Date Fund	Target Retirement 2030 Composite	\$4,926,250	11.86%
Vanguard Target Retirement 2035 - Investor	VTTHX	Target Date Fund	Target Retirement 2035 Composite	\$4,315,683	10.39%
Vanguard Target Retirement 2040 - Investor	VFORX	Target Date Fund	Target Retirement 2040 Composite	\$4,274,248	10.29%
Vanguard Target Retirement 2045 - Investor	VTIVX	Target Date Fund	Target Retirement 2045 Composite	\$3,662,330	8.82%
Vanguard Target Retirement 2050 - Investor	VFIFX	Target Date Fund	Target Retirement 2050 Composite	\$3,042,102	7.33%
Vanguard Target Retirement 2055 - Investor	VFFVX	Target Date Fund	Target Retirement 2055 Composite	\$1,830,124	4.41%
Vanguard Target Retirement 2060 - Investor	VTTSX	Target Date Fund	Target Retirement 2060 Composite	\$895,970	2.16%
Vanguard Target Retirement 2065 - Investor	VLXVX	Target Date Fund	Target Retirement 2065 Composite	\$155,253	0.37%
Vanguard Target Retirement 2070 - Investor	VSVNX	Target Date Fund	Target Retirement 2070 Composite	\$8,030	0.02%
Vanguard 500 Index Fund	VFIAX	Domestic Equity	S&P 500	\$2,178,259	5.25%
Vanguard Growth Index Fund Admiral Shares	VIGAX	Domestic Equity	CRSP US Large Cap Growth TR USD	\$13,496	0.03%
Vanguard Value Index Fund Admiral Shares	VVIAX	Domestic Equity	CRSP US Large Cap Value TR USD	\$14,246	0.03%
Vanguard Mid-Cap Index Fund	VIMAX	Domestic Equity	CRSP US Mid Cap TR USD	\$626,368	1.51%
Vanguard Small Cap Index Fund	VSMAX	Domestic Equity	CRSP US Small Cap TR USD	\$220,683	0.53%
Vanguard Developed Markets Index Fund Admiral	VTMGX	International Equity	FTSE-Developed All Cap Ex U.S. Index	\$459,634	1.11%
Vanguard FTSE All-World ex-US SmallCap Index	VFSAX	International Equity	FTSE - Global Small Cap Ex U.S. Index	\$26,399	0.06%
Vanguard Emerging Markets Index Fund Admiral	VEMAX	International Equity	Spliced Emerging Markets Index	\$31,861	0.08%
Vanguard High-Yield Corporate Fund	VWEAX	Fixed Income	High-Yield Corporate Composite Index	\$34,996	0.08%
Vanguard Total Bond Market Index Admiral	VBTLX	Fixed Income	Spliced Barclays USAgg Float Adj	\$622,094	1.50%
SAGIC Diversified Bond		Stable Value	FTSE T-Bill 3 Months TR	\$5,379,330	12.96%
Vanguard Real Estate Index Fund Admiral	VGSLX	Real Estate	REIT Spliced Index	\$24,430	0.06%
Total				\$41,519,175	100.00%

Asset Allocation of Vanguard Target Retirement Investments by Fund Vintage Year
As of September 30, 2023

	2070	2065	2060	2055	2050	2045	2040	2035	2030	2025	2020	Income
Multi-Cap Core Funds	53.6%	53.2%	53.3%	53.2%	53.3%	51.2%	46.9%	42.4%	37.7%	31.7%	23.8%	17.4%
Vanguard Total Stock Market Index Fund;Inst +	53.6%	53.2%	53.3%	53.2%	53.3%	51.2%	46.9%	42.4%	37.7%	31.7%	23.8%	17.4%
International Multi-Cap Core	35.7%	35.9%	36.0%	36.0%	35.9%	33.1%	30.0%	27.4%	24.7%	21.5%	16.2%	11.9%
Vanguard Total International Stock Index Fund;Inv	35.7%	35.9%	36.0%	36.0%	35.9%	33.1%	30.0%	27.4%	24.7%	21.5%	16.2%	11.9%
Core Bond Funds	7.0%	6.9%	7.0%	7.0%	7.0%	10.3%	15.5%	20.3%	25.5%	28.3%	32.6%	36.9%
Vanguard Total Bond Market II Index Fund;Investor	7.0%	6.9%	7.0%	7.0%	7.0%	10.3%	15.5%	20.3%	25.5%	28.3%	32.6%	36.9%
International Income Funds	3.0%	2.7%	2.7%	2.7%	2.7%	4.2%	6.6%	8.9%	11.1%	12.5%	14.7%	16.1%
Vanguard Total International Bond II Index Fd;Inst	3.0%	2.7%	2.7%	2.7%	2.7%	4.2%	6.6%	8.9%	11.1%	12.5%	14.7%	16.1%
Inflation Protected Bond Funds	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	4.8%	11.8%	16.9%
Vanguard Sht-Term Inflation-Protected Sec Idx;Adm	--	--	--	--	--	--	--	--	--	4.8%	11.8%	16.9%
Other	0.8%	1.3%	1.1%	1.0%	1.1%	1.2%	1.1%	1.1%	1.0%	1.2%	1.0%	0.8%
USD Cash	0.4%	0.1%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Vanguard Market Liquidity Fund	0.4%	1.2%	1.0%	1.0%	1.1%	1.2%	1.0%	1.1%	1.0%	1.2%	0.9%	0.8%
Total	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Performance Detail (Net of Fees) - Annualized

			Ending September 30, 2023														
	Market Value	% of Portfolio	2023 Q3	Rank	YTD	Rank	1 Yr	Rank	3 Yrs	Rank	5 Yrs	Rank	7 Yrs	Rank	10 Yrs	Rank	Expense Ratio
Total Fund	\$41,519,175	100.0%															
Total Target Date Funds	\$31,887,379	76.8%															
Vanguard Target Retirement Income Fund - Investor	\$397,764	1.0%	-2.3%	--	3.2%	--	7.0%	--	-0.1%	--	2.7%	--	3.1%	--	--	--	0.08%
Target Retirement Income Composite			-2.3%	--	3.2%	--	7.3%	--	0.1%	--	3.0%	--	3.4%	--	--	--	
Vanguard Target Retirement 2020 - Investor	\$1,925,888	4.6%	-2.7%	--	4.2%	--	9.4%	--	1.4%	--	3.6%	--	4.8%	--	--	--	0.08%
Target Retirement 2020 Composite			-2.5%	--	4.3%	--	9.7%	--	1.7%	--	4.0%	--	5.1%	--	--	--	
Vanguard Target Retirement 2025 - Investor	\$6,453,738	15.5%	-3.0%	--	5.2%	--	11.6%	--	2.2%	--	4.1%	--	5.5%	--	--	--	0.08%
Target Retirement 2025 Composite			-2.8%	--	5.4%	--	11.9%	--	2.6%	--	4.5%	--	5.9%	--	--	--	
Vanguard Target Retirement 2030 - Investor	\$4,926,250	11.9%	-3.2%	--	5.9%	--	13.1%	--	3.0%	--	4.5%	--	6.1%	--	--	--	0.08%
Target Retirement 2030 Composite			-3.0%	--	6.1%	--	13.5%	--	3.4%	--	4.9%	--	6.5%	--	--	--	
Vanguard Target Retirement 2035 - Investor	\$4,315,683	10.4%	-3.3%	--	6.7%	--	14.6%	--	3.9%	--	4.9%	--	6.8%	--	--	--	0.08%
Target Retirement 2035 Composite			-3.0%	--	6.9%	--	15.0%	--	4.3%	--	5.4%	--	7.2%	--	--	--	
Vanguard Target Retirement 2040 - Investor	\$4,274,248	10.3%	-3.3%	--	7.4%	--	16.2%	--	4.8%	--	5.4%	--	7.4%	--	--	--	0.08%
Target Retirement 2040 Composite			-3.1%	--	7.6%	--	16.5%	--	5.2%	--	5.8%	--	7.8%	--	--	--	
Vanguard Target Retirement 2045 - Investor	\$3,662,330	8.8%	-3.4%	--	8.1%	--	17.7%	--	5.7%	--	5.9%	--	7.9%	--	--	--	0.08%
Target Retirement 2045 Composite			-3.2%	--	8.4%	--	18.1%	--	6.2%	--	6.3%	--	8.3%	--	--	--	
Vanguard Target Retirement 2050 - Investor	\$3,042,102	7.3%	-3.5%	--	8.5%	--	18.5%	--	5.9%	--	6.0%	--	8.0%	--	--	--	0.08%
Target Retirement 2050 Composite			-3.2%	--	8.7%	--	18.7%	--	6.3%	--	6.4%	--	8.4%	--	--	--	
Vanguard Target Retirement 2055 - Investor	\$1,830,124	4.4%	-3.5%	--	8.5%	--	18.5%	--	5.9%	--	6.0%	--	8.0%	--	--	--	0.08%
Target Retirement 2055 Composite			-3.2%	--	8.7%	--	18.7%	--	6.3%	--	6.4%	--	8.4%	--	--	--	
Vanguard Target Retirement 2060 - Investor	\$895,970	2.2%	-3.5%	--	8.5%	--	18.5%	--	5.9%	--	6.0%	--	8.0%	--	--	--	0.08%
Target Retirement 2060 Composite			-3.2%	--	8.7%	--	18.7%	--	6.3%	--	6.4%	--	8.4%	--	--	--	
Vanguard Target Retirement 2065 - Investor	\$155,253	0.4%	-3.5%	--	8.5%	--	18.5%	--	5.9%	--	6.0%	--	--	--	--	--	0.08%
Target Retirement 2065 Composite			-3.2%	--	9.8%	--	19.8%	--	6.7%	--	6.6%	--	--	--	--	--	
Vanguard Target Retirement 2070 - Investor	\$8,030	0.0%	-3.5%	--	8.5%	--	18.5%	--	--	--	--	--	--	--	--	--	0.08%
Target Retirement 2070 Composite			-3.2%	--	8.7%	--	18.7%	--	--	--	--	--	--	--	--	--	

Performance Detail (Net of Fees) - Annualized

			Ending September 30, 2023														Expense Ratio
	Market Value	% of Portfolio	2023 Q3	Rank	YTD	Rank	1 Yr	Rank	3 Yrs	Rank	5 Yrs	Rank	7 Yrs	Rank	10 Yrs	Rank	
Total Domestic Equity	\$3,053,052	7.4%															
Vanguard 500 Index Fund	\$2,178,259	5.2%	-3.3%	50	13.0%	27	21.6%	31	10.1%	35	9.9%	20	12.2%	18	11.9%	12	0.04%
S&P 500			-3.3%	49	13.1%	25	21.6%	29	10.1%	34	9.9%	16	12.2%	15	11.9%	9	
Vanguard Growth Index Fund Admiral Shares	\$13,496	0.0%	-3.7%	49	28.3%	12	28.1%	23	6.7%	30	11.9%	12	14.5%	17	13.6%	18	0.05%
CRSP US Large Cap Growth TR USD			-3.7%	49	28.3%	11	28.2%	21	6.8%	28	12.0%	11	14.6%	16	13.6%	16	
Vanguard Value Index Fund Admiral Shares	\$14,246	0.0%	-2.3%	50	0.1%	69	14.8%	57	12.4%	48	7.3%	33	9.6%	26	9.8%	15	0.05%
CRSP US Large Cap Value TR USD			-2.3%	49	0.1%	69	14.9%	56	12.4%	48	7.3%	32	9.6%	25	9.9%	14	
Vanguard Mid-Cap Index Fund	\$626,368	1.5%	-5.1%	77	3.3%	66	12.6%	63	7.3%	73	6.5%	27	8.7%	29	9.0%	16	0.05%
CRSP US Mid Cap TR USD			-5.1%	76	3.3%	66	12.6%	63	7.3%	71	6.5%	25	8.7%	25	9.1%	13	
Vanguard Small Cap Index Fund	\$220,683	0.5%	-4.6%	54	4.2%	37	12.5%	50	8.7%	76	4.6%	29	8.0%	27	8.0%	20	0.05%
CRSP US Small Cap TR USD			-4.6%	56	4.1%	38	12.4%	51	8.7%	76	4.6%	31	8.0%	27	8.0%	22	
Total International Equity	\$517,894	1.2%															
Vanguard Developed Markets Index Fund Admiral	\$459,634	1.1%	-4.7%	53	5.9%	53	24.0%	48	5.3%	40	3.2%	35	5.3%	32	4.0%	35	0.07%
FTSE-Developed All Cap Ex U.S. Index			-3.9%	25	6.7%	35	24.2%	46	5.8%	27	3.5%	28	5.6%	21	--	--	
Vanguard FTSE All-World ex-US SmallCap Index	\$26,399	0.1%	-3.4%	28	4.3%	49	18.0%	83	2.9%	52	1.5%	57	3.7%	71	3.4%	93	0.16%
FTSE - Global Small Cap Ex U.S. Index			-2.7%	17	5.1%	24	18.3%	75	3.5%	42	1.9%	39	4.0%	54	3.7%	75	
Vanguard Emerging Markets Index Fund Admiral	\$31,861	0.1%	-2.2%	29	2.5%	62	10.9%	68	-0.2%	35	2.0%	39	3.5%	45	2.5%	43	0.14%
Spliced Emerging Markets Index			-1.5%	20	2.6%	60	11.0%	66	0.3%	32	2.2%	34	3.7%	38	2.6%	39	
Total Fixed Income	\$657,089	1.6%															
Vanguard High-Yield Corporate Fund	\$34,996	0.1%	-0.2%	--	4.1%	--	9.2%	--	1.0%	--	2.8%	--	3.4%	--	4.0%	--	0.13%
High-Yield Corporate Composite Index			0.2%	--	4.8%	--	9.4%	--	1.1%	--	3.2%	--	3.6%	--	4.1%	--	
Vanguard Total Bond Market Index Admiral	\$622,094	1.5%	-3.1%	--	-0.9%	--	0.7%	--	-5.2%	--	0.1%	--	-0.1%	--	1.1%	--	0.05%
Spliced Barclays USAgg Float Adj			-3.1%	--	-1.1%	--	0.8%	--	-5.2%	--	0.2%	--	0.0%	--	1.2%	--	

Performance Detail (Net of Fees) - Annualized

			Ending September 30, 2023														Expense Ratio
	Market Value	% of Portfolio	2023 Q3	Rank	YTD	Rank	1 Yr	Rank	3 Yrs	Rank	5 Yrs	Rank	7 Yrs	Rank	10 Yrs	Rank	
Total Stable Value	\$5,379,330	13.0%															
SAGIC Diversified Bond	\$5,379,330	13.0%	1.0%	--	3.0%	--	3.9%	--	3.6%	--	3.7%	--	3.7%	--	--	--	0.42%
FTSE T-Bill 3 Months TR			1.4%	--	3.8%	--	4.7%	--	1.8%	--	1.7%	--	1.6%	--	--	--	
Total Real Estate (REIT)	\$24,430	0.1%															
Vanguard Real Estate Index Fund Admiral	\$24,430	0.1%	-8.5%	--	-5.4%	--	-1.3%	--	2.3%	--	2.4%	--	2.1%	--	5.5%	--	0.12%
REIT Spliced Index			-8.5%	--	-5.2%	--	-1.1%	--	2.4%	--	2.5%	--	2.2%	--	5.6%	--	

Note: SAGIC Diversified Bond market value does not reflect unallocated assets (forfeitures).

Performance Detail (Net of Fees) - Annualized

	Market Value	% of Portfolio	Ending December 31st				
			2022	2021	2020	2019	2018
Total Fund	\$41,519,175	100.0%					
Total Target Date Funds	\$31,887,379	76.8%					
Vanguard Target Retirement Income Fund - Investor	\$397,764	1.0%	-12.7%	5.2%	10.0%	13.2%	-2.0%
Target Retirement Income Composite			-12.5%	5.4%	10.7%	13.4%	-2.0%
Vanguard Target Retirement 2020 - Investor	\$1,925,888	4.6%	-14.2%	8.2%	12.0%	17.6%	-4.2%
Target Retirement 2020 Composite			-13.8%	8.4%	12.9%	17.9%	-4.2%
Vanguard Target Retirement 2025 - Investor	\$6,453,738	15.5%	-15.5%	9.8%	13.3%	19.6%	-5.2%
Target Retirement 2025 Composite			-15.0%	10.1%	14.2%	19.9%	-5.0%
Vanguard Target Retirement 2030 - Investor	\$4,926,250	11.9%	-16.3%	11.4%	14.1%	21.1%	-5.9%
Target Retirement 2030 Composite			-15.7%	11.7%	15.0%	21.3%	-5.7%
Vanguard Target Retirement 2035 - Investor	\$4,315,683	10.4%	-16.6%	13.0%	14.8%	22.4%	-6.6%
Target Retirement 2035 Composite			-16.1%	13.2%	15.7%	22.8%	-6.5%
Vanguard Target Retirement 2040 - Investor	\$4,274,248	10.3%	-17.0%	14.6%	15.5%	23.9%	-7.3%
Target Retirement 2040 Composite			-16.5%	14.9%	16.3%	24.2%	-7.2%
Vanguard Target Retirement 2045 - Investor	\$3,662,330	8.8%	-17.4%	16.2%	16.3%	24.9%	-7.9%
Target Retirement 2045 Composite			-16.8%	16.4%	17.0%	25.4%	-7.8%
Vanguard Target Retirement 2050 - Investor	\$3,042,102	7.3%	-17.5%	16.4%	16.4%	25.0%	-7.9%
Target Retirement 2050 Composite			-17.1%	16.7%	17.2%	25.4%	-7.8%
Vanguard Target Retirement 2055 - Investor	\$1,830,124	4.4%	-17.5%	16.4%	16.3%	25.0%	-7.9%
Target Retirement 2055 Composite			-17.1%	16.7%	17.2%	25.4%	-7.8%
Vanguard Target Retirement 2060 - Investor	\$895,970	2.2%	-17.5%	16.4%	16.3%	25.0%	-7.9%
Target Retirement 2060 Composite			-17.1%	16.7%	17.2%	25.4%	-7.8%
Vanguard Target Retirement 2065 - Investor	\$155,253	0.4%	-17.4%	16.5%	16.2%	25.0%	-7.9%
Target Retirement 2065 Composite			-17.1%	16.7%	17.2%	25.4%	-7.8%
Vanguard Target Retirement 2070 - Investor	\$8,030	0.0%	--	--	--	--	--
Target Retirement 2070 Composite			--	--	--	--	--

Performance Detail (Net of Fees) - Annualized

	Market Value	% of Portfolio	Ending December 31st				
			2022	2021	2020	2019	2018
Total Domestic Equity	\$3,053,052	7.4%					
Vanguard 500 Index Fund	\$2,178,259	5.2%	-18.1%	28.7%	18.4%	31.5%	-4.4%
S&P 500			-18.1%	28.7%	18.4%	31.5%	-4.4%
Vanguard Growth Index Fund Admiral Shares	\$13,496	0.0%	-33.1%	27.3%	40.2%	37.2%	-3.3%
CRSP US Large Cap Growth TR USD			-33.1%	27.3%	40.3%	37.3%	-3.3%
Vanguard Value Index Fund Admiral Shares	\$14,246	0.0%	-2.1%	26.5%	2.3%	25.8%	-5.4%
CRSP US Large Cap Value TR USD			-2.0%	26.5%	2.3%	25.9%	-5.4%
Vanguard Mid-Cap Index Fund	\$626,368	1.5%	-18.7%	24.5%	18.2%	31.0%	-9.2%
CRSP US Mid Cap TR USD			-18.7%	24.5%	18.2%	31.1%	-9.2%
Vanguard Small Cap Index Fund	\$220,683	0.5%	-17.6%	17.7%	19.1%	27.4%	-9.3%
CRSP US Small Cap TR USD			-17.6%	17.7%	19.1%	27.3%	-9.3%
Total International Equity	\$517,894	1.2%					
Vanguard Developed Markets Index Fund Admiral	\$459,634	1.1%	-15.3%	11.4%	10.3%	22.0%	-14.5%
FTSE-Developed All Cap Ex U.S. Index			-15.3%	11.9%	10.3%	22.7%	-14.5%
Vanguard FTSE All-World ex-US SmallCap Index	\$26,399	0.1%	-21.3%	12.7%	11.9%	21.7%	-18.5%
FTSE - Global Small Cap Ex U.S. Index			-21.2%	13.4%	11.8%	22.1%	-18.6%
Vanguard Emerging Markets Index Fund Admiral	\$31,861	0.1%	-17.8%	0.9%	15.2%	20.3%	-14.6%
Spliced Emerging Markets Index			-17.6%	1.5%	15.5%	20.4%	-14.8%
Total Fixed Income	\$657,089	1.6%					
Vanguard High-Yield Corporate Fund	\$34,996	0.1%	-9.0%	3.8%	5.4%	15.9%	-2.9%
High-Yield Corporate Composite Index			-10.3%	4.4%	7.6%	14.6%	-1.7%
Vanguard Total Bond Market Index Admiral	\$622,094	1.5%	-13.2%	-1.7%	7.7%	8.7%	0.0%
Spliced Barclays USAgg Float Adj			-13.1%	-1.6%	7.7%	8.9%	-0.1%

Performance Detail (Net of Fees) - Annualized

	Market Value	% of Portfolio	Ending December 31st				
			2022	2021	2020	2019	2018
Total Stable Value	\$5,379,330	13.0%					
SAGIC Diversified Bond	\$5,379,330	13.0%	3.4%	3.3%	3.8%	3.8%	4.1%
FTSE T-Bill 3 Months TR			1.5%	0.0%	0.6%	2.3%	1.9%
Total Real Estate (REIT)	\$24,430	0.1%					
Vanguard Real Estate Index Fund Admiral	\$24,430	0.1%	-26.2%	40.4%	-4.7%	28.9%	-5.9%
REIT Spliced Index			-26.1%	40.6%	-4.6%	29.0%	-5.9%

Note: SAGIC Diversified Bond market value does not reflect unallocated assets (forfeitures).

