

Investment Performance Review
Period Ending March 31, 2021

Retirement Board of Allegheny County

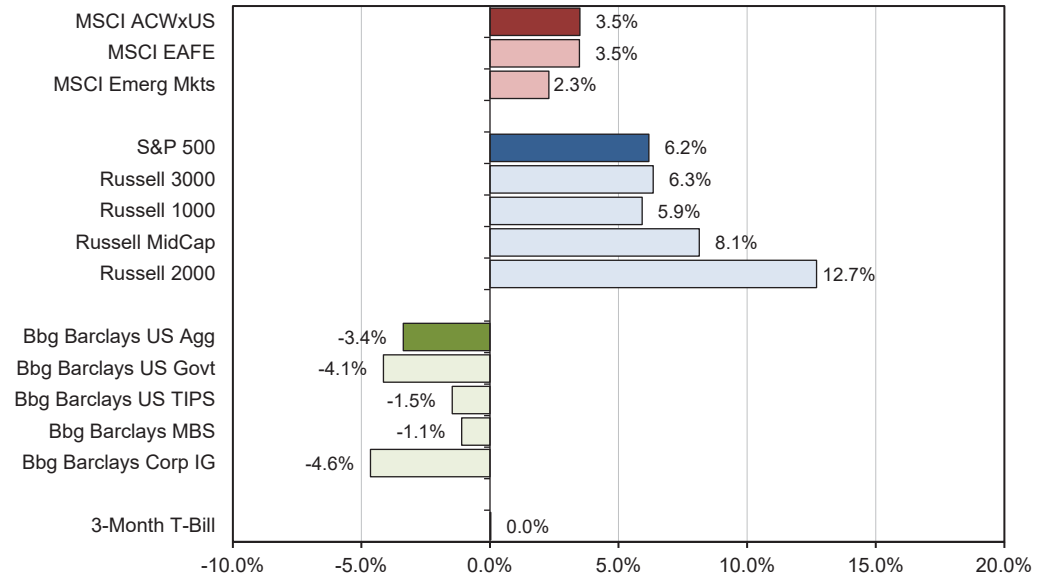


1st Quarter 2021 Market Environment

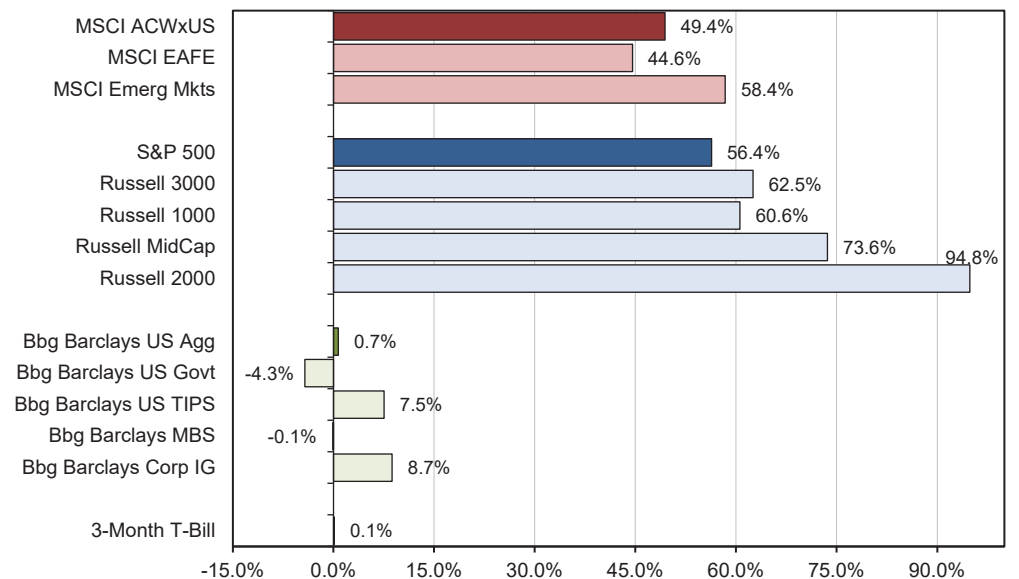


- Broad US equity markets produced positive returns for the 1st quarter of 2021. Performance during the period was largely driven by the effects of the American Rescue Plan (the 3rd round of US fiscal stimulus) and the growing deployment of COVID-19 vaccines. In March, President Biden signed the Plan into law providing an additional \$1.9 trillion of economic stimulus to the US which only served to bolster investors' optimism. As a result, for the 1st quarter, higher beta, small company stocks outperformed, returning 12.7% compared to 8.1% for mid-caps and 5.9% for large company stocks. The FDA also approved a third COVID-19 vaccine, a single dose treatment from Johnson & Johnson, for use. This approval created a better alignment of vaccine supply with countywide demand. The equity market has grown immensely over the past year as evidenced by the trailing 1-year chart which details the stellar rebound following a dramatic selloff in the 1st quarter of last year. Despite the sharp downturn at the onset of the pandemic, all broad US equity market indexes have rebounded and are trading at near-record levels. Most notably, domestic small cap stocks have returned 94.9% while US large caps returned 56.4% over the trailing 1-year period.
- Broad international equity markets also posted positive returns for the 1st quarter. Similar to US markets, a theme of optimism surrounding the outlook for global growth and demand drove performance. In the 1st quarter, the MSCI EAFE Index (3.5%) modestly outperformed the MSCI Emerging Markets Index (2.3%) as a strengthening US dollar created headwinds for emerging markets. This trend is reversed over the trailing 1-year period with the MSCI EAFE Index's return of 44.6%, underperforming the MSCI Emerging Markets Index return of 58.4%. While the European Union (EU) passed its largest-ever relief bill at the end of 2020, unlike the relief bills passed in the US, the EU benefits will take months to be dispersed through the economy. This delay most likely played a part in why the MSCI EAFE Index underperformed US markets in the 1st quarter.
- In contrast to equities, fixed income returns were negative during the 1st quarter as long-term interest rates rose and the yield curve noticeably steepened. However, despite this, the Fed reiterated its intent to keep short-term rates low based on the expectation that inflation will not exceed the average 2% target. For the quarter, the Bloomberg Barclays (BB) US Aggregate Index returned -3.4% driven by the underperformance in US Government (-4.1%) and Corporate Investment grade (-4.6%) bonds. For the 1-year period, while not comparable to equity market advances, Corporate Investment Grade credit proved to be an area of strength returning 8.7% and was closely followed by US TIPS returning 7.5%.

Quarter Performance



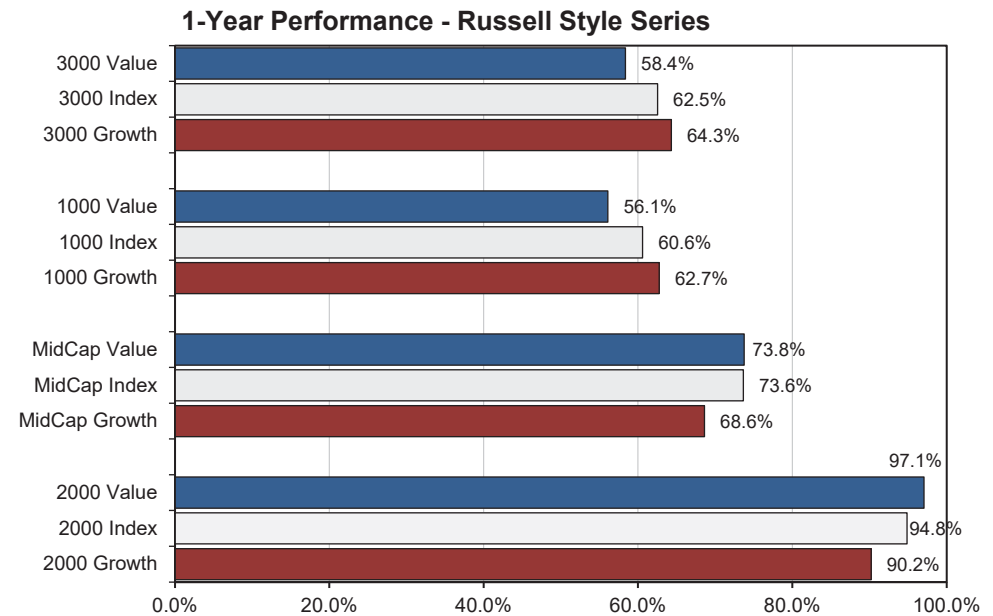
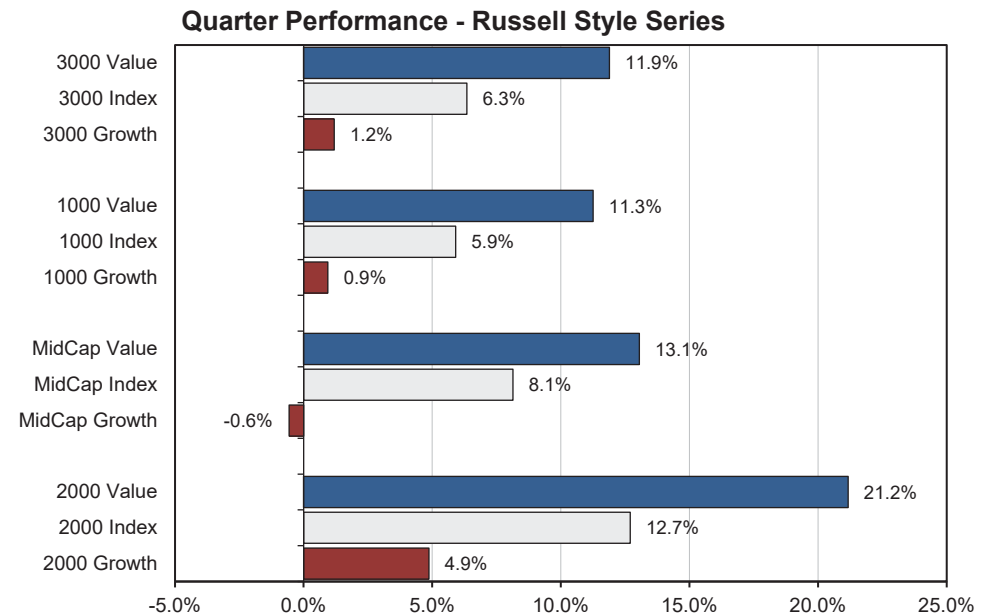
1-Year Performance



Source: Investment Metrics



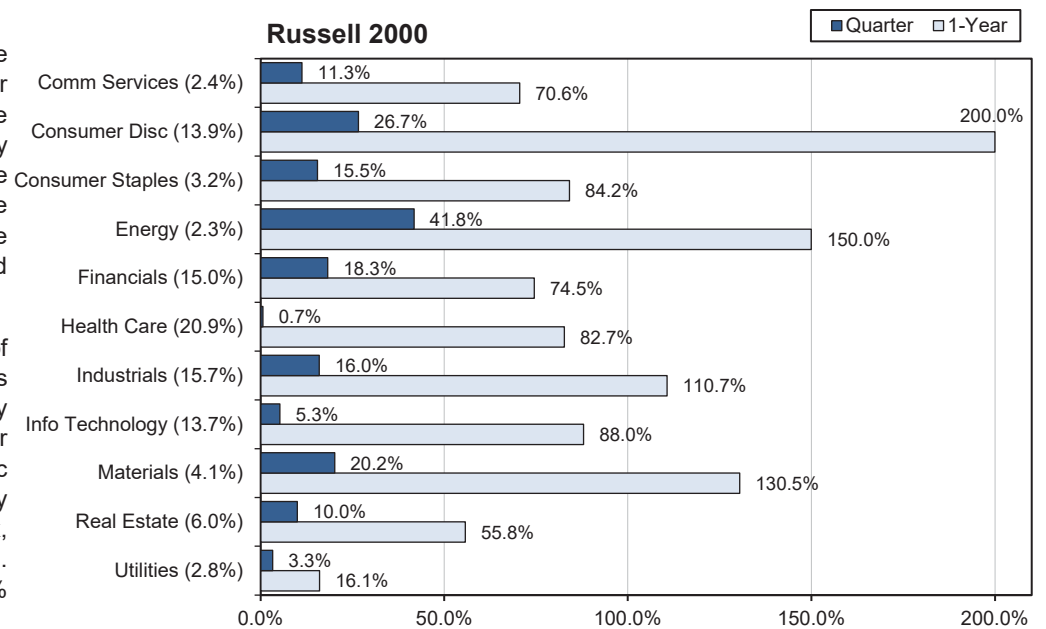
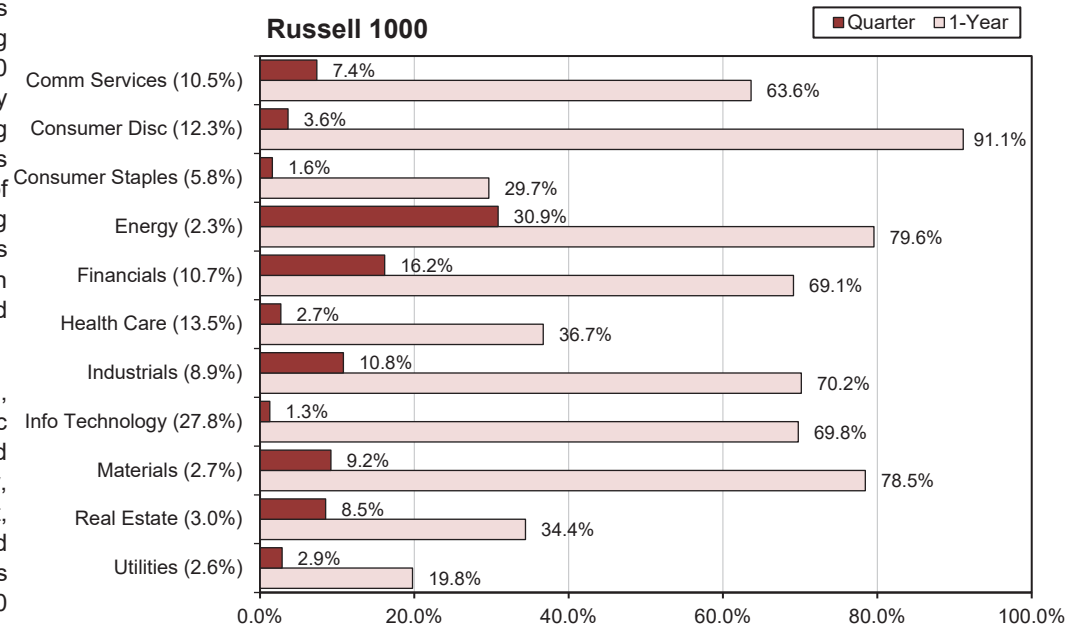
- Continuing their recent trend, the majority of US equities posted their 4th straight quarter of positive returns across both the style and market capitalization spectrums, with mid cap growth being the modestly negative outlier. During the quarter, small cap stocks outpaced both mid cap and large cap stocks as momentum related to vaccines and fiscal stimulus drove the market. The Russell 2000 Index returned a strong 12.7% compared to 8.1% for the Russell Mid Cap Index and 5.9% for the Russell 1000 Index.
- Value stocks outpaced growth stocks for the second consecutive quarter. Similar to the 4th quarter, the Russell 2000 Value Index was the best performing style index for the quarter with a return of 21.2%. While not as robust as small cap value, both the mid cap (13.1%) and large cap (11.3%) value benchmarks posted double-digit gains. In contrast, growth-oriented companies lagged value-oriented companies at each capitalization level. The widest performance dispersion occurred in small cap with a span of 16.3% separating the growth and value index returns. Beneath the headline index performance, the growth and value differentials are also observable across economic sector returns since the value benchmarks are more heavily weighted to sectors such as energy and financials, which led sector results, while growth indexes are dominated by their weights to technology and healthcare, which lagged.
- Following one of the sharpest drawdowns in history, stock returns were strongly positive over the trailing 1-year period across all styles and market capitalizations. Not surprisingly, higher beta, small cap stocks represented by the Russell 2000 produced an outsized return of 94.8%. While not as strong as small cap, performance in mid cap (73.6%) and large cap (60.6%) benchmarks was also extremely impressive over the trailing year. Despite more than a 30% dispersion between market capitalization performance over the trailing 1-year period, the difference between value and growth index results within each capitalization segment was much narrower. However, these style-based results do show how much value stocks have recovered relative to growth stocks in the recent quarter after lagging significantly following the onset of the pandemic.



Source: Investment Metrics



- Sector performance was positive across all eleven large cap economic sectors for the 1st quarter. Six sectors outpaced the return of the broad index during the period. The pro-cyclical rotation that began during the latter part of 2020 continued through the 1st quarter of 2021. Value-oriented sectors like energy and financials were some of the best performers for the quarter returning 30.9% and 16.2%, respectively. The energy sector experienced strong returns primarily due to rising energy prices resulting from increased expectations of economic growth and reduced supply. Financial stocks benefited from rising interest rates which acted as a tailwind to earnings. While all sectors experienced positive returns, consumer staples (1.6%) and information technology (1.3%) were significant laggards relative to their sector peers and the broad index results.
- Over the trailing 1-year period, large cap consumer discretionary (91.1%), energy (79.6%), and materials (78.5%) were the best performing economic sectors. For the full year, seven sectors exceeded the return of the broad benchmark: communication services, consumer discretionary, energy, financials, industrials, information technology, and materials. In contrast, sectors that were less impacted by COVID-19 such as consumer staples and utilities posted solid, but lower, returns for the trailing 1-year period. It is astonishing to observe that the weakest economic sector in the Russell 1000 for the trailing year, utilities, still managed to produce a strong return of 19.8%.
- Similar to large cap stocks, all eleven small cap sectors posted positive performance for the recent quarter and seven of them posted returns greater than the Russell 2000 Index. The index was led higher by strength in the energy sector, which returned 41.8% for the quarter. Consumer discretionary stocks also performed well during the period, returning 26.7%. Some of the sector's absolute performance for the quarter can be partially attributed to the "Reddit-fueled" individual investor trading frenzy that took place in stocks like GameStop (+907.5%) and AMC Entertainment (+223.1%) which experienced significant positive performance and volatility.
- Small cap stocks significantly outperformed large cap across the majority of economic sectors for the trailing 1-year period. While large cap sector returns were impressive, small cap performance within the consumer discretionary (200.0%) and energy (150.0%) sectors were simply amazing. Consumer discretionary's outsized performance is mainly attributable to the economic recovery seen throughout 2020- multiple stimulus injections into the economy and investor confidence in the progress on vaccines. Like the large cap index, the bottom performing sector in the small cap benchmark was utilities (16.1%). This sector performance produced a staggering dispersion of more than 180% from the best to the worst-performing sector in the Russell 2000.



Source: Morningstar Direct
 As a result of the GICS classification changes on 9/28/2018 and certain associated reporting limitations, sector performance represents backward looking performance for the prior year of each sector's current constituency, post creation of the Communication Services sector.



The Market Environment
Top 10 Index Weights & Quarterly Performance for the Russell 1000 & 2000
As of March 31, 2021

Top 10 Weighted Stocks				
Russell 1000	Weight	1-Qtr Return	1-Year Return	Sector
Apple Inc	5.15%	-7.8%	93.6%	Information Technology
Microsoft Corp	4.70%	6.2%	51.0%	Information Technology
Amazon.com Inc	3.49%	-5.0%	58.7%	Consumer Discretionary
Facebook Inc A	1.88%	7.8%	76.6%	Communication Services
Alphabet Inc A	1.65%	17.7%	77.5%	Communication Services
Alphabet Inc Class C	1.60%	18.1%	77.9%	Communication Services
Tesla Inc	1.36%	-5.3%	537.3%	Consumer Discretionary
Berkshire Hathaway Inc Class B	1.28%	10.2%	39.7%	Financials
JPMorgan Chase & Co	1.23%	20.7%	75.4%	Financials
Johnson & Johnson	1.15%	5.1%	28.7%	Health Care

Top 10 Weighted Stocks				
Russell 2000	Weight	1-Qtr Return	1-Year Return	Sector
Penn National Gaming Inc	0.58%	21.4%	728.8%	Consumer Discretionary
Caesars Entertainment Inc	0.56%	17.7%	507.3%	Consumer Discretionary
Plug Power Inc	0.52%	5.7%	912.4%	Industrials
Darling Ingredients Inc	0.42%	27.6%	283.8%	Consumer Staples
Novavax Inc	0.39%	62.6%	1235.1%	Health Care
GameStop Corp Class A	0.38%	907.5%	5323.4%	Consumer Discretionary
Lithia Motors Inc Class A	0.36%	33.4%	379.8%	Consumer Discretionary
Sunrun Inc	0.34%	-12.8%	498.8%	Industrials
Builders FirstSource Inc	0.33%	13.6%	279.1%	Industrials
RH	0.33%	33.3%	493.8%	Consumer Discretionary

Top 10 Performing Stocks (by Quarter)				
Russell 1000	Weight	1-Qtr Return	1-Year Return	Sector
Upstart Holdings Inc Ordinary Shares	0.00%	216.2%	N/A	Financials
TripAdvisor Inc	0.01%	86.9%	209.3%	Communication Services
Williams-Sonoma Inc	0.04%	76.7%	331.6%	Consumer Discretionary
Teradata Corp	0.01%	71.5%	88.1%	Information Technology
Coherent Inc	0.02%	68.6%	137.7%	Information Technology
Signature Bank	0.03%	67.7%	187.3%	Financials
L Brands Inc	0.04%	66.3%	435.1%	Consumer Discretionary
Marathon Oil Corp	0.02%	60.6%	227.4%	Energy
Cimarex Energy Co	0.02%	59.0%	263.0%	Energy
Continental Resources Inc	0.01%	58.7%	238.6%	Energy

Top 10 Performing Stocks (by Quarter)				
Russell 2000	Weight	1-Qtr Return	1-Year Return	Sector
GameStop Corp Class A	0.38%	907.5%	5323.4%	Consumer Discretionary
Cassava Sciences Inc	0.05%	559.1%	993.7%	Health Care
AMC Entmt Holdings Inc Class A	0.14%	381.6%	223.1%	Communication Services
Express, Inc.	0.01%	341.8%	169.8%	Consumer Discretionary
Pandion Therapeutics Inc Ord Shrs	0.03%	304.4%	N/A	Health Care
Evolus Inc	0.01%	286.6%	213.0%	Health Care
Immunome Inc Ordinary Shares	0.00%	250.0%	N/A	Health Care
Rubius Therapeutics Inc	0.03%	249.1%	495.5%	Health Care
The ExOne Co	0.02%	230.5%	390.8%	Industrials
Amyris Inc	0.07%	209.3%	646.1%	Materials

Bottom 10 Performing Stocks (by Quarter)				
Russell 1000	Weight	1-Qtr Return	1-Year Return	Sector
Sarepta Therapeutics Inc	0.01%	-56.3%	-23.8%	Health Care
C3.ai Inc Ordinary Shares - Class A	0.00%	-52.5%	N/A	Information Technology
ACADIA Pharmaceuticals Inc	0.01%	-51.7%	-38.9%	Health Care
Berkeley Lights Inc Ordinary Shares	0.00%	-43.8%	N/A	Health Care
Unity Software Inc Ordinary Shares	0.01%	-34.6%	N/A	Information Technology
Adaptive Biotechnologies Corp	0.01%	-31.9%	44.9%	Health Care
Alteryx Inc Class A	0.01%	-31.9%	-12.8%	Information Technology
Iovance Biotherapeutics Inc	0.01%	-31.8%	5.8%	Health Care
American Well Corp Ord Shrs - Class A	0.00%	-31.4%	N/A	Health Care
Array Technologies Inc Ord Shares	0.01%	-30.9%	N/A	Industrials

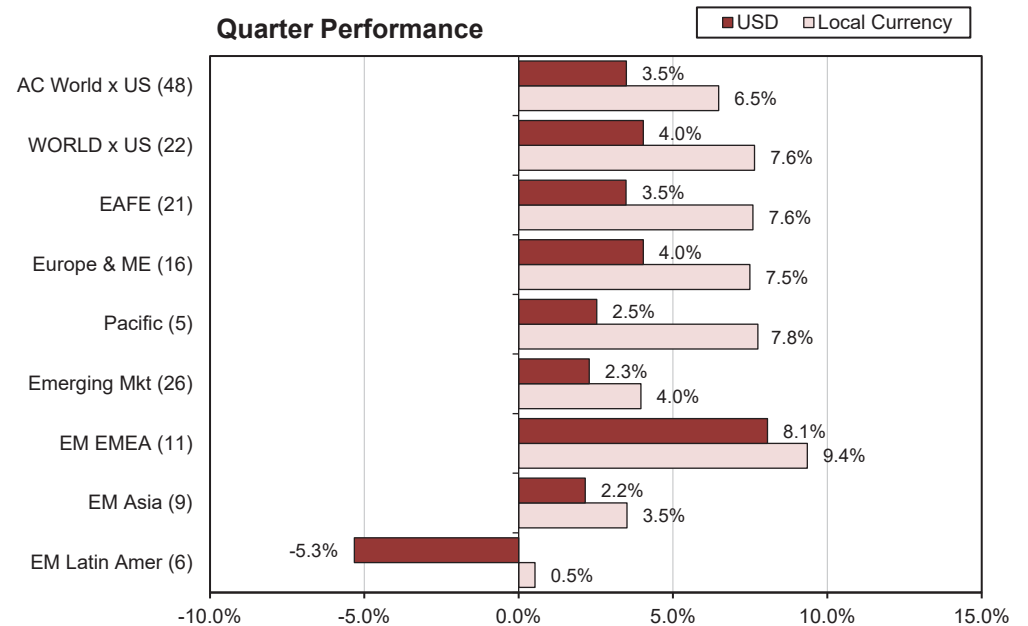
Bottom 10 Performing Stocks (by Quarter)				
Russell 2000	Weight	1-Qtr Return	1-Year Return	Sector
Odonate Therapeutics Inc	0.00%	-82.2%	-87.6%	Health Care
Graybug Vision Inc Ordinary Shares	0.00%	-80.9%	N/A	Health Care
Frequency Therapeutics Inc	0.01%	-73.1%	-46.7%	Health Care
Immunovant Inc	0.02%	-65.3%	3.1%	Health Care
Imara Inc Ordinary Shares	0.00%	-61.7%	-47.3%	Health Care
Athenex Inc	0.01%	-61.1%	-44.4%	Health Care
Concert Pharmaceuticals Inc	0.01%	-60.5%	-43.6%	Health Care
Amicus Therapeutics Inc	0.09%	-57.2%	6.9%	Health Care
Oncorus Inc Ordinary Shares	0.00%	-56.9%	N/A	Health Care
Acutus Medical Inc Ordinary Shares	0.01%	-53.6%	N/A	Health Care

Source: Morningstar Direct



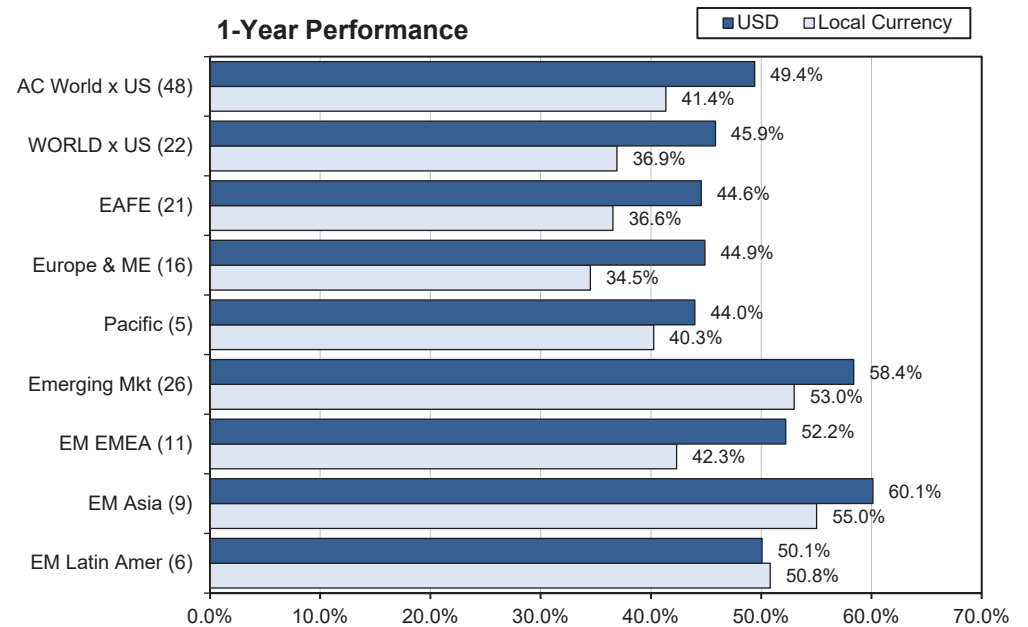
- Nearly all broad international equity indexes the chart tracks posted positive returns in both US dollar (USD) and local currency terms for the 1st quarter. Much like the trend seen in the US equity markets, international benchmarks benefited from the optimism surrounding the continued roll-out of COVID-19 vaccines. Fiscal and monetary stimulus also remained supportive throughout the Eurozone, UK, and Japan in the 1st quarter and benefited from the rebound in demand for global goods. For the period, developed markets outperformed emerging markets in both USD and local currency. The MSCI EAFE Index returned 3.5% in USD and 7.6% in local currency terms for the period while the MSCI Emerging Markets Index returned a lower 2.2% in USD and 3.5% in local currency terms. The performance of both broad international benchmarks faced headwinds from currency conversion as the USD strengthened relative to most major developed currencies and thus led to lower USD results. During the 1st quarter, the only regional index component that had negative performance was EM Latin American. This region's -5.3% return was largely driven by the negative performance of Columbia (-17.2%) and Brazil (-10.0%) during the period.

Quarter Performance



- The trailing 1-year results for international developed and emerging markets were positive across all regions and currencies. The MSCI EAFE Index returned 44.6% in USD and 36.6% in local currency terms, while the MSCI Emerging Markets Index returned 58.4% in USD and 53.0% in local currency terms. Like last quarter, performance within the emerging markets was led by Asian countries with the EM Asia Index region returning 60.1% in USD.

1-Year Performance



Source: MSCI Global Index Monitor (Returns are Net)



The Market Environment
US Dollar International Index Attribution & Country Detail
As of March 31, 2021

MSCI - EAFE	Sector Weight	Quarter Return	1-Year Return
Communication Services	5.2%	3.9%	42.6%
Consumer Discretionary	12.8%	5.8%	67.3%
Consumer Staples	10.3%	-2.6%	19.0%
Energy	3.3%	10.6%	25.6%
Financials	17.3%	9.7%	54.1%
Health Care	12.0%	-3.9%	17.4%
Industrials	15.5%	5.4%	58.9%
Information Technology	9.0%	2.4%	59.8%
Materials	8.0%	5.2%	73.3%
Real Estate	3.1%	2.5%	31.8%
Utilities	3.7%	-2.6%	28.2%
Total	100.0%	3.5%	44.6%

MSCI - ACWixUS	Sector Weight	Quarter Return	1-Year Return
Communication Services	7.1%	4.9%	45.2%
Consumer Discretionary	13.7%	2.2%	65.5%
Consumer Staples	8.4%	-2.5%	22.0%
Energy	4.5%	9.6%	36.3%
Financials	18.9%	8.4%	50.0%
Health Care	8.9%	-3.8%	22.2%
Industrials	11.8%	5.2%	57.9%
Information Technology	12.8%	3.5%	82.3%
Materials	8.2%	5.4%	76.2%
Real Estate	2.6%	3.5%	28.9%
Utilities	3.2%	-1.3%	28.4%
Total	100.0%	3.5%	49.4%

MSCI - Emerging Mkt	Sector Weight	Quarter Return	1-Year Return
Communication Services	11.7%	5.6%	48.9%
Consumer Discretionary	17.7%	-3.1%	61.5%
Consumer Staples	5.6%	-2.8%	34.1%
Energy	4.8%	2.8%	44.6%
Financials	18.2%	3.2%	37.4%
Health Care	4.5%	-4.6%	59.4%
Industrials	4.3%	2.7%	49.9%
Information Technology	20.9%	4.7%	103.9%
Materials	8.1%	9.1%	96.5%
Real Estate	2.2%	5.9%	20.2%
Utilities	2.0%	1.8%	30.4%
Total	100.0%	2.3%	58.4%

Country	MSCI-EAFE Weight	MSCI-ACWixUS Weight	Quarter Return	1-Year Return
Japan	24.8%	15.5%	1.6%	39.7%
United Kingdom	14.3%	8.9%	6.2%	33.5%
France	11.1%	7.0%	4.4%	50.0%
Germany	9.5%	5.9%	4.2%	59.3%
Switzerland	9.2%	5.7%	-2.0%	23.7%
Australia	7.0%	4.4%	3.4%	68.4%
Netherlands	4.2%	2.6%	11.2%	74.0%
Sweden	3.6%	2.3%	11.3%	75.2%
Hong Kong	3.4%	2.1%	7.3%	37.3%
Italy	2.5%	1.6%	6.3%	53.0%
Spain	2.4%	1.5%	1.0%	36.9%
Denmark	2.4%	1.5%	-3.0%	51.6%
Singapore	1.1%	0.7%	8.9%	40.3%
Finland	1.0%	0.6%	-1.4%	46.8%
Belgium	0.9%	0.6%	-2.6%	32.8%
Ireland	0.7%	0.5%	5.3%	63.1%
Norway	0.6%	0.4%	11.0%	63.5%
Israel	0.6%	0.4%	-0.3%	40.0%
New Zealand	0.3%	0.2%	-10.6%	28.2%
Austria	0.2%	0.1%	9.3%	85.1%
Portugal	0.2%	0.1%	-4.3%	26.1%
Total EAFE Countries	100.0%	62.4%	3.5%	44.6%
Canada		6.7%	9.6%	59.3%
Total Developed Countries		68.8%	15.9%	7.6%
China		11.7%	-0.4%	43.6%
Taiwan		4.3%	10.9%	93.2%
Korea		4.1%	1.6%	89.5%
India		3.0%	5.1%	76.4%
Brazil		1.4%	-10.0%	46.5%
South Africa		1.2%	12.1%	80.5%
Russia		1.0%	4.9%	44.3%
Saudi Arabia		0.9%	16.5%	54.4%
Thailand		0.6%	4.3%	39.1%
Mexico		0.5%	4.2%	58.5%
Malaysia		0.4%	-5.8%	20.8%
Indonesia		0.4%	-7.6%	40.6%
Qatar		0.2%	2.4%	20.8%
Philippines		0.2%	-10.6%	27.2%
Poland		0.2%	-7.5%	29.0%
Chile		0.2%	16.9%	66.2%
United Arab Emirates		0.2%	15.1%	56.5%
Turkey		0.1%	-20.4%	3.8%
Peru		0.1%	-10.6%	32.6%
Hungary		0.1%	0.4%	45.4%
Colombia		0.1%	-17.2%	33.4%
Argentina		0.0%	-6.0%	74.7%
Czech Republic		0.0%	5.5%	64.8%
Greece		0.0%	1.5%	35.3%
Egypt		0.0%	-4.0%	2.1%
Pakistan		0.0%	0.1%	37.8%
Total Emerging Countries		30.7%	2.3%	58.4%
Total ACWixUS Countries		100.0%	3.5%	49.4%

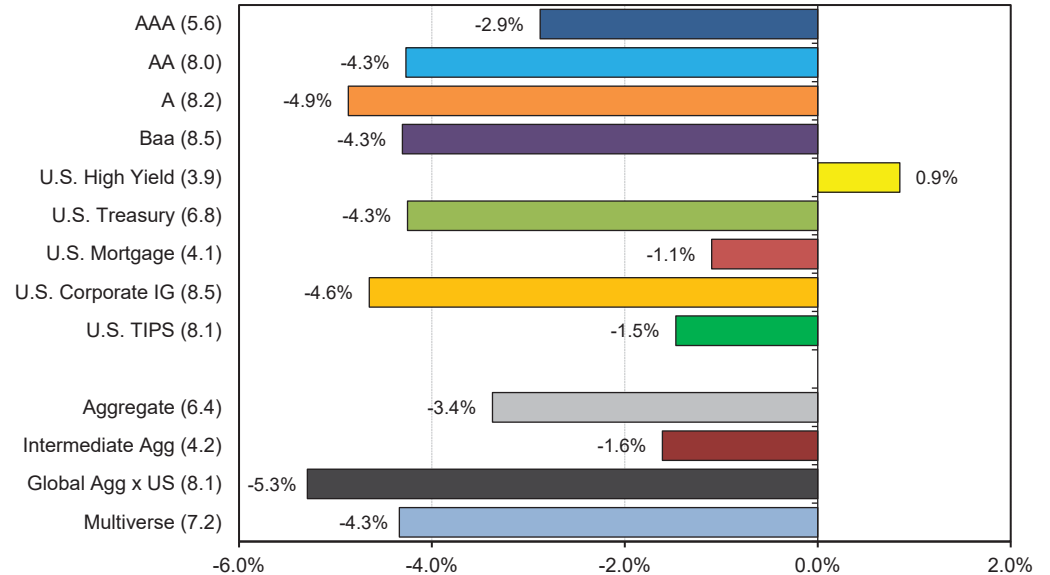
Source: Morningstar Direct, MSCI Global Index Monitor (Returns are Net in USD)
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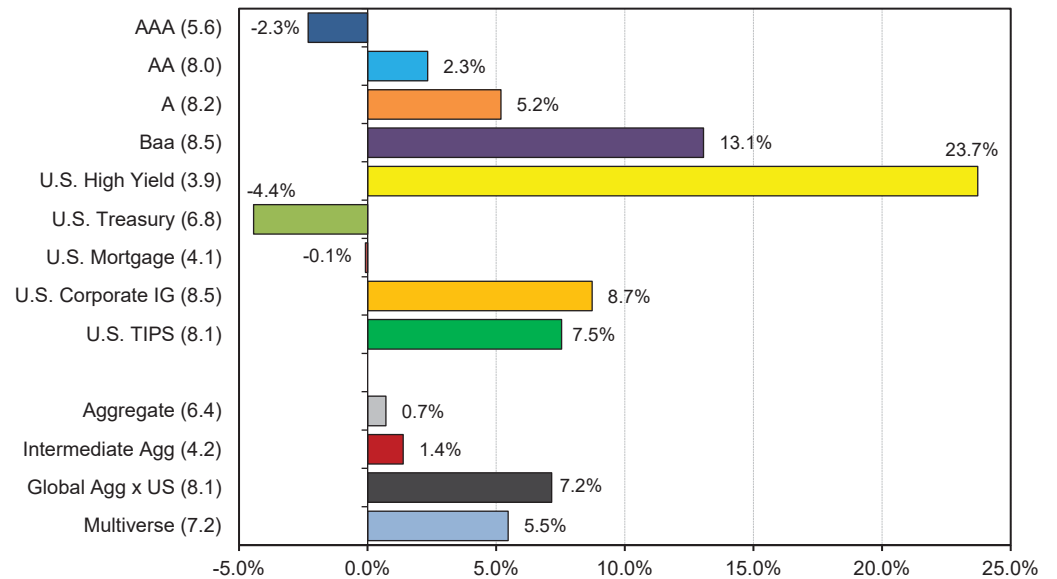
- Fixed income markets declined sharply during the 1st quarter primarily due to rising interest rates which acted as a drag on bond benchmark performance. The Bloomberg Barclays (BB) US Aggregate Bond Index returned -3.4% for the period. Digging deeper into the investment grade index's segments, while each component was negative, the US Treasury (-4.3%) and US Corporate Investment Grade (-4.6%) segments drove the results. Although yields on issues of less than 2-years declined during the quarter, yields on longer-dated issues rose substantially as the term to maturity increased. Notably, US High Yield (non-investment grade) was the only benchmark tracked on the chart to produce a positive result, adding 0.9% for the quarter. High yield bonds generally have a shorter duration compared to either US Treasury or US investment grade corporate bonds, and as such, are less affected by rising interest rates. Importantly, credit spreads also continued to decline during the period which acted as an additional tailwind for high yield issues. Outside of domestic markets, the BB Global Aggregate ex US Index posted a -5.3% return for the quarter. Like international stocks, global bonds were negatively impacted by the strengthening USD. Also notable was the revision in quality's performance in the 1st quarter relative to the previous three quarters. BBB rated credit (-4.3%) underperformed AAA (-2.9%) issues by 1.4%. In contrast, over the trailing 1-year period, BBB issues (13.1%) outpaced AAA issues (-2.3%) by a sizable margin.

- Over the trailing 1-year period, domestic bonds performance was small but positive while global bonds posted solid results. The BB Global Aggregate ex US Index return of 7.2% easily outpaced the domestic BB US Aggregate Index's return of 0.7%. A steepening yield curve, combined with a falling USD, were the primary contributors to the relative outperformance of global bonds. Results for the year were split beneath the headline performance of the BB US Aggregate Index with the US Corporate Investment Grade segment returning 8.7% and the US Treasury segment returning -4.4%. The US High Yield Index's return of 23.7% was a positive outlier in fixed income for the 1-year period. High Yield issues likely benefited both from narrowing of credit spreads as well as capital appreciation following the pandemic's economic shock during the 1st quarter of 2020.

Quarter Performance



1-Year Performance

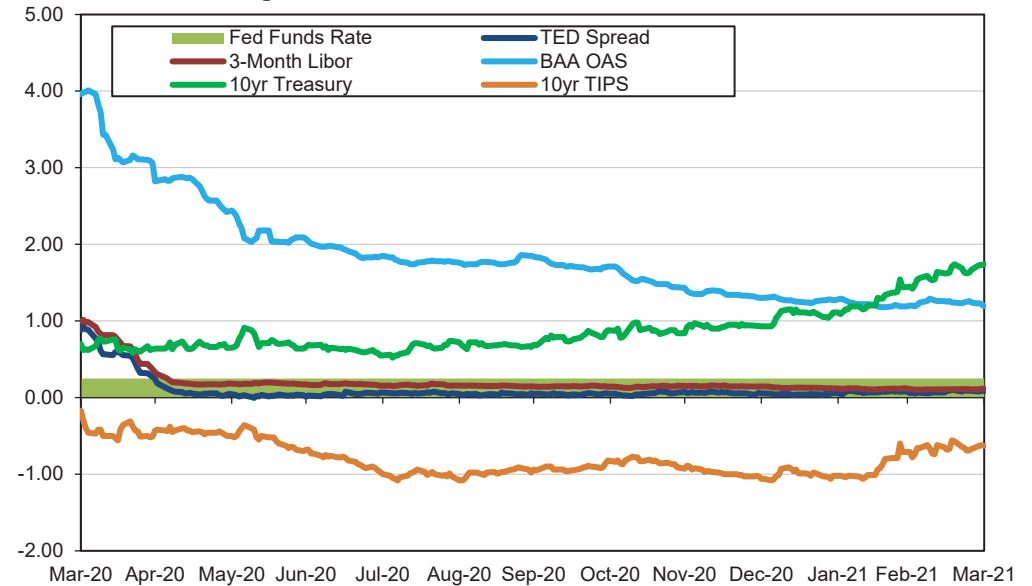


Source: Bloomberg

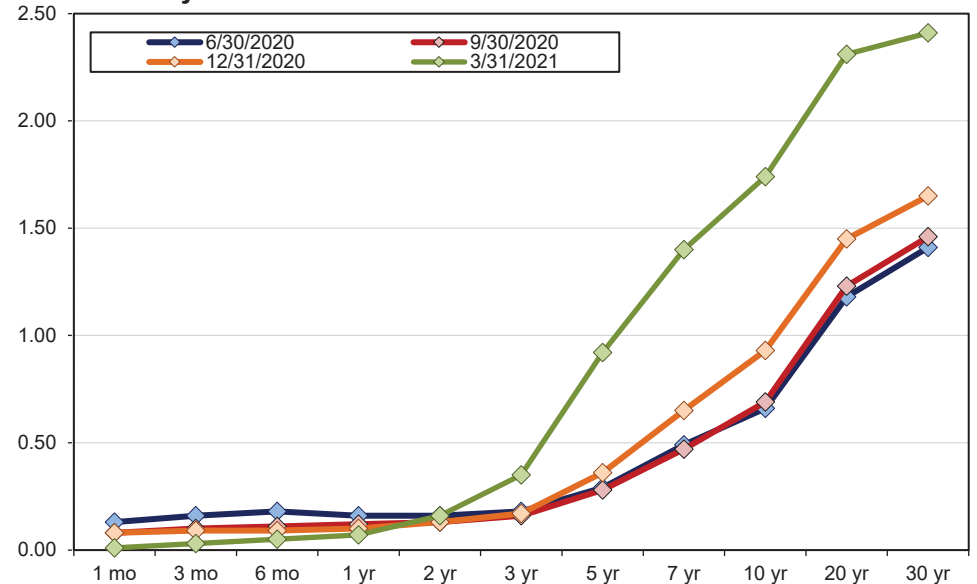


- Much of the index performance detailed in the bar graphs on the previous page is visible on a time series basis in the yield graph to the right. The “1-Year Trailing Market Rates” chart illustrates that throughout 2020 the US 10-year Treasury (green line) stayed between 0.5% and 1.0% but began increasing rapidly at the beginning of 2021, reaching a high of 1.74% during the 1st quarter of 2021. At the start of 2020, US interest rates declined significantly following the onset of the pandemic and the response from the US Federal Reserve Bank (Fed) to lower rates back near zero. 2021’s acceleration in longer-term rates is due to an increase in investor expectations of stronger economic growth and inflation concerns over the continued issuance of new Treasury bonds by the government to fund stimulus. The blue line illustrates changes in the BAA OAS (Option Adjusted Spread). This measure quantifies the additional yield premium that investors require to purchase and hold non-Treasury investment grade issues. The line illustrates the normalization in credit spreads following the substantial widening at the onset of the pandemic. Credit spreads continued their steady decline through the 1st quarter as concerns over corporate defaults subsided. The green band across the graph illustrates the Fed Funds Rate. Over the past year, the Fed’s target rate range has remained unchanged at 0.00% - 0.25%. During its March meeting, the Federal Open Market Committee (FOMC) upgraded its projections for the US economy in 2021 but vowed to keep interest rates near zero while also maintaining its asset purchasing measures aimed at supplying the market with liquidity.
- The lower graph provides a snapshot of the US Treasury yield curve at the end of each of the last four quarters. Beginning in the 4th quarter of 2020, longer-term interest rates began to move higher as investors’ optimism improved. This trend continued through the 1st quarter. Short term interest rates, primarily those under two years, fell modestly while all long-term rates increased. The combination of additional fiscal stimulus, higher expected economic growth, and inflation concerns all contributed to higher long-term rates. The 10-year Treasury ended the quarter at 1.74%, more in line with pre-pandemic levels, compared to 0.52% at its lowest point in 2020 and 0.93% at the beginning of 2021.

1-Year Trailing Market Rates



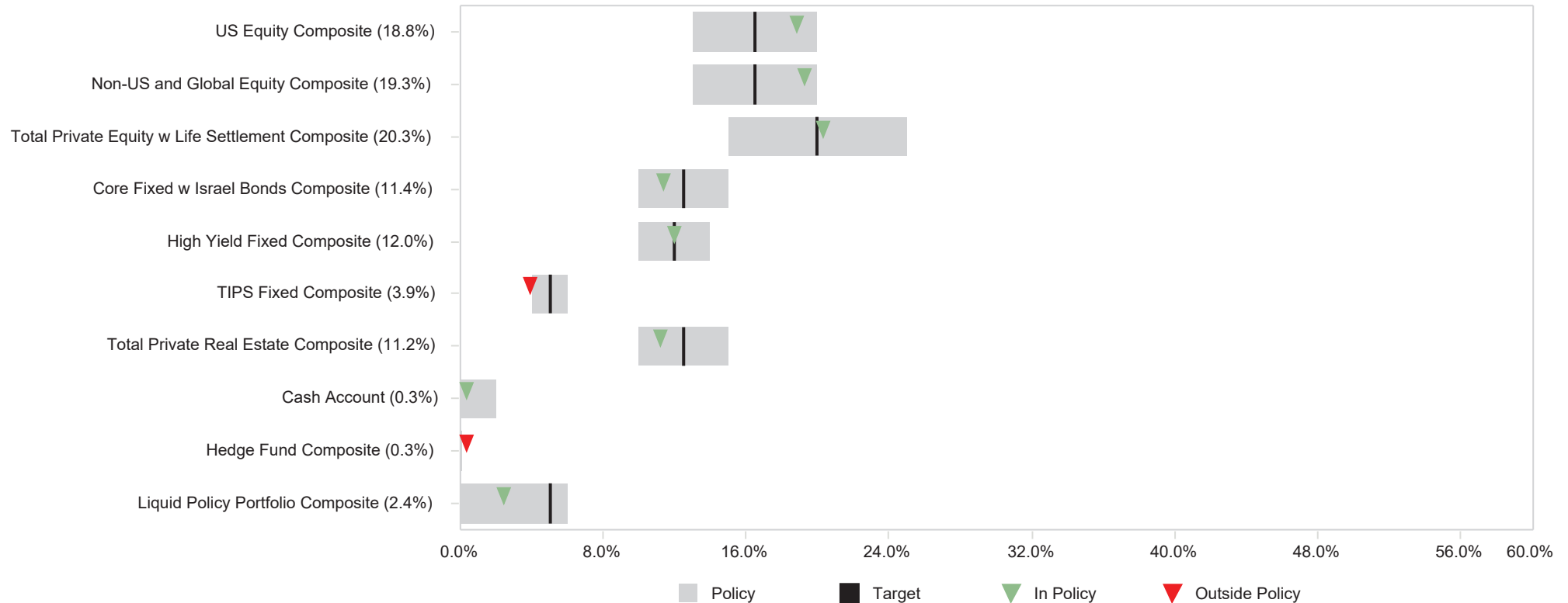
Treasury Yield Curve



Source: US Department of Treasury, FRED (Federal Reserve of St. Louis)



Executive Summary



Asset Allocation Compliance

	Asset Allocation \$	Current Allocation (%)	Minimum Allocation (%)	Maximum Allocation (%)	Target Allocation (%)
Total Fund	1,026,559,068	100.0	N/A	N/A	100.0
US Equity Composite	193,392,476	18.8	13.0	20.0	16.5
Non-US and Global Equity Composite	197,681,892	19.3	13.0	20.0	16.5
Total Private Equity w Life Settlement Composite	208,670,707	20.3	15.0	25.0	20.0
Core Fixed w Israel Bonds Composite	117,106,627	11.4	10.0	15.0	12.5
High Yield Fixed Composite	123,315,767	12.0	10.0	14.0	12.0
TIPS Fixed Composite	39,942,901	3.9	4.0	6.0	5.0
Total Private Real Estate Composite	115,019,323	11.2	10.0	15.0	12.5
Cash Account	3,402,921	0.3	0.0	2.0	0.0
Hedge Fund Composite	3,212,734	0.3	0.0	0.0	0.0
Liquid Policy Portfolio Composite	24,814,935	2.4	0.0	6.0	5.0

Asset Allocation includes assets of the Emerging, Minority, and Women owned Investment Manager Program. The Investment Policy Statement for the Retirement Board of Allegheny County allows for the Pension's asset allocation to temporarily fall outside of the stated policy ranges due to market fluctuations and the Pension's short-term cash flow needs. Recommendations are provided by the Pension's investment consultant regarding rebalancing of the Pension's asset allocation.



**Historical Asset Allocation
Total Fund**

As of March 31, 2021

Asset Allocation Attributes	Mar-2021		Dec-2020		Sep-2020		Jun-2020	
	(\$)	%	(\$)	%	(\$)	%	(\$)	%
	Total Fund	1,026,559,068	100.00	1,001,478,345	100.00	941,004,689	100.00	914,329,050
US Equity Composite	193,392,476	18.84	181,142,494	18.09	160,476,974	17.05	152,596,374	16.69
SSgA S&P 500 Index	104,550,326	10.18	98,460,158	9.83	89,758,272	9.54	85,256,129	9.32
Fragasso Large Core (EMWO)	6,304,002	0.61	5,996,108	0.60	5,374,197	0.57	4,908,395	0.54
Twin Capital Enhanced Equity	35,891,029	3.50	33,584,600	3.35	31,142,461	3.31	28,717,384	3.14
Earnest Small Value	16,519,815	1.61	14,500,459	1.45	11,188,602	1.19	11,238,228	1.23
Emerald Advisors Small Cap	15,541,396	1.51	15,151,956	1.51	11,976,361	1.27	12,304,143	1.35
Emerald Advisors All Cap (EMWO)	5,790,127	0.56	5,444,391	0.54	4,631,369	0.49	4,032,609	0.44
Ethos (EMWO)	1,975,837	0.19	1,823,352	0.18	1,523,095	0.16	1,416,830	0.15
CIM Small Cap (EMWO)	6,084,398	0.59	5,447,095	0.54	4,230,724	0.45	4,094,362	0.45
Cookson Peirce (EMWO)	735,546	0.07	734,375	0.07	651,892	0.07	628,293	0.07
Non US Equity Composite	196,273,748	19.12	189,635,847	18.94	170,406,775	18.11	157,712,009	17.25
SSgA ACWI ex US	37,847,078	3.69	36,545,346	3.65	33,176,262	3.53	31,218,398	3.41
Baillie Gifford Intl Equity	81,978,998	7.99	80,665,762	8.05	75,061,570	7.98	68,730,842	7.52
FIAM Select International Equity	41,842,836	4.08	40,473,954	4.04	34,508,081	3.67	32,240,232	3.53
Segall, Bryant & Hamill	34,604,835	3.37	31,950,784	3.19	27,660,862	2.94	25,522,537	2.79
Global Equity Composite	1,408,144	0.14	1,363,614	0.14	1,202,415	0.13	1,121,495	0.12
Columbus Macro (EMWO)	1,408,144	0.14	1,363,614	0.14	1,202,415	0.13	1,121,495	0.12
Core Fixed w Israel Bonds Composite	117,106,627	11.41	99,499,112	9.94	99,133,118	10.53	98,142,252	10.73
C S McKee	38,446,030	3.75	34,682,571	3.46	34,471,981	3.66	34,108,211	3.73
Federated Core Broad	34,528,279	3.36	30,268,451	3.02	29,768,091	3.16	29,339,966	3.21
CIM Investment Mgmt	23,636,469	2.30	13,950,130	1.39	13,899,925	1.48	13,816,745	1.51
StoneRidge Partners (EMWO)	5,458,158	0.53	5,557,249	0.55	6,189,972	0.66	6,421,363	0.70
Gridiron Capital Fixed Income (EMWO)	4,809,185	0.47	4,746,562	0.47	4,457,249	0.47	4,294,677	0.47
FNB (EMWO)	2,803,123	0.27	2,844,296	0.28	2,824,114	0.30	2,802,149	0.31
Israel Bonds	7,425,382	0.72	7,449,854	0.74	7,521,788	0.80	7,359,141	0.80
High Yield Fixed Composite	123,315,767	12.01	122,026,649	12.18	115,189,754	12.24	110,149,769	12.05
Oaktree High Yield	66,645,039	6.49	66,100,725	6.60	62,205,149	6.61	59,454,759	6.50
Federated High Yield	53,158,302	5.18	52,490,844	5.24	49,725,242	5.28	47,580,256	5.20
Sound Point	3,512,425	0.34	3,435,080	0.34	3,259,363	0.35	3,114,755	0.34
TIPS Fixed Composite	39,942,901	3.89	40,538,874	4.05	39,894,926	4.24	38,717,790	4.23
MCM TIPS	39,942,901	3.89	40,538,874	4.05	39,894,926	4.24	38,717,790	4.23



**Historical Asset Allocation
Total Fund**

As of March 31, 2021

	Mar-2021		Dec-2020		Sep-2020		Jun-2020	
	(\$)	%	(\$)	%	(\$)	%	(\$)	%
Real Estate Composite	104,803,678	10.21	103,565,303	10.34	102,119,746	10.85	100,929,333	11.04
Morgan Stanley Prime Property Fund	74,490,799	7.26	73,097,605	7.30	72,035,433	7.66	71,277,021	7.80
Oaktree Real Estate	6,948,844	0.68	6,955,225	0.69	7,002,697	0.74	7,035,603	0.77
Washington Alliance (EMWO)	12,824,195	1.25	12,824,195	1.28	12,672,926	1.35	11,753,894	1.29
Washington Alliance II (EMWO)	1,236,379	0.12	1,236,379	0.12	836,723	0.09	983,333	0.11
Siguler Guff Distressed RE	9,303,460	0.91	9,451,899	0.94	9,571,966	1.02	9,879,482	1.08
ERECT Composite	10,215,645	1.00	9,912,474	0.99	9,851,930	1.05	9,718,261	1.06
ERECT Fund II	10,215,645	1.00	9,912,474	0.99	9,851,930	1.05	9,718,261	1.06
Private Equity Composite	193,691,775	18.87	185,755,110	18.55	183,395,139	19.49	176,478,580	19.30
Life Settlement Composite	14,978,933	1.46	24,077,840	2.40	27,514,291	2.92	27,589,153	3.02
Hedge Fund Composite	3,212,734	0.31	3,061,813	0.31	2,762,835	0.29	2,672,965	0.29
Gridiron Capital Multi-Asset (EMWO)	3,212,566	0.31	3,061,645	0.31	2,762,667	0.29	2,630,126	0.29
Liquid Policy Portfolio Composite	24,814,935	2.42	-	0.00	-	0.00	-	0.00
BlackRock Liquidity iShares Public Pension Fund	24,814,935	2.42	-	0.00	-	0.00	-	0.00
Cash Account	3,402,921	0.33	15,036,468	1.50	3,746,580	0.40	10,303,809	1.13



Financial Reconciliation	Market Value 01/01/2021	Net Flows	Income	Return On Investment	Market Value 03/31/2021
Total Fund	1,001,478,345	-9,200,863	-600,786	37,967,303	1,026,559,068
SSgA S&P 500 Index	98,460,158	5,627	-	6,090,168	104,550,326
Fragasso Large Core (EMWO)	5,996,108	8,374	-3,227	307,894	6,304,002
Twin Capital Enhanced Equity	33,584,600	30,185	-20,150	2,306,429	35,891,029
Earnest Small Value	14,500,459	31,091	-11,334	2,019,357	16,519,815
Emerald Advisors Small Cap	15,151,956	28,312	-56,295	389,440	15,541,396
Emerald Advisors All Cap (EMWO)	5,444,391	8,600	4,151	345,736	5,790,127
Ethos (EMWO)	1,823,352	-	-	152,485	1,975,837
CIM Small Cap (EMWO)	5,447,095	9,303	-4,237	637,303	6,084,398
Cookson Peirce (EMWO)	734,375	925	-279	1,171	735,546
US Equity Composite	181,142,494	122,417	-91,371	12,249,982	193,392,476
SSgA ACWI ex US	36,545,346	6,738	-	1,301,732	37,847,078
Baillie Gifford Intl Equity	80,665,762	-	-	1,313,236	81,978,998
FIAM Select International Equity	40,473,954	-	-	1,368,882	41,842,836
Segall, Bryant & Hamill	31,950,784	53,123	-	2,654,051	34,604,835
Non US Equity Composite	189,635,847	59,860	-	6,637,901	196,273,748
Columbus Macro (EMWO)	1,363,614	2,547	-22	44,531	1,408,144
Global Equity Composite	1,363,614	2,547	-22	44,531	1,408,144
C S McKee	34,682,571	5,022,106	-229,676	-1,236,540	38,446,030
Federated Core Broad	30,268,451	5,020,394	-135,686	-740,171	34,528,279
CIM Investment Mgmt	13,950,130	10,008,719	-80,962	-313,661	23,636,469
StoneRidge Partners (EMWO)	5,557,249	2,771	-34,550	-99,091	5,458,158
Gridiron Capital Fixed Income (EMWO)	4,746,562	7,789	-6,351	62,623	4,809,185
FNB (EMWO)	2,844,296	2,475	-	-41,172	2,803,123
Israel Bonds	7,449,854	3,707	-	-24,472	7,425,382
Core Fixed w Israel Bonds Composite	99,499,112	20,067,963	-487,225	-2,392,485	117,106,627
Oaktree High Yield	66,100,725	-	-	635,048	66,645,039
Federated High Yield	52,490,844	-	-	667,459	53,158,302
Sound Point	3,435,080	-	-	77,345	3,512,425
High Yield Fixed Composite	122,026,649	-	-	1,379,852	123,315,767
MCM TIPS	40,538,874	3,682	-	-595,973	39,942,901
TIPS Fixed Composite	40,538,874	3,682	-	-595,973	39,942,901



Financial Reconciliation
Total Fund
1 Quarter Ending March 31, 2021

	Market Value 01/01/2021	Net Flows	Income	Return On Investment	Market Value 03/31/2021
Morgan Stanley Prime Property Fund	73,097,605	-	-	1,393,195	74,490,799
Oaktree Real Estate	6,955,225	-	-	206,358	6,948,844
Washington Alliance (EMWO)	12,824,195	-	-	-	12,824,195
Washington Alliance II (EMWO)	1,236,379	-	-	-	1,236,379
Siguler Guff Distressed RE	9,451,899	-148,439	-	-	9,303,460
Real Estate Composite	103,565,303	-148,439	-	1,599,553	104,803,678
ERECT Composite	9,912,474	-	-	303,171	10,215,645
Private Equity Composite	185,755,110	-4,366,357	-	15,407,568	193,691,775
Life Settlement Composite	24,077,840	-9,398,680	-	299,772	14,978,933
Gridiron Capital Multi-Asset (EMWO)	3,061,645	20,405	-5,020	150,921	3,212,566
Maplewood (EMWO)	168	-	-	-	168
Hedge Fund Composite	3,061,813	20,405	-5,020	150,921	3,212,734
BlackRock Liquidity iShares Public Pension Fund	-	24,296,155	-	518,780	24,814,935
Liquid Policy Portfolio Composite	-	24,296,151	-	518,784	24,814,935
MLP Composite	25,862,747	-28,221,151	-17,149	2,357,189	-1,215
Cash Account	15,036,468	-11,639,260	-	6,539	3,402,921



Financial Reconciliation	Market Value 01/01/2021	Net Flows	Income	Return On Investment	Market Value 03/31/2021
Total Fund	1,001,478,345	-9,200,863	-600,786	37,967,303	1,026,559,068
SSgA S&P 500 Index	98,460,158	5,627	-	6,090,168	104,550,326
Fragasso Large Core (EMWO)	5,996,108	8,374	-3,227	307,894	6,304,002
Twin Capital Enhanced Equity	33,584,600	30,185	-20,150	2,306,429	35,891,029
Earnest Small Value	14,500,459	31,091	-11,334	2,019,357	16,519,815
Emerald Advisors Small Cap	15,151,956	28,312	-56,295	389,440	15,541,396
Emerald Advisors All Cap (EMWO)	5,444,391	8,600	4,151	345,736	5,790,127
Ethos (EMWO)	1,823,352	-	-	152,485	1,975,837
CIM Small Cap (EMWO)	5,447,095	9,303	-4,237	637,303	6,084,398
Cookson Peirce (EMWO)	734,375	925	-279	1,171	735,546
US Equity Composite	181,142,494	122,417	-91,371	12,249,982	193,392,476
SSgA ACWI ex US	36,545,346	6,738	-	1,301,732	37,847,078
Baillie Gifford Intl Equity	80,665,762	-	-	1,313,236	81,978,998
FIAM Select International Equity	40,473,954	-	-	1,368,882	41,842,836
Segall, Bryant & Hamill	31,950,784	53,123	-	2,654,051	34,604,835
Non US Equity Composite	189,635,847	59,860	-	6,637,901	196,273,748
Columbus Macro (EMWO)	1,363,614	2,547	-22	44,531	1,408,144
Global Equity Composite	1,363,614	2,547	-22	44,531	1,408,144
C S McKee	34,682,571	5,022,106	-229,676	-1,236,540	38,446,030
Federated Core Broad	30,268,451	5,020,394	-135,686	-740,171	34,528,279
CIM Investment Mgmt	13,950,130	10,008,719	-80,962	-313,661	23,636,469
StoneRidge Partners (EMWO)	5,557,249	2,771	-34,550	-99,091	5,458,158
Gridiron Capital Fixed Income (EMWO)	4,746,562	7,789	-6,351	62,623	4,809,185
FNB (EMWO)	2,844,296	2,475	-	-41,172	2,803,123
Israel Bonds	7,449,854	3,707	-	-24,472	7,425,382
Core Fixed w Israel Bonds Composite	99,499,112	20,067,963	-487,225	-2,392,485	117,106,627
Oaktree High Yield	66,100,725	-	-	635,048	66,645,039
Federated High Yield	52,490,844	-	-	667,459	53,158,302
Sound Point	3,435,080	-	-	77,345	3,512,425
High Yield Fixed Composite	122,026,649	-	-	1,379,852	123,315,767
MCM TIPS	40,538,874	3,682	-	-595,973	39,942,901
TIPS Fixed Composite	40,538,874	3,682	-	-595,973	39,942,901

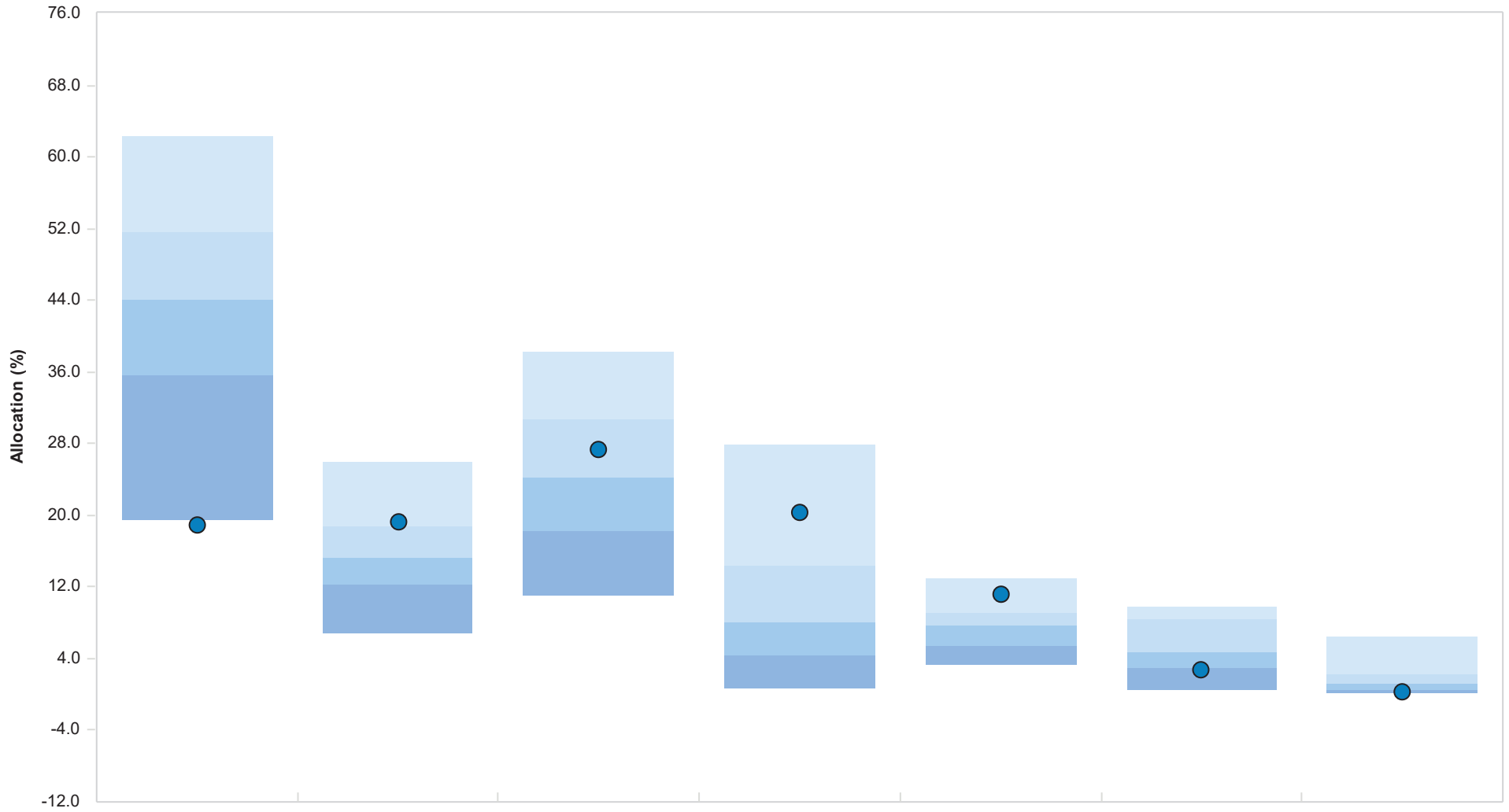


Financial Reconciliation
Total Fund
Year To Date Ending March 31, 2021

	Market Value 01/01/2021	Net Flows	Income	Return On Investment	Market Value 03/31/2021
Morgan Stanley Prime Property Fund	73,097,605	-	-	1,393,195	74,490,799
Oaktree Real Estate	6,955,225	-	-	206,358	6,948,844
Washington Alliance (EMWO)	12,824,195	-	-	-	12,824,195
Washington Alliance II (EMWO)	1,236,379	-	-	-	1,236,379
Siguler Guff Distressed RE	9,451,899	-148,439	-	-	9,303,460
Real Estate Composite	103,565,303	-148,439	-	1,599,553	104,803,678
ERECT Composite	9,912,474	-	-	303,171	10,215,645
Private Equity Composite	185,755,110	-4,366,357	-	15,407,568	193,691,775
Life Settlement Composite	24,077,840	-9,398,680	-	299,772	14,978,933
Gridiron Capital Multi-Asset (EMWO)	3,061,645	20,405	-5,020	150,921	3,212,566
Maplewood (EMWO)	168	-	-	-	168
Hedge Fund Composite	3,061,813	20,405	-5,020	150,921	3,212,734
BlackRock Liquidity iShares Public Pension Fund	-	24,296,155	-	518,780	24,814,935
Liquid Policy Portfolio Composite	-	24,296,151	-	518,784	24,814,935
MLP Composite	25,862,747	-28,221,151	-17,149	2,357,189	-1,215
Cash Account	15,036,468	-11,639,260	-	6,539	3,402,921