IUOE Local No. 77 Annuity Fund – Investment Structure and Plan Design

- At the May 9, 2023, meeting, IPS presented an Annual Review report and made the following recommendations: 1) retain Empower as recordkeeper at their proposed lower flat fee of \$55 per participant. The previous fee was \$74 per participant; 2) add a large cap growth index option (VIGAX) and a large cap value index option (VVIAX); 3) add Vanguard Target Retirement 2070 Fund when available; 4) request Empower schedule virtual educational meetings at least quarterly. Decision: The Trustees approved all recommendations. Status: Fund changes and new recordkeeping fee (\$55 per participant) were effective August 1, 2023.
- As of July 1, 2023, a new IPS investment consulting services contract was effective. The contract contains an increased level of IPS services, including development of an investment policy statement. A draft policy was provided to counsel on August 3, 2023, and is under review.

Recommendations: Adopt new investment policy statement.

Investment Options	Plan Assets	Net	Revenue	Revenue	Net Inv	Net Inv
	9/30/2023	Expense	Sharing	Sharing	Mgmt	Management
	(A)	Ratio	Fee %	Fee \$	Expense	Cost
Target Date Funds						
Vanguard Target Retirement Income Fund - Investor (VTINX)	\$397,764	0.08%	0.00%	\$0	0.08%	\$318
Vanguard Target Retirement 2020 - Investor (VTWNX)	\$1,925,888	0.08%	0.00%	\$0	0.08%	\$1,541
Vanguard Target Retirement 2025 - Investor (VTTVX)	\$6,453,738	0.08%	0.00%	\$0	0.08%	\$5,163
Vanguard Target Retirement 2030 - Investor (VTHRX)	\$4,926,250	0.08%	0.00%	\$0	0.08%	\$3,941
Vanguard Target Retirement 2035 - Investor (VTTHX)	\$4,315,683	0.08%	0.00%	\$0	0.08%	\$3,453
Vanguard Target Retirement 2040 - Investor (VFORX)	\$4,274,248	0.08%	0.00%	\$0	0.08%	\$3,419
Vanguard Target Retirement 2045 - Investor (VTIVX)	\$3,662,330	0.08%	0.00%	\$0	0.08%	\$2,930
Vanguard Target Retirement 2050 - Investor (VFIFX)	\$3,042,102	0.08%	0.00%	\$0	0.08%	\$2,434
Vanguard Target Retirement 2055 - Investor (VFFVX)	\$1,830,124	0.08%	0.00%	\$0	0.08%	\$1,464
Vanguard Target Retirement 2060 - Investor (VTTSX)	\$895,970	0.08%	0.00%	\$0	0.08%	\$717
Vanguard Target Retirement 2065 - Investor (VLXVX)	\$155,253	0.08%	0.00%	\$0	0.08%	\$124
Vanguard Target Retirement 2070 - Investor (VSVNX)	\$8,030	0.08%	0.00%	\$0	0.08%	\$6
Domestic Equity						
Vanguard 500 Index Fund (VFIAX)	\$2,178,259	0.04%	0.00%	\$0	0.04%	\$871
Vanguard Growth Index Fund Admiral Shares (VIGAX)	\$13,496	0.05%	0.00%	\$0	0.05%	\$7
Vanguard Value Index Fund Admiral Shares (VVIAX)	\$14,246	0.05%	0.00%	\$0	0.05%	\$7
Vanguard Mid-Cap Index Fund (VIMAX)	\$626,368	0.05%	0.00%	\$0	0.05%	\$313
Vanguard Small Cap Index Fund (VSMAX)	\$220,683	0.05%	0.00%	\$0	0.05%	\$110
International Equity						
Vanguard Developed Markets Index Fund Admiral (VTMGX)	\$459,634	0.07%	0.00%	\$0	0.07%	\$322
Vanguard FTSE All-World ex-US SmallCap Index (VFSAX)	\$26,399	0.16%	0.00%	\$0	0.16%	\$42
Vanguard Emerging Markets Index Fund Admiral (VEMAX)	\$31,861	0.14%	0.00%	\$0	0.14%	\$45
Fixed Income						
Vanguard High-Yield Corporate Fund (VWEAX)	\$34,996	0.13%	0.00%	\$0	0.13%	\$45
Vanguard Total Bond Market Index Admiral (VBTLX)	\$622,094	0.05%	0.00%	\$0	0.05%	\$311
Stable Value						
SAGIC Diversified Bond ¹	\$5,379,330	0.42%	0.00%	\$0	0.42%	\$22,593
Real Estate (REIT)						
Vanguard Real Estate Index Fund Admiral (VGSLX)	\$24,430	0.12%	0.00%	\$0	0.12%	\$29
Total	\$41,519,175	0.12%	0.00%	\$0	0.12%	\$50,206

¹ SAGIC Diversified Bond market value does not reflect unallocated asset (forfeitures).

IUOE Local No. 77 Annuity - SAGIC Diversified Bond

Quarter End Date	Market-to-Book	Net Crediting Rate
September 30, 2023	85.0%	4.27%
June 30, 2023	88.3%	4.07%
March 31, 2023	87.7%	3.69%
December 31, 2022	86.7%	3.79%
September 30, 2022	91.4%	3.74%
June 30, 2022	91.0%	3.54%
March 31, 2022	98.5%	3.28%
December 31, 2021	105.6%	2.65%
September 30, 2021	106.1%	3.22%
June 30, 2021	106.5%	3.05%
March 31, 2021	104.2%	3.62%
December 31, 2020	107.1%	3.75%
September 30, 2020	104.6%	3.88%
June 30, 2020	102.6%	4.01%

- Market-to-Book Value Ratio: The market-to-book value ratio is the difference in market value of underlying assets to book value. This ratio may be interpreted as a sign of investment soundness, with a ratio greater than 100% indicating higher market value in support of the stable value investment.
- Net Crediting Rate: The net crediting rating is the interest rate earned on the contract value (principal plus accrued income) after adjusting for expenses expressed as an effective annual yield.

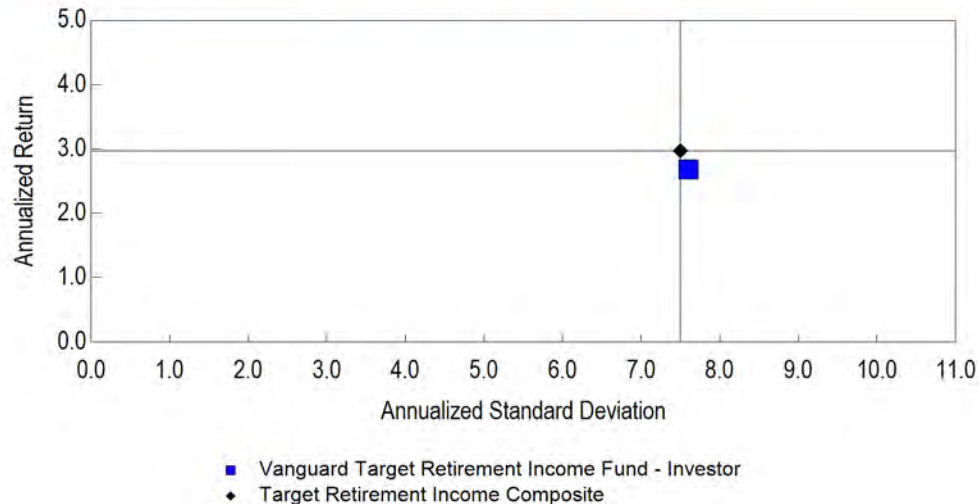
Account Information

Account Name	Vanguard Target Retirement Income Fund - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/31/21
Account Type	Target Date Fund
Benchmark	Target Retirement Income Composite
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement Income Fund - Investor	-0.1%	8.1%	101.3%	102.7%
Target Retirement Income Composite	0.1%	8.0%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement Income Fund - Investor	2.7%	7.6%	99.9%	102.3%
Target Retirement Income Composite	3.0%	7.5%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Target Retirement Income Fund - Investor	-2.3%	3.2%	7.0%	-0.1%	2.7%	-12.7%	5.2%	10.0%	13.2%	-2.0%	-4.8%	Aug-21
Target Retirement Income Composite	-2.3%	3.2%	7.3%	0.1%	3.0%	-12.5%	5.4%	10.7%	13.4%	-2.0%	-4.6%	Aug-21

Note: Returns are net of fees.

Vanguard Target Retirement Income Fund - Investor

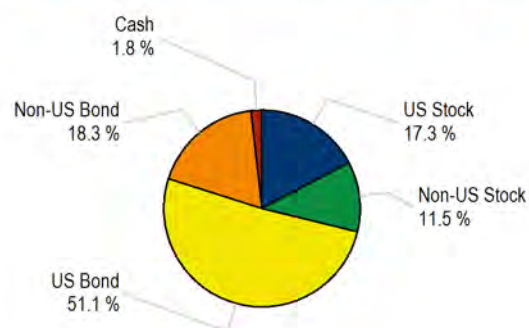
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide current income and some capital appreciation.

The fund invests in a mix of Vanguard mutual funds according to an asset allocation strategy designed for investors currently in retirement. Its indirect bond holdings are a diversified mix of short-, intermediate-, and long-term U.S. government, U.S. agency, and investment-grade U.S. corporate bonds; inflation-protected public obligations issued by the U.S. Treasury; mortgage-backed and asset-backed securities; and government, agency, corporate, and securitized investment-grade foreign bonds issued in currencies other than the U.S. dollar.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VTINX
Morningstar Category	Target-Date Retirement
Average Market Cap (\$mm)	69,073.51
Net Assets (\$mm)	35,263.27
% Assets in Top 10 Holdings	99.17
Total Number of Holdings	7
Manager Name	Walter Nejman
Manager Tenure	11
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL BOND MARKET II IDX INV	36.88%
VANGUARD TOTAL STOCK MKT IDX INSTL PLS	17.37%
VANGUARD SHRT-TERM INFL-PROT SEC IDX ADM	16.92%
VANGUARD TOTAL INTL BD II IDX INSL	16.12%
VANGUARD TOTAL INTL STOCK INDEX INV	11.89%

Fund Characteristics as of September 30, 2023

Versus Target Retirement Income Composite

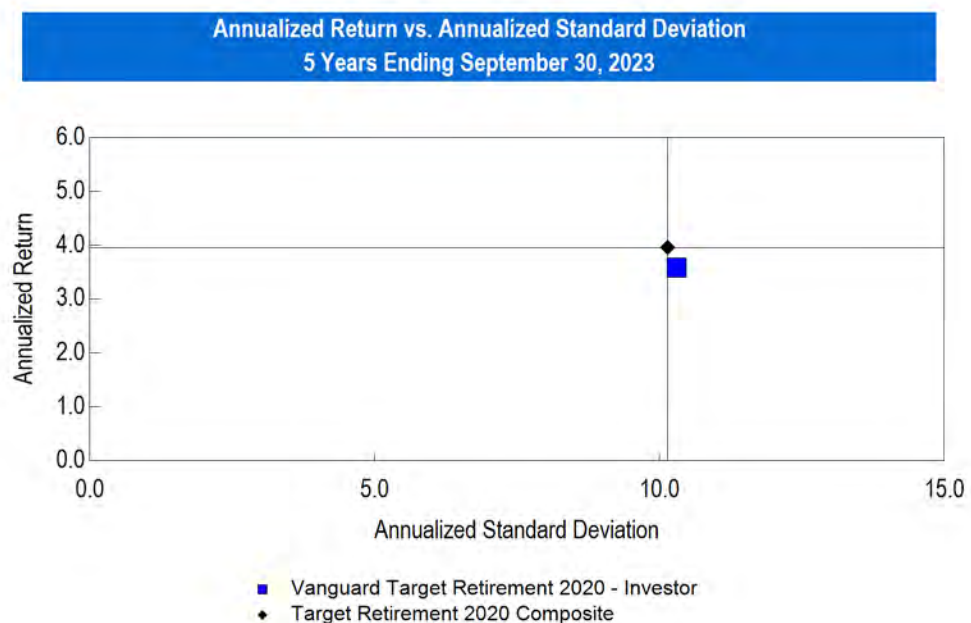
Sharpe Ratio (3 Year)	-0.23
Average Market Cap (\$mm)	69,073.51
Price/Earnings	14.76
Price/Book	2.15
Price/Sales	1.46
Price/Cash Flow	9.45
Dividend Yield	2.51
Number of Equity Holdings	0
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.02%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.64%
COMMUNICATION SERVICES	7.00%
CONSUMER CYCLICAL	11.15%
CONSUMER DEFENSIVE	6.71%
ENERGY	5.21%
FINANCIAL SERVICES	15.34%
HEALTHCARE	11.74%
INDUSTRIALS	11.46%
REAL ESTATE	3.05%
TECHNOLOGY	21.07%
UTILITIES	2.62%

Account Information	
Account Name	Vanguard Target Retirement 2020 - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/31/21
Account Type	Target Date Fund
Benchmark	Target Retirement 2020 Composite
Universe	

3 Years Ending September 30, 2023				
	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2020 - Investor	1.4%	10.0%	101.3%	102.9%
Target Retirement 2020 Composite	1.7%	9.9%	100.0%	100.0%



5 Years Ending September 30, 2023				
	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2020 - Investor	3.6%	10.3%	99.9%	102.0%
Target Retirement 2020 Composite	4.0%	10.1%	100.0%	100.0%

	Calendar Years											Inception Date
	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	
Vanguard Target Retirement 2020 - Investor	-2.7%	4.2%	9.4%	1.4%	3.6%	-14.2%	8.2%	12.0%	17.6%	-4.2%	-5.0%	Aug-21
Target Retirement 2020 Composite	-2.5%	4.3%	9.7%	1.7%	4.0%	-13.8%	8.4%	12.9%	17.9%	-4.2%	-4.6%	Aug-21

Note: Returns are net of fees.

Vanguard Target Retirement 2020 - Investor

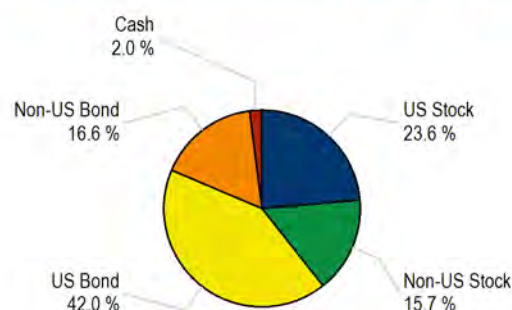
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide capital appreciation and current income consistent with its current asset allocation.

The fund invests in a mix of Vanguard mutual funds according to an asset allocation strategy designed for investors planning to retire and leave the workforce in or within a few years of 2020 (the target year). The fund's asset allocation will become more conservative over time, meaning that the percentage of assets allocated to stocks will decrease while the percentage of assets allocated to bonds and other fixed income investments will increase.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VTWNX
Morningstar Category	Target-Date 2020
Average Market Cap (\$mm)	69,185.53
Net Assets (\$mm)	37,750.51
% Assets in Top 10 Holdings	99.04
Total Number of Holdings	7
Manager Name	Walter Nejman
Manager Tenure	11
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL BOND MARKET II IDX INV	32.60%
VANGUARD TOTAL STOCK MKT IDX INSTL PLS	23.77%
VANGUARD TOTAL INTL STOCK INDEX INV	16.20%
VANGUARD TOTAL INTL BD II IDX INSL	14.69%
VANGUARD SHRT-TERM INFL-PROT SEC IDX ADM	11.79%

Fund Characteristics as of September 30, 2023

Versus Target Retirement 2020 Composite

Sharpe Ratio (3 Year)	-0.03
Average Market Cap (\$mm)	69,185.53
Price/Earnings	14.77
Price/Book	2.15
Price/Sales	1.46
Price/Cash Flow	9.45
Dividend Yield	2.51
Number of Equity Holdings	0
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.03%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.64%
COMMUNICATION SERVICES	7.01%
CONSUMER CYCLICAL	11.15%
CONSUMER DEFENSIVE	6.71%
ENERGY	5.21%
FINANCIAL SERVICES	15.34%
HEALTHCARE	11.75%
INDUSTRIALS	11.45%
REAL ESTATE	3.05%
TECHNOLOGY	21.09%
UTILITIES	2.62%

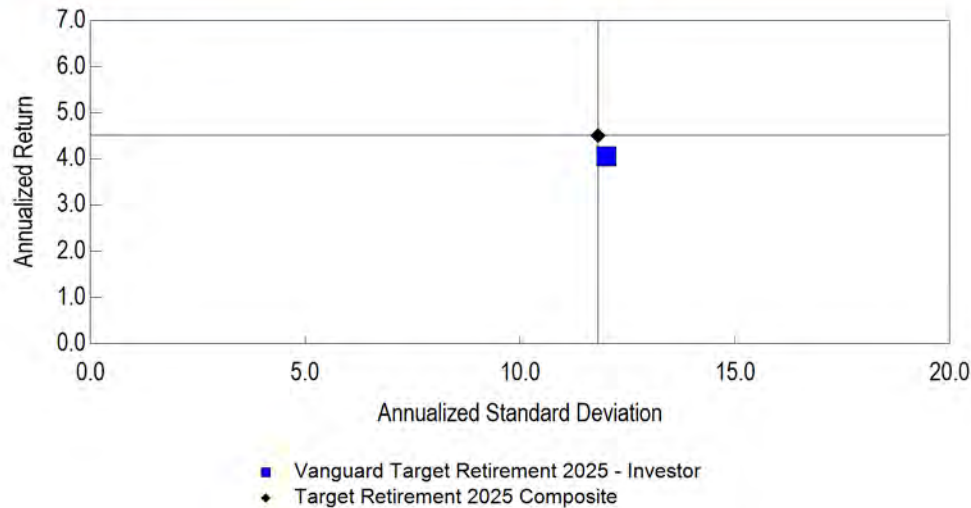
Account Information

Account Name	Vanguard Target Retirement 2025 - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/31/21
Account Type	Target Date Fund
Benchmark	Target Retirement 2025 Composite
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2025 - Investor	2.2%	11.7%	101.0%	103.0%
Target Retirement 2025 Composite	2.6%	11.4%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2025 - Investor	4.1%	12.0%	99.8%	101.9%
Target Retirement 2025 Composite	4.5%	11.8%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Target Retirement 2025 - Investor	-3.0%	5.2%	11.6%	2.2%	4.1%	-15.5%	9.8%	13.3%	19.6%	-5.2%	-5.2%	Aug-21
Target Retirement 2025 Composite	-2.8%	5.4%	11.9%	2.6%	4.5%	-15.0%	10.1%	14.2%	19.9%	-5.0%	-4.8%	Aug-21

Note: Returns are net of fees.