Plan Sponsor TF Asset Allocation vs. All Public DB Plans



	US Equity	Global ex-US Equity	US Fixed	Alternatives	Total Real Estate	Global TAA	Cash & Equivalents
● Total Fund	18.84 (96)	19.26 (24)	27.31 (35)	20.33 (11)	11.20 (11)	2.73 (78)	0.33 (85)
5th Percentile	62.36	25.98	38.27	27.91	12.88	9.86	6.39
1st Quartile	51.65	18.69	30.70	14.34	9.13	8.37	2.15
Median	44.03	15.22	24.10	8.03	7.67	4.70	1.10
3rd Quartile	35.58	12.17	18.24	4.25	5.47	2.99	0.51
95th Percentile	19.51	6.86	11.06	0.67	3.22	0.43	0.10



Asset Allocation & Performance	Allocation		Performance(%)							
	Market Value \$	%	MTH	QTR	YTD	1 YR	3 YR	5 YR	Inception	Inception Date
Total Fund	1,026,559,068	100.0	1.71	3.44	3.44	25.80	8.16	8.95	7.56	12/1993
Total Fund Policy Index			1.78	3.65	3.65	27.70	8.85	9.02	7.68	
US Equity Composite	193,392,476	18.8	3.62	6.69	6.69	61.80	16.22	16.26	9.59	11/1993
Wilshire 5000 Total Market TR Index			3.67	6.49	6.49	62.23	17.18	16.71	10.28	
Non US Equity Composite	196,273,748	19.1	1.07	3.47	3.47	57.45	7.95	11.40	5.87	01/2001
Non US Equity Policy Index			1.26	3.66	3.66	51.78	6.48	9.82	4.75	
Global Equity Composite	1,408,144	0.1	0.65	3.08	3.08	42.69	6.87	9.11	6.55	12/2014
MSCI AC World Index (Net)			2.67	4.57	4.57	54.60	12.07	13.21	9.58	
Core Fixed w Israel Bonds Composite*	117,106,627	11.4	-0.66	-2.35	-2.35	4.16	5.09	3.51	6.91	01/1983
Blmbg. Barc. U.S. Aggregate Index			-1.25	-3.38	-3.38	0.71	4.65	3.10	6.93	
High Yield Fixed Composite	123,315,767	12.0	0.29	1.06	1.06	22.16	5.95	7.10	6.93	04/2008
FTSE High Yield Market Capped Index			0.33	0.94	0.94	22.96	6.19	7.67	7.32	
TIPS Fixed Composite	39,942,901	3.9	-0.18	-1.48	-1.48	7.55	5.68	4.25	3.60	04/2008
Bloomberg Barclays U.S. TIPS Index			-0.19	-1.47	-1.47	7.54	5.68	3.86	3.55	
Real Estate Composite	104,803,678	10.2	1.35	1.34	1.34	2.98	6.16	7.24	8.43	04/2003
NCREIF Fund Index-ODCE (VW) (Net)			1.91	1.91	1.91	1.50	3.97	5.26	6.75	
ERECT Composite	10,215,645	1.0	3.06	3.06	3.06	5.90	7.95	7.05	6.89	09/2010
CPI - All Urban Consumers (SA)			0.62	1.24	1.24	2.64	2.00	2.15	1.86	
Total Private Equity w Life Settlement Composite*	208,670,707	20.3	3.31	6.45	6.45	12.94	11.30	10.87	7.23	04/2003
Total Private Equity Policy Index			3.82	6.98	6.98	13.50	11.49	10.98	7.26	
Hedge Fund Composite	3,212,734	0.3	1.44	4.26	4.26	32.68	5.47	5.42	2.43	04/2003
90 Day T-Bill Index + 3%			0.25	0.77	0.77	3.12	4.53	4.21	4.31	
Liquid Policy Portfolio Composite	24,814,935	2.4	1.92	N/A	N/A	N/A	N/A	N/A	1.92	03/2021
Liquid Policy Benchmark			1.99	N/A	N/A	N/A	N/A	N/A	1.99	
Cash Account	3,402,921	0.3	0.10	0.11	0.11	0.23	1.54	1.22	0.74	01/2012
90 Day U.S. Treasury Bill			0.01	0.02	0.02	0.12	1.49	1.18	0.66	

* All returns prior to March 2021 are from the original Core Fixed Composite and the Private Equity Composite, respectively. All returns from March 2021 and forward are from the composites inclusive of the Israel Bonds and Life Settlement funds, respectively



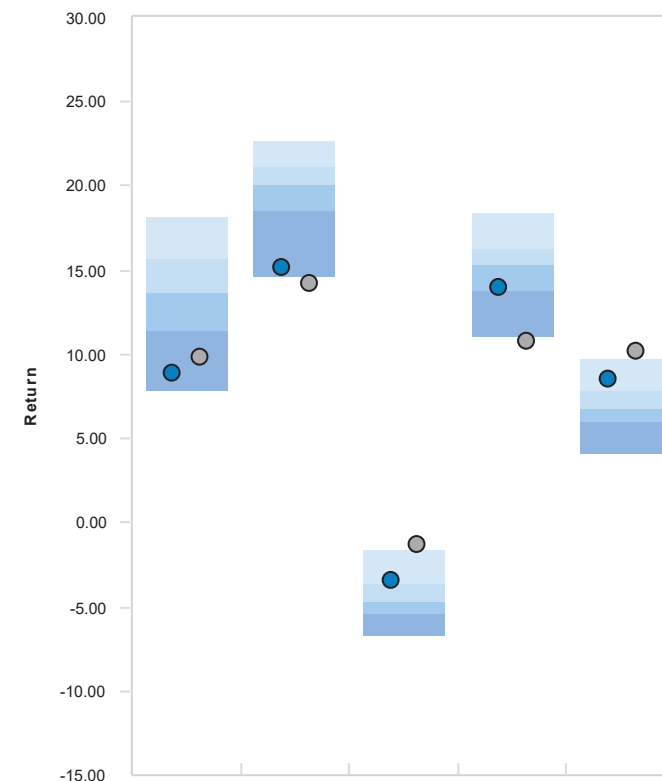
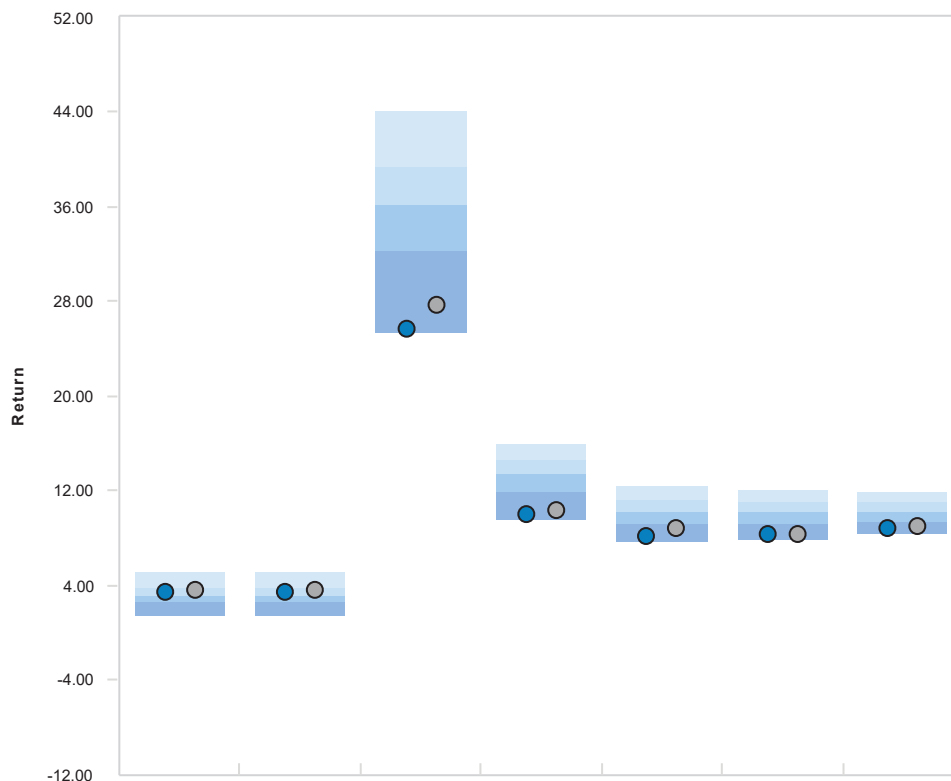
Asset Allocation & Performance	Allocation		Performance(%)						
	Market Value \$	%	QTR	YTD	1 YR	3 YR	5 YR	Inception	Inception Date
Total Fund	1,026,559,068	100.0	3.44	3.44	25.80	8.16	8.95	7.56	12/1993
Total Fund Policy Index			3.65	3.65	27.70	8.85	9.02	7.68	
US Equity Composite	193,392,476	18.8	6.69	6.69	61.80	16.22	16.26	9.59	11/1993
Wilshire 5000 Total Market TR Index			6.49	6.49	62.23	17.18	16.71	10.28	
SSgA S&P 500 Index	104,550,326	10.2	6.18	6.18	56.52	16.83	16.34	9.60	11/2007
S&P 500 Index			6.17	6.17	56.35	16.78	16.29	9.55	
Fragasso Large Core (EMWO)	6,304,002	0.6	4.98	4.98	48.75	15.89	15.02	13.32	09/2012
S&P 500 Index			6.17	6.17	56.35	16.78	16.29	15.17	
Twin Capital Enhanced Equity	35,891,029	3.5	6.78	6.78	54.09	15.01	14.91	9.89	01/2006
S&P 500 Index			6.17	6.17	56.35	16.78	16.29	10.14	
Earnest Small Value	16,519,815	1.6	13.70	13.70	84.13	13.55	15.97	14.97	06/2009
Russell 2000 Value Index			21.17	21.17	97.05	11.57	13.56	13.31	
Emerald Advisors Small Cap	15,541,396	1.5	2.38	2.38	87.58	18.11	19.32	12.35	11/2004
Russell 2000 Growth Index			4.88	4.88	90.20	17.16	18.61	11.10	
Emerald Advisors All Cap (EMWO)	5,790,127	0.6	6.19	6.19	94.21	26.18	24.90	20.91	10/2015
Russell 3000 Growth Index			1.19	1.19	64.31	22.39	20.87	20.37	
Ethos (EMWO)	1,975,837	0.2	8.36	8.36	73.67	19.41	N/A	18.43	08/2016
S&P 500 Index			6.17	6.17	56.35	16.78	16.29	16.04	
CIM Small Cap (EMWO)	6,084,398	0.6	11.53	11.53	83.84	11.48	13.44	8.76	01/2014
Russell 2000 Index			12.70	12.70	94.85	14.76	16.35	10.82	
Cookson Peirce (EMWO)	735,546	0.1	0.03	0.03	47.83	N/A	N/A	18.49	12/2018
Russell 3000 Index			6.35	6.35	62.53	17.12	16.64	19.91	
Non US Equity Composite	196,273,748	19.1	3.47	3.47	57.45	7.95	11.40	5.87	01/2001
Non US Equity Policy Index			3.66	3.66	51.78	6.48	9.82	4.75	
SSgA ACWI ex US	37,847,078	3.7	3.54	3.54	50.07	7.69	9.87	5.94	05/2015
MSCI AC World ex USA (Net)			3.49	3.49	49.41	6.51	9.76	5.56	
Baillie Gifford Intl Equity	81,978,998	8.0	1.63	1.63	62.29	12.42	15.05	10.79	08/2009
MSCI AC World ex USA (Net)			3.49	3.49	49.41	6.51	9.76	6.58	

	Allocation		Performance(%)							Inception Date
	Market Value \$	%	QTR	YTD	1 YR	3 YR	5 YR	Inception		
FIAM Select International Equity	41,842,836	4.1	3.38	3.38	54.45	7.90	10.26	5.23	01/2001	
FIAM Policy Index			3.49	3.49	49.41	6.51	9.76	4.67		
Segall, Bryant & Hamill	34,604,835	3.4	8.14	8.14	56.27	-1.47	5.86	4.54	05/2015	
MSCI EAFE Small Cap (net) Index			4.50	4.50	61.98	6.32	10.50	8.55		
Global Equity Composite	1,408,144	0.1	3.08	3.08	42.69	6.87	9.11	6.55	12/2014	
MSCI AC World Index (Net)			4.57	4.57	54.60	12.07	13.21	9.58		
Columbus Macro (EMWO)	1,408,144	0.1	3.08	3.08	42.69	6.87	9.11	6.55	12/2014	
MSCI AC World Index (Net)			4.57	4.57	54.60	12.07	13.21	9.58		
Core Fixed w Israel Bonds Composite*	117,106,627	11.4	-2.35	-2.35	4.16	5.09	3.51	6.91	01/1983	
Blmbg. Barc. U.S. Aggregate Index			-3.38	-3.38	0.71	4.65	3.10	6.93		
C S McKee	38,446,030	3.7	-3.14	-3.14	2.94	5.00	3.32	7.29	01/1983	
Blmbg. Barc. U.S. Aggregate Index			-3.38	-3.38	0.71	4.65	3.10	6.93		
Federated Core Broad	34,528,279	3.4	-2.36	-2.36	5.86	6.24	4.67	5.05	09/2006	
Blmbg. Barc. U.S. Aggregate Index			-3.38	-3.38	0.71	4.65	3.10	4.22		
CIM Investment Mgmt	23,636,469	2.3	-1.90	-1.90	1.15	4.05	2.38	3.35	11/2005	
Bloomberg Barclays Intermediate US Govt/Credit Idx			-1.86	-1.86	2.01	4.36	2.75	3.75		
StoneRidge Partners (EMWO)	5,458,158	0.5	-1.83	-1.83	0.09	3.14	2.36	2.46	08/2015	
StoneRidge Policy Index			-1.93	-1.93	3.89	4.65	3.09	3.15		
Gridiron Capital Fixed Income (EMWO)	4,809,185	0.5	1.16	1.16	16.80	6.02	N/A	4.39	02/2017	
Blmbg. Barc. U.S. Aggregate Index			-3.38	-3.38	0.71	4.65	3.10	3.78		
FNB (EMWO)	2,803,123	0.3	-1.53	-1.53	3.49	4.16	N/A	3.03	07/2017	
Bloomberg Barclays Intermed Aggregate Index			-1.61	-1.61	1.38	4.17	2.66	3.21		
Israel Bonds	7,425,382	0.7	-0.38	-0.38	2.39	2.80	1.97	2.78	01/2012	
High Yield Fixed Composite	123,315,767	12.0	1.06	1.06	22.16	5.95	7.10	6.93	04/2008	
FTSE High Yield Market Capped Index			0.94	0.94	22.96	6.19	7.67	7.32		
Oaktree High Yield	66,645,039	6.5	0.82	0.82	21.81	5.01	6.28	6.55	04/2008	
FTSE High Yield Market Capped Index			0.94	0.94	22.96	6.19	7.67	7.32		
Federated High Yield	53,158,302	5.2	1.27	1.27	22.53	7.32	N/A	6.10	07/2017	
Blmbg. Barc. U.S. High Yield - 2% Issuer Cap			0.86	0.86	23.65	6.82	8.04	5.86		

* All returns prior to March 2021 are from the original Core Fixed Composite. All returns March 2021 and forward are from the composite inclusive of the Israel Bonds.

	Allocation		Performance(%)						
	Market Value \$	%	QTR	YTD	1 YR	3 YR	5 YR	Inception	Inception Date
Sound Point	3,512,425	0.3	2.25	2.25	23.15	3.70	5.06	4.53	08/2013
Credit Suisse Leveraged Loan Index			2.01	2.01	20.77	4.13	5.33	4.15	
TIPS Fixed Composite	39,942,901	3.9	-1.48	-1.48	7.55	5.68	4.25	3.60	04/2008
Bloomberg Barclays U.S. TIPS Index			-1.47	-1.47	7.54	5.68	3.86	3.55	
MCM TIPS	39,942,901	3.9	-1.48	-1.48	7.55	5.68	N/A	4.62	12/2016
Bloomberg Barclays U.S. TIPS Index			-1.47	-1.47	7.54	5.68	3.86	4.39	
Real Estate Composite	104,803,678	10.2	1.34	1.34	2.98	6.16	7.24	8.43	04/2003
NCREIF Fund Index-ODCE (VW) (Net)			1.91	1.91	1.50	3.97	5.26	6.75	
Morgan Stanley Prime Property Fund	74,490,799	7.3	1.91	1.91	2.57	5.06	6.64	8.34	04/2003
NCREIF Fund Index-ODCE (VW) (Net)			1.91	1.91	1.50	3.97	5.26	6.75	
Oaktree Real Estate	6,948,844	0.7	-0.09	-0.09	-2.34	1.70	2.78	4.61	08/2013
Washington Alliance (EMWO)	12,824,195	1.2	0.00	0.00	11.91	15.25	14.81	12.82	08/2013
Washington Alliance II (EMWO)	1,236,379	0.1	0.00	0.00	0.00	N/A	N/A	0.00	03/2020
Siguler Guff Distressed RE	9,303,460	0.9	0.00	0.00	-0.60	7.31	9.21	6.54	03/2014
ERECT Composite	10,215,645	1.0	3.06	3.06	5.90	7.95	7.05	6.89	09/2010
CPI - All Urban Consumers (SA)			1.24	1.24	2.64	2.00	2.15	1.86	
Private Equity Composite	193,691,775	18.9	6.73	6.73	13.24	11.40	10.93	7.24	04/2003
Private Equity Policy Index			6.73	6.73	13.24	11.40	10.93	7.24	
Life Settlement Composite	14,978,933	1.5	1.97	1.97	-10.90	-4.51	-5.55	5.78	09/2009
Hedge Fund Composite	3,212,734	0.3	4.26	4.26	32.68	5.47	5.42	2.43	04/2003
90 Day T-Bill Index + 3%			0.77	0.77	3.12	4.53	4.21	4.31	
Gridiron Capital Multi-Asset (EMWO)	3,212,566	0.3	4.26	4.26	36.10	N/A	N/A	10.55	02/2019
HFRI FoF Composite Lagged			1.88	1.88	23.84	5.43	5.61	8.52	
Liquid Policy Portfolio Composite	24,814,935	2.4	N/A	N/A	N/A	N/A	N/A	1.92	03/2021
Liquid Policy Benchmark			N/A	N/A	N/A	N/A	N/A	1.99	
BlackRock Liquidity iShares Public Pension Fund	24,814,935	2.4	N/A	N/A	N/A	N/A	N/A	N/A	04/2021
Liquid Policy Benchmark			N/A	N/A	N/A	N/A	N/A	N/A	
Cash Account	3,402,921	0.3	0.11	0.11	0.23	1.54	1.22	0.74	01/2012

Plan Sponsor Peer Group Analysis - All Public DB Plans



	QTR	FYTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Total Fund	3.44 (40)	3.44 (40)	25.80 (95)	10.11 (94)	8.16 (91)	8.40 (91)	8.95 (88)
● Total Fund Policy Index	3.65 (31)	3.65 (31)	27.70 (92)	10.46 (92)	8.85 (82)	8.35 (92)	9.02 (87)
Median	3.19	3.19	36.19	13.44	10.23	10.18	10.23

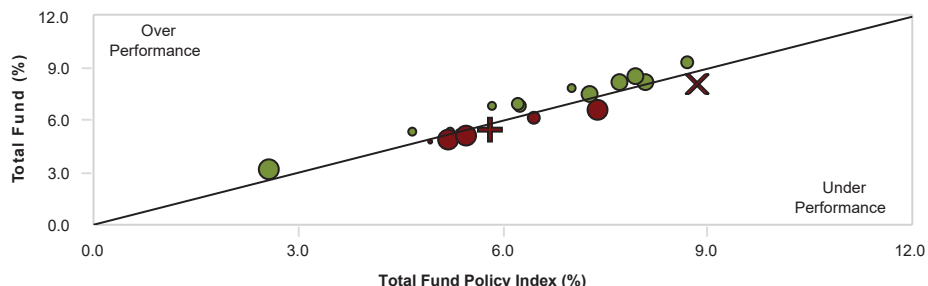
	2020	2019	2018	2017	2016
● Total Fund	8.93 (93)	15.16 (93)	-3.36 (21)	13.97 (71)	8.60 (15)
● Total Fund Policy Index	9.82 (88)	14.24 (96)	-1.27 (4)	10.82 (96)	10.27 (3)
Median	13.65	20.09	-4.64	15.28	6.82

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Total Fund	7.76	4.22	8.29	-10.44	4.38	0.67
Total Fund Policy Index	8.87	3.18	9.67	-10.86	3.83	0.72

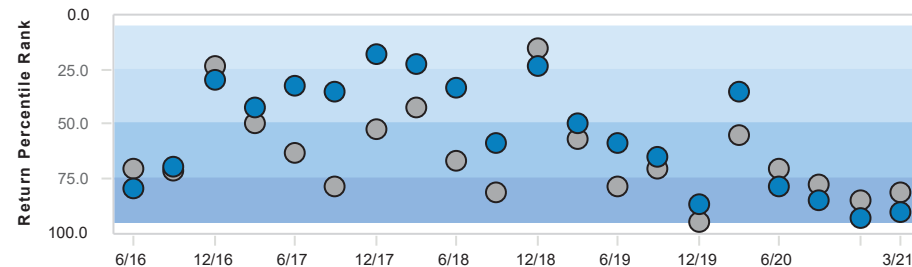


3 Yr Rolling Under/Over Performance - 5 Years



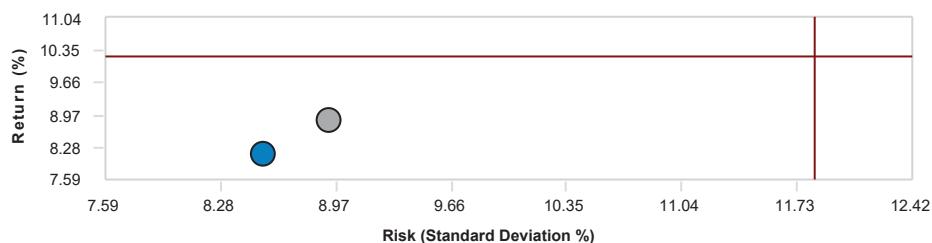
- Over Performance
- Under Performance
- + Earliest Date
- X Latest Date

3 Yr Rolling Percentile Ranking - 5 Years



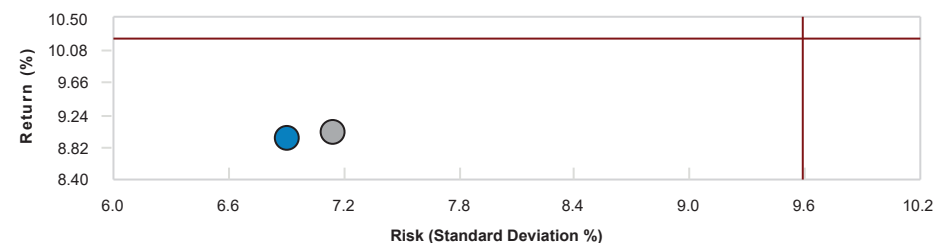
	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
● Total Fund	20	3 (15%)	7 (35%)	4 (20%)	6 (30%)
● Total Fund Policy Index	20	2 (10%)	2 (10%)	9 (45%)	7 (35%)

Peer Group Scattergram - 3 Years



	Return	Standard Deviation
● Total Fund	8.16	8.53
● Total Fund Policy Index	8.85	8.92
— Median	10.24	11.83

Peer Group Scattergram - 5 Years



	Return	Standard Deviation
● Total Fund	8.95	6.90
● Total Fund Policy Index	9.02	7.14
— Median	10.23	9.59

Historical Statistics - 3 Years

	Tracking Error	Up Market Capture	Down Market Capture	Alpha	Information Ratio	Sharpe Ratio	Beta	Downside Risk
Total Fund	1.56	97.87	104.80	-0.15	-0.43	0.78	0.94	5.76
Total Fund Policy Index	0.00	100.00	100.00	0.00	N/A	0.82	1.00	5.73

Historical Statistics - 5 Years

	Tracking Error	Up Market Capture	Down Market Capture	Alpha	Information Ratio	Sharpe Ratio	Beta	Downside Risk
Total Fund	1.50	101.64	106.59	0.40	-0.06	1.09	0.95	4.60
Total Fund Policy Index	0.00	100.00	100.00	0.00	N/A	1.07	1.00	4.54



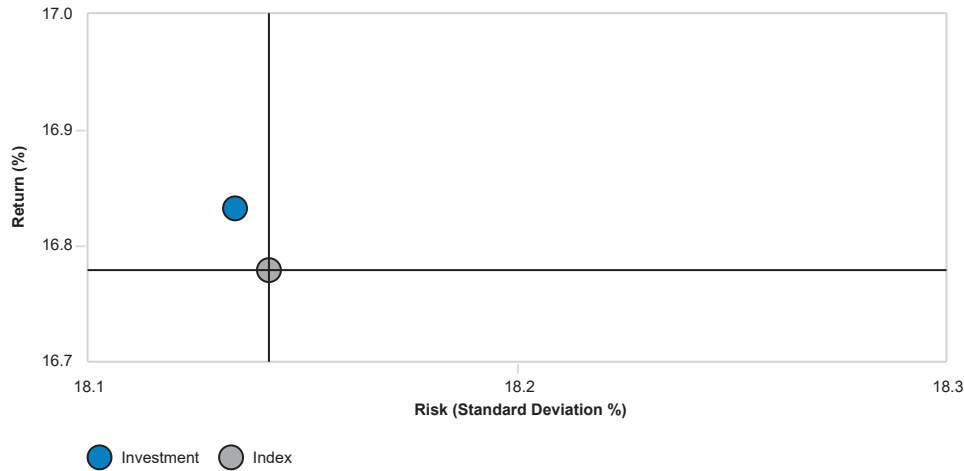
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	16.83	18.13	0.87	100.05	10	99.84	2
Index	16.78	18.14	0.86	100.00	10	100.00	2

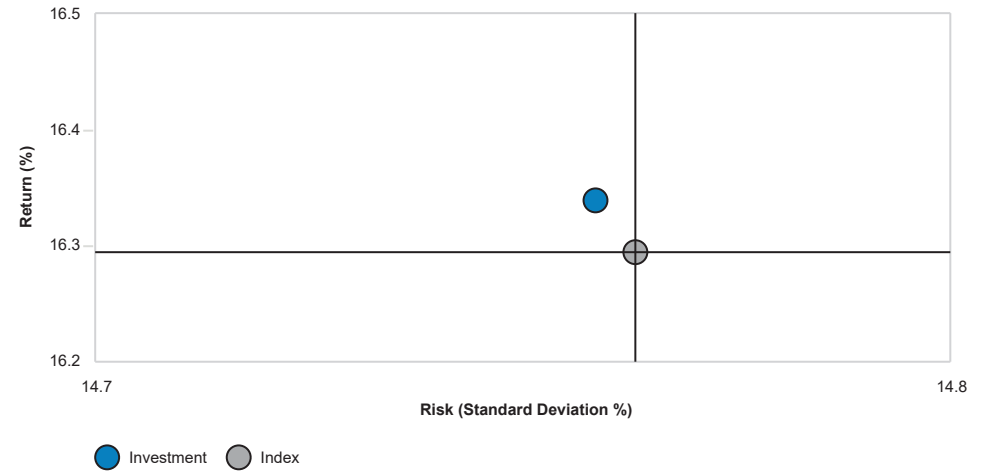
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	16.34	14.76	1.02	100.07	17	99.85	3
Index	16.29	14.76	1.02	100.00	17	100.00	3

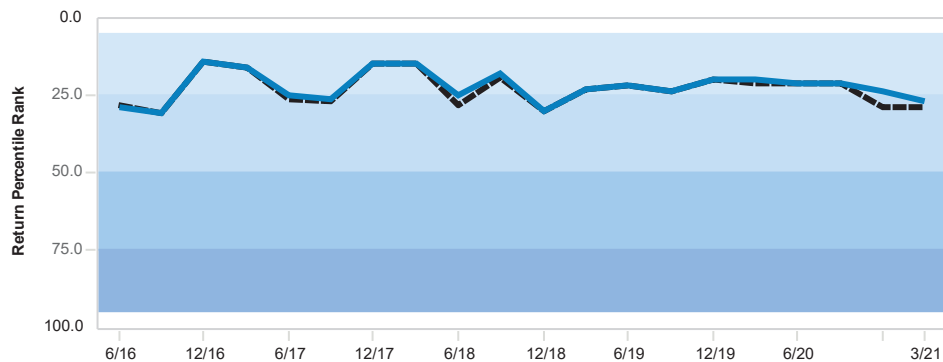
Risk and Return 3 Years



Risk and Return 5 Years

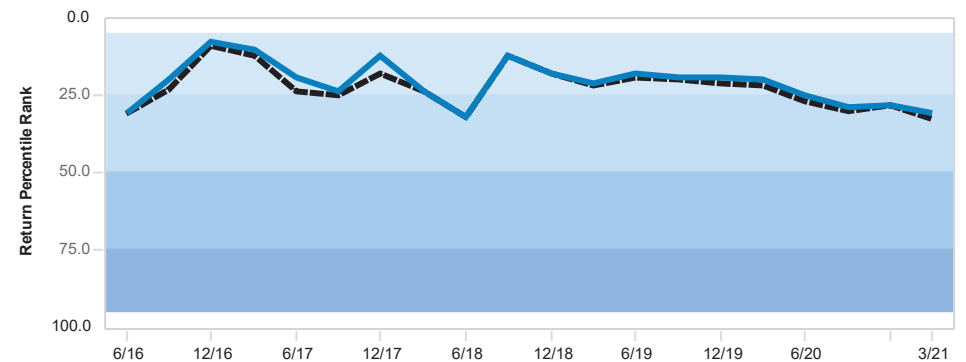


3 Year Rolling Percentile Rank IM U.S. Large Cap Index Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	15 (75%)	5 (25%)	0 (0%)	0 (0%)
Index	20	12 (60%)	8 (40%)	0 (0%)	0 (0%)

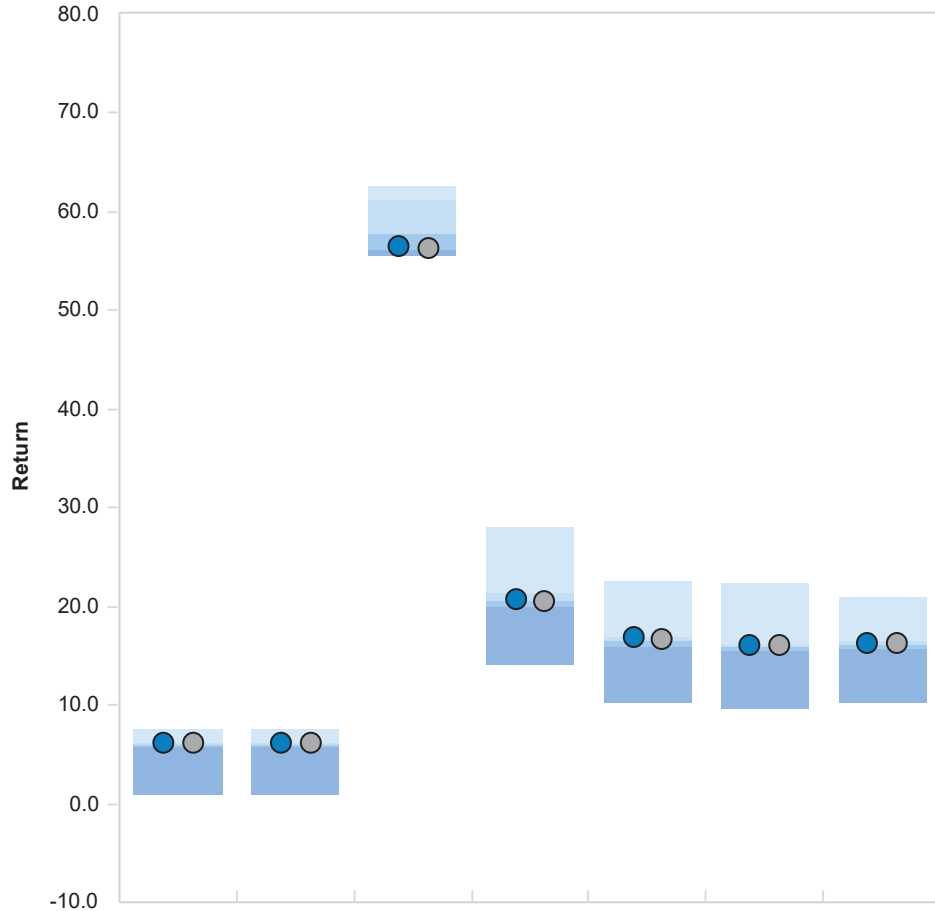
5 Year Rolling Percentile Rank IM U.S. Large Cap Index Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	15 (75%)	5 (25%)	0 (0%)	0 (0%)
Index	20	14 (70%)	6 (30%)	0 (0%)	0 (0%)

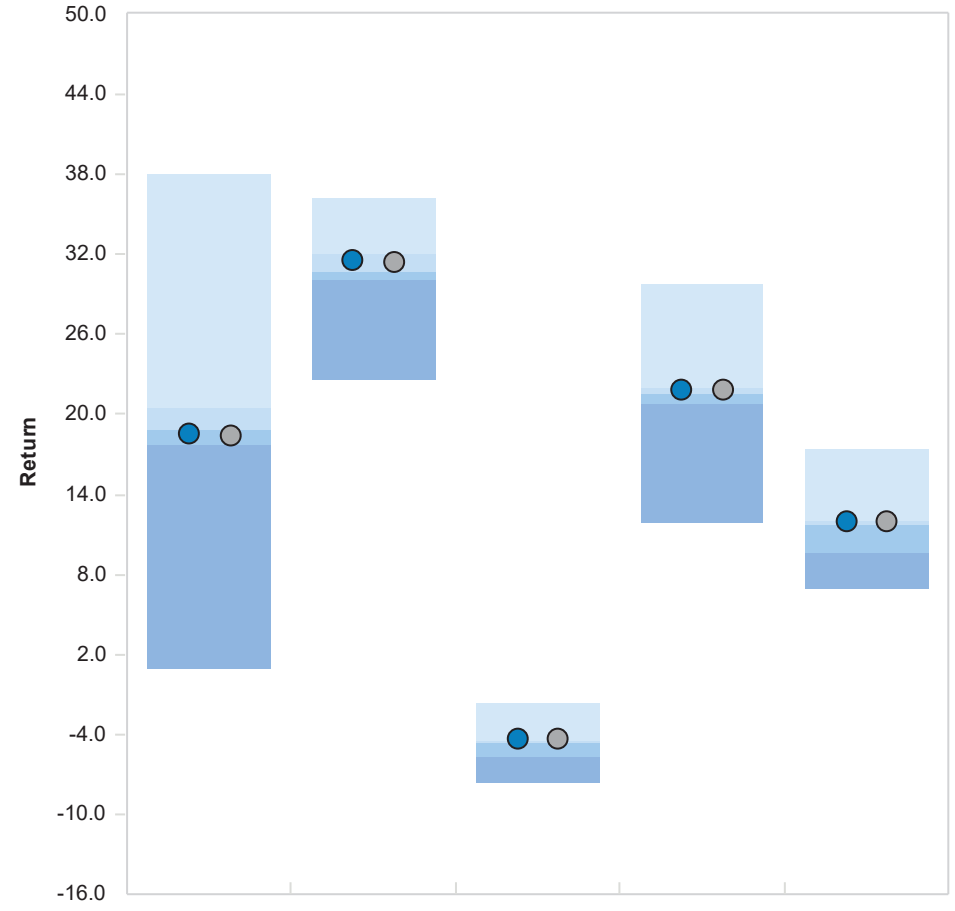


Peer Group Analysis - IM U.S. Large Cap Index Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	6.18 (29)	6.18 (29)	56.52 (62)	20.70 (44)	16.83 (27)	16.12 (26)	16.34 (31)
● Index	6.17 (30)	6.17 (30)	56.35 (64)	20.60 (50)	16.78 (29)	16.08 (30)	16.29 (33)
Median	6.13	6.13	57.72	20.60	16.44	15.95	16.08

Peer Group Analysis - IM U.S. Large Cap Index Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	18.53 (53)	31.54 (29)	-4.40 (25)	21.85 (29)	12.03 (20)
● Index	18.40 (54)	31.49 (29)	-4.38 (24)	21.83 (29)	11.96 (21)
Median	18.82	30.73	-4.66	21.60	11.65

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	12.23 (41)	8.93 (50)	20.57 (61)	-19.59 (21)	9.06 (19)	1.74 (9)
Index	12.15 (46)	8.93 (50)	20.54 (62)	-19.60 (23)	9.07 (13)	1.70 (9)
Median	12.12	8.92	20.87	-19.74	8.90	1.53



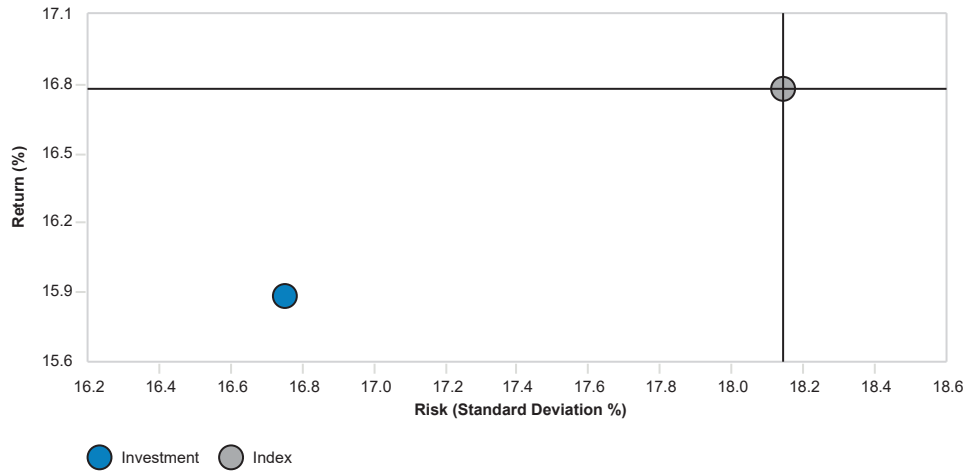
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	15.89	16.75	0.88	92.95	10	91.76	2
Index	16.78	18.14	0.86	100.00	10	100.00	2

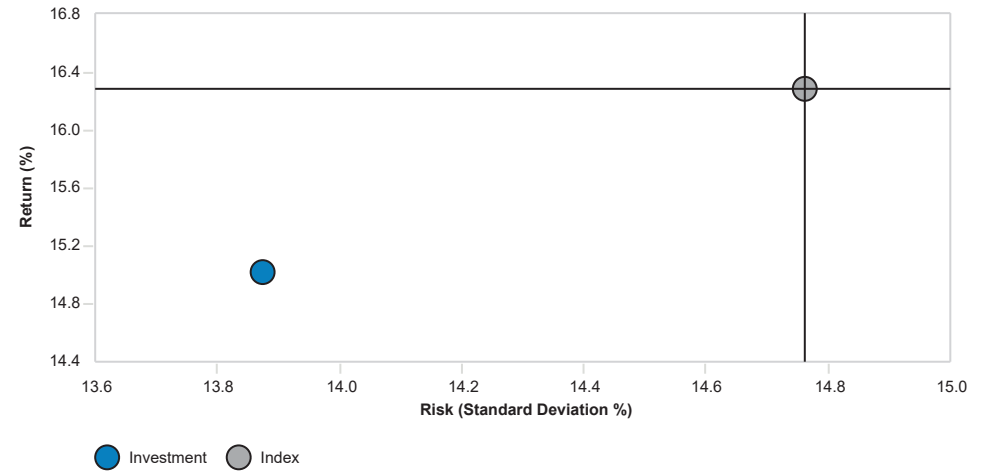
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	15.02	13.88	0.99	93.61	17	95.22	3
Index	16.29	14.76	1.02	100.00	17	100.00	3

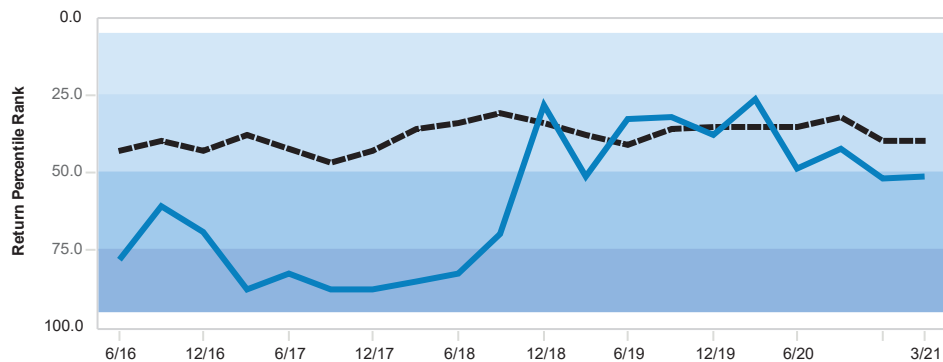
Risk and Return 3 Years



Risk and Return 5 Years

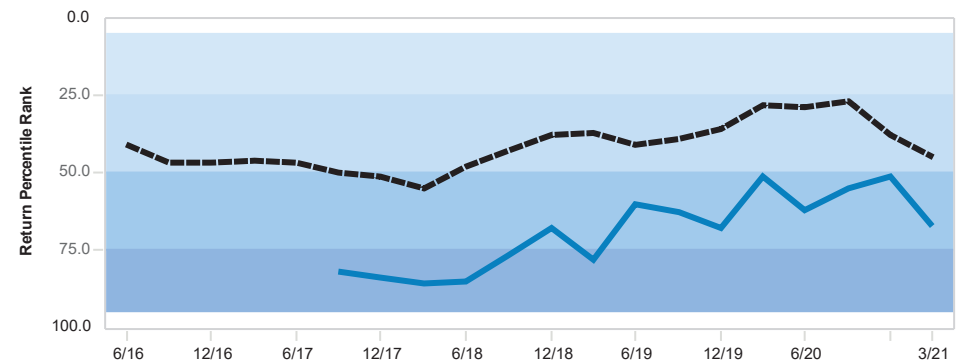


3 Year Rolling Percentile Rank IM U.S. Large Cap Core Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	0 (0%)	7 (35%)	6 (30%)	7 (35%)
Index	20	0 (0%)	20 (100%)	0 (0%)	0 (0%)

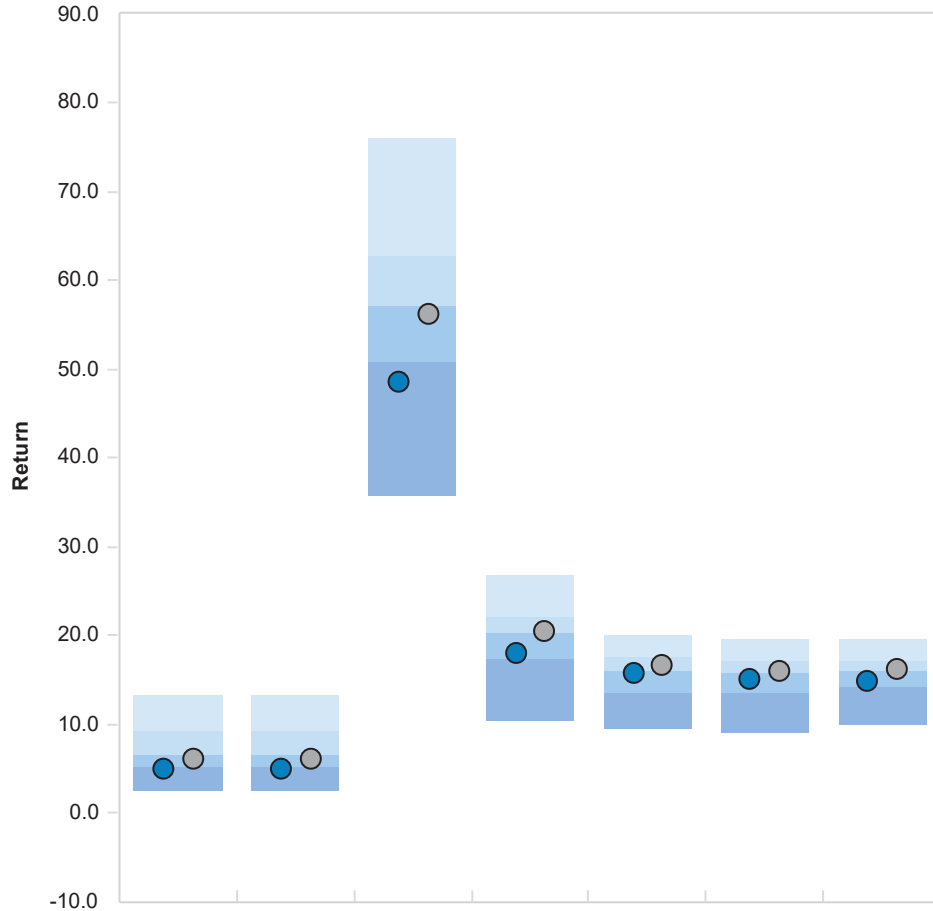
5 Year Rolling Percentile Rank IM U.S. Large Cap Core Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	15	0 (0%)	0 (0%)	9 (60%)	6 (40%)
Index	20	0 (0%)	18 (90%)	2 (10%)	0 (0%)

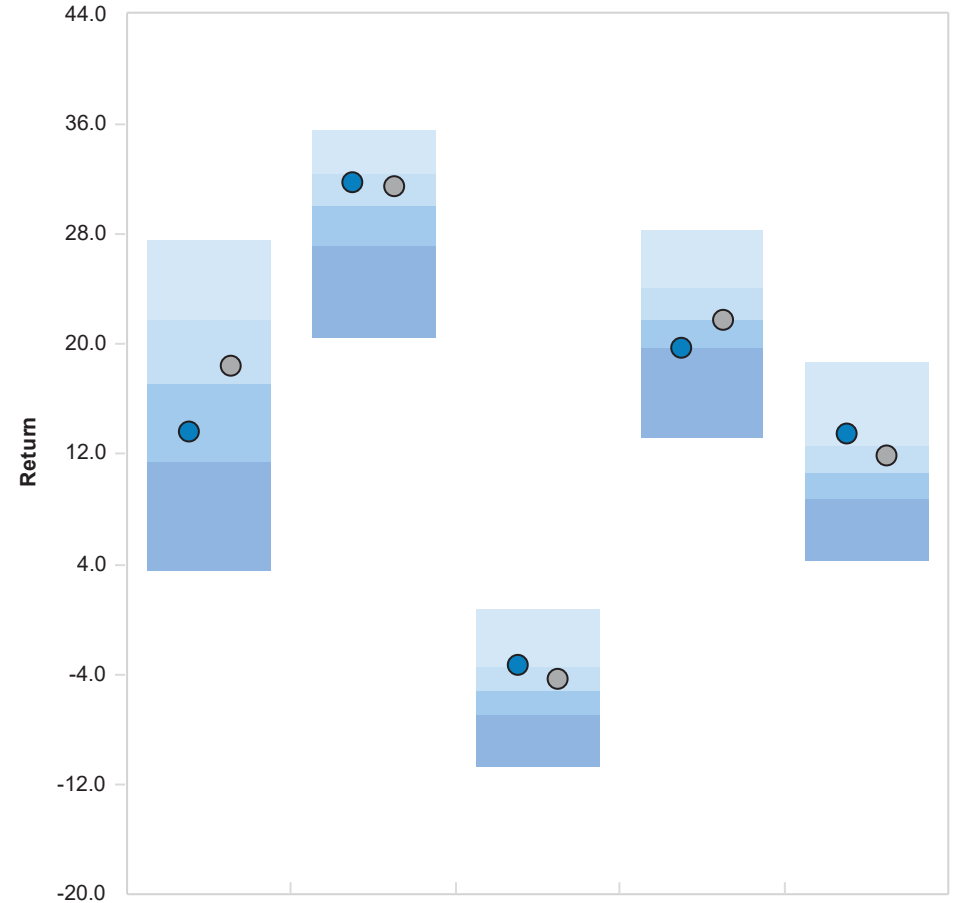


Peer Group Analysis - IM U.S. Large Cap Core Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	4.98 (79)	4.98 (79)	48.75 (81)	18.18 (72)	15.89 (51)	15.06 (62)	15.02 (67)
● Index	6.17 (63)	6.17 (63)	56.35 (55)	20.60 (44)	16.78 (40)	16.08 (46)	16.29 (45)
Median	6.74	6.74	57.18	20.27	16.15	15.85	16.14

Peer Group Analysis - IM U.S. Large Cap Core Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	13.61 (65)	31.87 (31)	-3.35 (22)	19.69 (76)	13.49 (20)
● Index	18.40 (43)	31.49 (35)	-4.38 (38)	21.83 (52)	11.96 (35)
Median	17.19	30.06	-5.17	21.85	10.63

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	11.57 (65)	9.49 (23)	15.98 (86)	-19.81 (48)	7.71 (69)	2.13 (30)
Index	12.15 (53)	8.93 (35)	20.54 (47)	-19.60 (44)	9.07 (32)	1.70 (42)
Median	12.29	8.01	20.42	-20.04	8.22	1.51



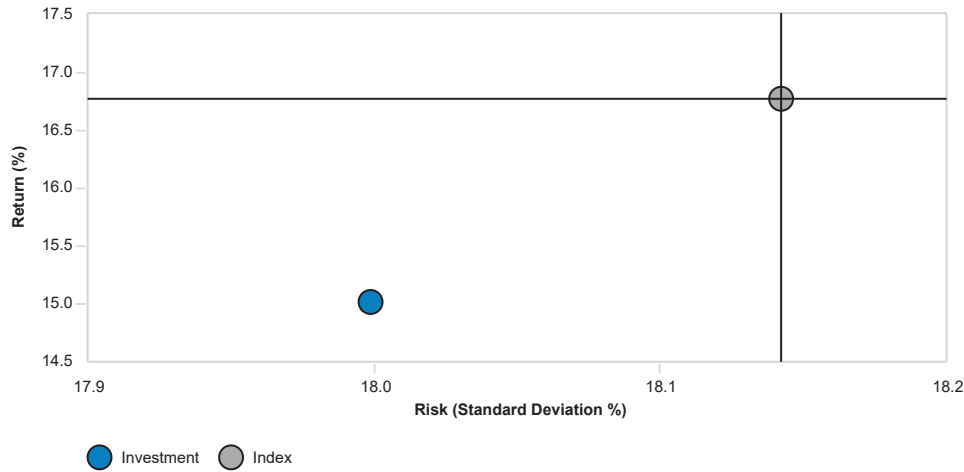
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	15.01	18.00	0.78	95.80	10	100.64	2
Index	16.78	18.14	0.86	100.00	10	100.00	2

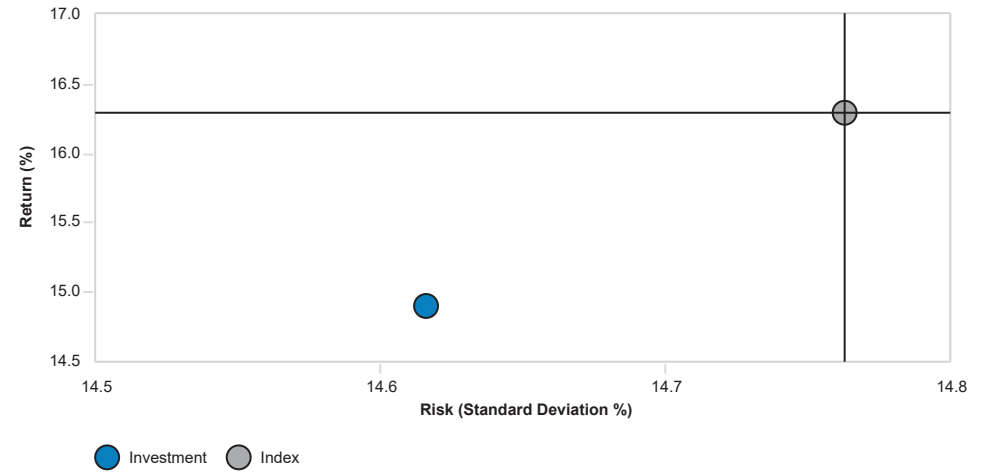
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	14.91	14.62	0.94	95.64	17	100.00	3
Index	16.29	14.76	1.02	100.00	17	100.00	3

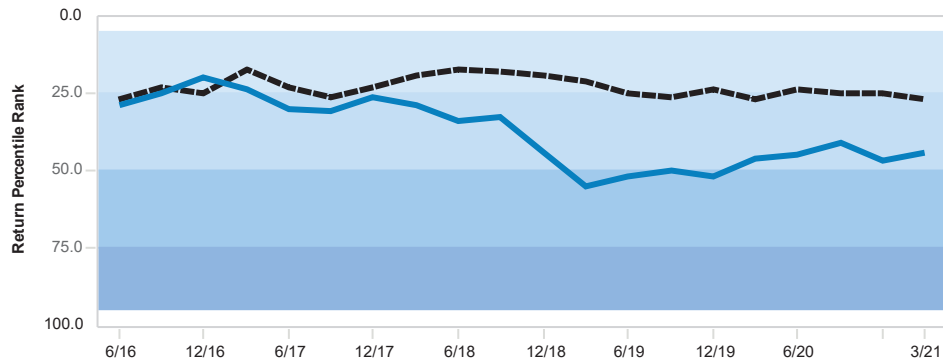
Risk and Return 3 Years



Risk and Return 5 Years

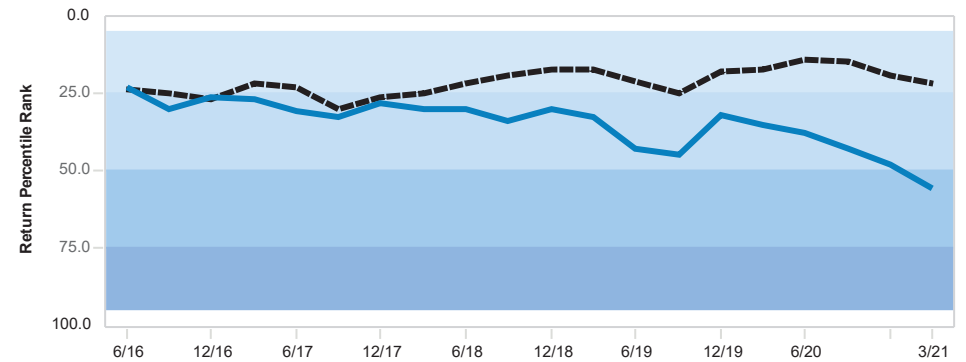


3 Year Rolling Percentile Rank IM U.S. Large Cap Core Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	3 (15%)	14 (70%)	3 (15%)	0 (0%)
Index	20	15 (75%)	5 (25%)	0 (0%)	0 (0%)

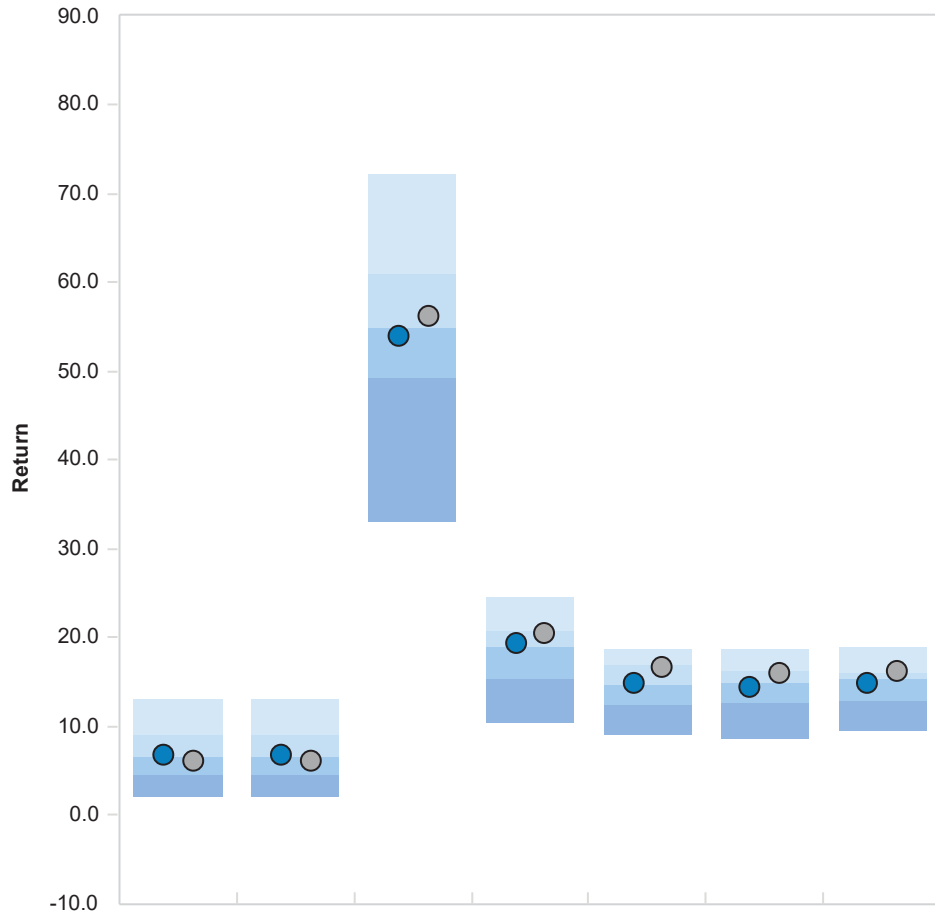
5 Year Rolling Percentile Rank IM U.S. Large Cap Core Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	1 (5%)	18 (90%)	1 (5%)	0 (0%)
Index	20	17 (85%)	3 (15%)	0 (0%)	0 (0%)

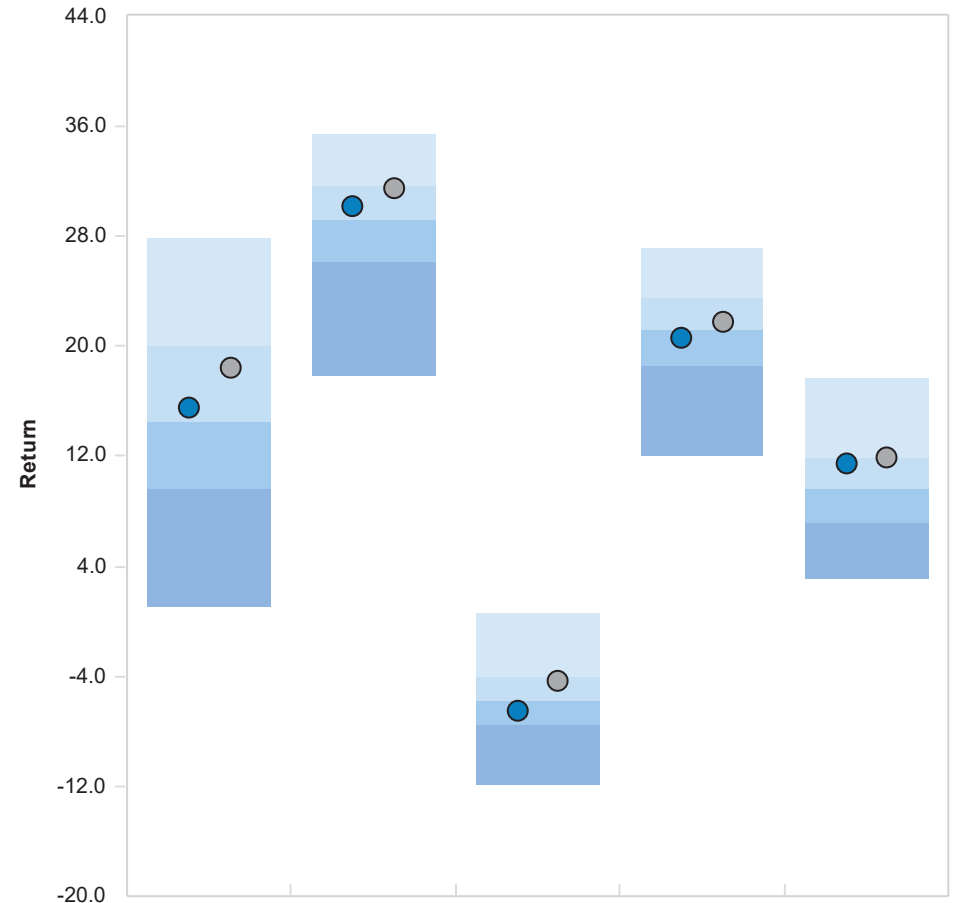


Peer Group Analysis - IM U.S. Large Cap Core Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	6.78 (49)	6.78 (49)	54.09 (55)	19.39 (45)	15.01 (44)	14.59 (54)	14.91 (56)
● Index	6.17 (58)	6.17 (58)	56.35 (42)	20.60 (29)	16.78 (27)	16.08 (28)	16.29 (22)
Median	6.69	6.69	54.93	18.89	14.71	14.87	15.29

Peer Group Analysis - IM U.S. Large Cap Core Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	15.56 (43)	30.24 (38)	-6.43 (60)	20.67 (57)	11.55 (27)
● Index	18.40 (33)	31.49 (28)	-4.38 (30)	21.83 (43)	11.96 (25)
Median	14.60	29.19	-5.72	21.27	9.55

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	11.26 (60)	8.44 (38)	19.61 (55)	-19.92 (51)	9.37 (20)	1.58 (46)
Index	12.15 (45)	8.93 (31)	20.54 (37)	-19.60 (44)	9.07 (25)	1.70 (43)
Median	11.87	7.89	19.94	-19.92	7.93	1.50



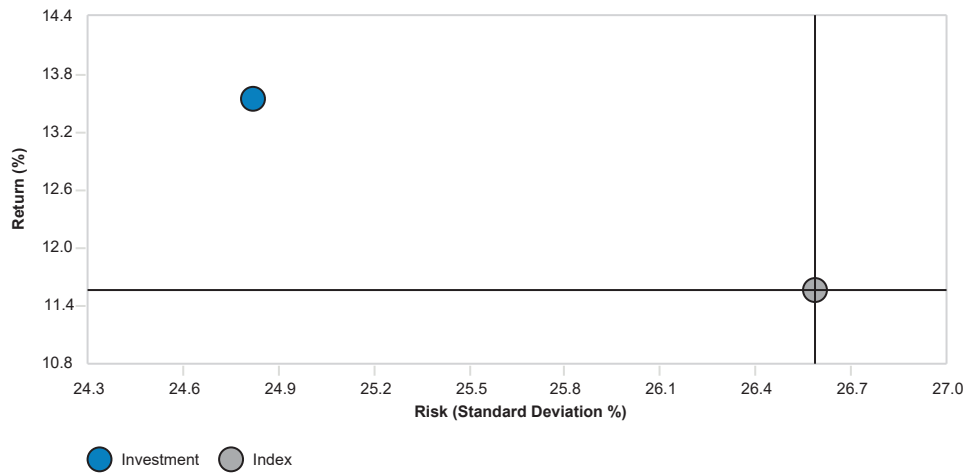
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	13.55	24.82	0.58	96.73	10	90.71	2
Index	11.57	26.59	0.49	100.00	9	100.00	3

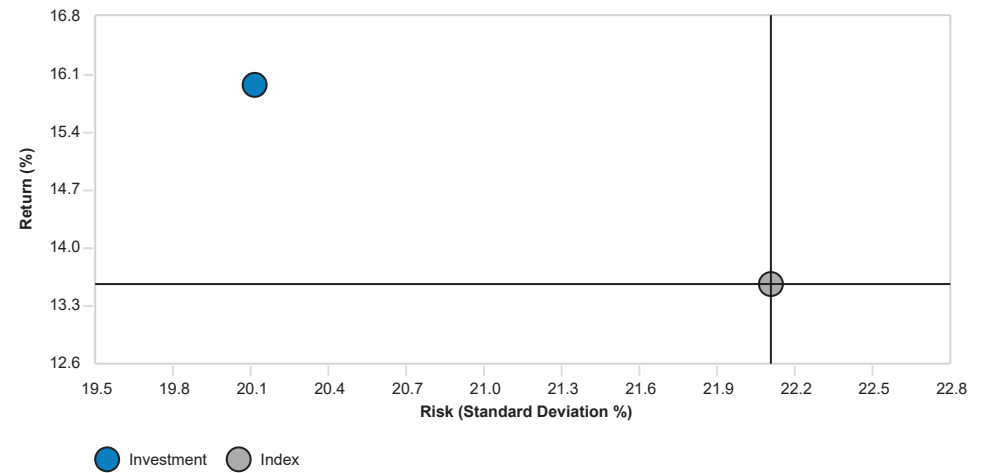
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	15.97	20.11	0.78	94.12	17	81.50	3
Index	13.56	22.11	0.64	100.00	15	100.00	5

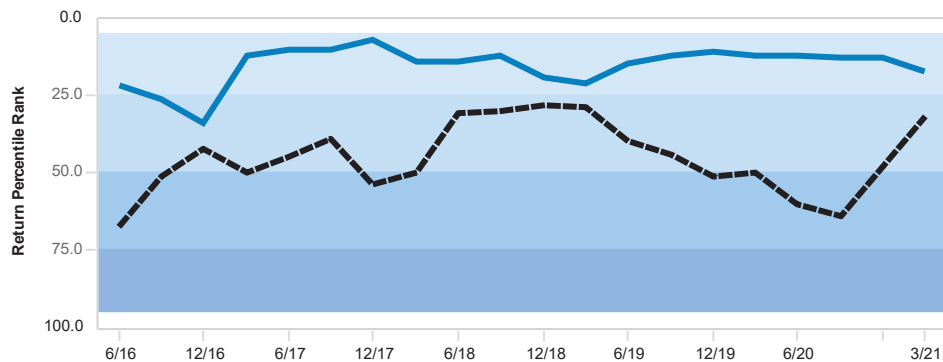
Risk and Return 3 Years



Risk and Return 5 Years

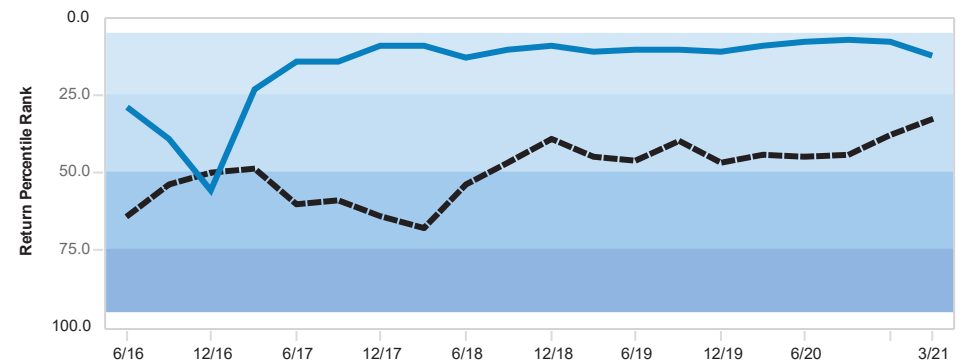


3 Year Rolling Percentile Rank IM U.S. Small Cap Value Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	18 (90%)	2 (10%)	0 (0%)	0 (0%)
Index	20	0 (0%)	14 (70%)	6 (30%)	0 (0%)

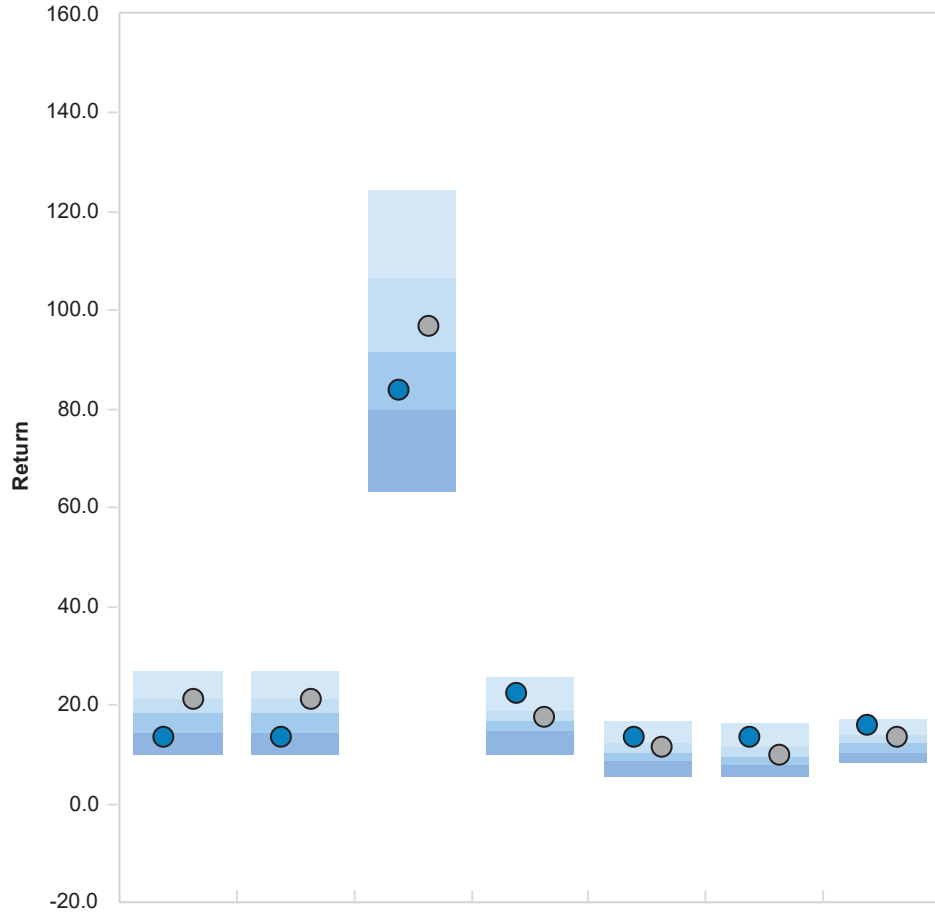
5 Year Rolling Percentile Rank IM U.S. Small Cap Value Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	17 (85%)	2 (10%)	1 (5%)	0 (0%)
Index	20	0 (0%)	13 (65%)	7 (35%)	0 (0%)