Vanguard Target Retirement 2025 - Investor

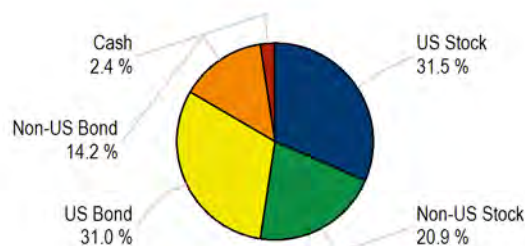
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide capital appreciation and current income consistent with its current asset allocation.

The fund invests in a mix of Vanguard mutual funds according to an asset allocation strategy designed for investors planning to retire and leave the workforce in or within a few years of 2025 (the target year). The fund's asset allocation will become more conservative over time, meaning that the percentage of assets allocated to stocks will decrease while the percentage of assets allocated to bonds and other fixed income investments will increase.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VTTVX
Morningstar Category	Target-Date 2025
Average Market Cap (\$mm)	69,300.88
Net Assets (\$mm)	72,179.83
% Assets in Top 10 Holdings	98.80
Total Number of Holdings	7
Manager Name	Walter Nejman
Manager Tenure	11
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL STOCK MKT IDX INSTL PLS	31.70%
VANGUARD TOTAL BOND MARKET II IDX INV	28.26%
VANGUARD TOTAL INTL STOCK INDEX INV	21.51%
VANGUARD TOTAL INTL BD II IDX INSL	12.52%
VANGUARD SHRT-TERM INFL-PROT SEC IDX ADM	4.81%

Fund Characteristics as of September 30, 2023

Versus Target Retirement 2025 Composite

Sharpe Ratio (3 Year)	0.04
Average Market Cap (\$mm)	69,300.88
Price/Earnings	14.78
Price/Book	2.16
Price/Sales	1.46
Price/Cash Flow	9.46
Dividend Yield	2.51
Number of Equity Holdings	0
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.04%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.63%
COMMUNICATION SERVICES	7.01%
CONSUMER CYCLICAL	11.14%
CONSUMER DEFENSIVE	6.71%
ENERGY	5.21%
FINANCIAL SERVICES	15.33%
HEALTHCARE	11.75%
INDUSTRIALS	11.45%
REAL ESTATE	3.05%
TECHNOLOGY	21.10%
UTILITIES	2.62%

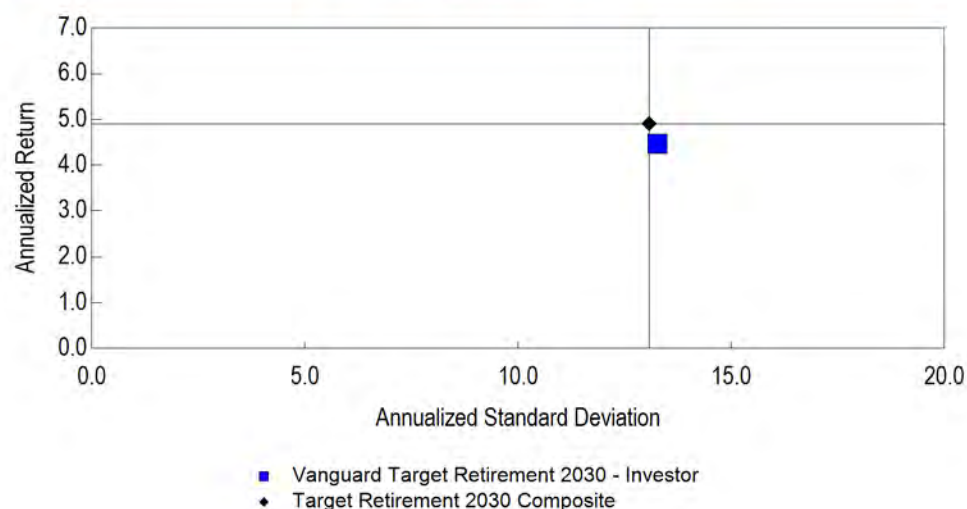
Account Information

Account Name	Vanguard Target Retirement 2030 - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/31/21
Account Type	Target Date Fund
Benchmark	Target Retirement 2030 Composite
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2030 - Investor	3.0%	12.8%	100.8%	102.5%
Target Retirement 2030 Composite	3.4%	12.6%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2030 - Investor	4.5%	13.3%	100.0%	101.7%
Target Retirement 2030 Composite	4.9%	13.1%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Target Retirement 2030 - Investor	-3.2%	5.9%	13.1%	3.0%	4.5%	-16.3%	11.4%	14.1%	21.1%	-5.9%	-5.2%	Aug-21
Target Retirement 2030 Composite	-3.0%	6.1%	13.5%	3.4%	4.9%	-15.7%	11.7%	15.0%	21.3%	-5.7%	-4.7%	Aug-21

Note: Returns are net of fees.

Vanguard Target Retirement 2030 - Investor

Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide capital appreciation and current income consistent with its current asset allocation.

The fund invests in a mix of Vanguard mutual funds according to an asset allocation strategy designed for investors planning to retire and leave the workforce in or within a few years of 2030 (the target year). The fund's asset allocation will become more conservative over time, meaning that the percentage of assets allocated to stocks will decrease while the percentage of assets allocated to bonds and other fixed income investments will increase.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VTHRX
Morningstar Category	Target-Date 2030
Average Market Cap (\$mm)	70,244.48
Net Assets (\$mm)	81,553.63
% Assets in Top 10 Holdings	98.99
Total Number of Holdings	6
Manager Name	Walter Nejman
Manager Tenure	11
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL STOCK MKT IDX INSTL PLS	37.74%
VANGUARD TOTAL BOND MARKET II IDX INV	25.47%
VANGUARD TOTAL INTL STOCK INDEX INV	24.73%
VANGUARD TOTAL INTL BD II IDX INSL	11.05%

Fund Characteristics as of September 30, 2023

Versus Target Retirement 2030 Composite

Sharpe Ratio (3 Year)	0.10
Average Market Cap (\$mm)	70,244.48
Price/Earnings	14.82
Price/Book	2.17
Price/Sales	1.47
Price/Cash Flow	9.50
Dividend Yield	2.49
Number of Equity Holdings	0
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.04%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.59%
COMMUNICATION SERVICES	7.03%
CONSUMER CYCLICAL	11.14%
CONSUMER DEFENSIVE	6.70%
ENERGY	5.20%
FINANCIAL SERVICES	15.27%
HEALTHCARE	11.78%
INDUSTRIALS	11.40%
REAL ESTATE	3.05%
TECHNOLOGY	21.23%
UTILITIES	2.61%

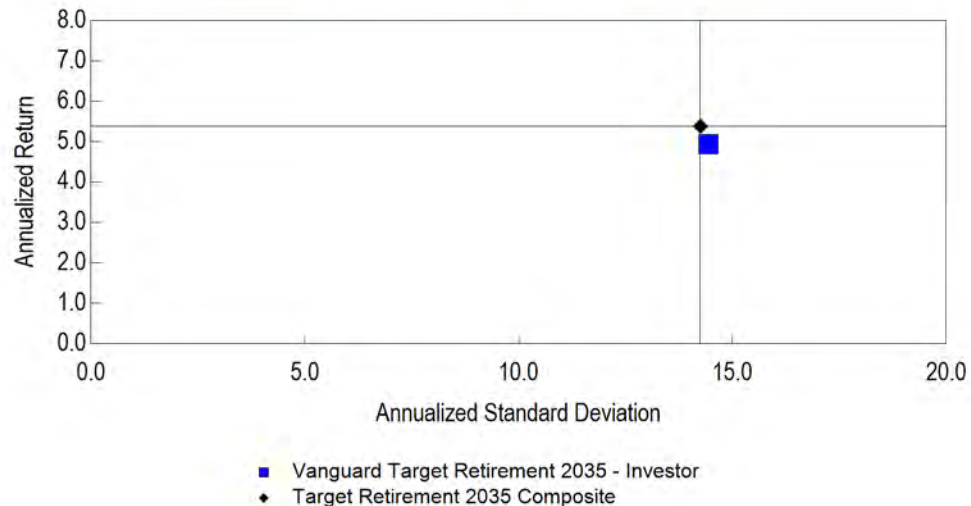
Account Information

Account Name	Vanguard Target Retirement 2035 - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/31/21
Account Type	Target Date Fund
Benchmark	Target Retirement 2035 Composite
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2035 - Investor	3.9%	13.7%	101.0%	102.5%
Target Retirement 2035 Composite	4.3%	13.5%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2035 - Investor	4.9%	14.4%	100.1%	101.5%
Target Retirement 2035 Composite	5.4%	14.3%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Target Retirement 2035 - Investor	-3.3%	6.7%	14.6%	3.9%	4.9%	-16.6%	13.0%	14.8%	22.4%	-6.6%	-4.9%	Aug-21
Target Retirement 2035 Composite	-3.0%	6.9%	15.0%	4.3%	5.4%	-16.1%	13.2%	15.7%	22.8%	-6.5%	-4.5%	Aug-21

Note: Returns are net of fees.

Vanguard Target Retirement 2035 - Investor

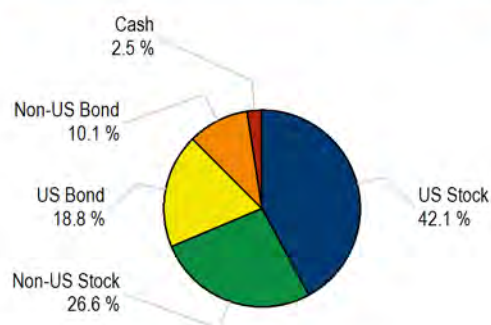
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide capital appreciation and current income consistent with its current asset allocation.

The fund invests in a mix of Vanguard mutual funds according to an asset allocation strategy designed for investors planning to retire and leave the workforce in or within a few years of 2035 (the target year). The fund's asset allocation will become more conservative over time, meaning that the percentage of assets allocated to stocks will decrease while the percentage of assets allocated to bonds and other fixed income investments will increase.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VTTHX
Morningstar Category	Target-Date 2035
Average Market Cap (\$mm)	70,611.65
Net Assets (\$mm)	82,364.57
% Assets in Top 10 Holdings	98.87
Total Number of Holdings	6
Manager Name	Walter Nejman
Manager Tenure	11
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL STOCK MKT IDX INSTL PLS	42.35%
VANGUARD TOTAL INTL STOCK INDEX INV	27.37%
VANGUARD TOTAL BOND MARKET II IDX INV	20.29%
VANGUARD TOTAL INTL BD II IDX INSL	8.86%

Fund Characteristics as of September 30, 2023

Versus Target Retirement 2035 Composite

Sharpe Ratio (3 Year)	0.16
Average Market Cap (\$mm)	70,611.65
Price/Earnings	14.84
Price/Book	2.18
Price/Sales	1.47
Price/Cash Flow	9.52
Dividend Yield	2.48
Number of Equity Holdings	0
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.04%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.57%
COMMUNICATION SERVICES	7.04%
CONSUMER CYCLICAL	11.14%
CONSUMER DEFENSIVE	6.69%
ENERGY	5.19%
FINANCIAL SERVICES	15.25%
HEALTHCARE	11.80%
INDUSTRIALS	11.39%
REAL ESTATE	3.05%
TECHNOLOGY	21.28%
UTILITIES	2.61%

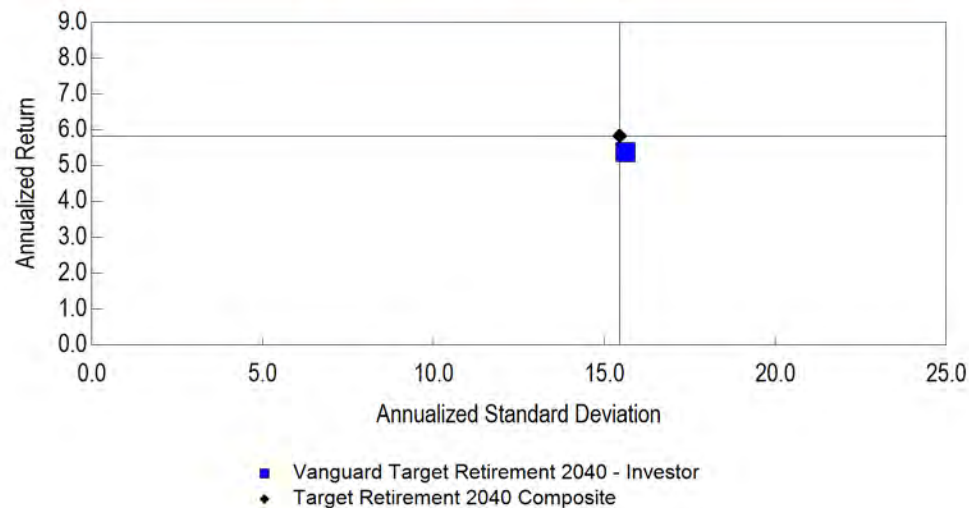
Account Information

Account Name	Vanguard Target Retirement 2040 - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/31/21
Account Type	Target Date Fund
Benchmark	Target Retirement 2040 Composite
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2040 - Investor	4.8%	14.7%	100.8%	102.3%
Target Retirement 2040 Composite	5.2%	14.5%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2040 - Investor	5.4%	15.6%	100.0%	101.3%
Target Retirement 2040 Composite	5.8%	15.4%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Target Retirement 2040 - Investor	-3.3%	7.4%	16.2%	4.8%	5.4%	-17.0%	14.6%	15.5%	23.9%	-7.3%	-4.7%	Aug-21
Target Retirement 2040 Composite	-3.1%	7.6%	16.5%	5.2%	5.8%	-16.5%	14.9%	16.3%	24.2%	-7.2%	-4.3%	Aug-21

Note: Returns are net of fees.

Vanguard Target Retirement 2040 - Investor

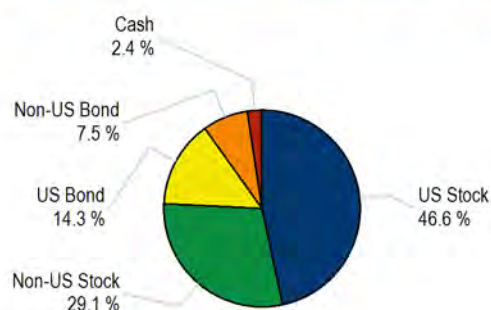
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide capital appreciation and current income consistent with its current asset allocation.

The fund invests in a mix of Vanguard mutual funds according to an asset allocation strategy designed for investors planning to retire and leave the workforce in or within a few years of 2040 (the target year). The fund's asset allocation will become more conservative over time, meaning that the percentage of assets allocated to stocks will decrease while the percentage of assets allocated to bonds and other fixed income investments will increase.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VFORX
Morningstar Category	Target-Date 2040
Average Market Cap (\$mm)	70,929.59
Net Assets (\$mm)	72,165.26
% Assets in Top 10 Holdings	98.95
Total Number of Holdings	6
Manager Name	Walter Nejman
Manager Tenure	11
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL STOCK MKT IDX INSTL PLS	46.94%
VANGUARD TOTAL INTL STOCK INDEX INV	29.98%
VANGUARD TOTAL BOND MARKET II IDX INV	15.48%
VANGUARD TOTAL INTL BD II IDX INSL	6.55%

Fund Characteristics as of September 30, 2023

Versus Target Retirement 2040 Composite

Sharpe Ratio (3 Year)	0.21
Average Market Cap (\$mm)	70,929.59
Price/Earnings	14.86
Price/Book	2.18
Price/Sales	1.47
Price/Cash Flow	9.53
Dividend Yield	2.48
Number of Equity Holdings	0
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.04%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.55%
COMMUNICATION SERVICES	7.05%
CONSUMER CYCLICAL	11.14%
CONSUMER DEFENSIVE	6.69%
ENERGY	5.19%
FINANCIAL SERVICES	15.23%
HEALTHCARE	11.81%
INDUSTRIALS	11.37%
REAL ESTATE	3.05%
TECHNOLOGY	21.32%
UTILITIES	2.61%

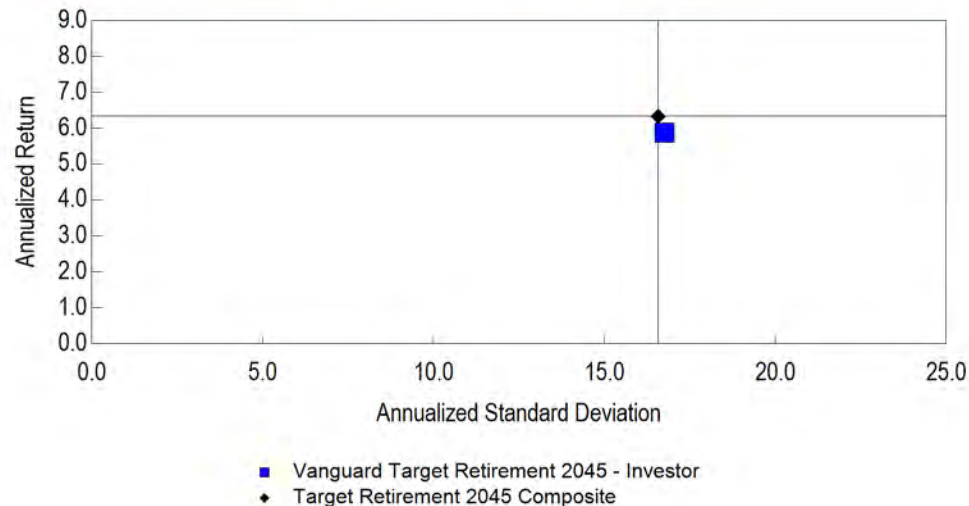
Account Information

Account Name	Vanguard Target Retirement 2045 - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/31/21
Account Type	Target Date Fund
Benchmark	Target Retirement 2045 Composite
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2045 - Investor	5.7%	15.7%	101.1%	102.5%
Target Retirement 2045 Composite	6.2%	15.5%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2045 - Investor	5.9%	16.8%	100.3%	101.3%
Target Retirement 2045 Composite	6.3%	16.6%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Target Retirement 2045 - Investor	-3.4%	8.1%	17.7%	5.7%	5.9%	-17.4%	16.2%	16.3%	24.9%	-7.9%	-4.6%	Aug-21
Target Retirement 2045 Composite	-3.2%	8.4%	18.1%	6.2%	6.3%	-16.8%	16.4%	17.0%	25.4%	-7.8%	-4.1%	Aug-21

Note: Returns are net of fees.

Vanguard Target Retirement 2045 - Investor

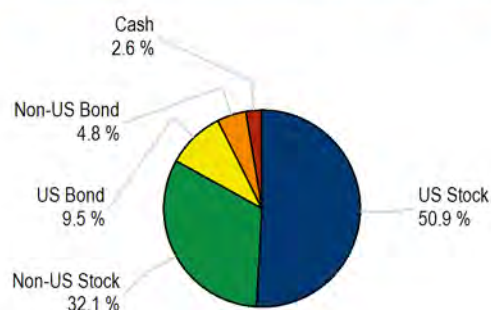
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide capital appreciation and current income consistent with its current asset allocation.

The fund invests in a mix of Vanguard mutual funds according to an asset allocation strategy designed for investors planning to retire and leave the workforce in or within a few years of 2045 (the target year). The fund's asset allocation will become more conservative over time, meaning that the percentage of assets allocated to stocks will decrease while the percentage of assets allocated to bonds and other fixed income investments will increase.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VTIVX
Morningstar Category	Target-Date 2045
Average Market Cap (\$mm)	70,637.13
Net Assets (\$mm)	68,781.10
% Assets in Top 10 Holdings	98.76
Total Number of Holdings	6
Manager Name	Walter Nejman
Manager Tenure	11
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL STOCK MKT IDX INSTL PLS	51.23%
VANGUARD TOTAL INTL STOCK INDEX INV	33.07%
VANGUARD TOTAL BOND MARKET II IDX INV	10.28%
VANGUARD TOTAL INTL BD II IDX INSL	4.17%

Fund Characteristics as of September 30, 2023

Versus Target Retirement 2045 Composite

Sharpe Ratio (3 Year)	0.26
Average Market Cap (\$mm)	70,637.13
Price/Earnings	14.84
Price/Book	2.18
Price/Sales	1.47
Price/Cash Flow	9.52
Dividend Yield	2.48
Number of Equity Holdings	0
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.04%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.57%
COMMUNICATION SERVICES	7.04%
CONSUMER CYCLICAL	11.14%
CONSUMER DEFENSIVE	6.69%
ENERGY	5.19%
FINANCIAL SERVICES	15.24%
HEALTHCARE	11.80%
INDUSTRIALS	11.39%
REAL ESTATE	3.05%
TECHNOLOGY	21.28%
UTILITIES	2.61%

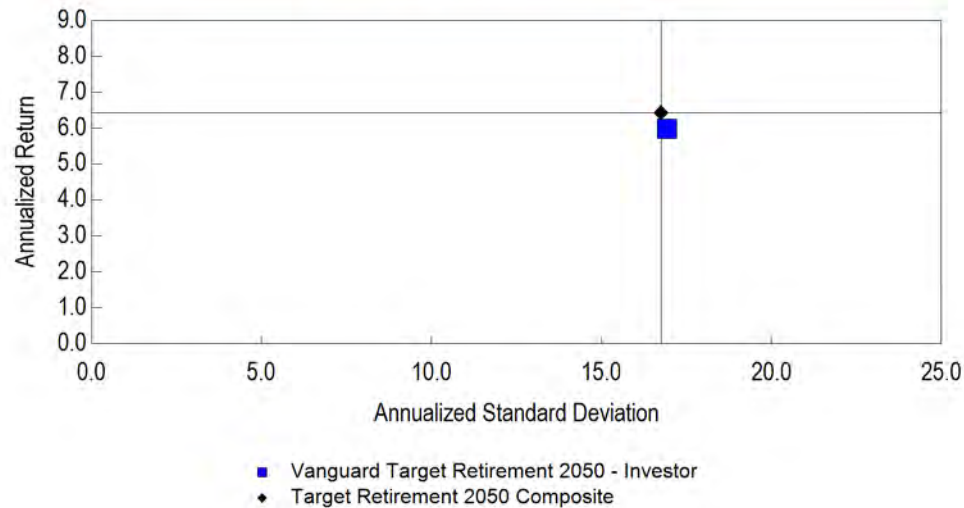
Account Information

Account Name	Vanguard Target Retirement 2050 - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/31/21
Account Type	Target Date Fund
Benchmark	Target Retirement 2050 Composite
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2050 - Investor	5.9%	16.0%	101.1%	102.2%
Target Retirement 2050 Composite	6.3%	15.8%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2050 - Investor	6.0%	16.9%	100.2%	101.2%
Target Retirement 2050 Composite	6.4%	16.8%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Target Retirement 2050 - Investor	-3.5%	8.5%	18.5%	5.9%	6.0%	-17.5%	16.4%	16.4%	25.0%	-7.9%	-4.4%	Aug-21
Target Retirement 2050 Composite	-3.2%	8.7%	18.7%	6.3%	6.4%	-17.1%	16.7%	17.2%	25.4%	-7.8%	-4.1%	Aug-21

Note: Returns are net of fees.

Vanguard Target Retirement 2050 - Investor

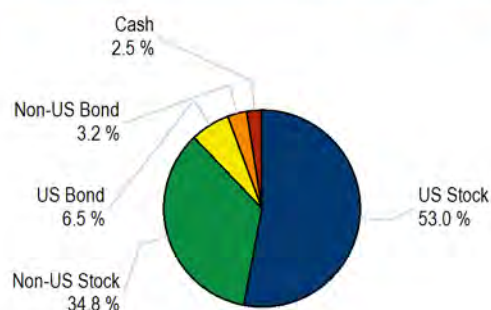
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide capital appreciation and current income consistent with its current asset allocation.

The fund invests in a mix of Vanguard mutual funds according to an asset allocation strategy designed for investors planning to retire and leave the workforce in or within a few years of 2050 (the target year). The fund's asset allocation will become more conservative over time, meaning that the percentage of assets allocated to stocks will decrease while the percentage of assets allocated to bonds and other fixed income investments will increase.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VFIFX
Morningstar Category	Target-Date 2050
Average Market Cap (\$mm)	69,523.25
Net Assets (\$mm)	56,636.92
% Assets in Top 10 Holdings	98.94
Total Number of Holdings	6
Manager Name	Walter Nejman
Manager Tenure	11
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL STOCK MKT IDX INSTL PLS	53.31%
VANGUARD TOTAL INTL STOCK INDEX INV	35.87%
VANGUARD TOTAL BOND MARKET II IDX INV	7.02%
VANGUARD TOTAL INTL BD II IDX INSL	2.74%

Fund Characteristics as of September 30, 2023

Versus Target Retirement 2050 Composite

Sharpe Ratio (3 Year)	0.26
Average Market Cap (\$mm)	69,523.25
Price/Earnings	14.79
Price/Book	2.16
Price/Sales	1.46
Price/Cash Flow	9.47
Dividend Yield	2.50
Number of Equity Holdings	0
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.04%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.62%
COMMUNICATION SERVICES	7.02%
CONSUMER CYCLICAL	11.14%
CONSUMER DEFENSIVE	6.71%
ENERGY	5.21%
FINANCIAL SERVICES	15.31%
HEALTHCARE	11.76%
INDUSTRIALS	11.44%
REAL ESTATE	3.05%
TECHNOLOGY	21.13%
UTILITIES	2.61%

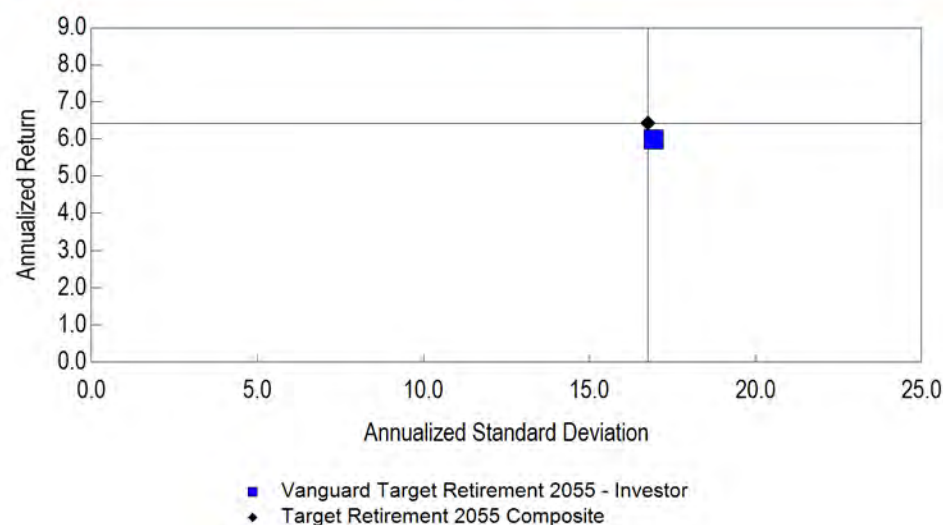
Account Information

Account Name	Vanguard Target Retirement 2055 - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/31/21
Account Type	Target Date Fund
Benchmark	Target Retirement 2055 Composite
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2055 - Investor	5.9%	16.0%	101.1%	102.2%
Target Retirement 2055 Composite	6.3%	15.8%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2055 - Investor	6.0%	16.9%	100.1%	101.2%
Target Retirement 2055 Composite	6.4%	16.8%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Target Retirement 2055 - Investor	-3.5%	8.5%	18.5%	5.9%	6.0%	-17.5%	16.4%	16.3%	25.0%	-7.9%	-4.4%	Aug-21
Target Retirement 2055 Composite	-3.2%	8.7%	18.7%	6.3%	6.4%	-17.1%	16.7%	17.2%	25.4%	-7.8%	-4.1%	Aug-21

Note: Returns are net of fees.

Vanguard Target Retirement 2055 - Investor

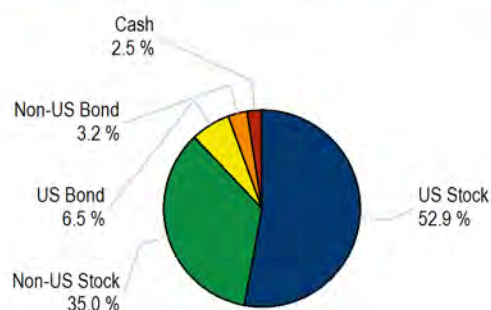
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide capital appreciation and current income consistent with its current asset allocation.

The fund invests in a mix of Vanguard mutual funds according to an asset allocation strategy designed for investors planning to retire and leave the workforce in or within a few years of 2055 (the target year). The fund's asset allocation will become more conservative over time, meaning that the percentage of assets allocated to stocks will decrease while the percentage of assets allocated to bonds and other fixed income investments will increase.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VFFVX
Morningstar Category	Target-Date 2055
Average Market Cap (\$mm)	69,356.31
Net Assets (\$mm)	36,764.83
% Assets in Top 10 Holdings	99.00
Total Number of Holdings	6
Manager Name	Walter Nejman
Manager Tenure	11
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL STOCK MKT IDX INSTL PLS	53.22%
VANGUARD TOTAL INTL STOCK INDEX INV	36.03%
VANGUARD TOTAL BOND MARKET II IDX INV	7.02%
VANGUARD TOTAL INTL BD II IDX INSL	2.73%

Fund Characteristics as of September 30, 2023

Versus Target Retirement 2055 Composite

Sharpe Ratio (3 Year)	0.26
Average Market Cap (\$mm)	69,356.31
Price/Earnings	14.78
Price/Book	2.16
Price/Sales	1.46
Price/Cash Flow	9.46
Dividend Yield	2.50
Number of Equity Holdings	0
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.04%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.63%
COMMUNICATION SERVICES	7.01%
CONSUMER CYCLICAL	11.14%
CONSUMER DEFENSIVE	6.71%
ENERGY	5.21%
FINANCIAL SERVICES	15.32%
HEALTHCARE	11.75%
INDUSTRIALS	11.45%
REAL ESTATE	3.05%
TECHNOLOGY	21.11%
UTILITIES	2.61%

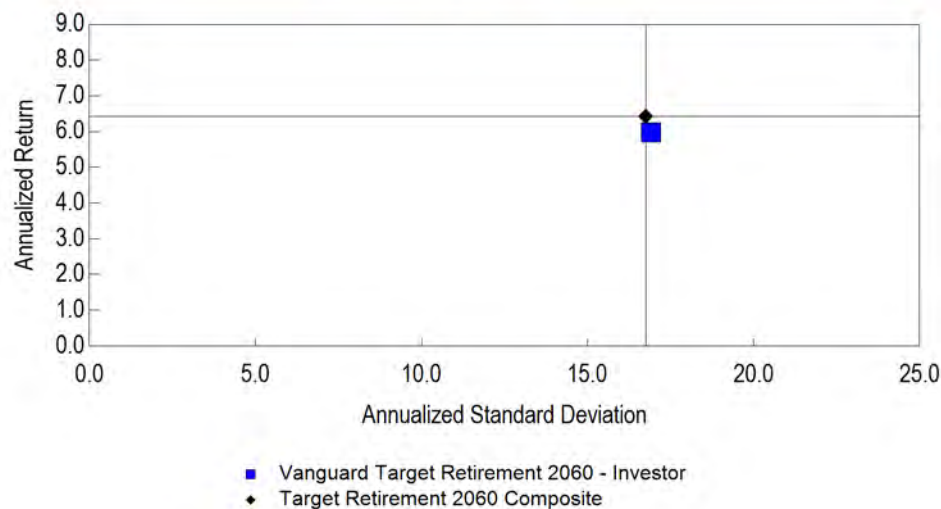
Account Information

Account Name	Vanguard Target Retirement 2060 - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/31/21
Account Type	Target Date Fund
Benchmark	Target Retirement 2060 Composite
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2060 - Investor	5.9%	16.0%	100.9%	102.1%
Target Retirement 2060 Composite	6.3%	15.8%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2060 - Investor	6.0%	16.9%	100.1%	101.2%
Target Retirement 2060 Composite	6.4%	16.8%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Target Retirement 2060 - Investor	-3.5%	8.5%	18.5%	5.9%	6.0%	-17.5%	16.4%	16.3%	25.0%	-7.9%	-4.4%	Aug-21
Target Retirement 2060 Composite	-3.2%	8.7%	18.7%	6.3%	6.4%	-17.1%	16.7%	17.2%	25.4%	-7.8%	-4.1%	Aug-21

Note: Returns are net of fees.

Vanguard Target Retirement 2060 - Investor

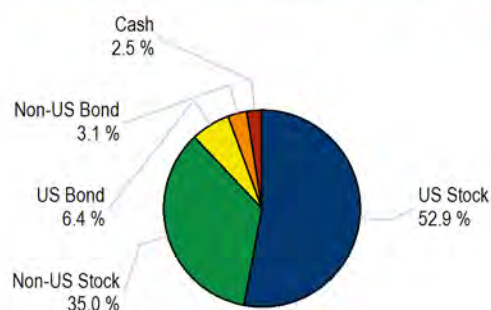
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide capital appreciation and current income consistent with its current asset allocation.

The fund invests in a mix of Vanguard mutual funds according to an asset allocation strategy designed for investors planning to retire and leave the workforce in or within a few years of 2060 (the target year). The fund's asset allocation will become more conservative over time, meaning that the percentage of assets allocated to stocks will decrease while the percentage of assets allocated to bonds and other fixed income investments will increase.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VTTSX
Morningstar Category	Target-Date 2060
Average Market Cap (\$mm)	69,419.13
Net Assets (\$mm)	19,697.27
% Assets in Top 10 Holdings	98.94
Total Number of Holdings	6
Manager Name	Walter Nejman
Manager Tenure	11
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL STOCK MKT IDX INSTL PLS	53.28%
VANGUARD TOTAL INTL STOCK INDEX INV	35.99%
VANGUARD TOTAL BOND MARKET II IDX INV	6.96%
VANGUARD TOTAL INTL BD II IDX INSL	2.71%

Fund Characteristics as of September 30, 2023

Versus Target Retirement 2060 Composite

Sharpe Ratio (3 Year)	0.26
Average Market Cap (\$mm)	69,419.13
Price/Earnings	14.78
Price/Book	2.16
Price/Sales	1.46
Price/Cash Flow	9.47
Dividend Yield	2.50
Number of Equity Holdings	0
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.04%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.63%
COMMUNICATION SERVICES	7.01%
CONSUMER CYCLICAL	11.14%
CONSUMER DEFENSIVE	6.71%
ENERGY	5.21%
FINANCIAL SERVICES	15.32%
HEALTHCARE	11.76%
INDUSTRIALS	11.44%
REAL ESTATE	3.05%
TECHNOLOGY	21.12%
UTILITIES	2.61%

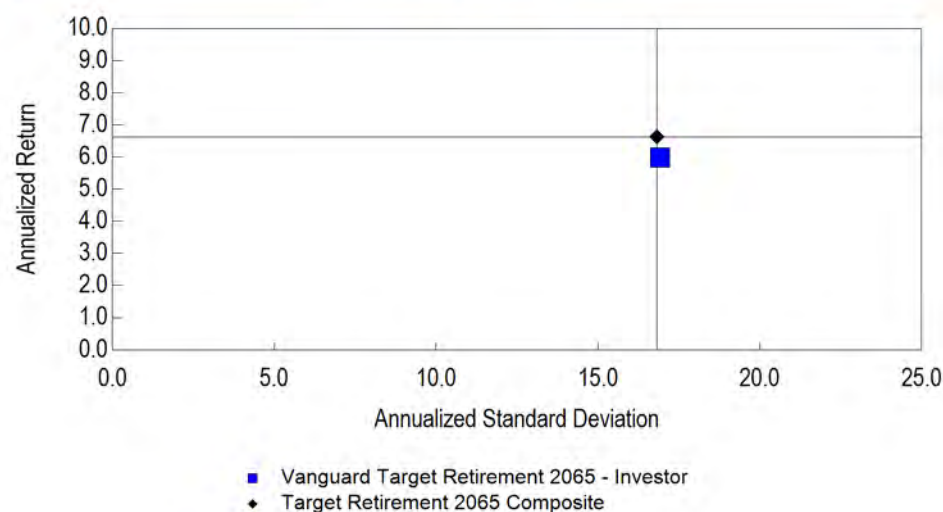
Account Information

Account Name	Vanguard Target Retirement 2065 - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/01/21
Account Type	Target Date Fund
Benchmark	Target Retirement 2065 Composite
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2065 - Investor	5.9%	16.0%	99.3%	102.1%
Target Retirement 2065 Composite	6.7%	15.9%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Target Retirement 2065 - Investor	6.0%	16.9%	98.8%	101.2%
Target Retirement 2065 Composite	6.6%	16.8%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Target Retirement 2065 - Investor	-3.5%	8.5%	18.5%	5.9%	6.0%	-17.4%	16.5%	16.2%	25.0%	-7.9%	-3.3%	Aug-21
Target Retirement 2065 Composite	-3.2%	9.8%	19.8%	6.7%	6.6%	-17.1%	16.7%	17.2%	25.4%	-7.8%	-2.5%	Aug-21

Note: Returns are net of fees.

Vanguard Target Retirement 2065 - Investor

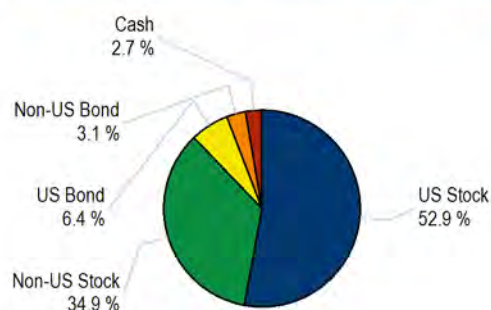
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide capital appreciation and current income consistent with its current asset allocation.