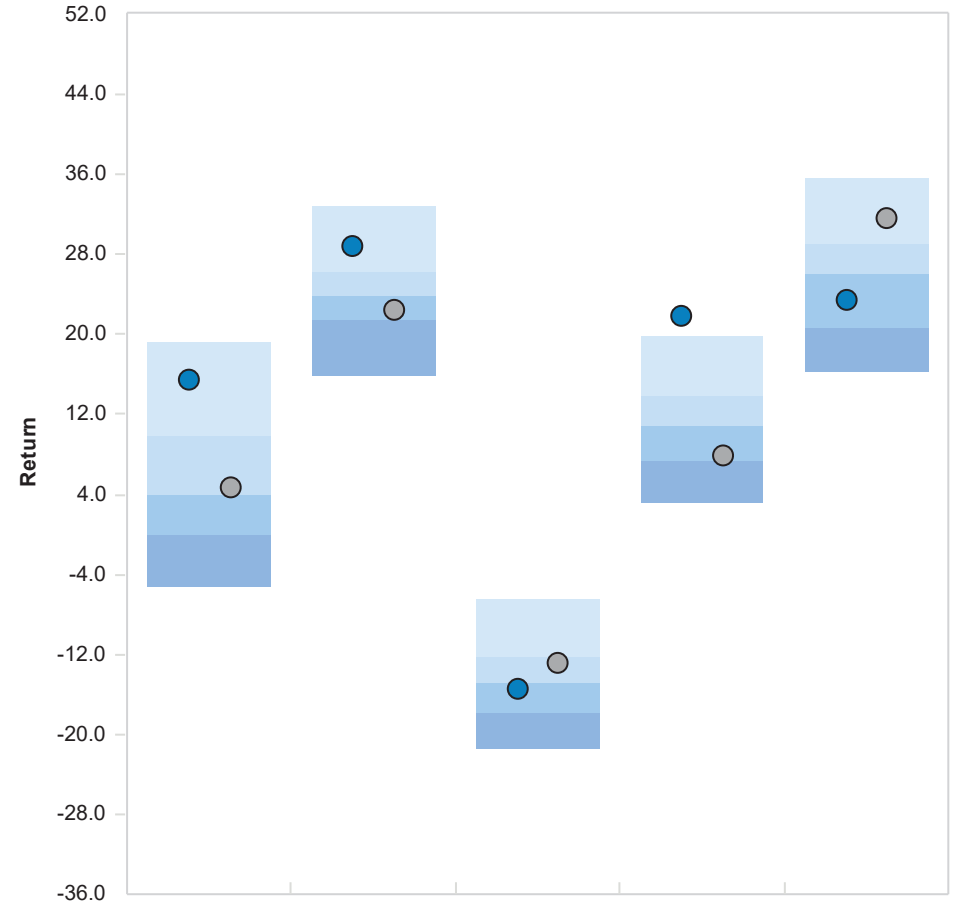


Peer Group Analysis - IM U.S. Small Cap Value Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	13.70 (78)	13.70 (78)	84.13 (65)	22.65 (10)	13.55 (17)	13.48 (14)	15.97 (12)
● Index	21.17 (28)	21.17 (28)	97.05 (39)	17.75 (39)	11.57 (32)	9.92 (46)	13.56 (33)
Median	18.61	18.61	91.55	16.79	10.23	9.70	12.22

Peer Group Analysis - IM U.S. Small Cap Value Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	15.50 (11)	28.89 (12)	-15.35 (55)	21.78 (4)	23.40 (65)
● Index	4.63 (47)	22.39 (65)	-12.86 (32)	7.84 (71)	31.74 (13)
Median	3.97	23.95	-14.90	10.95	25.97

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	29.60 (52)	4.13 (33)	20.00 (55)	-28.68 (9)	7.46 (54)	0.82 (26)
Index	33.36 (24)	2.56 (47)	18.91 (68)	-35.66 (57)	8.49 (34)	-0.57 (56)
Median	29.64	2.18	20.67	-35.14	7.81	-0.37



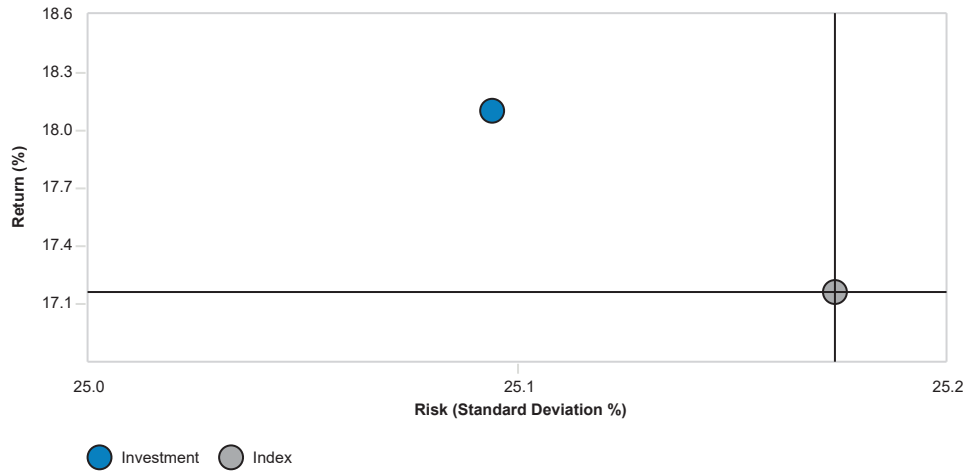
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	18.11	25.09	0.73	101.30	9	99.07	3
Index	17.16	25.17	0.70	100.00	9	100.00	3

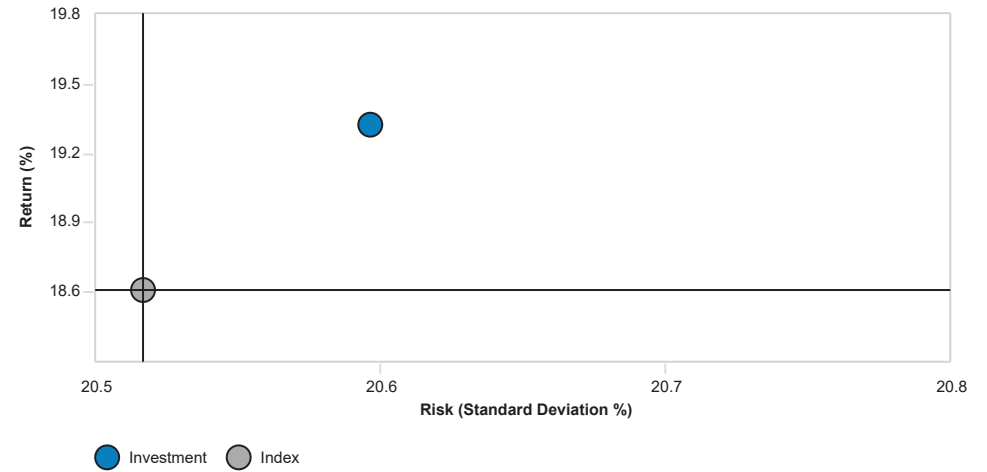
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	19.32	20.60	0.91	99.44	16	95.09	4
Index	18.61	20.52	0.88	100.00	17	100.00	3

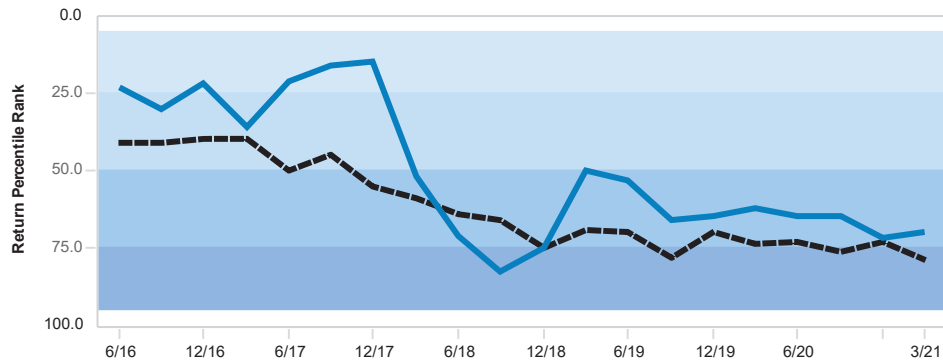
Risk and Return 3 Years



Risk and Return 5 Years

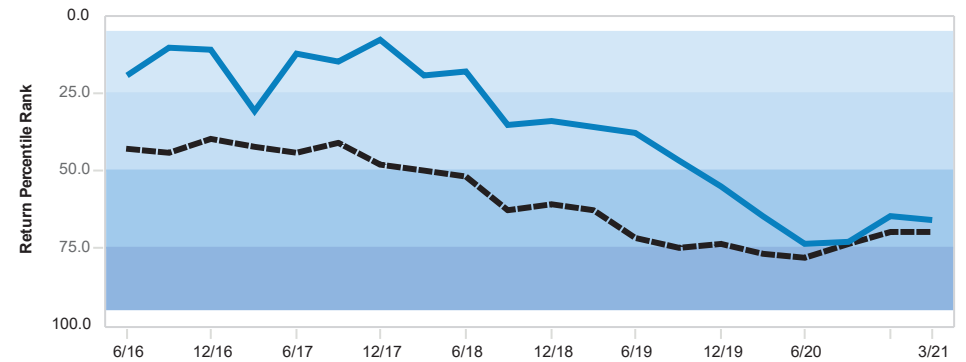


3 Year Rolling Percentile Rank IM U.S. Small Cap Growth Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	5 (25%)	3 (15%)	11 (55%)	1 (5%)
Index	20	0 (0%)	6 (30%)	11 (55%)	3 (15%)

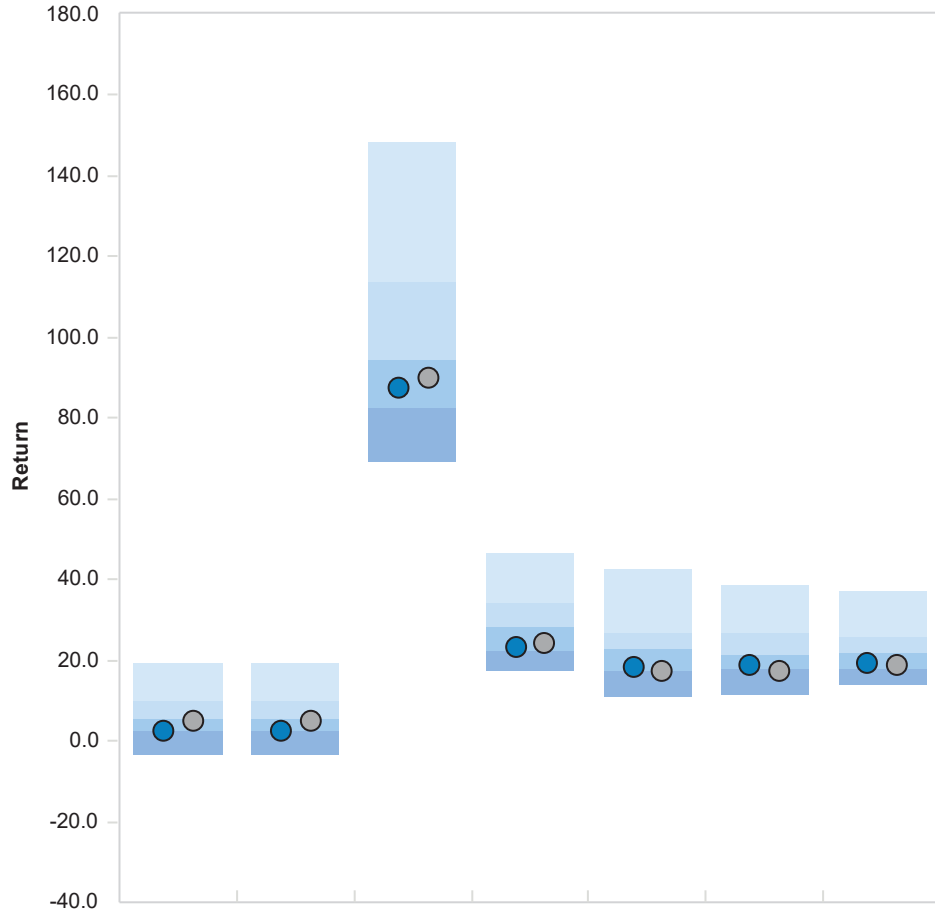
5 Year Rolling Percentile Rank IM U.S. Small Cap Growth Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	8 (40%)	6 (30%)	6 (30%)	0 (0%)
Index	20	0 (0%)	8 (40%)	10 (50%)	2 (10%)

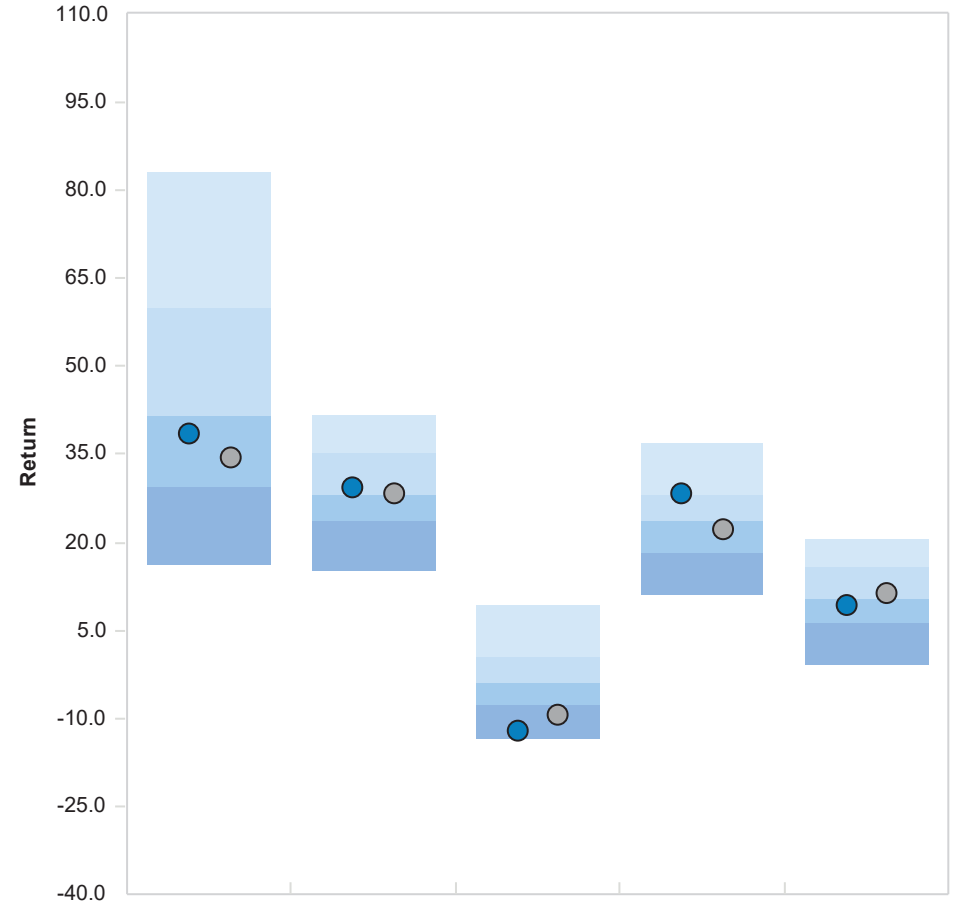


Peer Group Analysis - IM U.S. Small Cap Growth Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	2.38 (74)	2.38 (74)	87.58 (62)	23.24 (71)	18.11 (70)	18.60 (69)	19.32 (66)
● Index	4.88 (55)	4.88 (55)	90.20 (57)	24.44 (65)	17.16 (79)	17.53 (76)	18.61 (70)
Median	5.51	5.51	94.54	28.40	22.67	21.42	21.60

Peer Group Analysis - IM U.S. Small Cap Growth Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	38.53 (58)	29.23 (46)	-11.94 (92)	28.31 (25)	9.17 (57)
● Index	34.63 (65)	28.48 (49)	-9.31 (80)	22.17 (56)	11.32 (46)
Median	41.54	28.09	-3.95	23.68	10.49

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	26.28 (58)	9.60 (43)	32.38 (57)	-24.39 (60)	11.21 (27)	-7.14 (77)
Index	29.61 (29)	7.16 (68)	30.58 (65)	-25.76 (71)	11.39 (24)	-4.17 (45)
Median	27.14	8.92	33.62	-23.40	9.38	-4.64



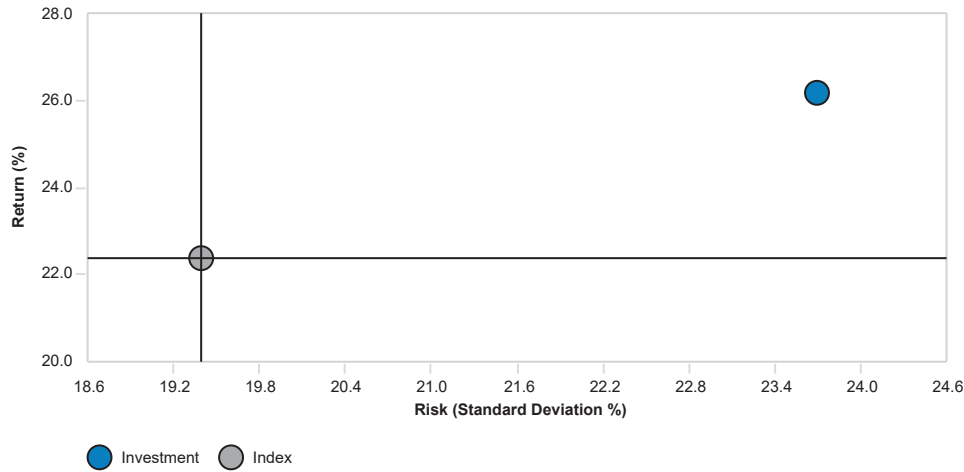
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	26.18	23.69	1.04	115.40	9	111.82	3
Index	22.39	19.40	1.06	100.00	10	100.00	2

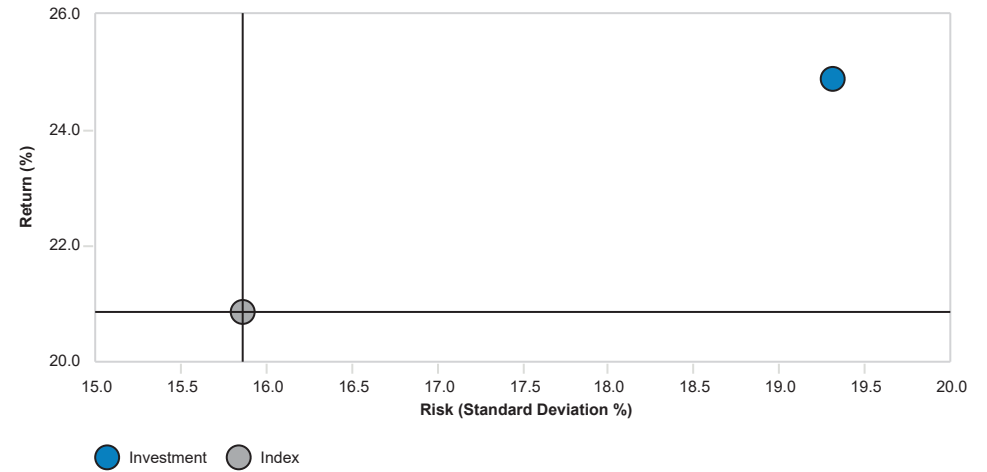
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	24.90	19.32	1.19	116.73	16	112.28	4
Index	20.87	15.86	1.20	100.00	18	100.00	2

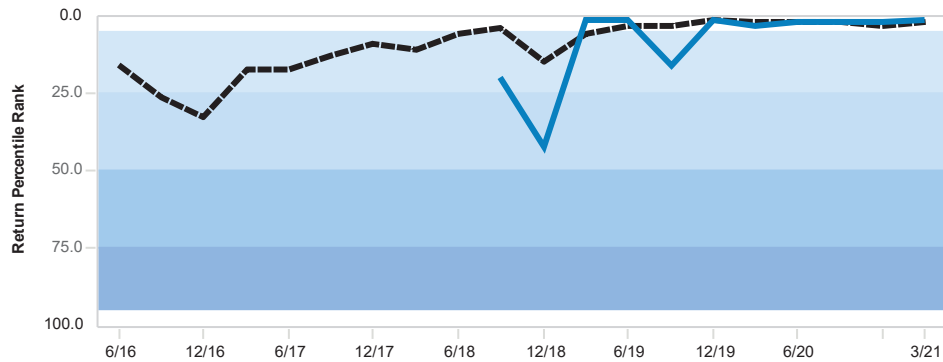
Risk and Return 3 Years



Risk and Return 5 Years

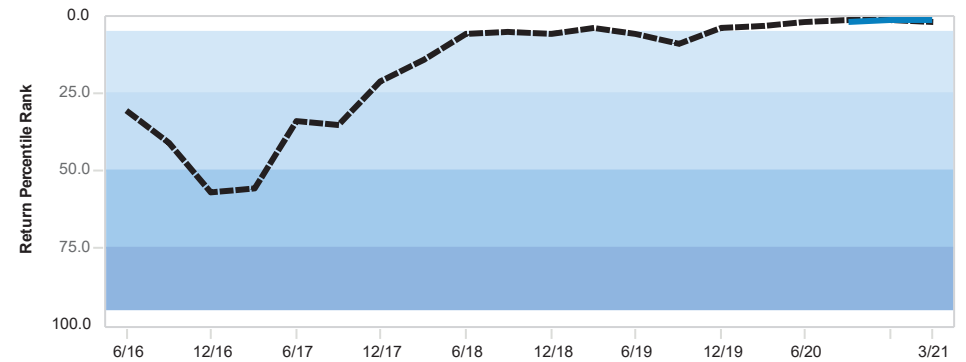


3 Year Rolling Percentile Rank IM U.S. All Cap Core Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	11	10 (91%)	1 (9%)	0 (0%)	0 (0%)
Index	20	18 (90%)	2 (10%)	0 (0%)	0 (0%)

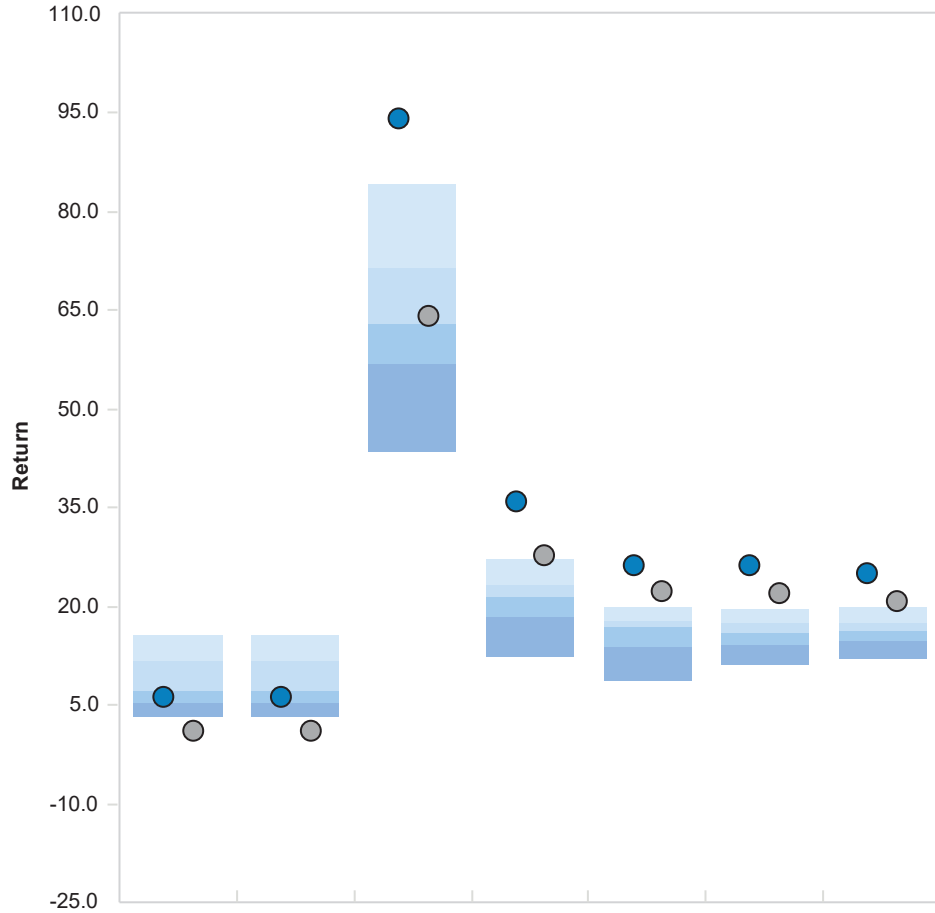
5 Year Rolling Percentile Rank IM U.S. All Cap Core Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	3	3 (100%)	0 (0%)	0 (0%)	0 (0%)
Index	20	14 (70%)	4 (20%)	2 (10%)	0 (0%)

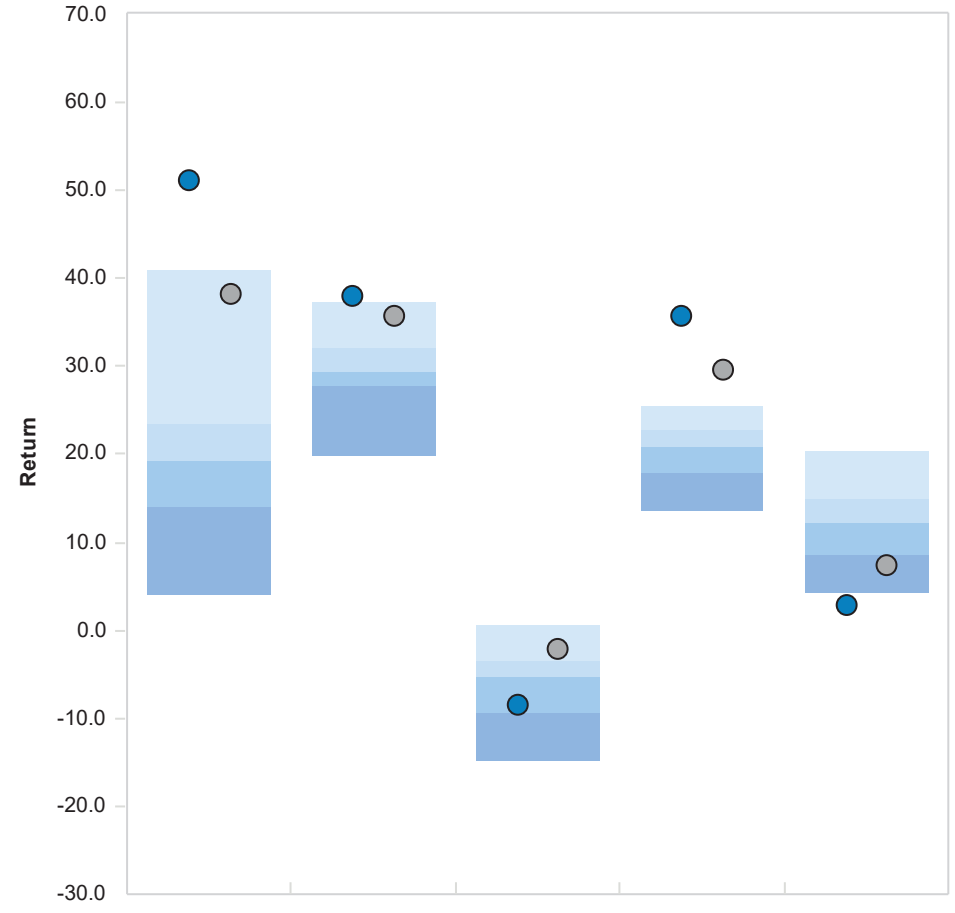


Peer Group Analysis - IM U.S. All Cap Core Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	6.19 (63)	6.19 (63)	94.21 (4)	35.99 (2)	26.18 (1)	26.21 (1)	24.90 (1)
● Index	1.19 (99)	1.19 (99)	64.31 (39)	27.90 (3)	22.39 (2)	22.05 (1)	20.87 (2)
Median	7.12	7.12	63.04	21.36	16.90	16.09	16.35

Peer Group Analysis - IM U.S. All Cap Core Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	51.29 (4)	38.03 (2)	-8.39 (71)	35.81 (1)	2.91 (96)
● Index	38.26 (7)	35.85 (9)	-2.12 (20)	29.59 (1)	7.39 (83)
Median	19.16	29.45	-5.19	20.91	12.22

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	17.39 (24)	14.85 (2)	35.65 (1)	-17.28 (16)	14.55 (1)	-3.72 (99)
Index	12.41 (78)	12.86 (4)	27.99 (4)	-14.85 (10)	10.67 (5)	1.10 (59)
Median	14.52	7.82	21.20	-21.26	7.71	1.50



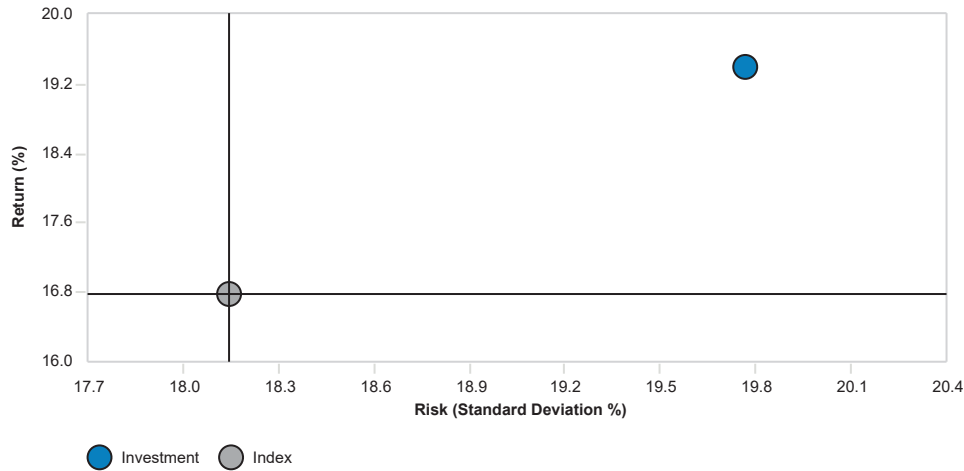
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	19.41	19.77	0.92	105.60	10	96.27	2
Index	16.78	18.14	0.86	100.00	10	100.00	2

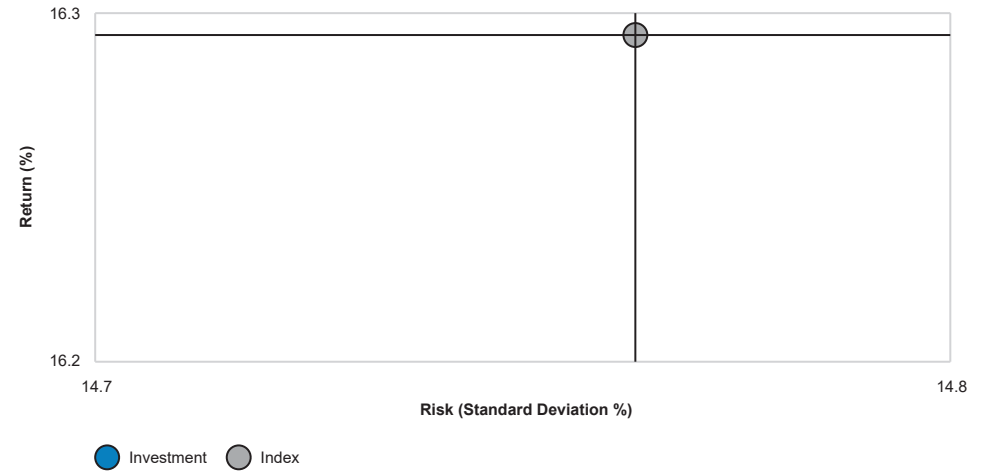
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Index	16.29	14.76	1.02	100.00	17	100.00	3

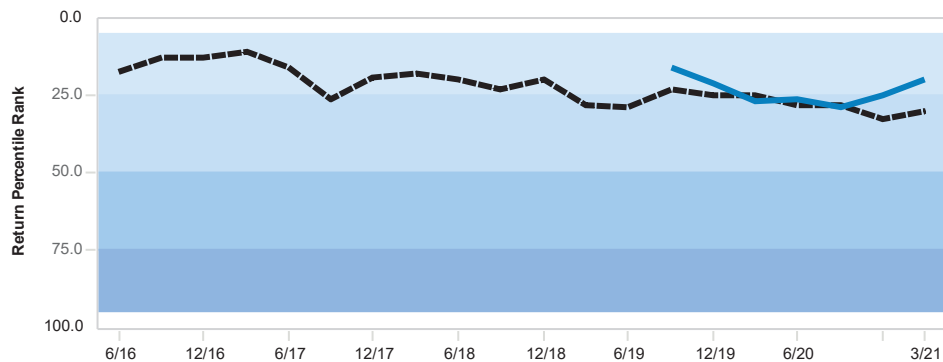
Risk and Return 3 Years



Risk and Return 5 Years

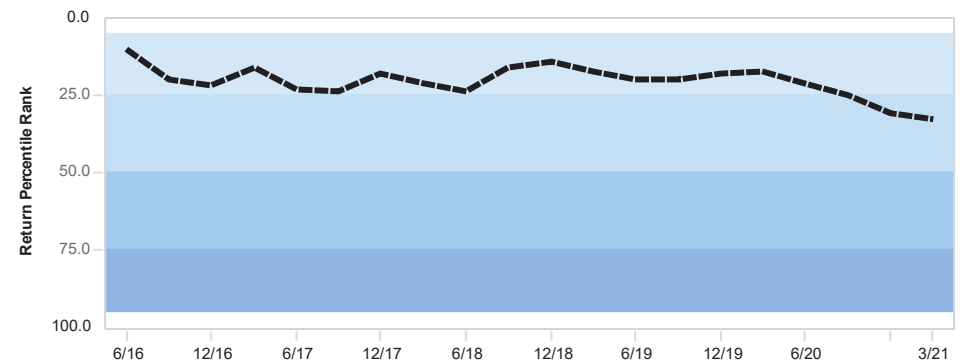


3 Year Rolling Percentile Rank IM U.S. Equity (MF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	7	4 (57%)	3 (43%)	0 (0%)	0 (0%)
Index	20	13 (65%)	7 (35%)	0 (0%)	0 (0%)

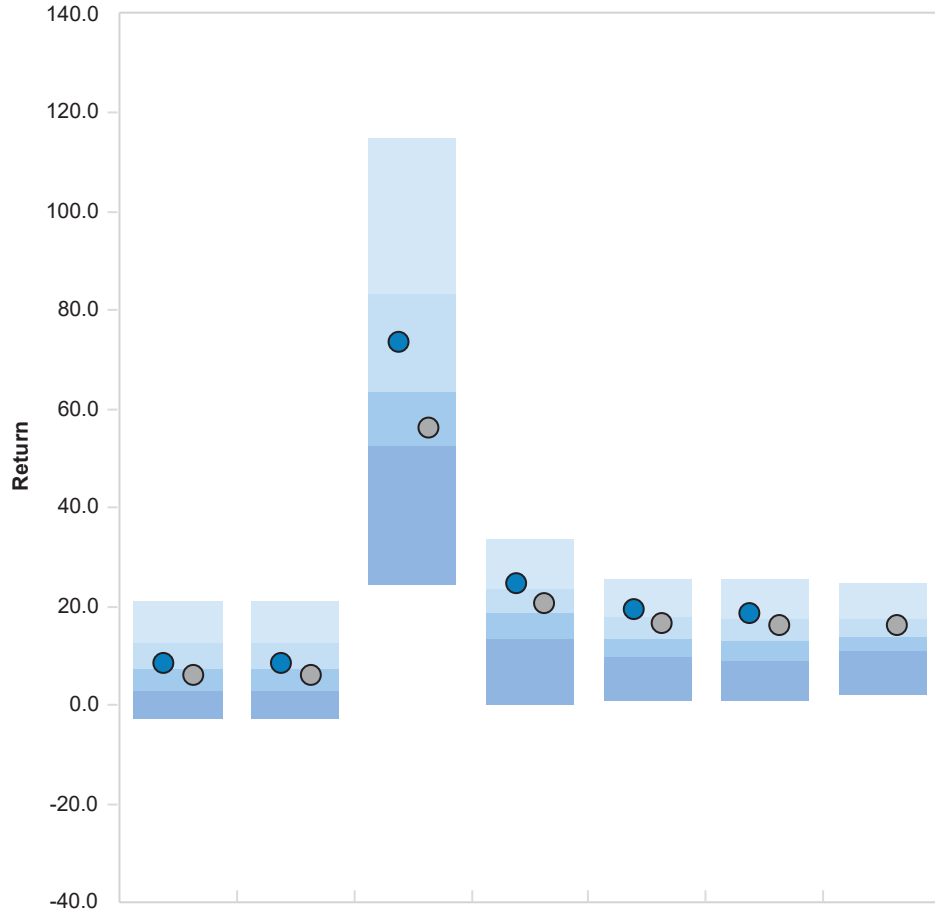
5 Year Rolling Percentile Rank IM U.S. Equity (MF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	0	0	0	0	0
Index	20	18 (90%)	2 (10%)	0 (0%)	0 (0%)