The fund invests in a mix of Vanguard mutual funds according to an asset allocation strategy designed for investors planning to retire and leave the workforce in or within a few years of 2065 (the target year). The fund's asset allocation will become more conservative over time, meaning that the percentage of assets allocated to stocks will decrease while the percentage of assets allocated to bonds and other fixed income investments will increase.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VLXVX
Morningstar Category	Target-Date 2065+
Average Market Cap (\$mm)	69,452.18
Net Assets (\$mm)	5,190.52
% Assets in Top 10 Holdings	98.73
Total Number of Holdings	6
Manager Name	Walter Nejman
Manager Tenure	6
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL STOCK MKT IDX INSTL PLS	53.23%
VANGUARD TOTAL INTL STOCK INDEX INV	35.91%
VANGUARD TOTAL BOND MARKET II IDX INV	6.86%
VANGUARD TOTAL INTL BD II IDX INSL	2.72%

Fund Characteristics as of September 30, 2023

Versus Target Retirement 2065 Composite

Sharpe Ratio (3 Year)	0.27
Average Market Cap (\$mm)	69,452.18
Price/Earnings	14.78
Price/Book	2.16
Price/Sales	1.46
Price/Cash Flow	9.47
Dividend Yield	2.50
Number of Equity Holdings	0
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.06%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.63%
COMMUNICATION SERVICES	7.01%
CONSUMER CYCLICAL	11.14%
CONSUMER DEFENSIVE	6.71%
ENERGY	5.21%
FINANCIAL SERVICES	15.32%
HEALTHCARE	11.76%
INDUSTRIALS	11.44%
REAL ESTATE	3.05%
TECHNOLOGY	21.12%
UTILITIES	2.61%

Account Information	
Account Name	Vanguard Target Retirement 2070 - Investor
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	8/01/23
Account Type	Target Date Fund
Benchmark	Target Retirement 2070 Composite
Universe	

	Calendar Years											Inception Date
	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	
Vanguard Target Retirement 2070 - Investor	-3.5%	8.5%	18.5%	--	--	--	--	--	--	--	-6.6%	Aug-23
Target Retirement 2070 Composite	-3.2%	8.7%	18.7%	--	--	--	--	--	--	--	-6.4%	Aug-23

Note: Returns are net of fees.

Vanguard Target Retirement 2070 - Investor

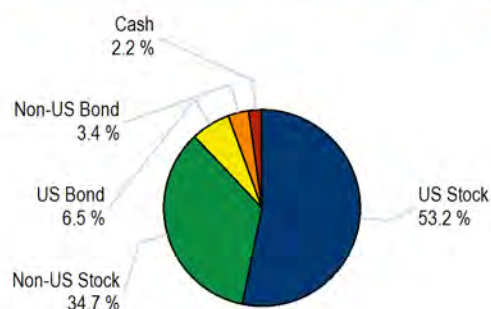
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide capital appreciation and current income consistent with its current asset allocation.

The fund invests in a mix of Vanguard mutual funds (underlying funds) according to an asset allocation strategy designed for investors planning to retire and leave the workforce in or within a few years of 2070 (the target year). The fund's asset allocation will become more conservative over time, meaning that the percentage of assets allocated to stocks will decrease while the percentage of assets allocated to bonds and other fixed income investments will increase.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VSVNX
Morningstar Category	Target-Date 2065+
Average Market Cap (\$mm)	69,759.89
Net Assets (\$mm)	314.68
% Assets in Top 10 Holdings	99.24
Total Number of Holdings	6
Manager Name	Walter Nejman
Manager Tenure	1
Expense Ratio	0.08%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD TOTAL STOCK MKT IDX INSTL PLS	53.56%
VANGUARD TOTAL INTL STOCK INDEX INV	35.73%
VANGUARD TOTAL BOND MARKET II IDX INV	6.97%
VANGUARD TOTAL INTL BD II IDX INSL	2.98%

Fund Characteristics as of September 30, 2023

Versus Target Retirement 2070 Composite

Sharpe Ratio (3 Year)	
Average Market Cap (\$mm)	69,759.89
Price/Earnings	14.80
Price/Book	2.16
Price/Sales	1.46
Price/Cash Flow	9.48
Dividend Yield	2.50
Number of Equity Holdings	0
R-Squared (3 Year)	
Alpha (3 Year)	

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.61%
COMMUNICATION SERVICES	7.02%
CONSUMER CYCLICAL	11.14%
CONSUMER DEFENSIVE	6.70%
ENERGY	5.20%
FINANCIAL SERVICES	15.30%
HEALTHCARE	11.77%
INDUSTRIALS	11.43%
REAL ESTATE	3.05%
TECHNOLOGY	21.17%
UTILITIES	2.61%

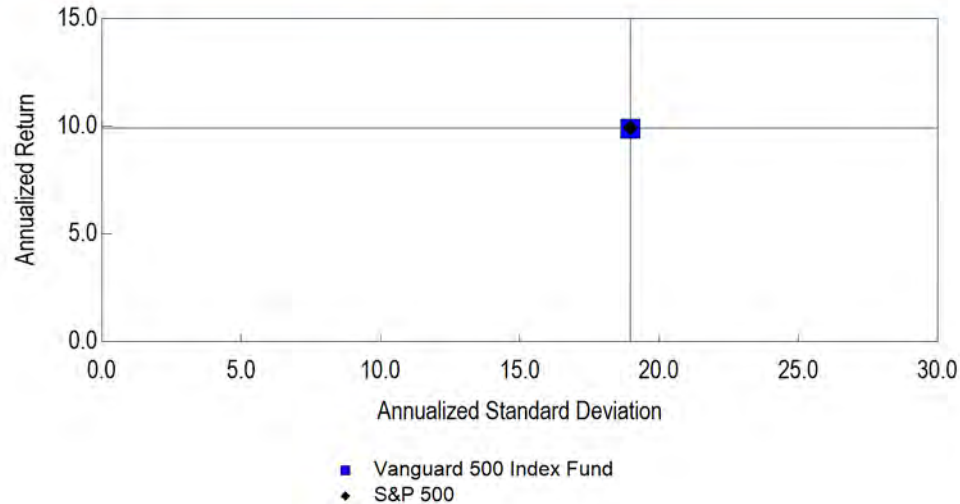
Account Information

Account Name	Vanguard 500 Index Fund
Account Structure	Mutual Fund
Investment Style	Passive
Inception Date	1/01/17
Account Type	Domestic Equity
Benchmark	S&P 500
Universe	Large Blend MStar MF

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard 500 Index Fund	10.1%	17.9%	99.9%	100.0%
S&P 500	10.1%	17.9%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard 500 Index Fund	9.9%	19.0%	99.9%	100.0%
S&P 500	9.9%	19.0%	100.0%	100.0%

Calendar Years

	2023 Q3		Rank		YTD Rank		1 Yr Rank		3 Yrs Rank		5 Yrs Rank		2022 Rank		2021 Rank		2020 Rank		2019 Rank		2018 Rank		Inception		Inception Date	
Vanguard 500 Index Fund	-3.3%	50	13.0%	27	21.6%	31	10.1%	35	9.9%	20	-18.1%	50	28.7%	23	18.4%	39	31.5%	26	-4.4%	24	12.1%	Jan-17				
S&P 500	-3.3%	49	13.1%	25	21.6%	29	10.1%	34	9.9%	16	-18.1%	48	28.7%	22	18.4%	38	31.5%	25	-4.4%	22	12.1%	Jan-17				

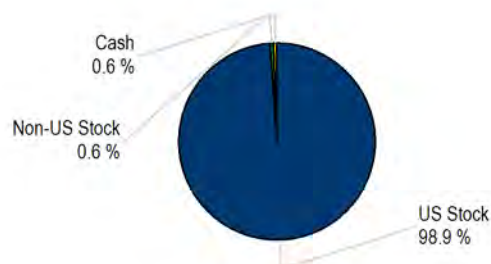
Note: Returns are net of fees.

Description:

The investment seeks to track the performance of the Standard & Poor's 500 Index that measures the investment return of large-capitalization stocks.

The fund employs an indexing investment approach designed to track the performance of the Standard & Poor's 500 Index, a widely recognized benchmark of U.S. stock market performance that is dominated by the stocks of large U.S. companies. The advisor attempts to replicate the target index by investing all, or substantially all, of its assets in the stocks that make up the index, holding each stock in approximately the same proportion as its weighting in the index.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VFIAX
Morningstar Category	Large Blend
Average Market Cap (\$mm)	216,236.44
Net Assets (\$mm)	410,264.97
% Assets in Top 10 Holdings	30.46
Total Number of Holdings	508
Manager Name	Donald M. Butler
Manager Tenure	7
Expense Ratio	0.04%
Closed to New Investors	No

Top Holdings as of September 30, 2023

APPLE INC	6.97%
MICROSOFT CORP	6.50%
AMAZON.COM INC	3.20%
NVIDIA CORP	2.97%
ALPHABET INC CLASS A	2.15%
TESLA INC	1.91%
META PLATFORMS INC CLASS A	1.85%
ALPHABET INC CLASS C	1.84%
BERKSHIRE HATHAWAY INC CLASS B	1.77%
EXXON MOBIL CORP	1.30%

Fund Characteristics as of September 30, 2023

Versus S&P 500

Sharpe Ratio (3 Year)	0.47
Average Market Cap (\$mm)	216,236.44
Price/Earnings	17.85
Price/Book	3.50
Price/Sales	2.18
Price/Cash Flow	12.82
Dividend Yield	1.77
Number of Equity Holdings	505
R-Squared (3 Year)	1.00
Alpha (3 Year)	0.00%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	2.22%
COMMUNICATION SERVICES	8.87%
CONSUMER CYCLICAL	10.86%
CONSUMER DEFENSIVE	6.52%
ENERGY	4.72%
FINANCIAL SERVICES	12.33%
HEALTHCARE	13.42%
INDUSTRIALS	8.15%
REAL ESTATE	2.37%
TECHNOLOGY	28.12%
UTILITIES	2.42%

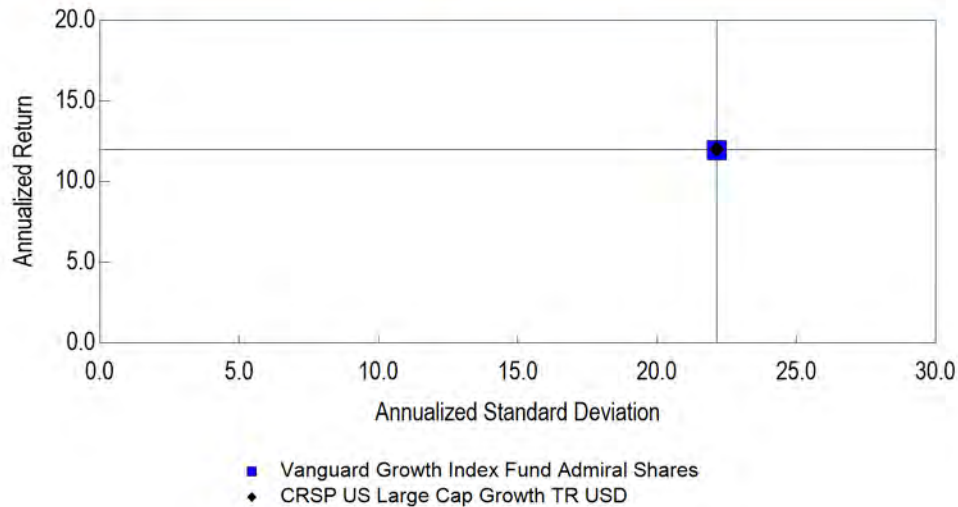
Account Information

Account Name	Vanguard Growth Index Fund Admiral Shares
Account Structure	Mutual Fund
Investment Style	Passive
Inception Date	8/01/23
Account Type	Domestic Equity
Benchmark	CRSP US Large Cap Growth TR USD
Universe	Large Growth MStar MF

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Growth Index Fund Admiral Shares	6.7%	22.0%	99.9%	100.0%
CRSP US Large Cap Growth TR USD	6.8%	22.0%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Growth Index Fund Admiral Shares	11.9%	22.1%	99.8%	100.0%
CRSP US Large Cap Growth TR USD	12.0%	22.1%	100.0%	100.0%

Calendar Years

	2023 Q3	Rank	YTD Rank	1 Yr Rank	3 Yrs Rank	5 Yrs Rank	2022 Rank	2021 Rank	2020 Rank	2019 Rank	2018 Rank	Inception	Inception Date									
Vanguard Growth Index Fund Admiral Shares	-3.7%	49	28.3%	12	28.1%	23	6.7%	30	11.9%	12	-33.1%	69	27.3%	20	40.2%	31	37.2%	13	-3.3%	65	-6.8%	Aug-23
CRSP US Large Cap Growth TR USD	-3.7%	49	28.3%	11	28.2%	21	6.8%	28	12.0%	11	-33.1%	68	27.3%	19	40.3%	31	37.3%	12	-3.3%	65	-6.8%	Aug-23

Note: Returns are net of fees.

Vanguard Growth Index Fund Admiral Shares

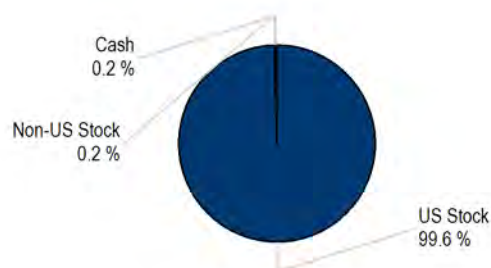
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to track the performance of the CRSP US Large Cap Growth Index that measures the investment return of large-capitalization growth stocks.

The fund employs an indexing investment approach designed to track the performance of the index, a broadly diversified index predominantly made up of growth stocks of large U.S. companies. The advisor attempts to replicate the target index by investing all, or substantially all, of its assets in the stocks that make up the index, holding each stock in approximately the same proportion as its weighting in the index.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VIGAX
Morningstar Category	Large Growth
Average Market Cap (\$mm)	391,318.89
Net Assets (\$mm)	58,840.72
% Assets in Top 10 Holdings	53.66
Total Number of Holdings	225
Manager Name	Gerard C. O'Reilly
Manager Tenure	29
Expense Ratio	0.05%
Closed to New Investors	No

Top Holdings as of September 30, 2023

APPLE INC	12.78%
MICROSOFT CORP	11.79%
AMAZON.COM INC	5.93%
NVIDIA CORP	5.13%
ALPHABET INC CLASS A	3.90%
TESLA INC	3.39%
META PLATFORMS INC CLASS A	3.35%
ALPHABET INC CLASS C	3.27%
ELI LILLY AND CO	2.31%
VISA INC CLASS A	1.80%

Fund Characteristics as of September 30, 2023

Versus CRSP US Large Cap Growth TR USD

Sharpe Ratio (3 Year)	0.23
Average Market Cap (\$mm)	391,318.89
Price/Earnings	26.03
Price/Book	7.01
Price/Sales	4.52
Price/Cash Flow	18.88
Dividend Yield	0.73
Number of Equity Holdings	222
R-Squared (3 Year)	1.00
Alpha (3 Year)	0.00%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	1.73%
COMMUNICATION SERVICES	13.72%
CONSUMER CYCLICAL	16.88%
CONSUMER DEFENSIVE	2.22%
ENERGY	1.36%
FINANCIAL SERVICES	5.99%
HEALTHCARE	8.76%
INDUSTRIALS	3.36%
REAL ESTATE	1.71%
TECHNOLOGY	44.27%
UTILITIES	0.00%

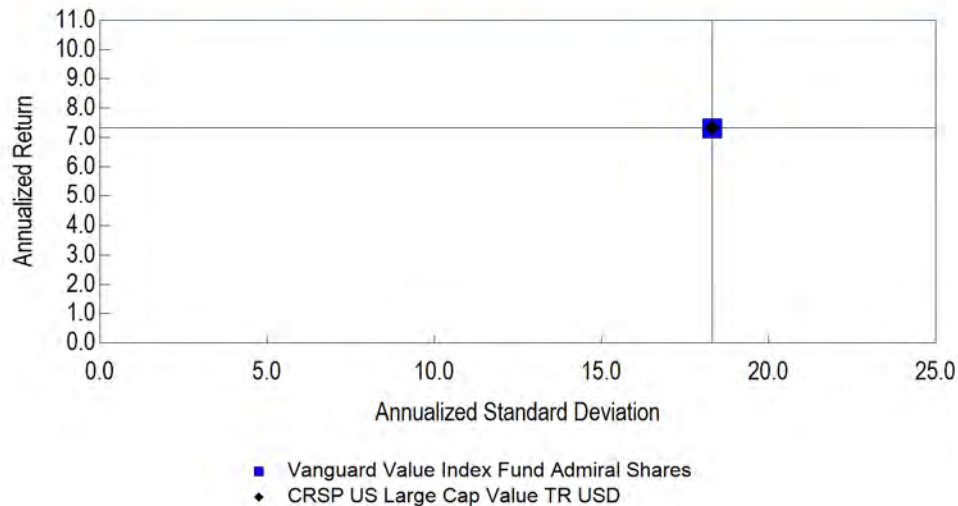
Account Information

Account Name	Vanguard Value Index Fund Admiral Shares
Account Structure	Mutual Fund
Investment Style	Passive
Inception Date	8/01/23
Account Type	Domestic Equity
Benchmark	CRSP US Large Cap Value TR USD
Universe	Large Value MStar MF

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Value Index Fund Admiral Shares	12.4%	16.9%	99.9%	100.0%
CRSP US Large Cap Value TR USD	12.4%	16.9%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Value Index Fund Admiral Shares	7.3%	18.3%	99.9%	100.0%
CRSP US Large Cap Value TR USD	7.3%	18.3%	100.0%	100.0%

Calendar Years

	2023 Q3 Rank	YTD Rank	1 Yr Rank	3 Yrs Rank	5 Yrs Rank	2022 Rank	2021 Rank	2020 Rank	2019 Rank	2018 Rank	Inception	Inception Date
Vanguard Value Index Fund Admiral Shares	-2.3% 50	0.1% 69	14.8% 57	12.4% 48	7.3% 33	-2.1% 20	26.5% 50	2.3% 57	25.8% 50	-5.4% 21	-5.6%	Aug-23
CRSP US Large Cap Value TR USD	-2.3% 49	0.1% 69	14.9% 56	12.4% 48	7.3% 32	-2.0% 19	26.5% 49	2.3% 57	25.9% 49	-5.4% 21	-5.6%	Aug-23

Note: Returns are net of fees.