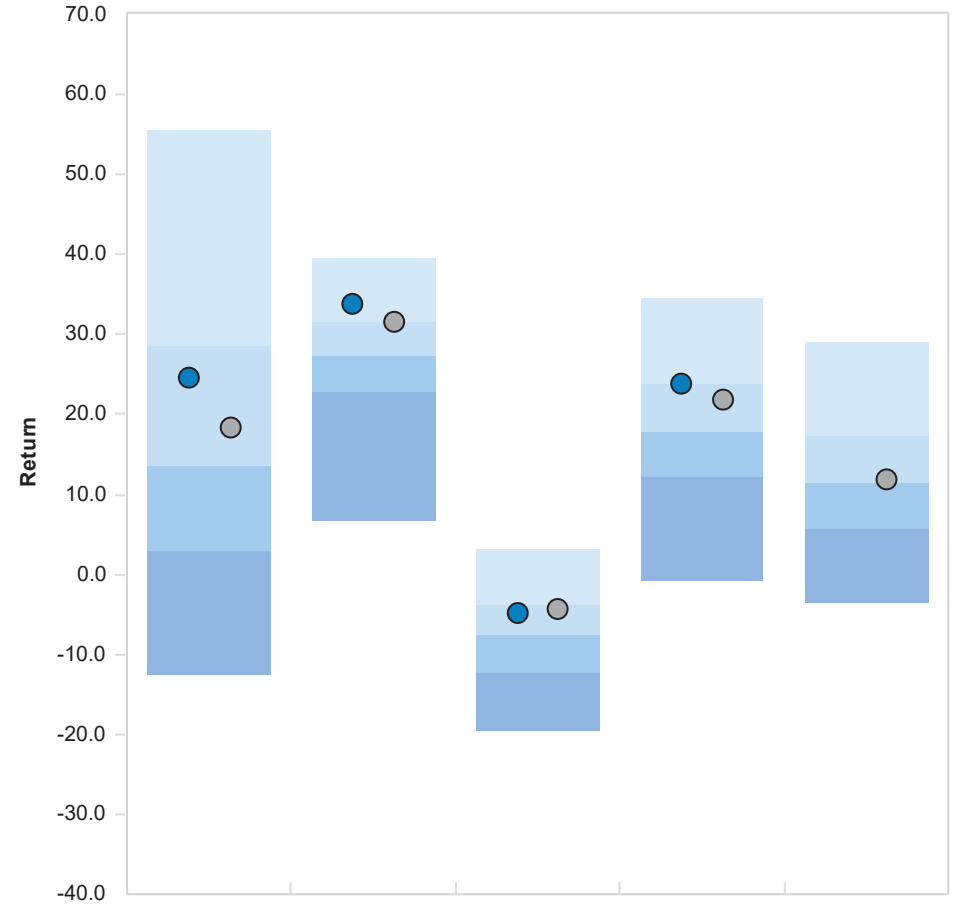


Peer Group Analysis - IM U.S. Equity (MF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	8.36 (45)	8.36 (45)	73.67 (36)	24.92 (20)	19.41 (20)	18.82 (21)	N/A
● Index	6.17 (58)	6.17 (58)	56.35 (66)	20.60 (38)	16.78 (30)	16.08 (32)	16.29 (33)
Median	7.39	7.39	63.57	18.45	13.40	12.84	13.96

Peer Group Analysis - IM U.S. Equity (MF)



	2020	2019	2018	2017	2016
● Investment	24.65 (30)	33.89 (17)	-4.89 (33)	23.74 (26)	N/A
● Index	18.40 (41)	31.49 (26)	-4.38 (29)	21.83 (32)	11.96 (47)
Median	13.66	27.35	-7.49	17.82	11.34

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	19.71 (38)	7.50 (44)	24.53 (37)	-22.22 (47)	8.05 (48)	1.43 (32)
Index	12.15 (71)	8.93 (33)	20.54 (55)	-19.60 (34)	9.07 (32)	1.70 (26)
Median	16.26	6.65	21.51	-23.16	7.91	0.37



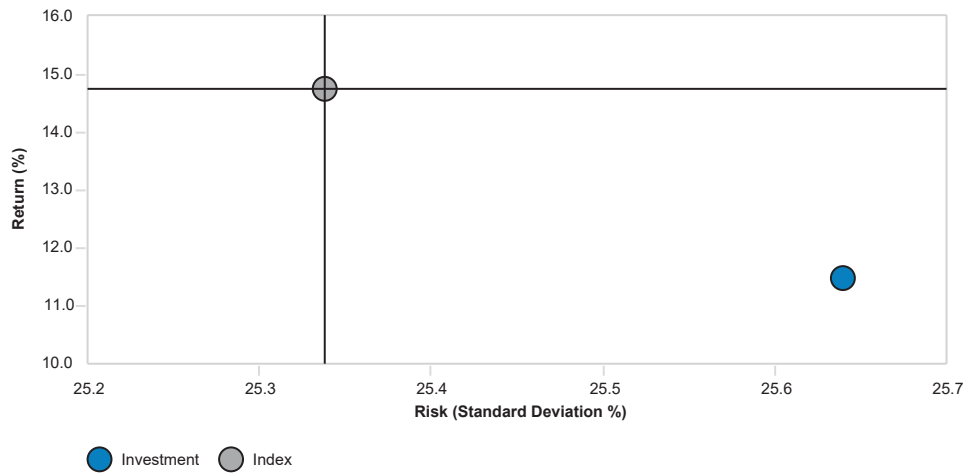
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	11.48	25.64	0.50	96.78	10	105.68	2
Index	14.76	25.34	0.61	100.00	9	100.00	3

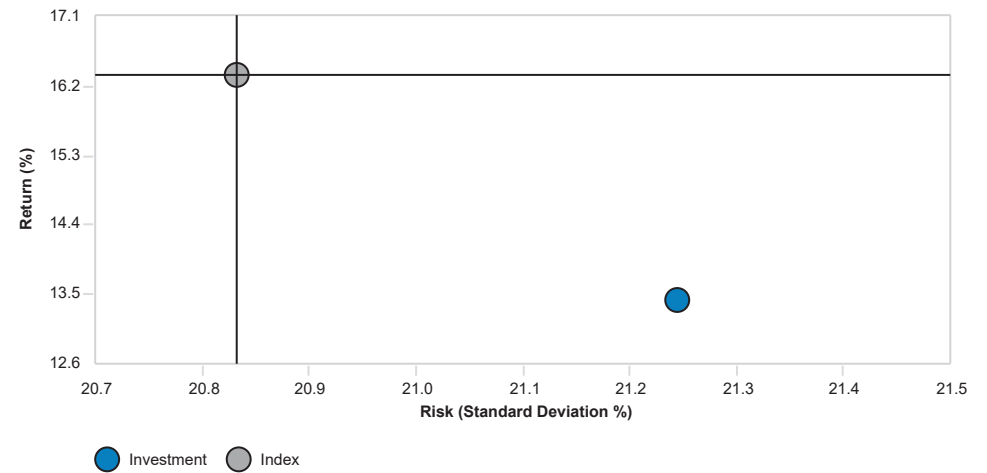
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	13.44	21.25	0.65	96.71	18	107.35	2
Index	16.35	20.83	0.78	100.00	16	100.00	4

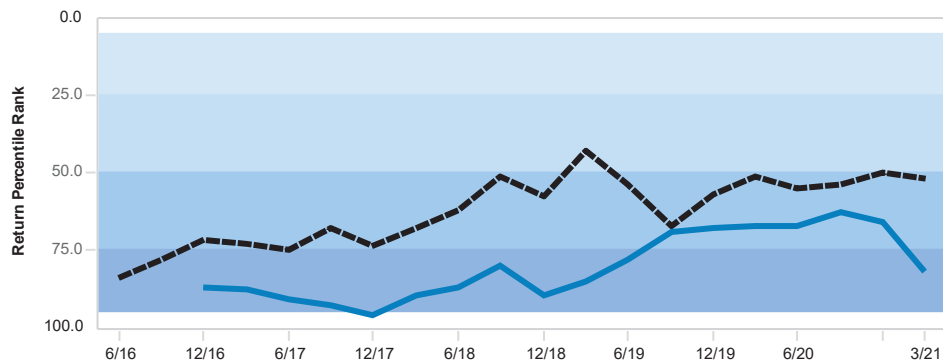
Risk and Return 3 Years



Risk and Return 5 Years

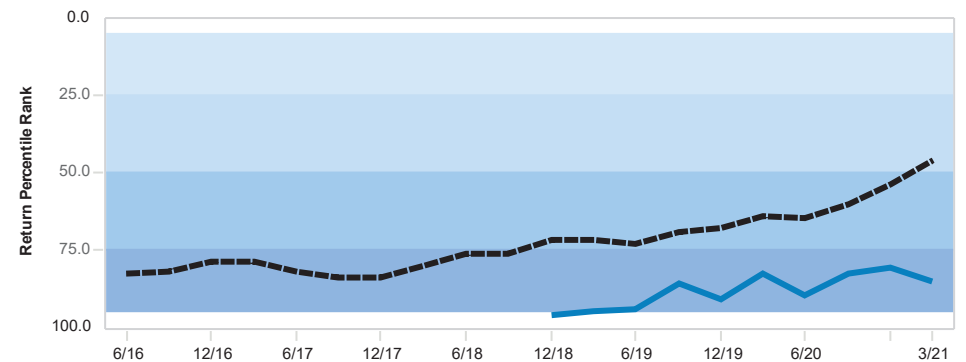


3 Year Rolling Percentile Rank IM U.S. Small Cap Core Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	18	0 (0%)	0 (0%)	6 (33%)	12 (67%)
Index	20	0 (0%)	2 (10%)	16 (80%)	2 (10%)

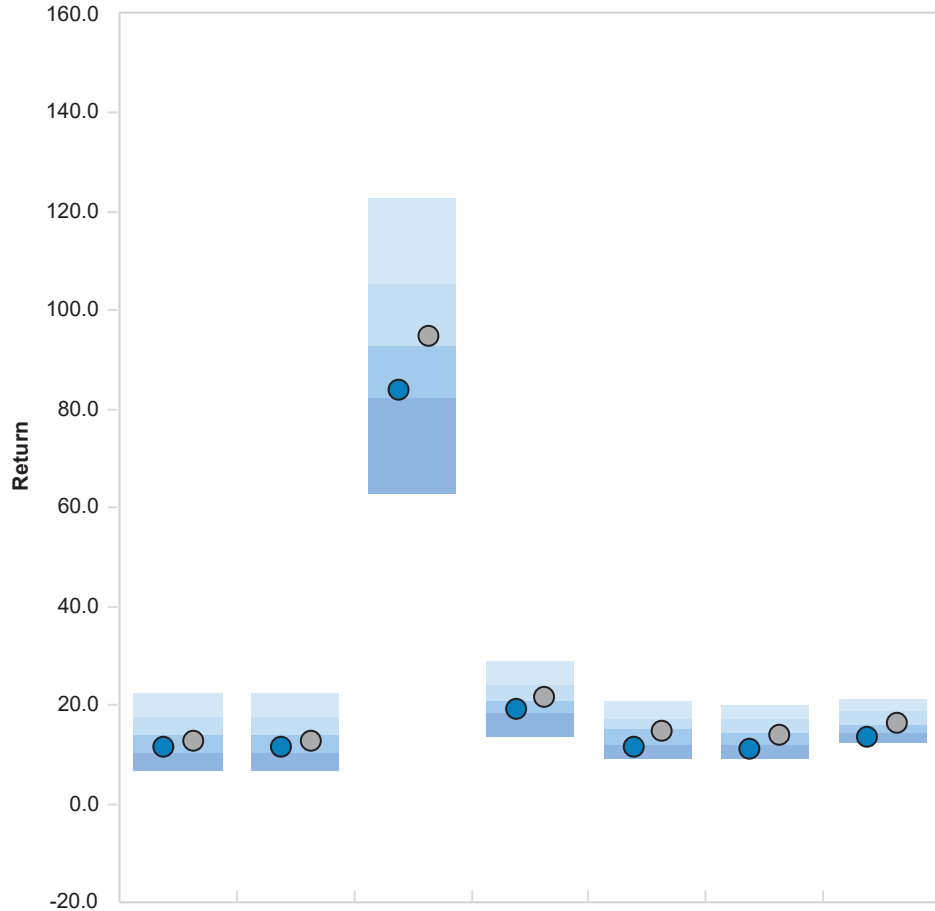
5 Year Rolling Percentile Rank IM U.S. Small Cap Core Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	10	0 (0%)	0 (0%)	0 (0%)	10 (100%)
Index	20	0 (0%)	1 (5%)	9 (45%)	10 (50%)

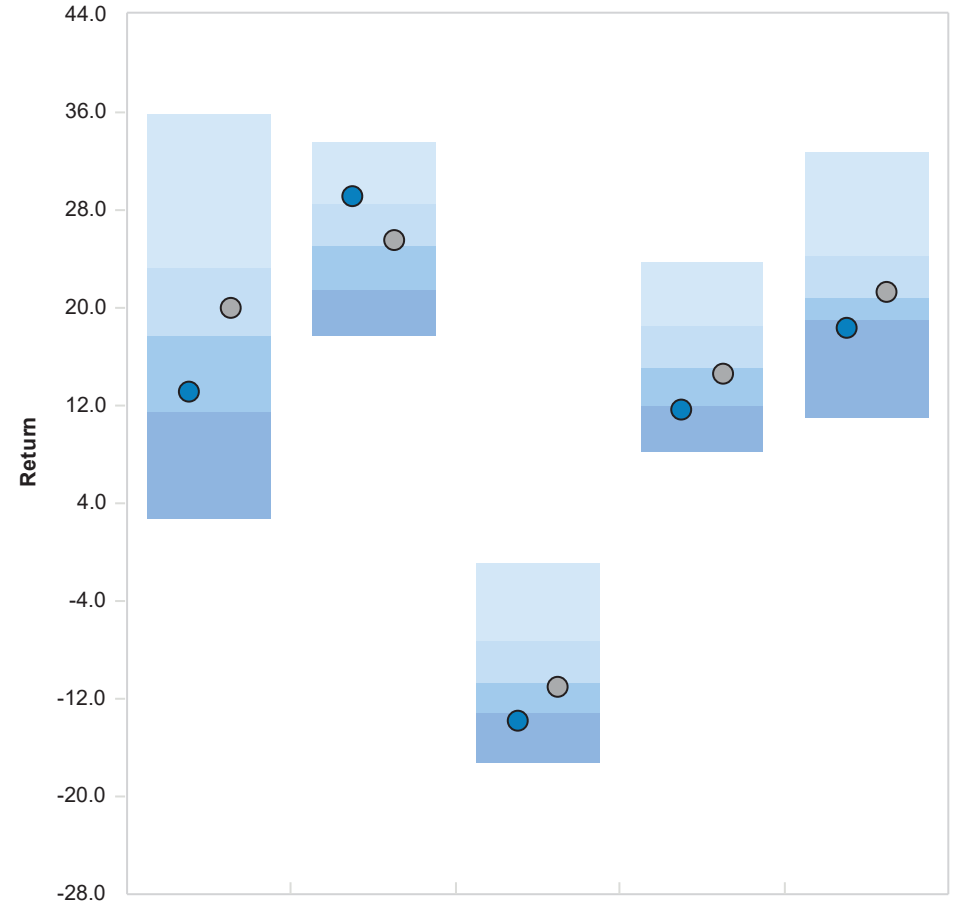


Peer Group Analysis - IM U.S. Small Cap Core Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	11.53 (70)	11.53 (70)	83.84 (73)	19.43 (68)	11.48 (82)	11.03 (84)	13.44 (85)
● Index	12.70 (60)	12.70 (60)	94.85 (44)	21.70 (44)	14.76 (52)	14.01 (57)	16.35 (46)
Median	13.83	13.83	92.88	20.80	15.00	14.44	16.11

Peer Group Analysis - IM U.S. Small Cap Core Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	13.19 (67)	29.19 (24)	-13.87 (81)	11.60 (79)	18.38 (81)
● Index	19.96 (34)	25.53 (50)	-11.01 (56)	14.65 (56)	21.31 (47)
Median	17.76	25.11	-10.69	15.13	20.77

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	28.75 (48)	4.06 (65)	23.03 (69)	-31.33 (46)	8.94 (43)	0.64 (13)
Index	31.37 (28)	4.93 (50)	25.42 (44)	-30.61 (41)	9.94 (21)	-2.40 (66)
Median	28.14	4.85	25.05	-31.61	8.66	-1.69



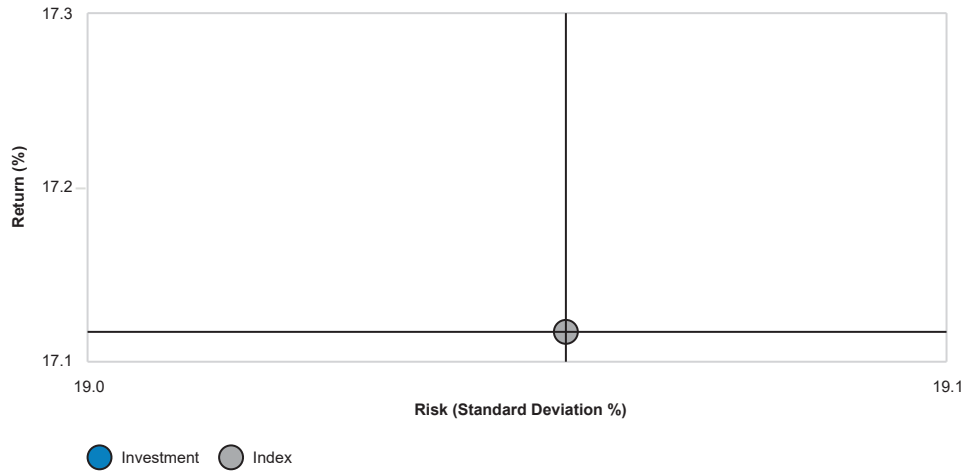
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Index	17.12	19.06	0.85	100.00	10	100.00	2

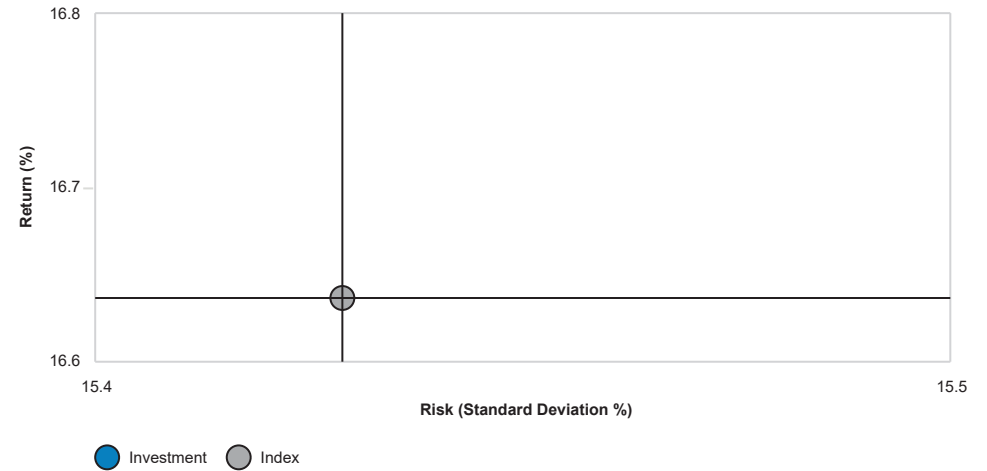
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Index	16.64	15.43	1.00	100.00	17	100.00	3

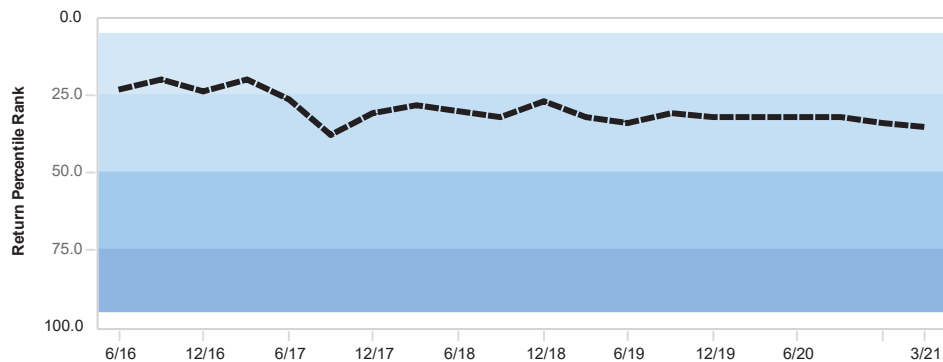
Risk and Return 3 Years



Risk and Return 5 Years

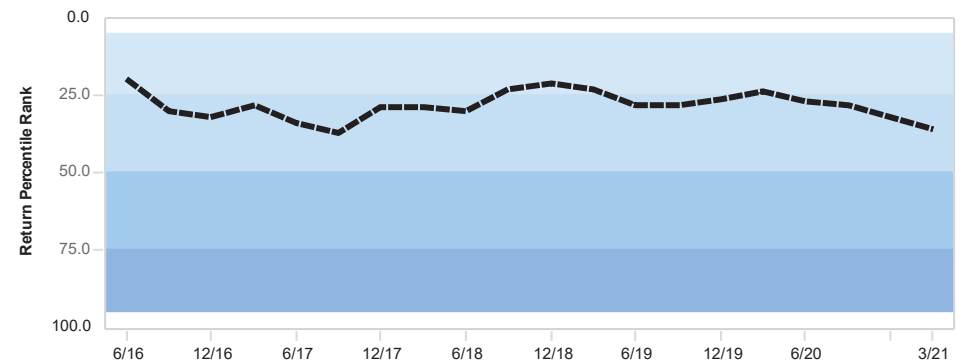


3 Year Rolling Percentile Rank IM U.S. Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	0	0	0	0	0
Index	20	4 (20%)	16 (80%)	0 (0%)	0 (0%)

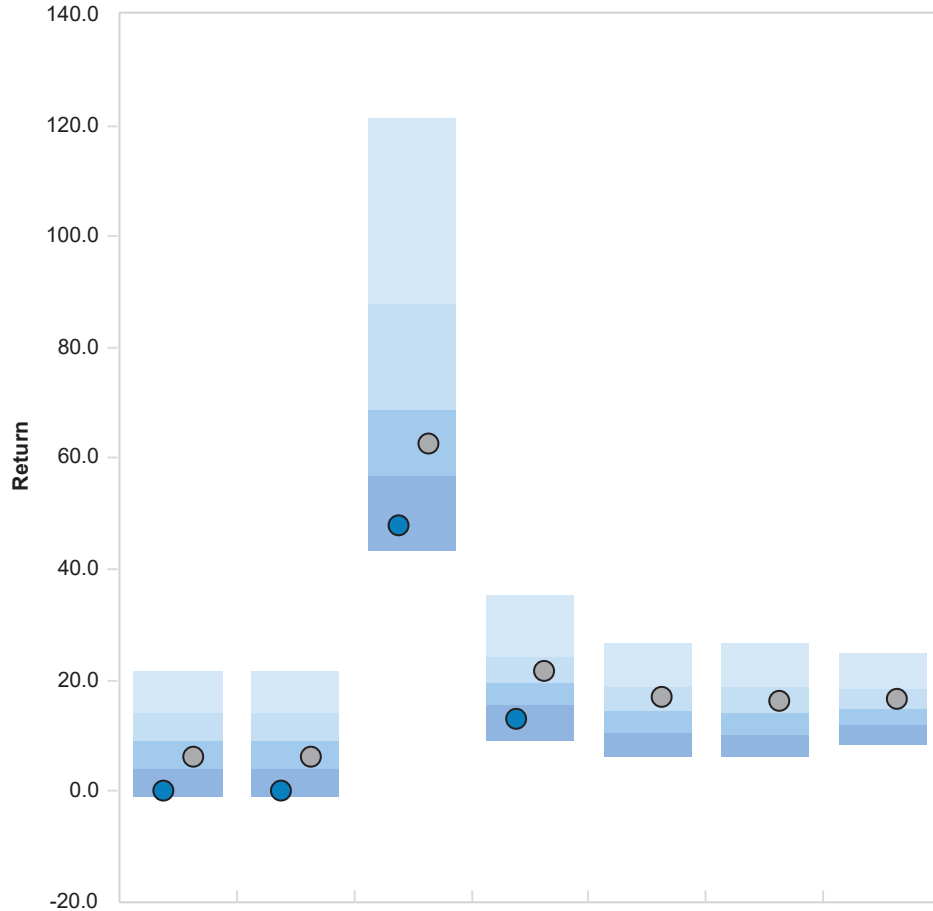
5 Year Rolling Percentile Rank IM U.S. Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	0	0	0	0	0
Index	20	5 (25%)	15 (75%)	0 (0%)	0 (0%)

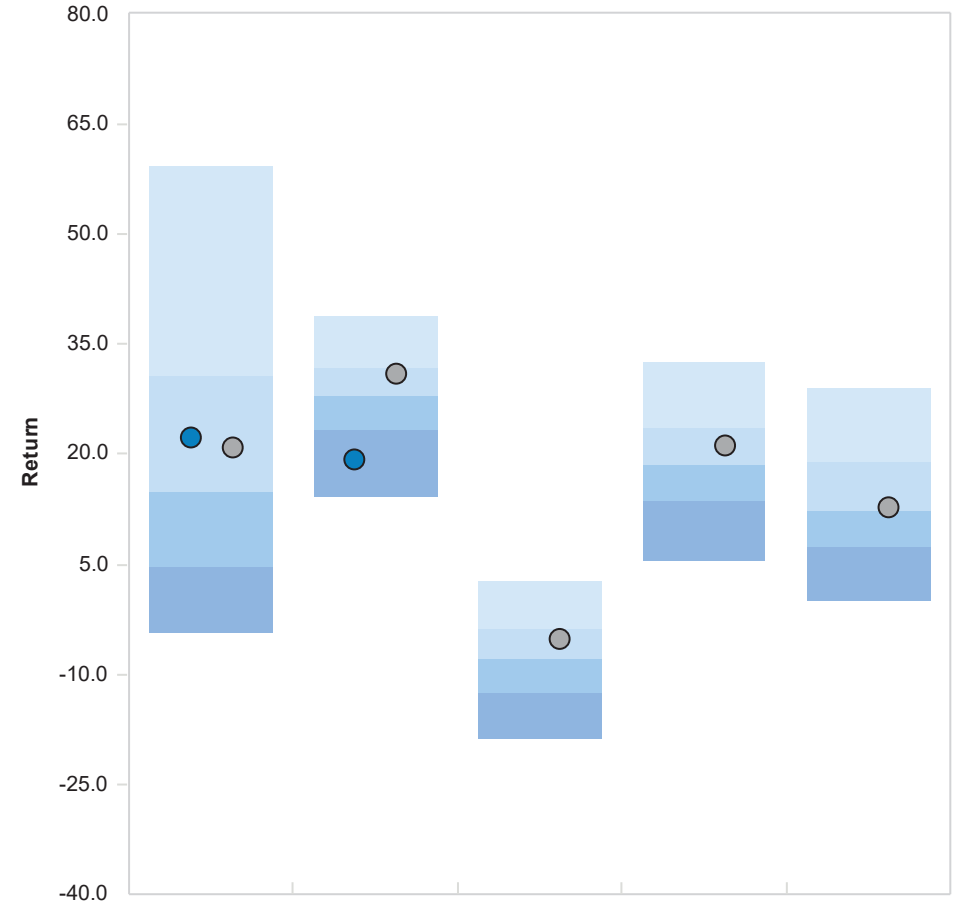


Peer Group Analysis - IM U.S. Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	0.03 (93)	0.03 (93)	47.83 (92)	12.94 (87)	N/A	N/A	N/A
● Index	6.35 (63)	6.35 (63)	62.53 (63)	21.53 (39)	17.12 (35)	16.28 (37)	16.64 (36)
Median	8.99	8.99	68.73	19.66	14.54	14.13	14.87

Peer Group Analysis - IM U.S. Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	22.31 (36)	19.24 (89)	N/A	N/A	N/A
● Index	20.89 (37)	31.02 (30)	-5.24 (35)	21.13 (38)	12.74 (49)
Median	14.85	27.94	-7.76	18.50	12.36

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	12.52 (77)	3.76 (79)	26.58 (30)	-17.23 (19)	6.00 (82)	-3.77 (87)
Index	14.68 (67)	9.21 (29)	22.03 (51)	-20.90 (36)	9.10 (31)	1.16 (34)
Median	18.62	6.84	22.13	-24.57	8.01	0.24



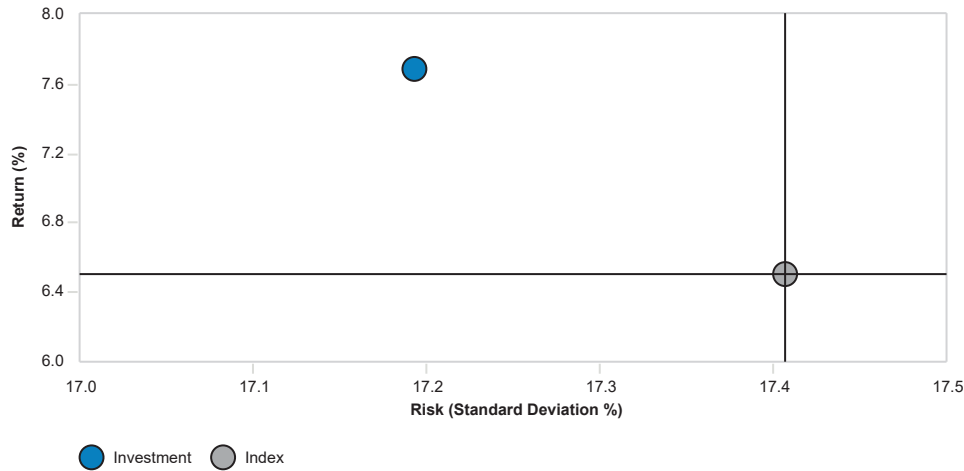
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	7.69	17.19	0.43	100.50	8	95.18	4
Index	6.51	17.41	0.36	100.00	8	100.00	4

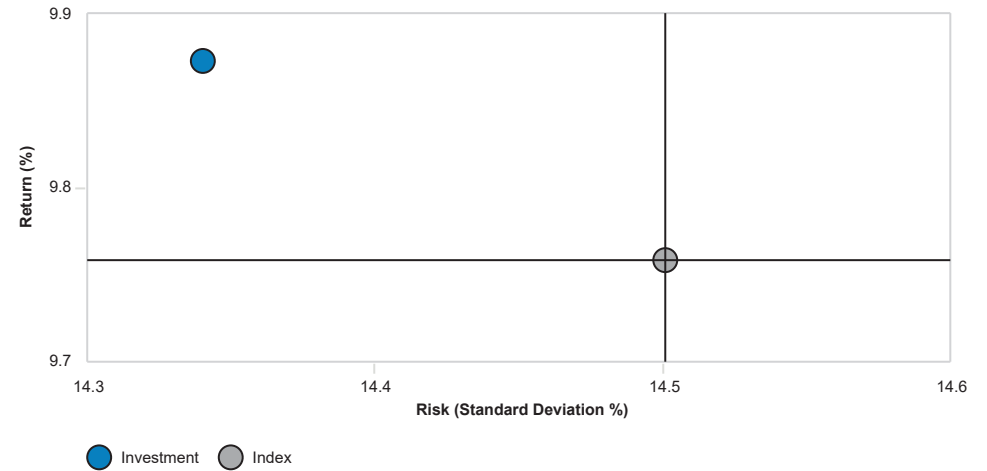
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	9.87	14.34	0.65	98.59	13	96.99	7
Index	9.76	14.50	0.63	100.00	13	100.00	7

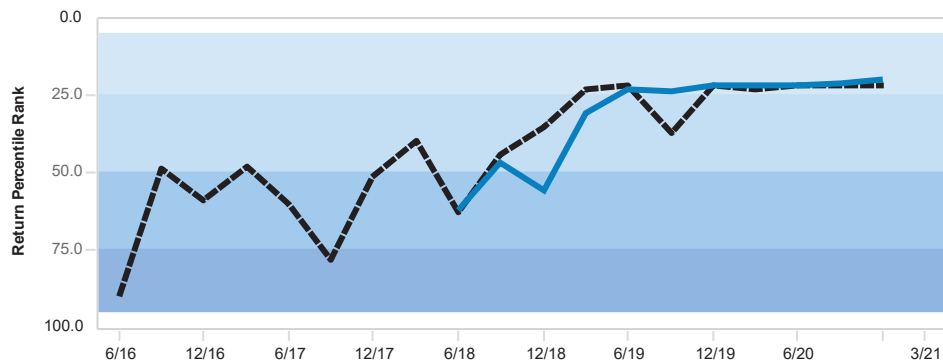
Risk and Return 3 Years



Risk and Return 5 Years

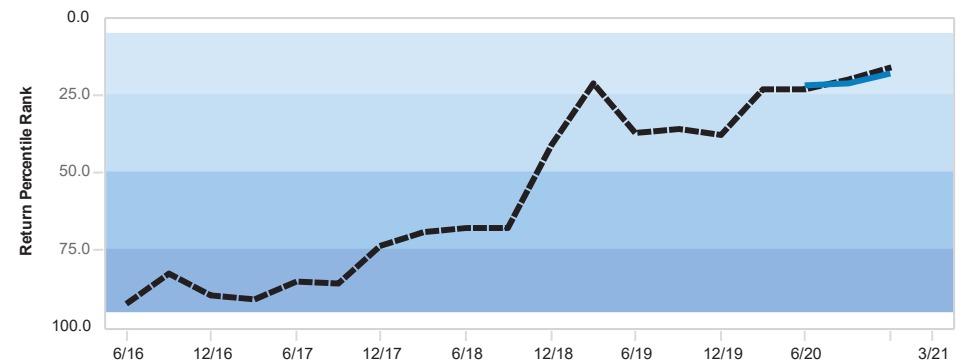


3 Year Rolling Percentile Rank IM Enhanced and Indexed International Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	11	7 (64%)	2 (18%)	2 (18%)	0 (0%)
Index	19	7 (37%)	6 (32%)	4 (21%)	2 (11%)

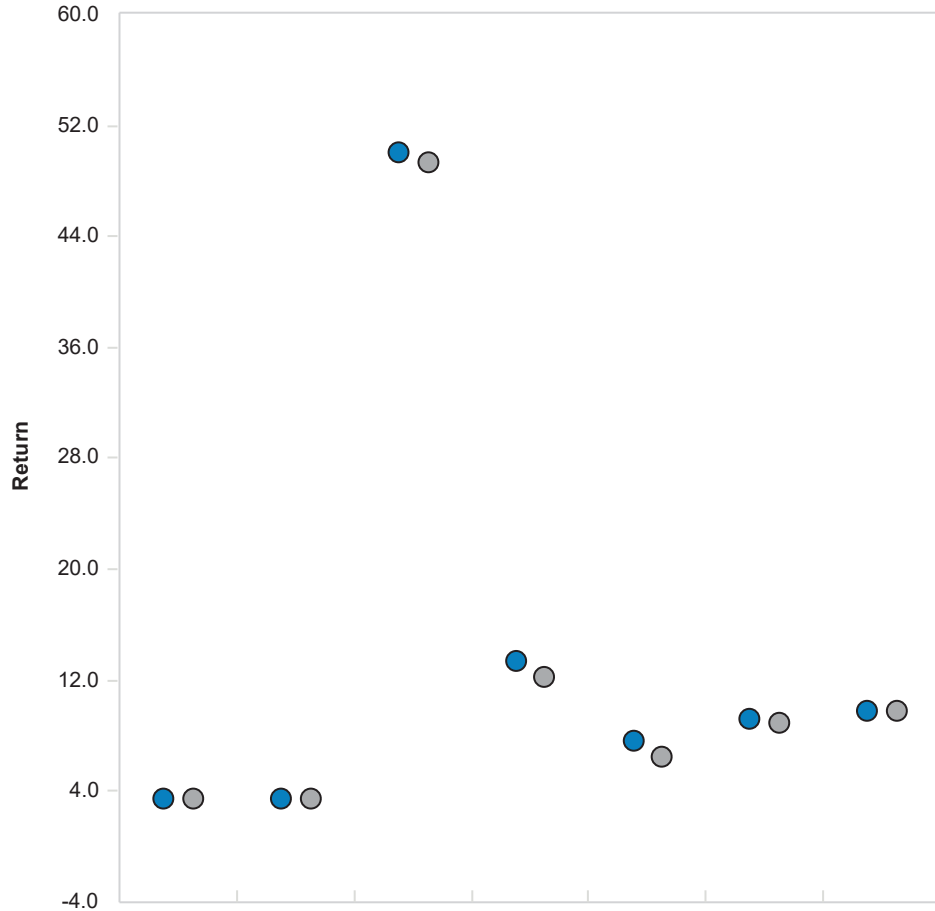
5 Year Rolling Percentile Rank IM Enhanced and Indexed International Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	3	3 (100%)	0 (0%)	0 (0%)	0 (0%)
Index	19	5 (26%)	4 (21%)	4 (21%)	6 (32%)

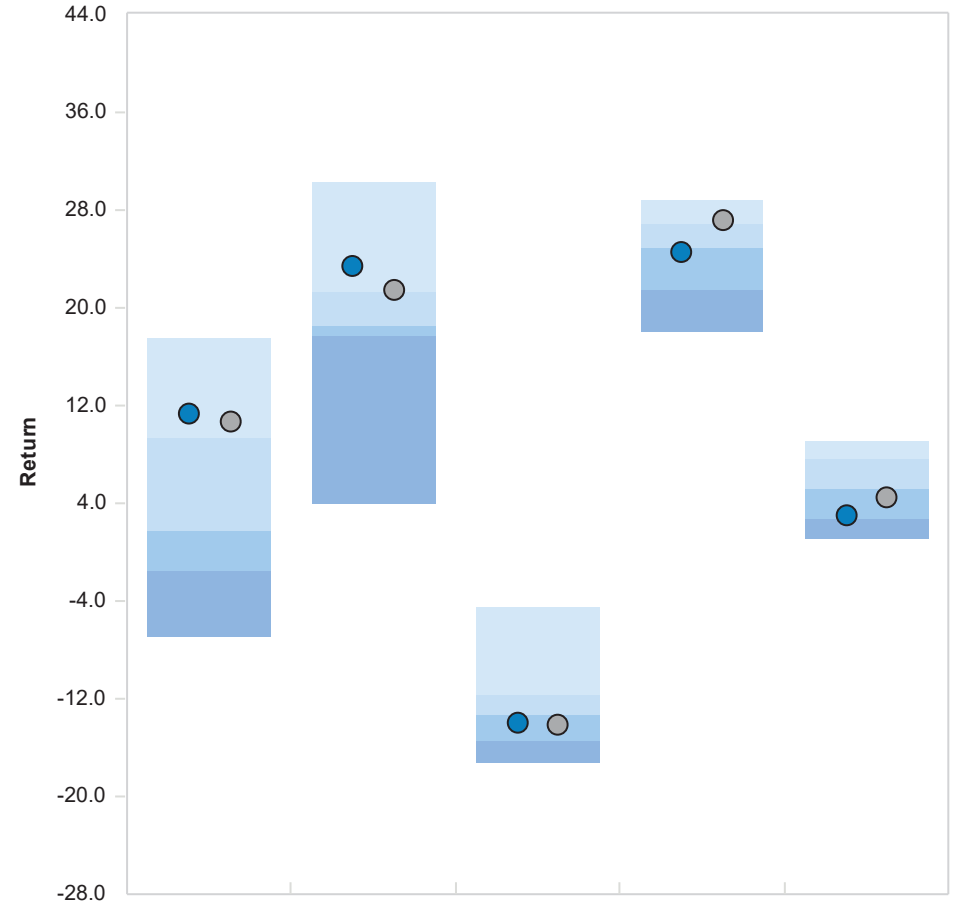


Peer Group Analysis - IM Enhanced and Indexed International Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	3.54 (N/A)	3.54 (N/A)	50.07 (N/A)	13.39 (N/A)	7.69 (N/A)	9.29 (N/A)	9.87 (N/A)
● Index	3.49 (N/A)	3.49 (N/A)	49.41 (N/A)	12.31 (N/A)	6.51 (N/A)	8.93 (N/A)	9.76 (N/A)
Median	N/A	N/A	N/A	N/A	N/A	N/A	N/A

Peer Group Analysis - IM Enhanced and Indexed International Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	11.27 (16)	23.42 (19)	-13.88 (55)	24.56 (54)	3.01 (68)
● Index	10.65 (21)	21.51 (24)	-14.20 (57)	27.19 (20)	4.50 (54)
Median	1.79	18.50	-13.30	24.84	5.10

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	17.31 (30)	6.27 (18)	16.26 (21)	-23.23 (32)	8.29 (48)	-0.85 (23)
Index	17.01 (32)	6.25 (18)	16.12 (25)	-23.36 (33)	8.92 (30)	-1.80 (55)
Median	15.02	3.84	14.90	-25.62	8.19	-1.71



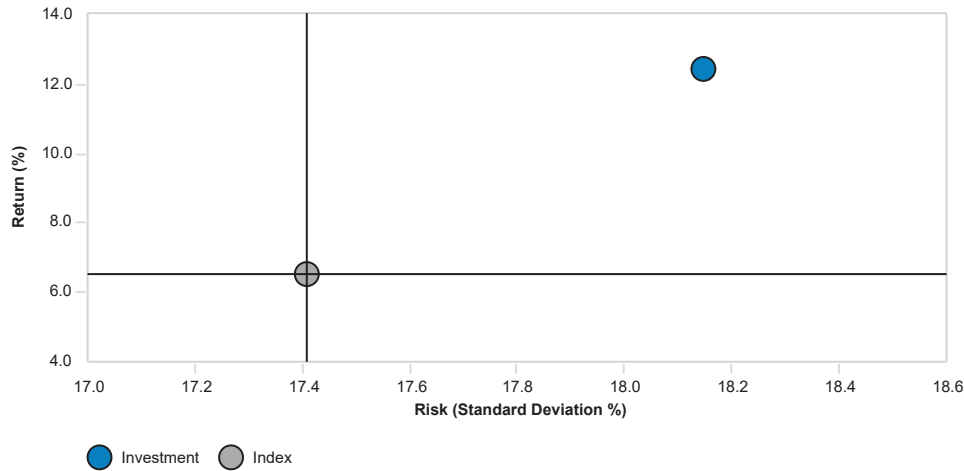
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	12.42	18.15	0.65	113.45	8	90.19	4
Index	6.51	17.41	0.36	100.00	8	100.00	4

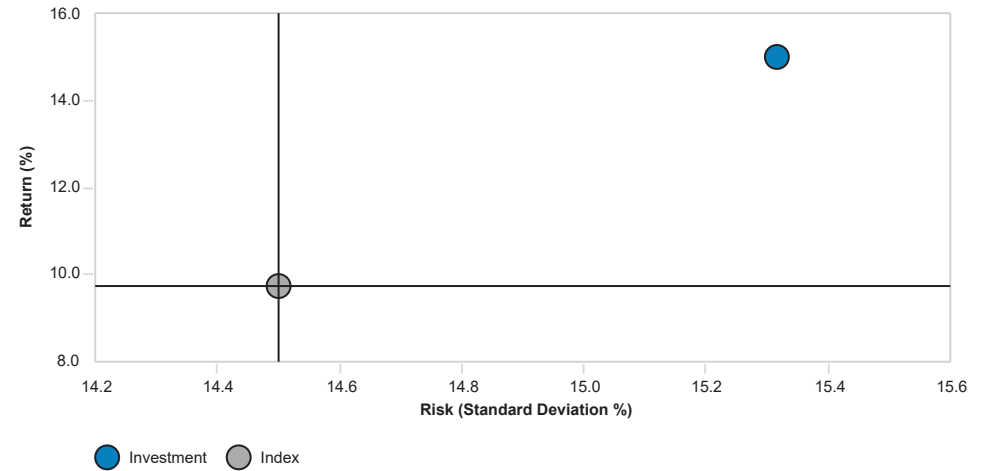
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	15.05	15.32	0.92	114.10	13	90.34	7
Index	9.76	14.50	0.63	100.00	13	100.00	7

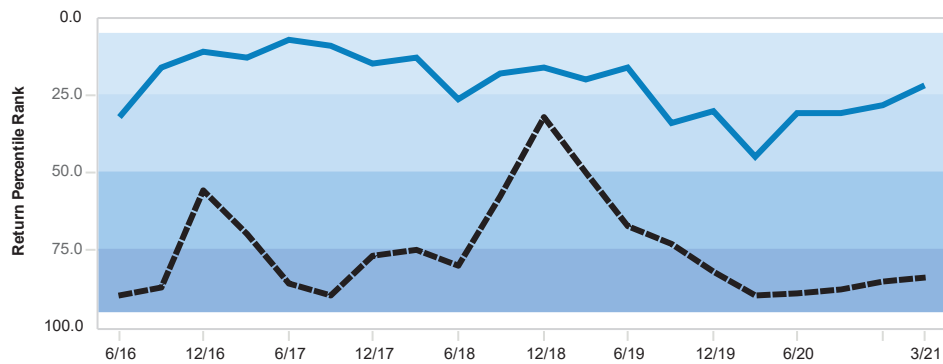
Risk and Return 3 Years



Risk and Return 5 Years

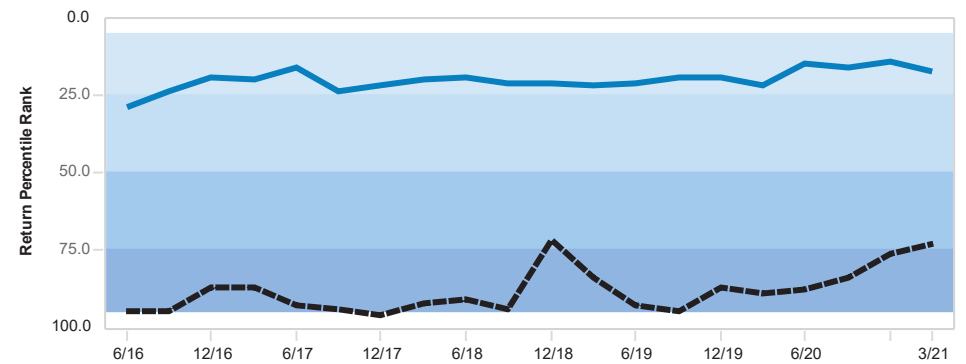


3 Year Rolling Percentile Rank IM International Large Cap Growth Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	12 (60%)	8 (40%)	0 (0%)	0 (0%)
Index	20	0 (0%)	2 (10%)	6 (30%)	12 (60%)

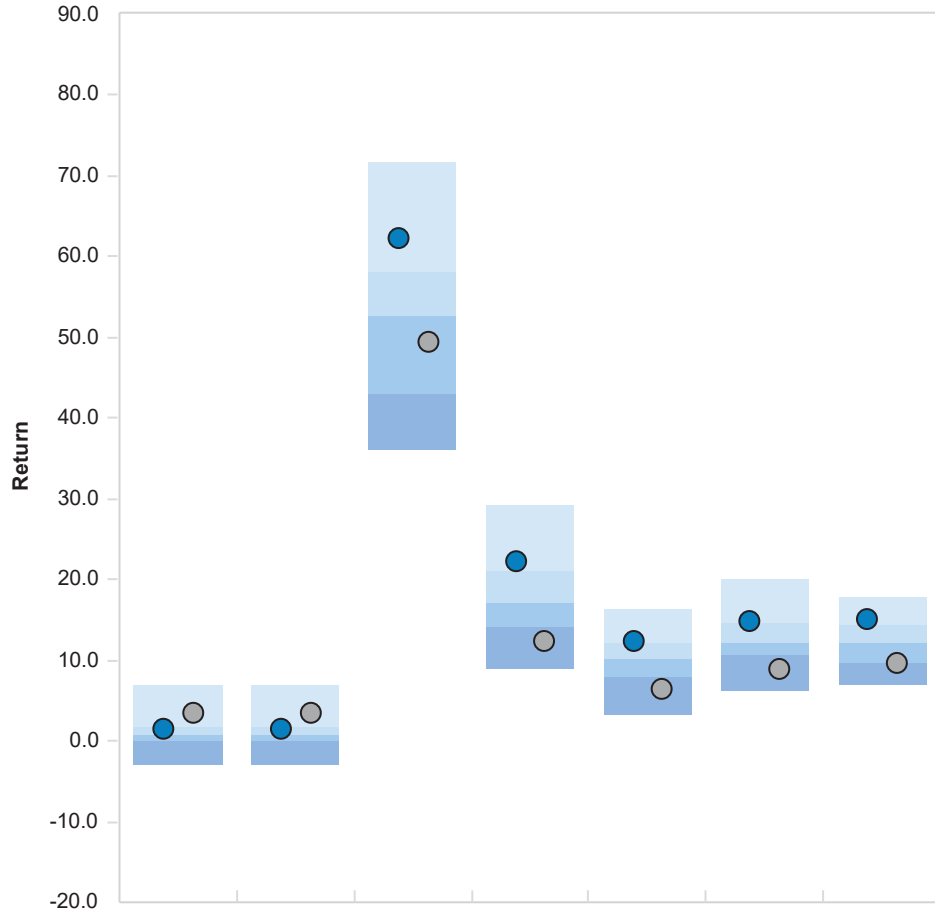
5 Year Rolling Percentile Rank IM International Large Cap Growth Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	19 (95%)	1 (5%)	0 (0%)	0 (0%)
Index	20	0 (0%)	0 (0%)	2 (10%)	18 (90%)

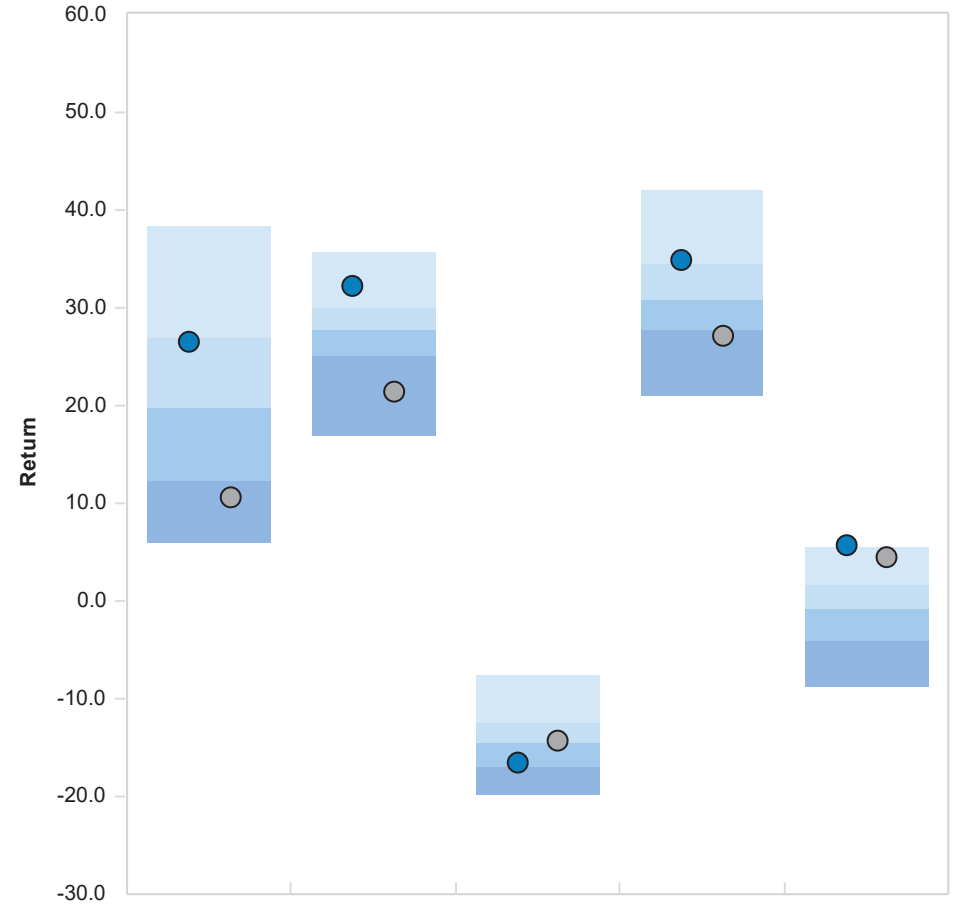


Peer Group Analysis - IM International Large Cap Growth Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	1.63 (29)	1.63 (29)	62.29 (16)	22.21 (21)	12.42 (22)	14.94 (24)	15.05 (17)
● Index	3.49 (15)	3.49 (15)	49.41 (61)	12.31 (88)	6.51 (84)	8.93 (84)	9.76 (73)
Median	0.81	0.81	52.62	17.15	10.04	12.15	12.07

Peer Group Analysis - IM International Large Cap Growth Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	26.60 (28)	32.23 (15)	-16.57 (69)	34.83 (24)	5.77 (5)
● Index	10.65 (80)	21.51 (87)	-14.20 (49)	27.19 (80)	4.50 (7)
Median	19.86	27.69	-14.46	30.80	-0.74

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	14.94 (46)	10.66 (31)	25.55 (10)	-20.73 (68)	12.15 (9)	-1.82 (61)
Index	17.01 (22)	6.25 (88)	16.12 (79)	-23.36 (90)	8.92 (63)	-1.80 (61)
Median	14.30	8.92	19.28	-19.38	9.64	-1.60



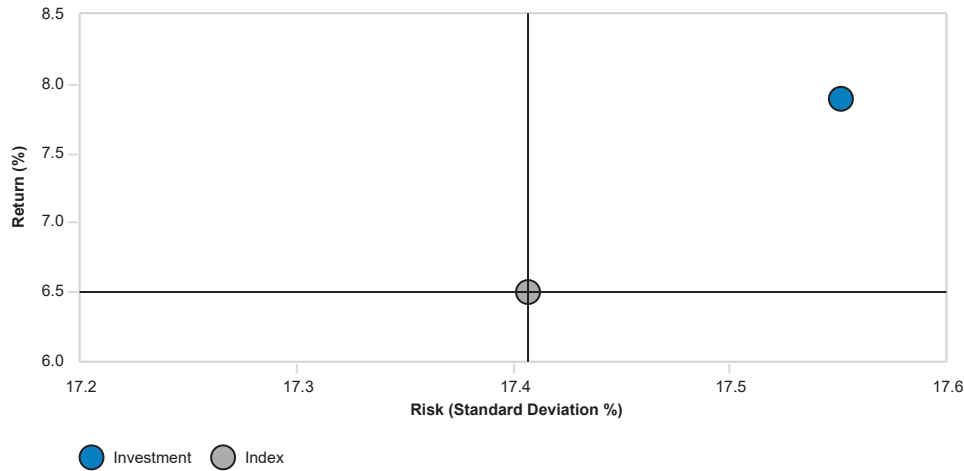
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	7.90	17.55	0.44	103.10	8	97.48	4
Index	6.51	17.41	0.36	100.00	8	100.00	4

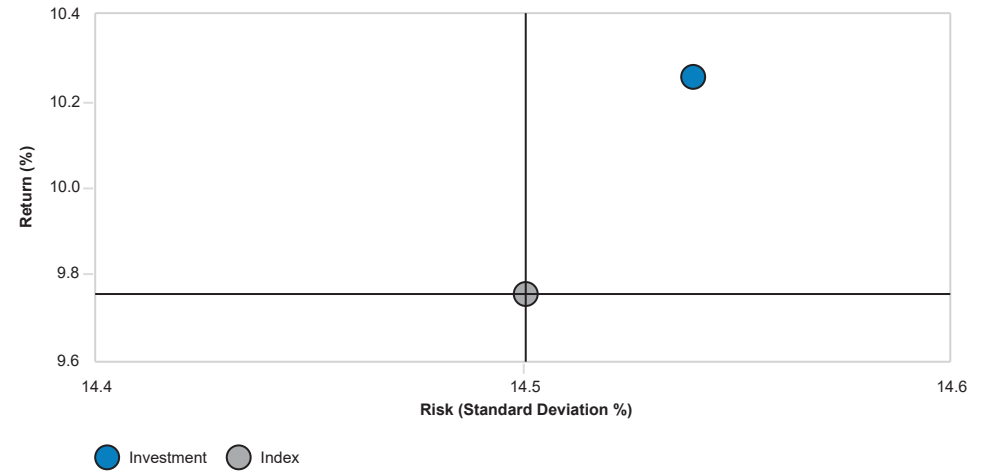
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	10.26	14.54	0.66	99.81	13	96.43	7
Index	9.76	14.50	0.63	100.00	13	100.00	7

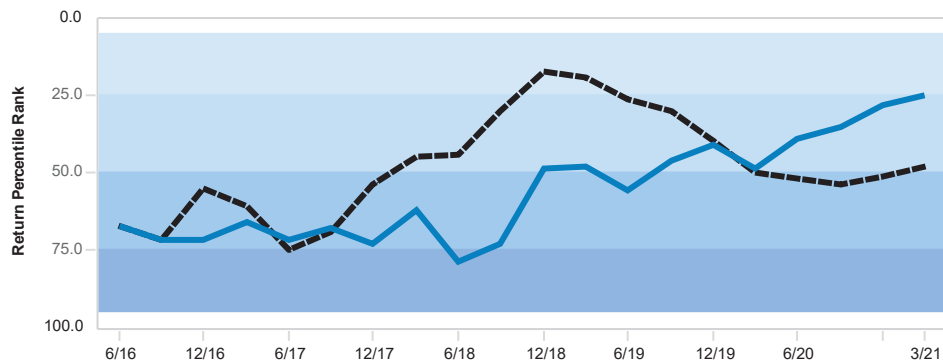
Risk and Return 3 Years



Risk and Return 5 Years

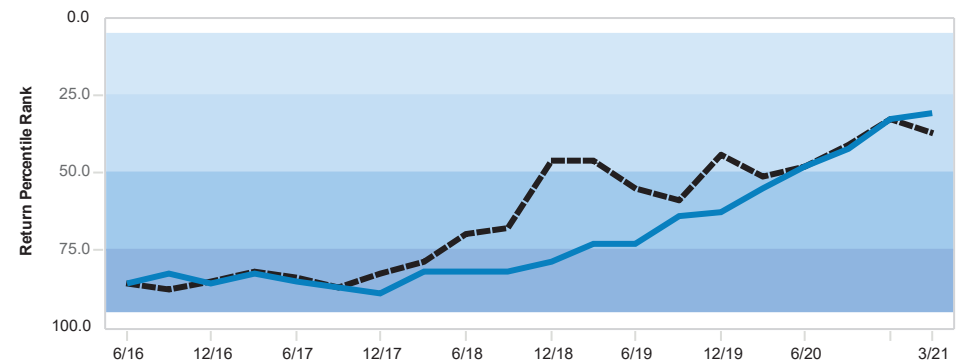


3 Year Rolling Percentile Rank IM International Large Cap Core Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	1 (5%)	8 (40%)	10 (50%)	1 (5%)
Index	20	2 (10%)	8 (40%)	10 (50%)	0 (0%)

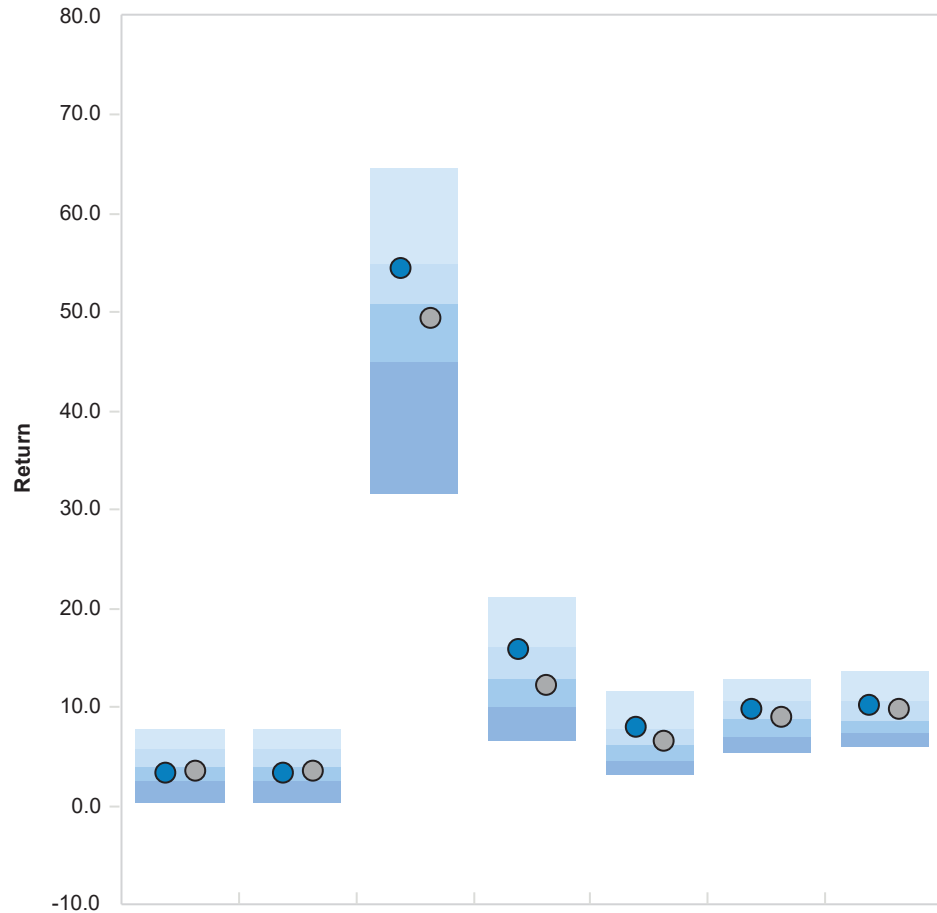
5 Year Rolling Percentile Rank IM International Large Cap Core Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	0 (0%)	4 (20%)	5 (25%)	11 (55%)
Index	20	0 (0%)	7 (35%)	5 (25%)	8 (40%)

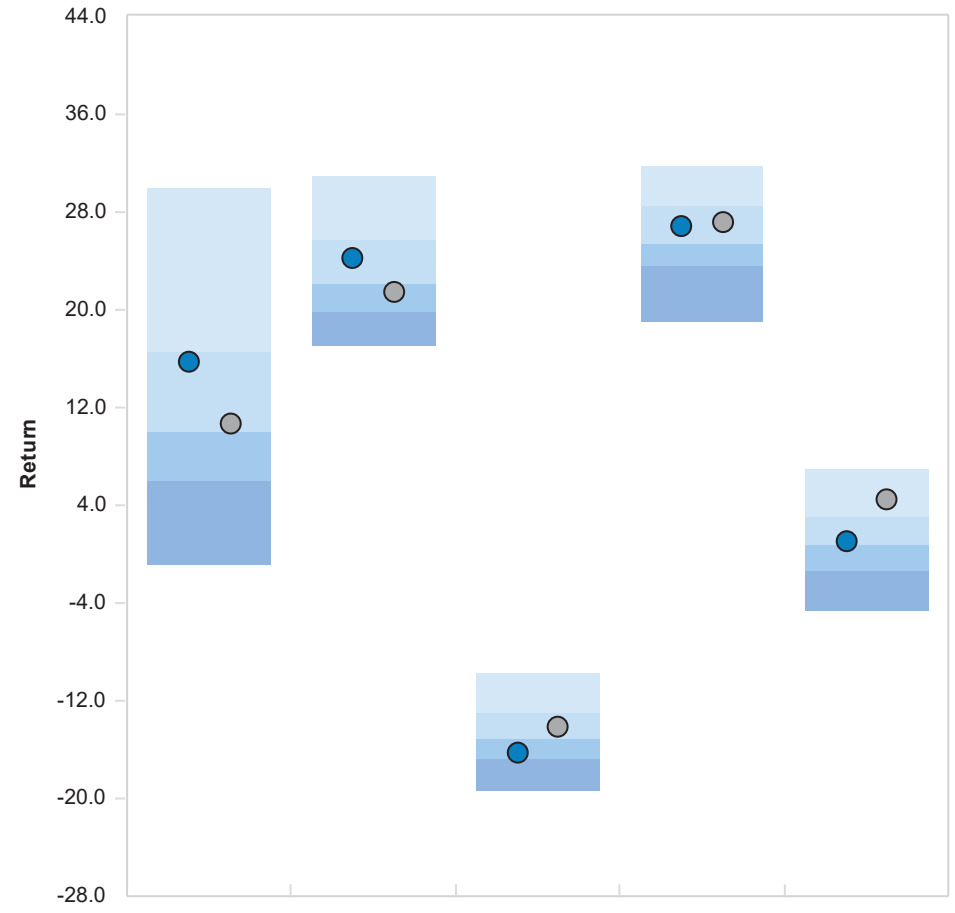


Peer Group Analysis - IM International Large Cap Core Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	3.38 (61)	3.38 (61)	54.45 (29)	15.81 (27)	7.90 (25)	9.88 (37)	10.26 (31)
● Index	3.49 (61)	3.49 (61)	49.41 (55)	12.31 (54)	6.51 (48)	8.93 (49)	9.76 (37)
Median	3.93	3.93	50.94	12.92	6.27	8.72	8.60

Peer Group Analysis - IM International Large Cap Core Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	15.83 (27)	24.24 (34)	-16.33 (70)	26.92 (36)	1.10 (47)
● Index	10.65 (47)	21.51 (59)	-14.20 (42)	27.19 (34)	4.50 (17)
Median	9.96	22.16	-15.04	25.42	0.81

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	17.20 (23)	7.03 (45)	19.09 (18)	-22.47 (46)	8.92 (48)	-0.25 (14)
Index	17.01 (26)	6.25 (53)	16.12 (58)	-23.36 (60)	8.92 (48)	-1.80 (56)
Median	15.47	6.39	16.66	-22.71	8.88	-1.63



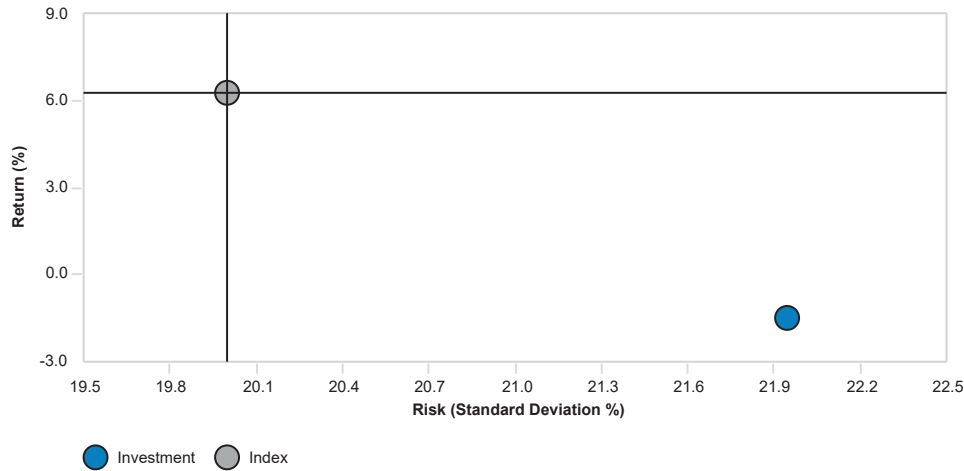
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	-1.47	21.94	-0.02	95.34	6	126.90	6
Index	6.32	20.00	0.33	100.00	7	100.00	5

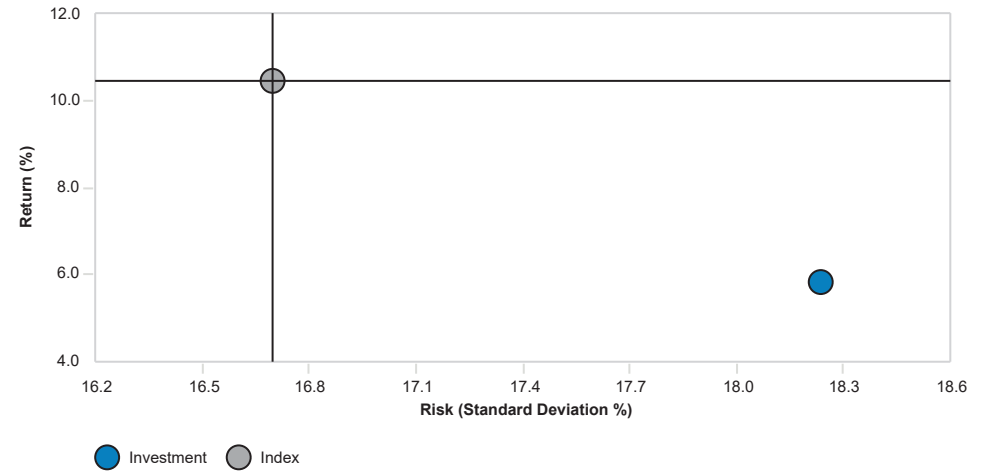
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	5.86	18.24	0.34	95.93	12	117.88	8
Index	10.50	16.70	0.61	100.00	13	100.00	7