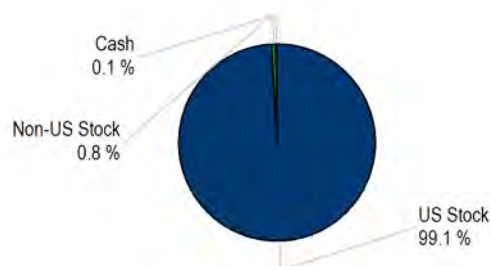
Vanguard Value Index Fund Admiral Shares

Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to track the performance of the CRSP US Large Cap Value Index that measures the investment return of large-capitalization value stocks. The fund employs an indexing investment approach designed to track the performance of the CRSP US Large Cap Value Index, a broadly diversified index predominantly made up of value stocks of large U.S. companies. The advisor attempts to replicate the target index by investing all, or substantially all, of its assets in the stocks that make up the index, holding each stock in approximately the same proportion as its weighting in the index.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VVIAX
Morningstar Category	Large Value
Average Market Cap (\$mm)	100,923.83
Net Assets (\$mm)	31,157.48
% Assets in Top 10 Holdings	23.13
Total Number of Holdings	344
Manager Name	Gerard C. O'Reilly
Manager Tenure	29
Expense Ratio	0.05%
Closed to New Investors	No

Top Holdings as of September 30, 2023

BERKSHIRE HATHAWAY INC CLASS B	3.81%
EXXON MOBIL CORP	2.80%
UNITEDHEALTH GROUP INC	2.78%
JPMORGAN CHASE & CO	2.51%
JOHNSON & JOHNSON	2.23%
PROCTER & GAMBLE CO	2.05%
BROADCOM INC	2.04%
CHEVRON CORP	1.78%
ABBVIE INC	1.57%
MERCK & CO INC	1.56%

Fund Characteristics as of September 30, 2023

Versus CRSP US Large Cap Value TR USD

Sharpe Ratio (3 Year)	0.63
Average Market Cap (\$mm)	100,923.83
Price/Earnings	13.35
Price/Book	2.25
Price/Sales	1.40
Price/Cash Flow	9.08
Dividend Yield	2.88
Number of Equity Holdings	341
R-Squared (3 Year)	1.00
Alpha (3 Year)	0.00%

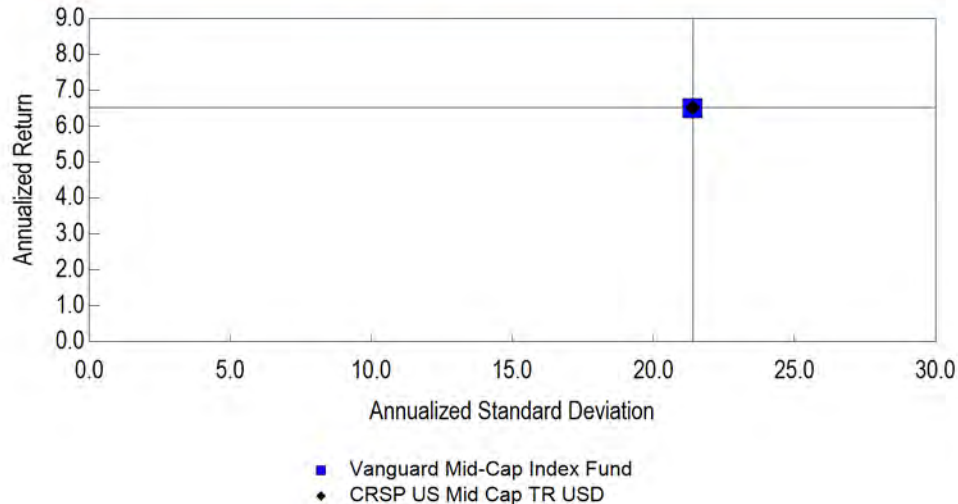
Sector Allocation as of September 30, 2023

BASIC MATERIALS	2.72%
COMMUNICATION SERVICES	3.23%
CONSUMER CYCLICAL	3.19%
CONSUMER DEFENSIVE	11.26%
ENERGY	8.45%
FINANCIAL SERVICES	19.92%
HEALTHCARE	18.99%
INDUSTRIALS	13.55%
REAL ESTATE	3.07%
TECHNOLOGY	10.54%
UTILITIES	5.06%

Account Information

Account Name	Vanguard Mid-Cap Index Fund
Account Structure	Mutual Fund
Investment Style	Passive
Inception Date	1/01/17
Account Type	Domestic Equity
Benchmark	CRSP US Mid Cap TR USD
Universe	Mid-Cap Blend MStar MF

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Mid-Cap Index Fund	7.3%	19.4%	99.9%	100.0%
CRSP US Mid Cap TR USD	7.3%	19.4%	100.0%	100.0%

5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Mid-Cap Index Fund	6.5%	21.4%	99.9%	100.0%
CRSP US Mid Cap TR USD	6.5%	21.4%	100.0%	100.0%

Calendar Years

	2023 Q3 Rank	YTD Rank	1 Yr Rank	3 Yrs Rank	5 Yrs Rank	2022 Rank	2021 Rank	2020 Rank	2019 Rank	2018 Rank	Inception	Inception Date
Vanguard Mid-Cap Index Fund	-5.1% 77	3.3% 66	12.6% 63	7.3% 73	6.5% 27	-18.7% 83	24.5% 46	18.2% 27	31.0% 18	-9.2% 27	8.7%	Jan-17
CRSP US Mid Cap TR USD	-5.1% 76	3.3% 66	12.6% 63	7.3% 71	6.5% 25	-18.7% 81	24.5% 45	18.2% 27	31.1% 15	-9.2% 27	8.7%	Jan-17

Note: Returns are net of fees.

Vanguard Mid-Cap Index Fund

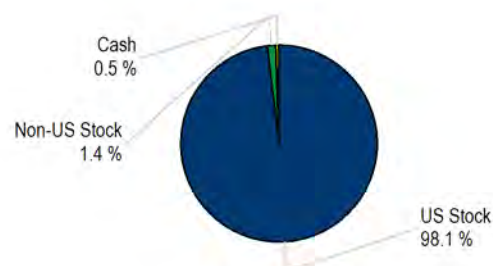
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to track the performance of the CRSP US Mid Cap Index that measures the investment return of mid-capitalization stocks.

The fund employs an indexing investment approach designed to track the performance of the CRSP US Mid Cap Index, a broadly diversified index of stocks of mid-size U.S. companies. The advisor attempts to replicate the target index by investing all, or substantially all, of its assets in the stocks that make up the index, holding each stock in approximately the same proportion as its weighting in the index.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VIMAX
Morningstar Category	Mid-Cap Blend
Average Market Cap (\$mm)	24,081.31
Net Assets (\$mm)	51,716.27
% Assets in Top 10 Holdings	7.31
Total Number of Holdings	341
Manager Name	Donald M. Butler
Manager Tenure	25
Expense Ratio	0.05%
Closed to New Investors	No

Top Holdings as of September 30, 2023

AMPHENOL CORP CLASS A	0.81%
ARTHUR J. GALLAGHER & CO	0.80%
CARRIER GLOBAL CORP ORDINARY SHARES	0.75%
MOTOROLA SOLUTIONS INC	0.74%
PACCAR INC	0.72%
TRANSDIGM GROUP INC	0.72%
ARISTA NETWORKS INC	0.69%
HESS CORP	0.69%
MICROCHIP TECHNOLOGY INC	0.69%
WELLTOWER INC	0.69%

Fund Characteristics as of September 30, 2023

Versus CRSP US Mid Cap TR USD

Sharpe Ratio (3 Year)	0.29
Average Market Cap (\$mm)	24,081.31
Price/Earnings	15.72
Price/Book	2.47
Price/Sales	1.42
Price/Cash Flow	9.63
Dividend Yield	2.01
Number of Equity Holdings	338
R-Squared (3 Year)	1.00
Alpha (3 Year)	0.00%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.95%
COMMUNICATION SERVICES	3.98%
CONSUMER CYCLICAL	8.76%
CONSUMER DEFENSIVE	4.15%
ENERGY	4.99%
FINANCIAL SERVICES	12.26%
HEALTHCARE	11.68%
INDUSTRIALS	15.46%
REAL ESTATE	8.24%
TECHNOLOGY	18.67%
UTILITIES	6.86%

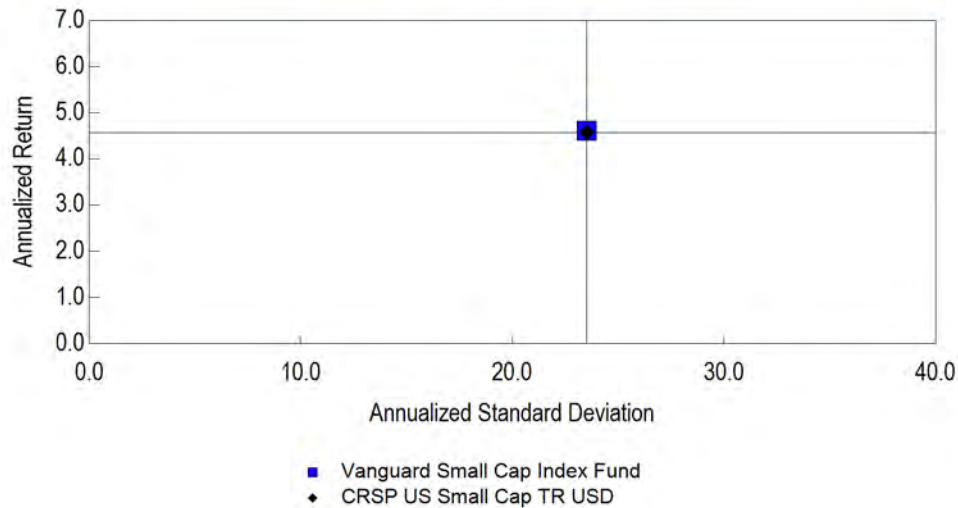
Account Information

Account Name	Vanguard Small Cap Index Fund
Account Structure	Mutual Fund
Investment Style	Passive
Inception Date	1/01/17
Account Type	Domestic Equity
Benchmark	CRSP US Small Cap TR USD
Universe	Small Blend MStar MF

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Small Cap Index Fund	8.7%	20.9%	100.0%	99.9%
CRSP US Small Cap TR USD	8.7%	20.9%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Small Cap Index Fund	4.6%	23.5%	100.1%	100.0%
CRSP US Small Cap TR USD	4.6%	23.5%	100.0%	100.0%

Calendar Years

	2023 Q3 Rank	YTD Rank	1 Yr Rank	3 Yrs Rank	5 Yrs Rank	2022 Rank	2021 Rank	2020 Rank	2019 Rank	2018 Rank	Inception	Inception Date
Vanguard Small Cap Index Fund	-4.6% 54	4.2% 37	12.5% 50	8.7% 76	4.6% 29	-17.6% 63	17.7% 84	19.1% 20	27.4% 21	-9.3% 19	7.4%	Jan-17
CRSP US Small Cap TR USD	-4.6% 56	4.1% 38	12.4% 51	8.7% 76	4.6% 31	-17.6% 63	17.7% 84	19.1% 20	27.3% 21	-9.3% 19	7.3%	Jan-17

Note: Returns are net of fees.

Vanguard Small Cap Index Fund

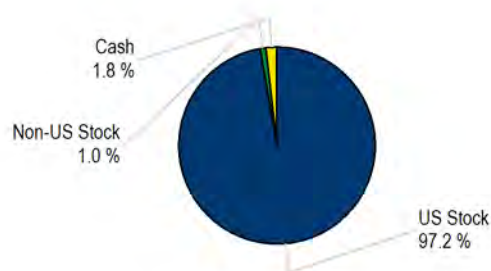
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to track the performance of the CRSP US Small Cap Index that measures the investment return of small-capitalization stocks.

The fund employs an indexing investment approach designed to track the performance of the CRSP US Small Cap Index, a broadly diversified index of stocks of small U.S. companies. The advisor attempts to replicate the target index by investing all, or substantially all, of its assets in the stocks that make up the index, holding each stock in approximately the same proportion as its weighting in the index.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VSMAX
Morningstar Category	Small Blend
Average Market Cap (\$mm)	5,267.14
Net Assets (\$mm)	46,012.35
% Assets in Top 10 Holdings	3.43
Total Number of Holdings	1,450
Manager Name	William A. Coleman
Manager Tenure	7
Expense Ratio	0.05%
Closed to New Investors	No

Top Holdings as of September 30, 2023

TARGA RESOURCES CORP	0.41%
PTC INC	0.36%
BUNGE LTD	0.35%
ATMOS ENERGY CORP	0.34%
BUILDERS FIRSTSOURCE INC	0.34%
IDEX CORP	0.34%
JABIL INC	0.34%
RELIANCE STEEL & ALUMINUM CO	0.33%
AXON ENTERPRISE INC	0.31%
BOOZ ALLEN HAMILTON HOLDING CORP CLASS A	0.31%

Fund Characteristics as of September 30, 2023

Versus CRSP US Small Cap TR USD

Sharpe Ratio (3 Year)	0.34
Average Market Cap (\$mm)	5,267.14
Price/Earnings	13.28
Price/Book	1.83
Price/Sales	1.06
Price/Cash Flow	6.95
Dividend Yield	1.97
Number of Equity Holdings	1,446
R-Squared (3 Year)	1.00
Alpha (3 Year)	0.00%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	4.19%
COMMUNICATION SERVICES	2.35%
CONSUMER CYCLICAL	13.21%
CONSUMER DEFENSIVE	4.26%
ENERGY	5.90%
FINANCIAL SERVICES	12.71%
HEALTHCARE	10.98%
INDUSTRIALS	19.77%
REAL ESTATE	7.90%
TECHNOLOGY	16.06%
UTILITIES	2.68%

Account Information

Account Name	Vanguard Developed Markets Index Fund Admiral
Account Structure	Mutual Fund
Investment Style	Passive
Inception Date	1/01/17
Account Type	International Equity
Benchmark	FTSE-Developed All Cap Ex U.S. Index
Universe	Foreign Large Blend MStar MF

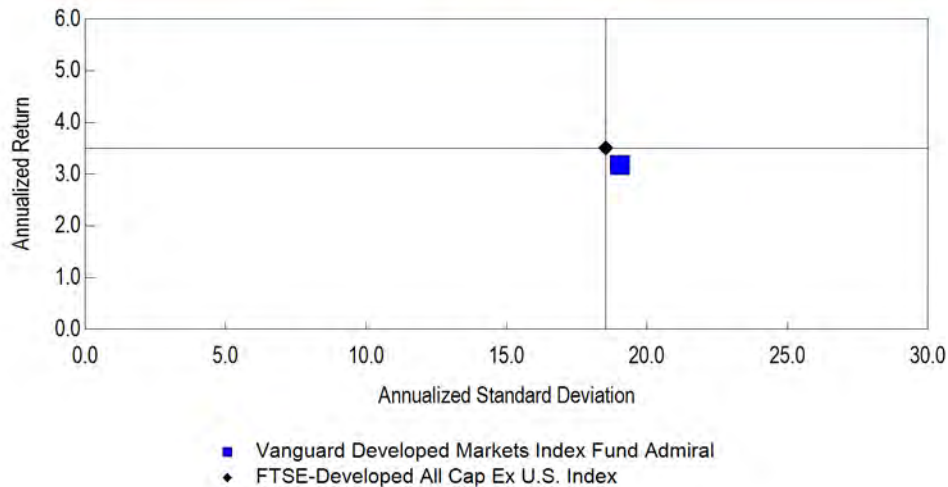
3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Developed Markets Index Fund Admiral	5.3%	19.1%	106.0%	104.8%
FTSE-Developed All Cap Ex U.S. Index	5.8%	18.4%	100.0%	100.0%

5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Developed Markets Index Fund Admiral	3.2%	19.0%	105.2%	102.3%
FTSE-Developed All Cap Ex U.S. Index	3.5%	18.5%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation
5 Years Ending September 30, 2023



Calendar Years

	2023 Q3	Rank	YTD Rank		1 Yr Rank	3 Yrs Rank	5 Yrs Rank				2022 Rank	2021 Rank	2020 Rank	2019 Rank	2018 Rank	Inception	Inception Date					
Vanguard Developed Markets Index Fund Admiral	-4.7%	53	5.9%	53	24.0%	48	5.3%	40	3.2%	35	-15.3%	42	11.4%	33	10.3%	46	22.0%	47	-14.5%	42	5.7%	Jan-17
FTSE-Developed All Cap Ex U.S. Index	-3.9%	25	6.7%	35	24.2%	46	5.8%	27	3.5%	28	-15.3%	42	11.9%	28	10.3%	45	22.7%	37	-14.5%	44	6.0%	Jan-17

Note: Returns are net of fees.

Vanguard Developed Markets Index Fund Admiral

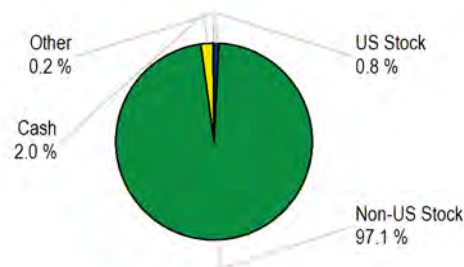
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to track the performance of the FTSE Developed All Cap ex US Index.

The fund employs an indexing investment approach designed to track the performance of the FTSE Developed All Cap ex US Index, a market-capitalization-weighted index that is made up of approximately 4,006 common stocks of large-, mid-, and small-cap companies located in Canada and the major markets of Europe and the Pacific region. The Advisor attempts to replicate the target index by investing all, or substantially all, of its assets in the stocks that make up the index, holding each stock in approximately the same proportion as its weighting in the index.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VTMGX
Morningstar Category	Foreign Large Blend
Average Market Cap (\$mm)	28,584.36
Net Assets (\$mm)	23,867.98
% Assets in Top 10 Holdings	11.21
Total Number of Holdings	4,057
Manager Name	Christine D. Franquin
Manager Tenure	11
Expense Ratio	0.07%
Closed to New Investors	No

Top Holdings as of September 30, 2023

NESTLE SA	1.49%
NOVO NORDISK A/S CLASS B	1.41%
SAMSUNG ELECTRONICS CO LTD	1.18%
ASML HOLDING NV	1.15%
TOYOTA MOTOR CORP	1.06%
SHELL PLC	1.05%
NOVARTIS AG REGISTERED SHARES	1.04%
ASTRAZENECA PLC	0.98%
ROCHE HOLDING AG	0.93%
LVMH MOET HENNESSY LOUIS VUITTON SE	0.92%

Fund Characteristics as of September 30, 2023

Versus FTSE-Developed All Cap Ex U.S. Index

Sharpe Ratio (3 Year)	0.19
Average Market Cap (\$mm)	28,584.36
Price/Earnings	12.10
Price/Book	1.43
Price/Sales	1.00
Price/Cash Flow	6.92
Dividend Yield	3.66
Number of Equity Holdings	4,029
R-Squared (3 Year)	0.99
Alpha (3 Year)	-0.04%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	7.79%
COMMUNICATION SERVICES	3.97%
CONSUMER CYCLICAL	10.85%
CONSUMER DEFENSIVE	8.08%
ENERGY	5.91%
FINANCIAL SERVICES	19.03%
HEALTHCARE	11.09%
INDUSTRIALS	16.90%
REAL ESTATE	3.32%
TECHNOLOGY	10.14%
UTILITIES	2.91%

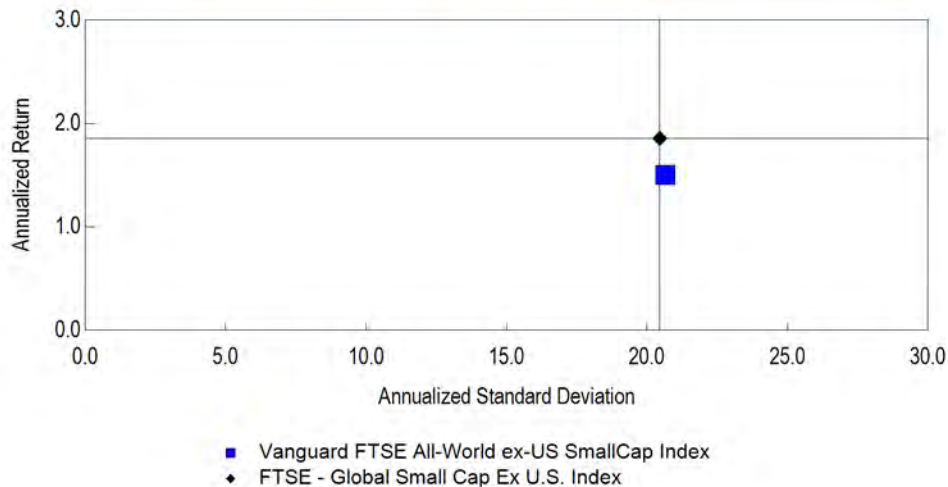
Account Information

Account Name	Vanguard FTSE All-World ex-US SmallCap Index
Account Structure	Mutual Fund
Investment Style	Passive
Inception Date	10/01/18
Account Type	International Equity
Benchmark	FTSE - Global Small Cap Ex U.S. Index
Universe	Foreign Small/Mid Blend Mstar MF

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard FTSE All-World ex-US SmallCap Index	2.9%	18.5%	102.2%	102.9%
FTSE - Global Small Cap Ex U.S. Index	3.5%	18.2%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard FTSE All-World ex-US SmallCap Index	1.5%	20.7%	102.0%	101.2%
FTSE - Global Small Cap Ex U.S. Index	1.9%	20.5%	100.0%	100.0%

Calendar Years

	2023 Q3	Rank	YTD Rank		1 Yr Rank		3 Yrs Rank		5 Yrs Rank		2022 Rank		2021 Rank		2020 Rank		2019 Rank		2018 Rank		Inception	Inception Date
Vanguard FTSE All-World ex-US SmallCap Index	-3.4%	28	4.3%	49	18.0%	83	2.9%	52	1.5%	57	-21.3%	63	12.7%	63	11.9%	40	21.7%	59	-18.5%	32	1.5%	Oct-18
FTSE - Global Small Cap Ex U.S. Index	-2.7%	17	5.1%	24	18.3%	75	3.5%	42	1.9%	39	-21.2%	59	13.4%	40	11.8%	41	22.1%	54	-18.6%	35	1.9%	Oct-18

Note: Returns are net of fees.

Vanguard FTSE All-World ex-US SmallCap Index

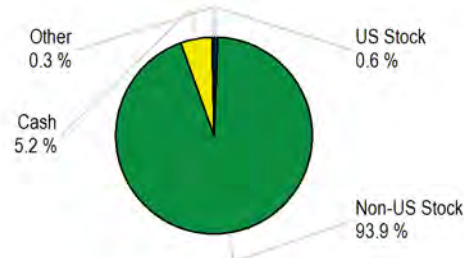
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to track the performance of a benchmark index that measures the investment return of stocks of international small-cap companies.

The fund employs an indexing investment approach designed to track the performance of the FTSE Global Small Cap ex US Index. The advisor attempts to sample the target index by investing all, or substantially all, of its assets in common stocks in the index and by holding a representative sample of securities that resembles the full index in terms of key risk factors and other characteristics.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VFSAX
Morningstar Category	Foreign Small/Mid Blend
Average Market Cap (\$mm)	1,635.33
Net Assets (\$mm)	1,307.42
% Assets in Top 10 Holdings	4.02
Total Number of Holdings	4,708
Manager Name	Jeffrey D. Miller
Manager Tenure	8
Expense Ratio	0.16%
Closed to New Investors	No

Top Holdings as of September 30, 2023

CAMECO CORP	0.62%
WSP GLOBAL INC	0.60%
FIRST QUANTUM MINERALS LTD	0.47%
RB GLOBAL INC	0.41%
TFI INTERNATIONAL INC	0.38%
ARC RESOURCES LTD	0.36%
EMERA INC	0.34%
OPEN TEXT CORP	0.34%
STANTEC INC	0.26%
CAE INC	0.25%

Fund Characteristics as of September 30, 2023

Versus FTSE - Global Small Cap Ex U.S. Index

Sharpe Ratio (3 Year)	0.07
Average Market Cap (\$mm)	1,635.33
Price/Earnings	11.48
Price/Book	1.19
Price/Sales	0.76
Price/Cash Flow	6.02
Dividend Yield	3.75
Number of Equity Holdings	4,617
R-Squared (3 Year)	0.99
Alpha (3 Year)	-0.05%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	10.80%
COMMUNICATION SERVICES	3.11%
CONSUMER CYCLICAL	12.24%
CONSUMER DEFENSIVE	4.26%
ENERGY	5.24%
FINANCIAL SERVICES	10.46%
HEALTHCARE	6.91%
INDUSTRIALS	20.68%
REAL ESTATE	8.99%
TECHNOLOGY	14.15%
UTILITIES	3.15%

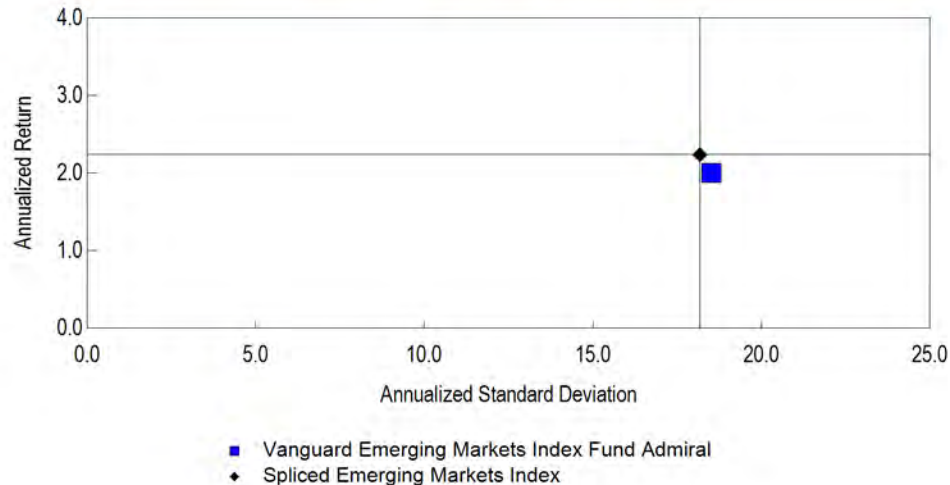
Account Information

Account Name	Vanguard Emerging Markets Index Fund Admiral
Account Structure	Mutual Fund
Investment Style	Passive
Inception Date	8/31/21
Account Type	International Equity
Benchmark	Spliced Emerging Markets Index
Universe	Diversified Emerging Mkts MStar MF

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Emerging Markets Index Fund Admiral	-0.2%	16.6%	99.6%	102.1%
Spliced Emerging Markets Index	0.3%	16.2%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Emerging Markets Index Fund Admiral	2.0%	18.5%	100.8%	101.1%
Spliced Emerging Markets Index	2.2%	18.2%	100.0%	100.0%

Calendar Years

	2023 Q3										Inception										Inception Date	
	Rank	YTD Rank	1 Yr Rank	3 Yrs Rank	5 Yrs Rank	2022 Rank	2021 Rank	2020 Rank	2019 Rank	2018 Rank	Inception	Inception Date										
Vanguard Emerging Markets Index Fund Admiral	-2.2%	29	2.5%	62	10.9%	68	-0.2%	35	2.0%	39	-17.8%	26	0.9%	38	15.2%	67	20.3%	51	-14.6%	28	-9.6%	Aug-21
Spliced Emerging Markets Index	-1.5%	20	2.6%	60	11.0%	66	0.3%	32	2.2%	34	-17.6%	24	1.5%	34	15.5%	64	20.4%	50	-14.8%	31	-9.4%	Aug-21

Note: Returns are net of fees.

Vanguard Emerging Markets Index Fund Admiral

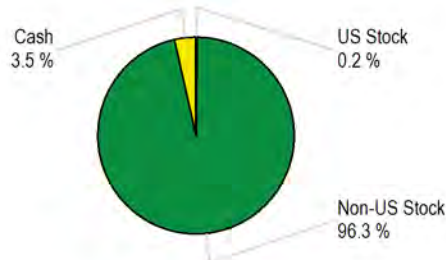
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to track the performance of a benchmark index that measures the investment return of stocks issued by companies located in emerging market countries.

The fund employs an indexing investment approach designed to track the performance of the FTSE Emerging Markets All Cap China A Inclusion Index. It invests by sampling the index, meaning that it holds a broadly diversified collection of securities that, in the aggregate, approximates the index in terms of key characteristics.

Mutual Fund Allocation as of September 30, 2023



Fund Characteristics as of September 30, 2023

Versus Spliced Emerging Markets Index

Sharpe Ratio (3 Year)	-0.12
Average Market Cap (\$mm)	19,871.50
Price/Earnings	11.77
Price/Book	1.49
Price/Sales	1.21
Price/Cash Flow	6.68
Dividend Yield	3.80
Number of Equity Holdings	4,712
R-Squared (3 Year)	0.98
Alpha (3 Year)	-0.04%

Portfolio Fund Information as of September 30, 2023

Ticker	VEMAX
Morningstar Category	Diversified Emerging Mkts
Average Market Cap (\$mm)	19,871.50
Net Assets (\$mm)	14,668.61
% Assets in Top 10 Holdings	17.13
Total Number of Holdings	4,784
Manager Name	Michael Perre
Manager Tenure	15
Expense Ratio	0.14%
Closed to New Investors	No

Sector Allocation as of September 30, 2023

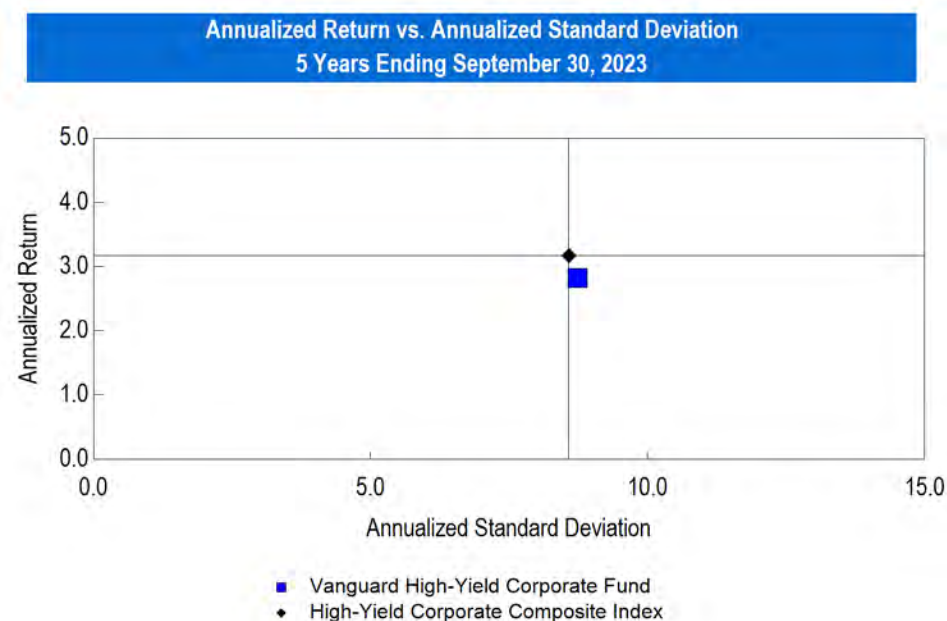
BASIC MATERIALS	8.68%
COMMUNICATION SERVICES	9.04%
CONSUMER CYCLICAL	13.39%
CONSUMER DEFENSIVE	6.38%
ENERGY	5.69%
FINANCIAL SERVICES	21.13%
HEALTHCARE	4.64%
INDUSTRIALS	8.21%
REAL ESTATE	2.82%
TECHNOLOGY	16.67%
UTILITIES	3.34%

Top Holdings as of September 30, 2023

TAIWAN SEMICONDUCTOR MANUFACTURING CO LTD	4.77%
TENCENT HOLDINGS LTD	3.36%
ALIBABA GROUP HOLDING LTD ORDINARY SHARES	2.56%
RELIANCE INDUSTRIES LTD	1.31%
MEITUAN CLASS B	1.07%
HDFC BANK LTD	0.97%
INFOSYS LTD	0.84%
PDD HOLDINGS INC ADR	0.82%
CHINA CONSTRUCTION BANK CORP CLASS H	0.73%
VALE SA	0.71%

Account Information	
Account Name	Vanguard High-Yield Corporate Fund
Account Structure	Mutual Fund
Investment Style	Active
Inception Date	10/01/18
Account Type	Fixed Income
Benchmark	High-Yield Corporate Composite Index
Universe	

3 Years Ending September 30, 2023				
	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard High-Yield Corporate Fund	1.0%	7.8%	99.5%	101.1%
High-Yield Corporate Composite Index	1.1%	7.7%	100.0%	100.0%



5 Years Ending September 30, 2023				
	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard High-Yield Corporate Fund	2.8%	8.7%	98.8%	102.1%
High-Yield Corporate Composite Index	3.2%	8.6%	100.0%	100.0%

	Calendar Years											Inception Date
	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	
Vanguard High-Yield Corporate Fund	-0.2%	4.1%	9.2%	1.0%	2.8%	-9.0%	3.8%	5.4%	15.9%	-2.9%	2.8%	Oct-18
High-Yield Corporate Composite Index	0.2%	4.8%	9.4%	1.1%	3.2%	-10.3%	4.4%	7.6%	14.6%	-1.7%	3.2%	Oct-18

Note: Returns are net of fees.

Vanguard High-Yield Corporate Fund

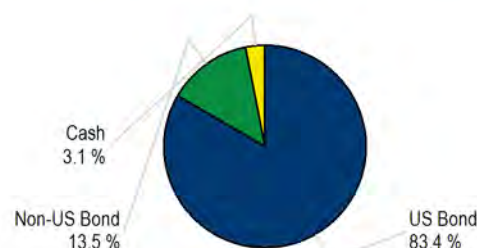
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide a high level of current income.

The fund invests primarily in a diversified group of high-yielding, higher-risk corporate bonds-commonly known as "junk bonds"-with medium- and lower-range credit-quality ratings. It invests at least 80% of its assets in corporate bonds that are rated below Baa by Moody's Investors Service, Inc. (Moody's); have an equivalent rating by any other independent bond-rating agency; or, if unrated, are determined to be of comparable quality by the fund's advisor. The fund's high-yield bonds and loans mostly have short- and intermediate-term maturities.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VWEAX
Morningstar Category	High Yield Bond
Average Market Cap (\$mm)	
Net Assets (\$mm)	19,693.39
% Assets in Top 10 Holdings	7.58
Total Number of Holdings	821
Manager Name	Michael Chang
Manager Tenure	1
Expense Ratio	0.13%
Closed to New Investors	No

Top Holdings as of September 30, 2023

UNITED STATES TREASURY NOTES	1.61%
IMOLA MERGER CORP.	0.91%
UNITED STATES TREASURY BILLS	0.70%
UNITED STATES TREASURY NOTES	0.69%
UNITED STATES TREASURY BILLS	0.68%
HERC HOLDINGS INC	0.65%
SS&C TECHNOLOGIES, INC.	0.63%
MOZART DEBT MERGER SUBORDINATED INC.	0.62%
AERCAP GLOBAL AVIATION TRUST	0.55%
CAESARS ENTERTAINMENT INC NEW	0.54%

Fund Characteristics as of September 30, 2023

Versus High-Yield Corporate Composite Index

Sharpe Ratio (3 Year)	-0.09
Average Duration	3.68
Average Coupon	5.23%
Average Effective Maturity	4.80
R-Squared (3 Year)	0.99
Alpha (3 Year)	-0.01%
Beta (3 Year)	1.02

Fixed Income Sectors as of September 30, 2023

GOVERNMENT	5.77%
MUNICIPAL	0.00%
CORPORATE	91.61%
SECURITIZED	0.09%
CASH & EQUIVALENTS	2.54%
DERIVATIVE	0.00%

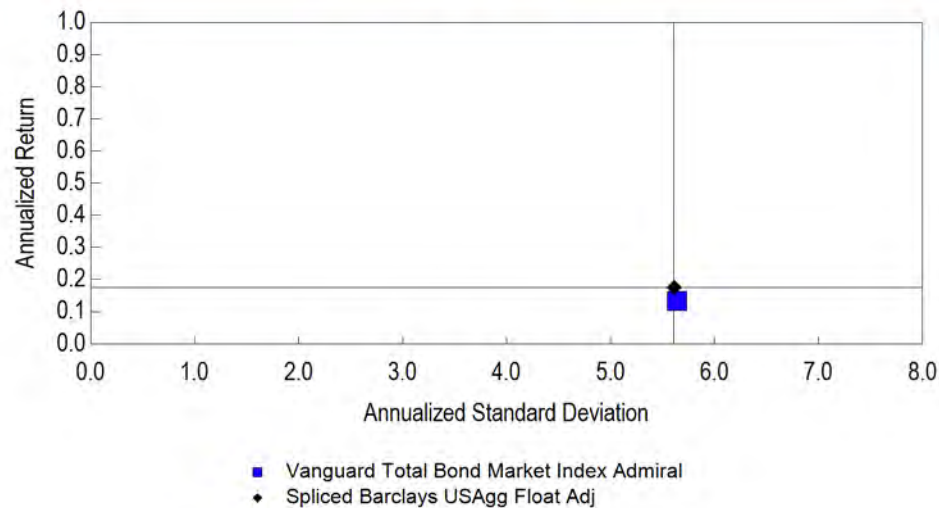
Account Information

Account Name	Vanguard Total Bond Market Index Admiral
Account Structure	Mutual Fund
Investment Style	Passive
Inception Date	1/01/17
Account Type	Fixed Income
Benchmark	Spliced Barclays USAgg Float Adj
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Total Bond Market Index Admiral	-5.2%	6.2%	101.8%	101.0%
Spliced Barclays USAgg Float Adj	-5.2%	6.2%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Total Bond Market Index Admiral	0.1%	5.6%	100.2%	100.6%
Spliced Barclays USAgg Float Adj	0.2%	5.6%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Total Bond Market Index Admiral	-3.1%	-0.9%	0.7%	-5.2%	0.1%	-13.2%	-1.7%	7.7%	8.7%	0.0%	0.4%	Jan-17
Spliced Barclays USAgg Float Adj	-3.1%	-1.1%	0.8%	-5.2%	0.2%	-13.1%	-1.6%	7.7%	8.9%	-0.1%	0.4%	Jan-17

Note: Returns are net of fees.

Vanguard Total Bond Market Index Admiral

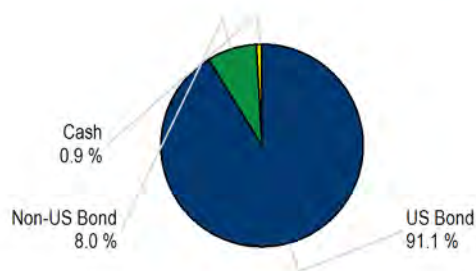
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to track the performance of the Bloomberg U.S. Aggregate Float Adjusted Index.

This index measures the performance of a wide spectrum of public, investment-grade, taxable, fixed income securities in the United States-including government, corporate, and international dollar-denominated bonds, as well as mortgage-backed and asset-backed securities-all with maturities of more than 1 year. All of the fund's investments will be selected through the sampling process, and at least 80% of its assets will be invested in bonds held in the index.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VBTLX
Morningstar Category	Intermediate Core Bond
Average Market Cap (\$mm)	
Net Assets (\$mm)	93,873.06
% Assets in Top 10 Holdings	4.38
Total Number of Holdings	17,896
Manager Name	Joshua C. Barrickman
Manager Tenure	11
Expense Ratio	0.05%
Closed to New Investors	No

Top Holdings as of September 30, 2023

UNITED STATES TREASURY NOTES	0.49%
UNITED STATES TREASURY NOTES	0.48%
UNITED STATES TREASURY NOTES	0.47%
UNITED STATES TREASURY NOTES	0.46%
UNITED STATES TREASURY NOTES	0.42%
UNITED STATES TREASURY NOTES	0.40%
UNITED STATES TREASURY NOTES	0.39%

Fund Characteristics as of September 30, 2023

Versus Spliced Barclays USAgg Float Adj

Sharpe Ratio (3 Year)	-1.11
Average Duration	6.26
Average Coupon	3.10%
Average Effective Maturity	8.70
R-Squared (3 Year)	1.00
Alpha (3 Year)	0.00%
Beta (3 Year)	1.01

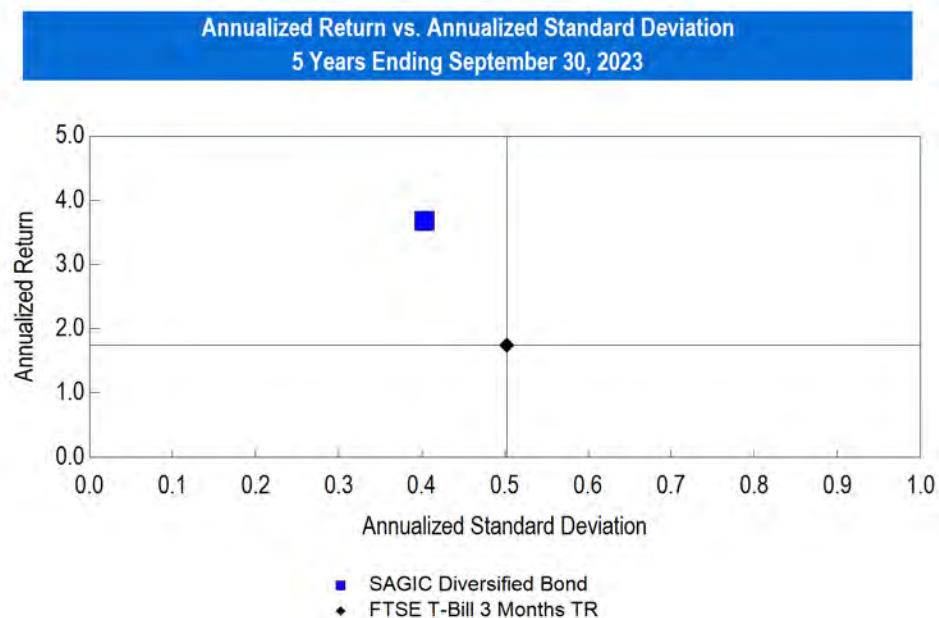
Fixed Income Sectors as of September 30, 2023

GOVERNMENT	49.25%
MUNICIPAL	0.61%
CORPORATE	26.61%
SECURITIZED	22.64%
CASH & EQUIVALENTS	0.89%
DERIVATIVE	0.00%

Account Information	
Account Name	SAGIC Diversified Bond
Account Structure	Separate Account
Investment Style	Active
Inception Date	1/01/16
Account Type	Stable Value
Benchmark	FTSE T-Bill 3 Months TR
Universe	

3 Years Ending September 30, 2023				
	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
SAGIC Diversified Bond	3.6%	0.1%	203.3%	--
FTSE T-Bill 3 Months TR	1.8%	0.6%	100.0%	--

5 Years Ending September 30, 2023				
	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
SAGIC Diversified Bond	3.7%	0.4%	219.2%	--
FTSE T-Bill 3 Months TR	1.7%	0.5%	100.0%	--



	Calendar Years											Inception Date
	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	
SAGIC Diversified Bond	1.0%	3.0%	3.9%	3.6%	3.7%	3.4%	3.3%	3.8%	3.8%	4.1%	3.6%	Jan-16
FTSE T-Bill 3 Months TR	1.4%	3.8%	4.7%	1.8%	1.7%	1.5%	0.0%	0.6%	2.3%	1.9%	1.4%	Jan-16

Note: Returns are net of fees.

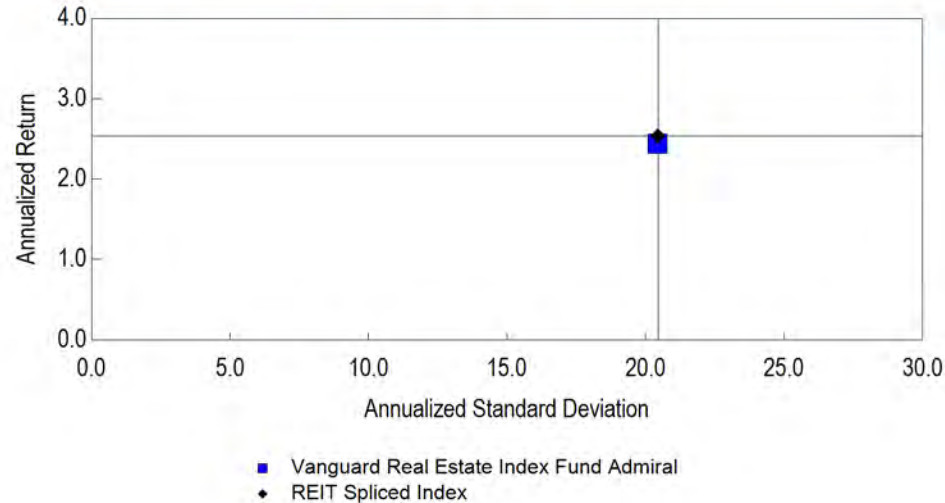
Account Information

Account Name	Vanguard Real Estate Index Fund Admiral
Account Structure	Mutual Fund
Investment Style	Passive
Inception Date	8/01/21
Account Type	Real Estate
Benchmark	REIT Spliced Index
Universe	

3 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Real Estate Index Fund Admiral	2.3%	20.7%	99.7%	100.1%
REIT Spliced Index	2.4%	20.7%	100.0%	100.0%

Annualized Return vs. Annualized Standard Deviation 5 Years Ending September 30, 2023



5 Years Ending September 30, 2023

	Anlzd Return	Anlzd Standard Deviation	Up Mkt Capture Ratio	Down Mkt Capture Ratio
Vanguard Real Estate Index Fund Admiral	2.4%	20.4%	99.6%	100.1%
REIT Spliced Index	2.5%	20.4%	100.0%	100.0%

Calendar Years

	2023 Q3	YTD	1 Yr	3 Yrs	5 Yrs	2022	2021	2020	2019	2018	Inception	Inception Date
Vanguard Real Estate Index Fund Admiral	-8.5%	-5.4%	-1.3%	2.3%	2.4%	-26.2%	40.4%	-4.7%	28.9%	-5.9%	-11.2%	Aug-21
REIT Spliced Index	-8.5%	-5.2%	-1.1%	2.4%	2.5%	-26.1%	40.6%	-4.6%	29.0%	-5.9%	-11.1%	Aug-21

Note: Returns are net of fees.

Vanguard Real Estate Index Fund Admiral

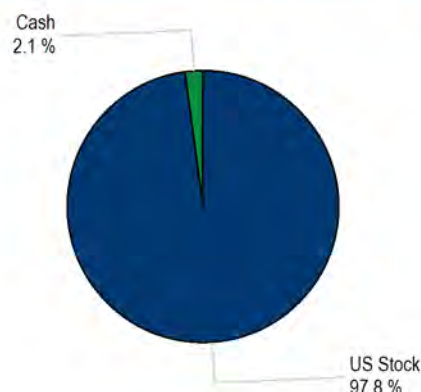
Master Consulting Services Report as of September 30, 2023

Description:

The investment seeks to provide a high level of income and moderate long-term capital appreciation by tracking the performance of the MSCI US Investable Market Real Estate 25/50 Index that measures the performance of publicly traded equity REITs and other real estate-related investments.

The advisor attempts to track the index by investing all, or substantially all, of its assets-either directly or indirectly through a wholly owned subsidiary, which is itself a registered investment company-in the stocks that make up the index, holding each stock in approximately the same proportion as its weighting in the index. The fund is non-diversified.

Mutual Fund Allocation as of September 30, 2023



Portfolio Fund Information as of September 30, 2023

Ticker	VGSLX
Morningstar Category	Real Estate
Average Market Cap (\$mm)	19,722.73
Net Assets (\$mm)	18,160.14
% Assets in Top 10 Holdings	46.74
Total Number of Holdings	164
Manager Name	Gerard C. O'Reilly
Manager Tenure	27
Expense Ratio	0.12%
Closed to New Investors	No

Top Holdings as of September 30, 2023

VANGUARD REAL ESTATE II INDEX	12.67%
PROLOGIS INC	7.50%
AMERICAN TOWER CORP	5.55%
EQUINIX INC	4.92%
PUBLIC STORAGE	3.02%
CROWN CASTLE INC	2.89%
WELLTOWER INC	2.84%
SIMON PROPERTY GROUP INC	2.48%
REALTY INCOME CORP	2.43%
DIGITAL REALTY TRUST INC	2.42%

Fund Characteristics as of September 30, 2023

Versus REIT Spliced Index

Sharpe Ratio (3 Year)	0.03
Average Market Cap (\$mm)	19,722.73
Price/Earnings	27.52
Price/Book	1.93
Price/Sales	3.94
Price/Cash Flow	12.62
Dividend Yield	4.60
Number of Equity Holdings	160
R-Squared (3 Year)	1.00
Alpha (3 Year)	-0.01%

Sector Allocation as of September 30, 2023

BASIC MATERIALS	0.00%
COMMUNICATION SERVICES	0.82%
CONSUMER CYCLICAL	0.00%
CONSUMER DEFENSIVE	0.00%
ENERGY	0.00%
FINANCIAL SERVICES	0.00%
HEALTHCARE	0.00%
INDUSTRIALS	0.00%
REAL ESTATE	99.17%
TECHNOLOGY	0.00%
UTILITIES	0.00%

Footnotes

- Select overseas (MFS/Harris) funds were transferred to EuroPacific Growth (American) on June 18, 2008. Select Diversified Value (Benstein) closed on July 1, 2009.
- NFJ Small Cap Value (Allianz) was funded on June 1, 2009.
- Small Cap Growth (Van Kampen) was funded on June 1, 2009.
- Large Cap Value (Eaton Vance) was funded on June 1, 2009.
- Balanced (Ultra Aggressive Journey) was funded on October 1, 2009.
- On July 15, 2010 the fund invested in the following funds:

Adv Dow Jones Target Today (Wells Fargo)	Dow Jones Target 2030
Dow Jones Target 2010	Dow Jones Target 2035
Dow Jones Target 2015	Dow Jones Target 2040
Dow Jones Target 2020	Dow Jones Target 2045
Dow Jones Target 2025	Dow Jones Target 2050
- The above Dow Jones Target funds replaced the Journey Funds previously held by the Fund.
- Small Cap Growth (Invesco Van Kampen) name changed to Small Cap Discovery (Invesco) SIA-RD for the 3Q 2012 report.
- Domestic equity (Select Sands/Delaware Growth Opportunities Fund), domestic equity (New Horizons - T. Rowe Price), domestic equity (Invesco Comstock A Load Waived), and domestic equity (Wells Fargo Advantage Special Mid Cap Value) were funded November 1, 2013.
- Investment grade fixed income (MetWest Total Return Bond Fund) replaced investment grade fixed income (Select PIMCO Total Return) on October 1, 2014.
- Investment grade fixed income (Stable Return II) closed on June 1, 2015 and was replaced with investment grade fixed income (Blended Stable Value Fund).
- During 1Q 2016, all assets from investment grade fixed income (Blended Stable Value) were transferred to investment grade fixed income (SAGIC Diversified Bond).
- During 1Q 2017, the fund invested in the following Funds:

Vanguard Target Retirement 2010 Fund	Vanguard Target Retirement 2040 Fund
Vanguard Target Retirement 2015 Fund	Vanguard Target Retirement 2045 Fund
Vanguard Target Retirement 2020 Fund	Vanguard Target Retirement 2050 Fund
Vanguard Target Retirement 2025 Fund	Vanguard Target Retirement 2055 Fund
Vanguard Target Retirement 2030 Fund	Vanguard Target Retirement 2060 Fund
Vanguard Target Retirement 2035 Fund	Vanguard Target Retirement Income Fund
- The above Vanguard Target Retirement Funds replaced the Dow Jones funds previously held by the Fund.

- During 1Q 2017, the following funds were removed from investment:

MM S&P 500 Index Fund	Invesco Comstock A Load Waived Fund
Select Sands/Delaware Growth Opportunities Fund	Wells Fargo Advantage Spec Md Cap Val Inv Fund
Sel Mid Cap Growth II Fund	NFJ Small Cap Value Fund
New Horizons - T. Rowe Price Fund	EuroPacific Growth Fund
- The above funds were replaced with the following Vanguard Funds:

Total Bond Market Index Fund	Small Cap Index Fund
500 Index Fund	Developed Markets Index Fund Admiral
Mid-Cap Index Fund	FTSE All-World ex-US Index Fund
- On July 21, 2017, balanced (Vanguard Target Retirement 2010) merged into balanced (Vanguard Target Retirement Income Fund).
- On October 1, 2018, high yield fixed income (Vanguard High-Yield Corporate Fund) was added to the Fund.
- On October 1, 2018, international equity (Vanguard FTSE All-World ex-US SmallCap Index) was added to the Fund.
- Effective June 26, 2019, international equity (Vanguard Index Funds) merged with international equity (Admiral Share Class), the merger had no impact on current values.
- Effective August 16, 2021, international equity (Vanguard FTSE All-World ex-US Index Fund Admiral) was eliminated and all assets were merged with international equity (Vanguard Developed Markets Index Fund Admiral).
- Effective August 16, 2021, balanced (Vanguard Target Retirement 2065 - Institutional) was added to the Fund.
- Effective August 16, 2021, emerging markets (Vanguard Emerging Markets Index Fund Admiral) was added to the Fund.
- Effective August 16, 2021, real estate (Vanguard Real Estate Index Fund Admiral) was added to the Fund.
- Effective August 16, 2021, all Vanguard Target Retirement Funds were converted to Institutional share class for fee savings.
- Effective February 11, 2022, the Vanguard Target Date Retirement Series implemented share class mergers in which the investment options Institutional Class shares became Investor Class shares. The merger had no impact on current values or the investment option's gross expense ratio.
- On July 8, 2022, target date funds (Vanguard Target Retirement 2015 - Investor) merged into target date funds (Vanguard Target Retirement Income Fund - Investor).

- On April 11, 2023, participant assets that were involved in error in the MassMutual US Govt Money Market Fund - Class R5 were transferred by the participant into domestic equity (Vanguard 500 Index Fund) and fixed income (Vanguard High-Yield Corporate Fund).
- Effective August 1, 2023, target date funds (Vanguard Target Retirement 2070 - Investor) was added to the Fund.
- Effective August 1, 2023, domestic equity (Vanguard Growth Index Fund Admiral Shares) was added to the Fund.
- Effective August 1, 2023, domestic equity (Vanguard Value Index Fund Admiral Shares) was added to the Fund.
- Benchmark indexes listed in report were identified by the recordkeeper, Empower and the fund company prospectus.
- Values, flows, and returns for all commingled funds, mutual funds, partnerships, and all other alternative assets are provided by the firm managing the assets and cannot be independently verified by IPS.
- The net of fees returns in this report are estimated. Fees do not include: The investment consulting fee paid to IPS, custodian fees, or other administrative costs.
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SECURE Act 2.0

The chart below is intended to outline the required provisions of The SECURE Act 2.0. Trustees should be aware of the effective dates and may want to work with counsel to enact any new Plan design changes accordingly.

Provision	Details	Effective Date
RMD penalties & corrections	Reduce the penalty for failing to take a minimum required distribution from 50% to 25%. If a correction is made within two years (subject to some limitations), the tax is further reduced to 10%.	1/1/2023
Required minimum distributions (RMDs) beginning age changes	Increases the age for required minimum distributions from 72 to 73 effective Jan. 1, 2023, and to 75 effective Jan. 1, 2033.	1/1/2023
Increase in force-out limit	Plans may cash out participants, involuntarily, with balances up to \$7,000. These balances must be rolled over to an IRA.	1/1/2024
In-plan Roth RMD	Eliminate the pre-death distribution requirement for in-plan Roth accounts.	1/1/2024
Increase in catch-up contribution limits	Individuals aged 60-63 may make catch-up contributions to the greater of \$10,000 or 150% of catch-up limit. This is indexed to inflation.	1/1/2025
Long-term, part-time employee eligible after 2 years	Long-Term Part-Time Employees, which are those who complete at least 500 hours of service in each of two consecutive 12-month periods, must be eligible to make elective deferrals.	1/1/2025
Annual paper benefit statement required	Participants may opt out of receiving paper statements if e-delivery is available.	1/1/2026
Catch-up Contributions – Roth requirements	Participants with prior year wages greater than \$145k (indexed to inflation) will only be able to make catch-up contributions with Roth accounts. Plans will need a Roth option.	1/1/2026

Glossary of Investment Terminology

Total Return	The annual return on an investment including appreciation, depreciation and income (interest, dividends, net operating income).
Alpha	The excess return (positive or negative) generated by active portfolio management and security selection, relative to a benchmark.
Beta	A historical measure of an investment's volatility relative to the market. The beta of the market is 1.0 (as represented by a benchmark such as the S&P 500 Index). A beta of greater than 1.0 indicates an investment with greater volatility than the benchmark. A beta of less than 1.0 indicates less volatility than the benchmark.
Standard Deviation	Standard deviation is a statistical measurement of the dispersion of a set of data from its mean. The more spread apart the data are, the greater the standard deviation.
Risk	For an investment portfolio, risk is typically defined as the volatility of the returns, as measured by calculating the standard deviation. The risk does not necessarily indicate the risk of loss, but does indicate the risk of inconsistent returns.
Capture Ratio	Calculates how well a manager performs in a rising or falling market as a percentage of a benchmark. In a rising market, a percentage of 100 or better is preferred, and indicates the manager exceeded the benchmark (upside capture ratio). In a falling market, a percentage of less than 100 is preferred, indicating that the manager lost less than the benchmark (downside capture ratio).
Correlation	A statistical measure of how two asset classes perform in relation to each other. Asset classes with a correlation of 1.0 have perfect positive correlation (exactly the same). Assets with perfect negative correlation of -1.0 will perform equally but in opposite directions.
Efficient Frontier	A series of portfolios with the maximum expected return for any level of risk, which is calculated based on assumptions of risk, return and correlation. These portfolios are shown graphically on a risk and return chart, and represent the most efficient tradeoff between risk and return.
Market Cap	The dollar value of a corporation, which is calculated by multiplying the share price and the number of outstanding shares.
Large Cap	Stocks which typically have a market capitalization of \$10 billion or higher.
Mid Cap	Stocks which typically have a market capitalization of \$2 to \$10 billion.
Small Cap	Stocks which typically have a market capitalization of \$2 billion or less.
Geometric Calculation	Geometric Calculations are used when determining an annualized investment return and tends to dampen the effect of very high or very low values. The result is a number that is smaller than (or equal to) the arithmetic average of the values.
Compound Annual Returns	Compound annual returns show the annual investment return, assuming the investment grew at a constant rate, and reflects the impact of the time in the calculation of an investment return.
Return/Risk Ratio	The return/risk ratio is the expected return of an investment divided by the expected standard deviation (risk). When comparing return/risk ratios a higher value is presumed to be better than a lower value

Disclaimer:

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EPIC

May 3-5, 2023

The following investment managers and providers attended and helped to defray the cost of IPS' annual conference EPIC. EPIC is an educational conference addressing various issues related to employee benefit plans. IPS does not give preferential treatment to investment managers or any other provider that pays to attend EPIC.

Amalgamated Bank of Chicago	GoldenTree Asset Management	Oaktree Capital Management
American Realty Advisors	Great Lakes Advisors	Old Glory Asset Management
Ares Management	Hamilton Lane Advisors	Partners Group
Aristotle	Hardman Johnston Global Advisors	Patriot Financial Partners
ASB Real Estate Investments	HPS Partners	PNC Capital Advisors
Atlanta Capital Management	Intercontinental Real Estate Corp.	Post Advisory Group
Barrow Hanley Global Investors	Invesco Advisers, Inc.	Principal Financial Group
BentallGreenOak	Janus Henderson Investors	Principal Life Insurance
BNY Mellon Asset Management (Mellon)	John Hancock	Raymond James Investment Management
Boston Partners Global Investors	JP Morgan Asset Management	Richmond Capital Mgmt
Boyd Watterson Asset Management	Kearney Capital LLC	Schroders Investment Management
Capital Group	Kelson Group	Segall Bryant & Hamill
Chartwell Investment Partners	Lazard Asset Management	Sierra Investment Partners
Christenson Investment Partners	Loomis, Sayles & Company	Smith Graham & Co.
Columbia Threadneedle Investments	Lord Abnett & Co.	State Street Global Advisors
Constitution Capital Equity Partners	LSV Asset Management	Stonepeak Partners
Corbin Capital Partners	Lyrical Asset Management	Ullico Investment Company
Earnest Partners	MacKay Shields	Vanguard
Empower	McMorgan & Company	Victory Capital Management
EnTrust Global	Manning & Napier	Vista Underwriting
Fidelity Investments	Manulife	Washington Capital Management
First Eagle Investment Mgmt.	Mesirow Private Equity	WEDGE Capital Management
Foundry Partners	National Investment Services	Wellington Management Company
Fred Alger Management	National Real Estate Investors	Westfield Capital Management
GAMCO Asset Management	Neuberger Berman	Westport Capital Partners
GCM Grosvenor	Northern Trust Asset Management	William Blair & Company
Glouston Capital Partners	Nuveen Investment Group	Xponance