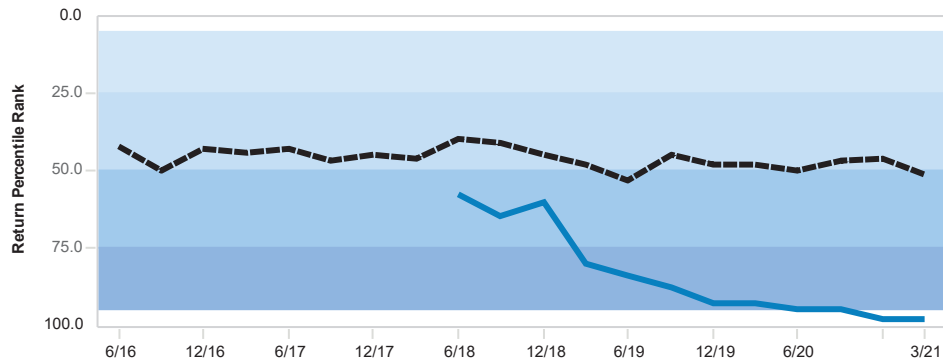
Risk and Return 3 Years



Risk and Return 5 Years

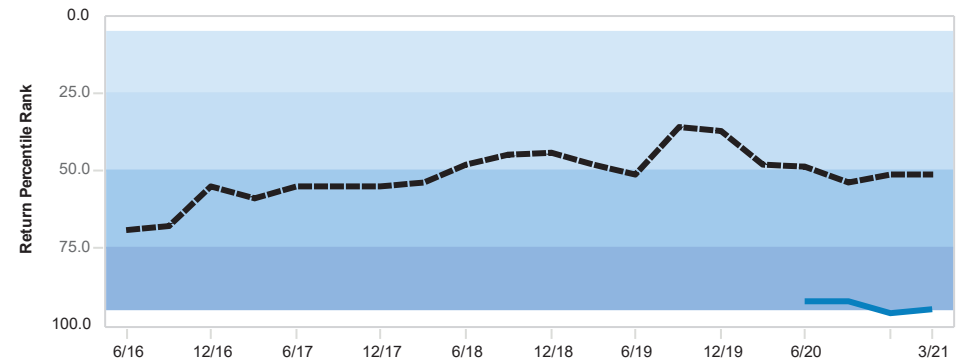


3 Year Rolling Percentile Rank IM International Small Cap Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	12	0 (0%)	0 (0%)	3 (25%)	9 (75%)
Index	20	0 (0%)	18 (90%)	2 (10%)	0 (0%)

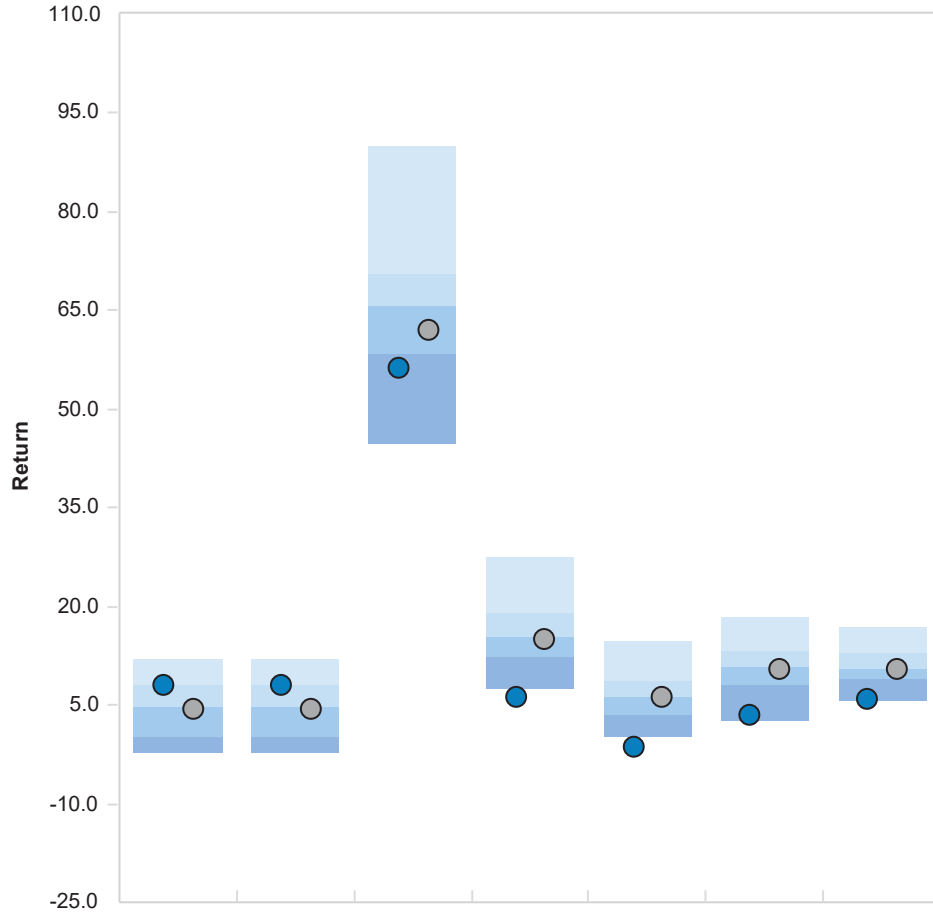
5 Year Rolling Percentile Rank IM International Small Cap Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	4	0 (0%)	0 (0%)	0 (0%)	4 (100%)
Index	20	0 (0%)	8 (40%)	12 (60%)	0 (0%)

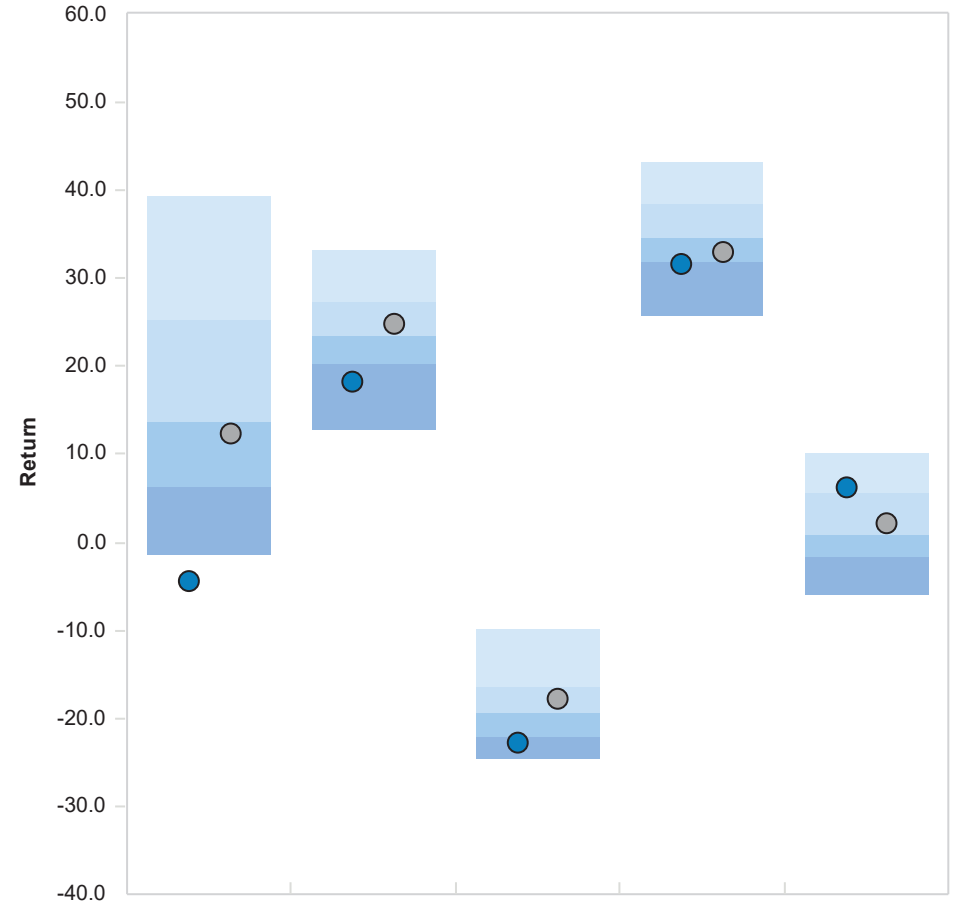


Peer Group Analysis - IM International Small Cap Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	8.14 (22)	8.14 (22)	56.27 (81)	6.28 (98)	-1.47 (98)	3.48 (95)	5.86 (95)
● Index	4.50 (53)	4.50 (53)	61.98 (60)	15.15 (52)	6.32 (51)	10.37 (54)	10.50 (51)
Median	4.80	4.80	65.70	15.23	6.39	10.75	10.51

Peer Group Analysis - IM International Small Cap Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	-4.29 (98)	18.21 (83)	-22.85 (82)	31.71 (76)	6.26 (20)
● Index	12.34 (54)	24.96 (40)	-17.89 (35)	33.01 (63)	2.18 (41)
Median	13.69	23.39	-19.27	34.52	0.73

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	15.33 (60)	8.38 (83)	15.61 (94)	-33.77 (91)	11.95 (50)	-1.22 (23)
Index	17.27 (42)	10.25 (49)	19.88 (66)	-27.52 (53)	11.52 (56)	-0.44 (11)
Median	16.47	10.23	21.45	-27.03	11.88	-2.10



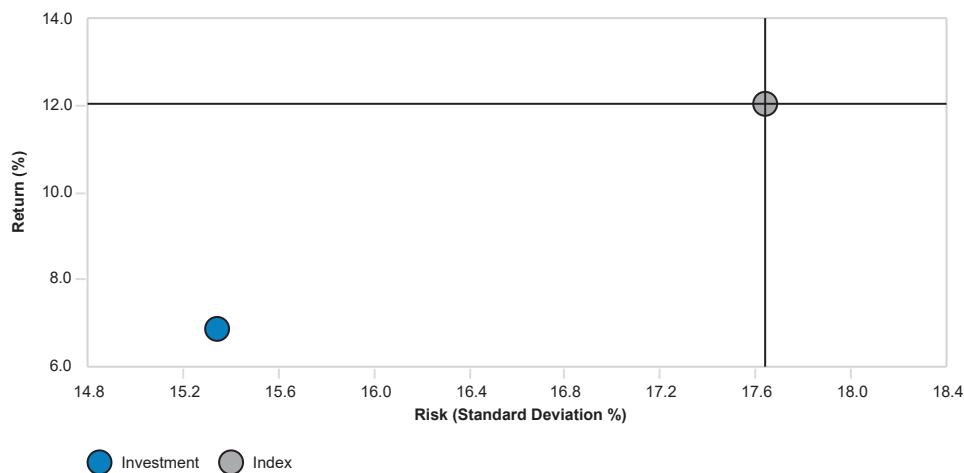
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	6.87	15.34	0.41	78.19	8	91.57	4
Index	12.07	17.64	0.65	100.00	9	100.00	3

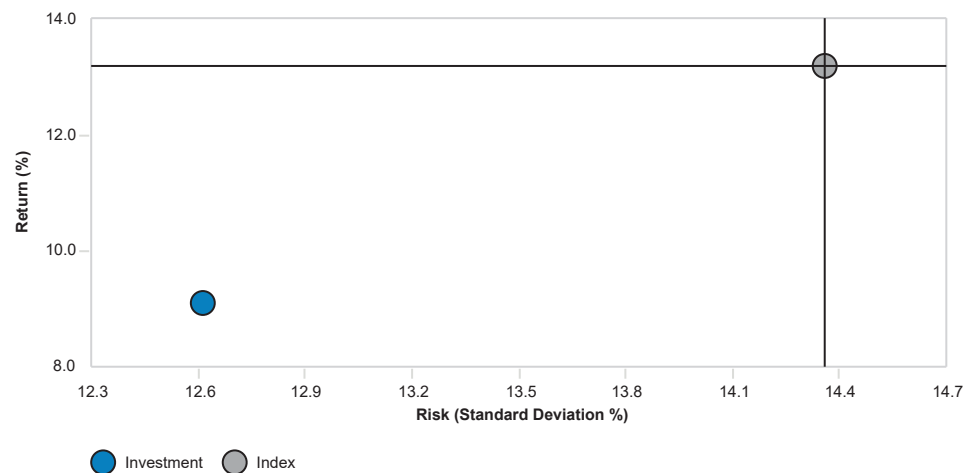
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	9.11	12.61	0.66	78.86	15	87.93	5
Index	13.21	14.36	0.85	100.00	16	100.00	4

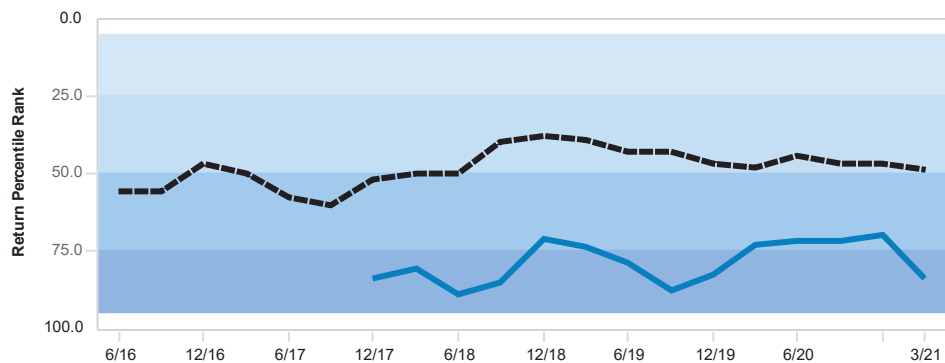
Risk and Return 3 Years



Risk and Return 5 Years

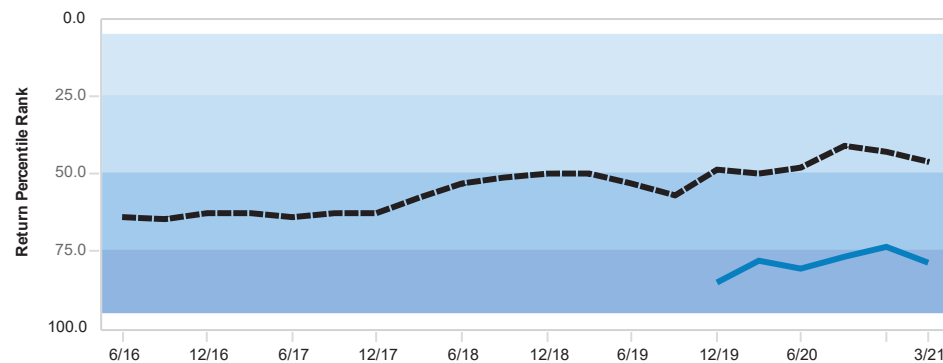


3 Year Rolling Percentile Rank IM Global Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	14	0 (0%)	0 (0%)	6 (43%)	8 (57%)
Index	20	0 (0%)	15 (75%)	5 (25%)	0 (0%)

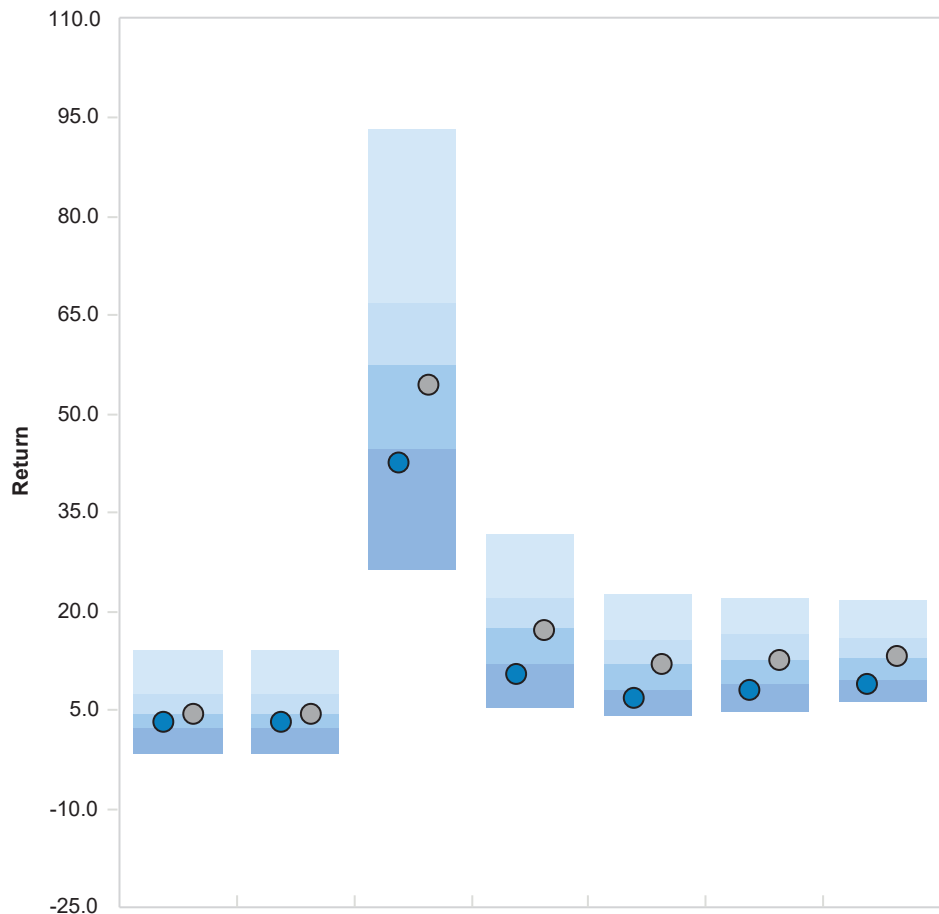
5 Year Rolling Percentile Rank IM Global Equity (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	6	0 (0%)	0 (0%)	1 (17%)	5 (83%)
Index	20	0 (0%)	8 (40%)	12 (60%)	0 (0%)

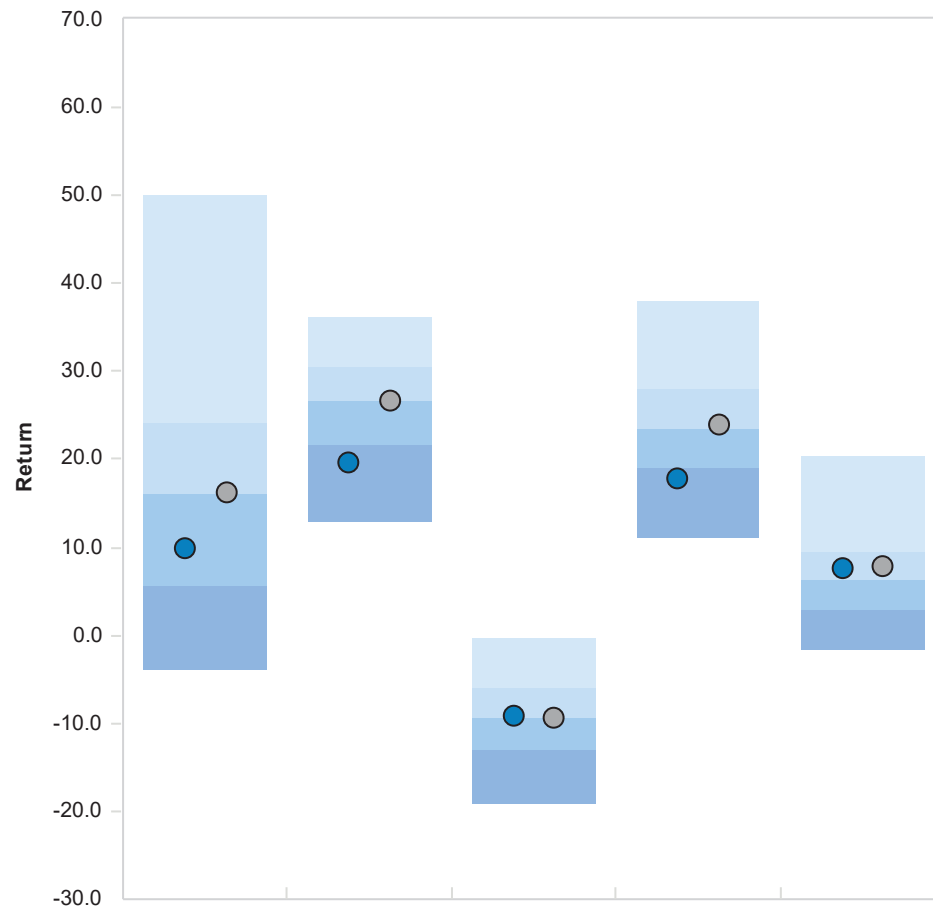


Peer Group Analysis - IM Global Equity (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	3.08 (64)	3.08 (64)	42.69 (78)	10.41 (83)	6.87 (84)	8.07 (81)	9.11 (79)
● Index	4.57 (49)	4.57 (49)	54.60 (56)	17.13 (51)	12.07 (49)	12.76 (50)	13.21 (46)
Median	4.40	4.40	57.64	17.37	11.95	12.66	12.80

Peer Group Analysis - IM Global Equity (SA+CF)



	2020	2019	2018	2017	2016
● Investment	9.86 (66)	19.58 (83)	-9.09 (48)	17.92 (80)	7.71 (37)
● Index	16.25 (50)	26.60 (51)	-9.42 (50)	23.97 (47)	7.86 (36)
Median	16.08	26.66	-9.42	23.48	6.22

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	13.22 (61)	7.22 (59)	14.03 (80)	-20.64 (50)	9.08 (42)	-2.67 (87)
Index	14.68 (47)	8.13 (49)	19.22 (51)	-21.37 (58)	8.95 (44)	-0.03 (44)
Median	14.14	8.00	19.30	-20.68	8.61	-0.38



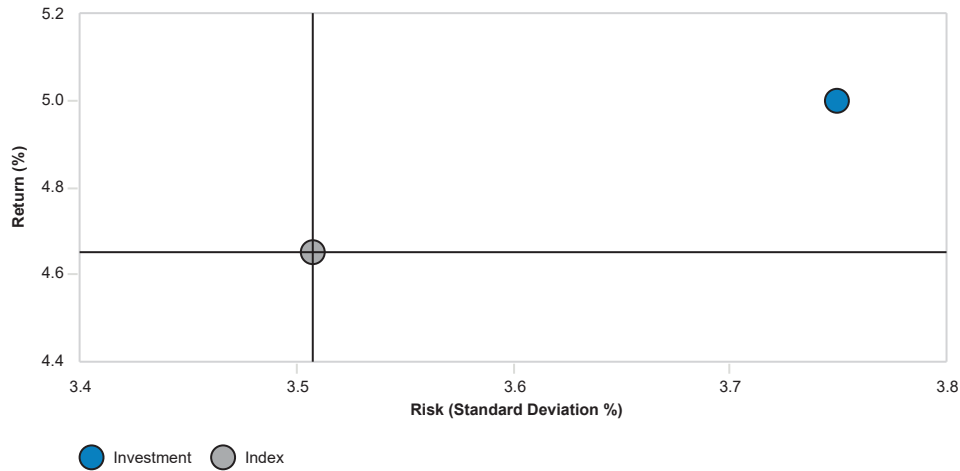
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	5.00	3.75	0.93	106.93	10	106.05	2
Index	4.65	3.51	0.91	100.00	10	100.00	2

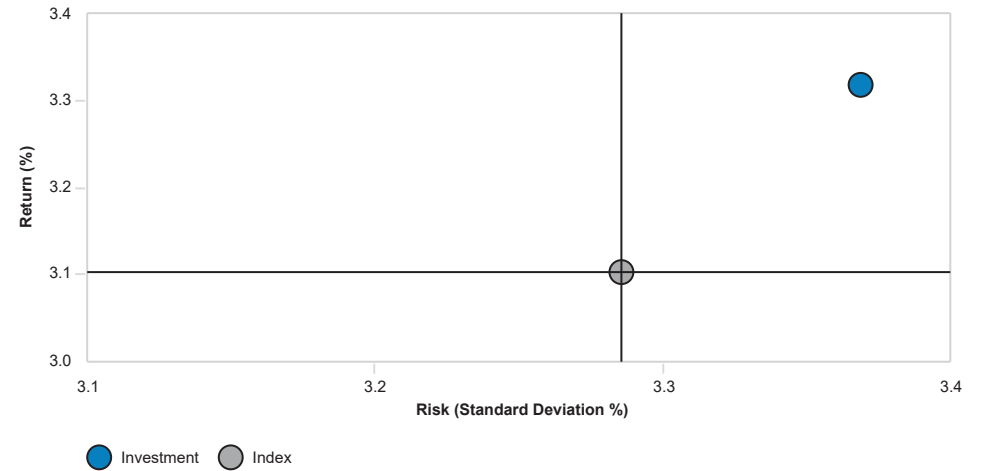
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	3.32	3.37	0.65	102.98	16	98.81	4
Index	3.10	3.29	0.60	100.00	16	100.00	4

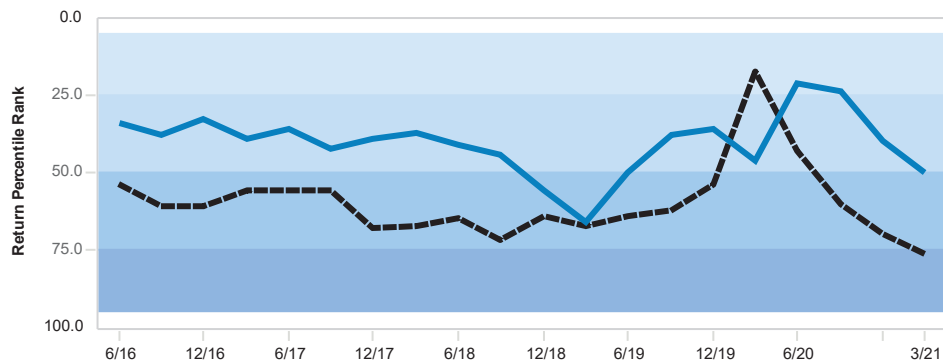
Risk and Return 3 Years



Risk and Return 5 Years

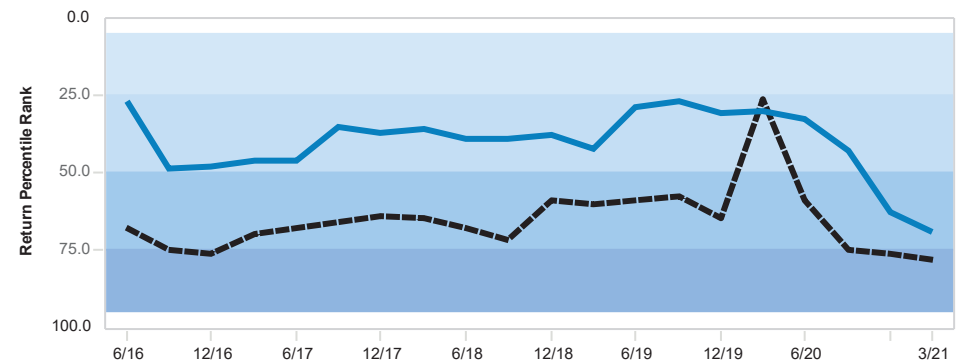


3 Year Rolling Percentile Rank IM U.S. Broad Market Core Fixed Income (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	2 (10%)	16 (80%)	2 (10%)	0 (0%)
Index	20	1 (5%)	1 (5%)	17 (85%)	1 (5%)

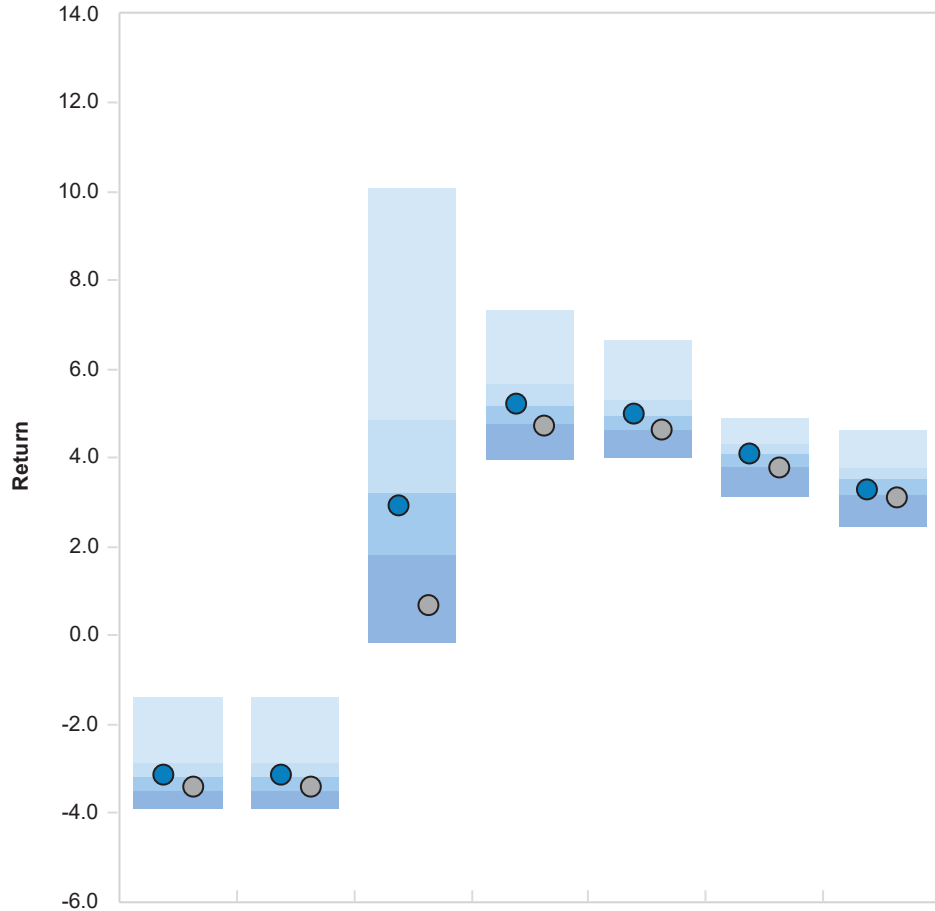
5 Year Rolling Percentile Rank IM U.S. Broad Market Core Fixed Income (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	0 (0%)	18 (90%)	2 (10%)	0 (0%)
Index	20	0 (0%)	1 (5%)	16 (80%)	3 (15%)

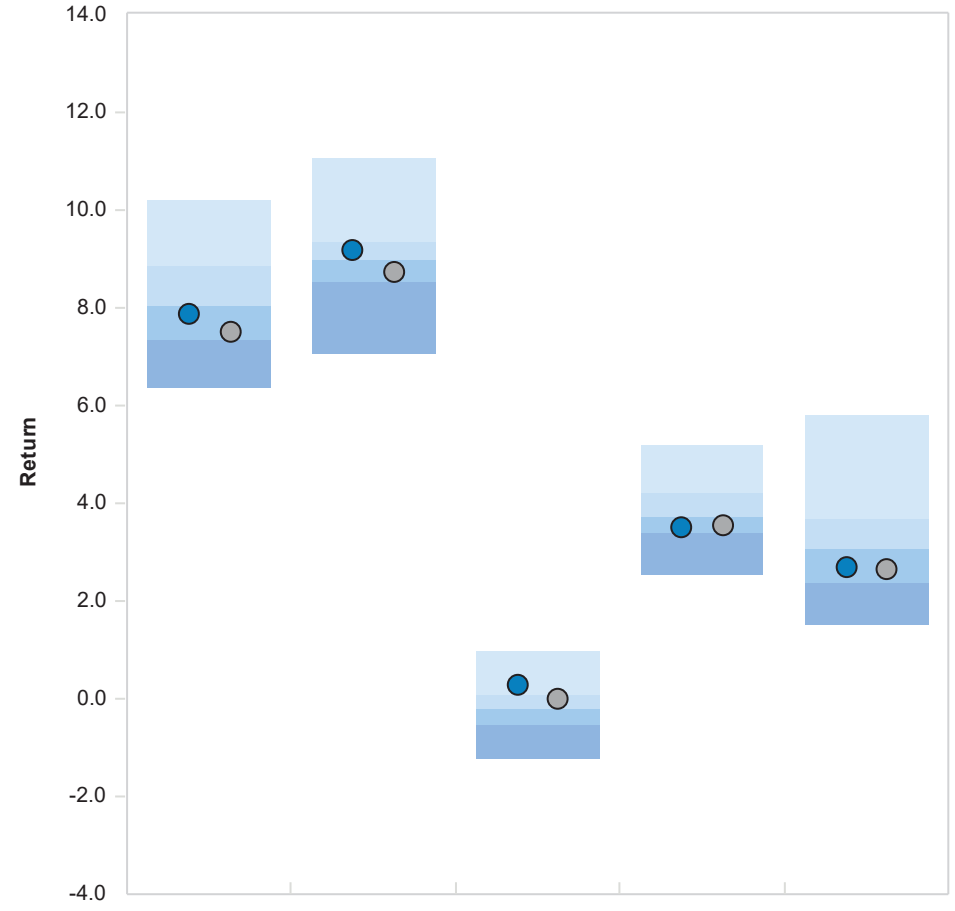


Peer Group Analysis - IM U.S. Broad Market Core Fixed Income (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	-3.14 (45)	-3.14 (45)	2.94 (54)	5.25 (48)	5.00 (50)	4.11 (53)	3.32 (69)
● Index	-3.38 (60)	-3.38 (60)	0.71 (86)	4.74 (79)	4.65 (76)	3.78 (77)	3.10 (78)
Median	-3.17	-3.17	3.22	5.21	4.99	4.12	3.53

Peer Group Analysis - IM U.S. Broad Market Core Fixed Income (SA+CF)



	2020	2019	2018	2017	2016
● Investment	7.87 (56)	9.18 (40)	0.29 (15)	3.52 (66)	2.70 (65)
● Index	7.51 (70)	8.72 (68)	0.01 (31)	3.54 (63)	2.65 (66)
Median	8.05	8.97	-0.21	3.73	3.05

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	0.55 (90)	1.07 (50)	4.58 (45)	1.51 (52)	0.19 (43)	2.52 (8)
Index	0.67 (80)	0.62 (83)	2.90 (83)	3.15 (16)	0.18 (45)	2.27 (52)
Median	1.05	1.06	4.38	1.52	0.16	2.28



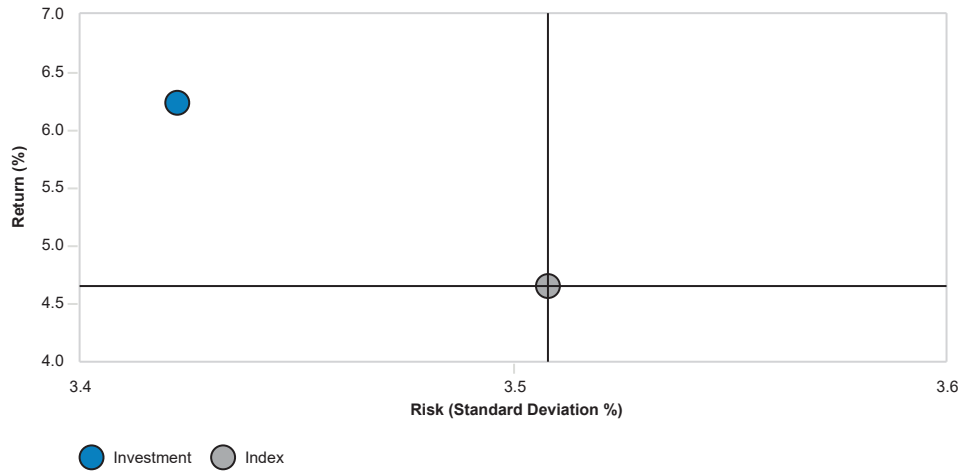
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	6.24	3.42	1.36	110.90	10	74.69	2
Index	4.65	3.51	0.91	100.00	10	100.00	2

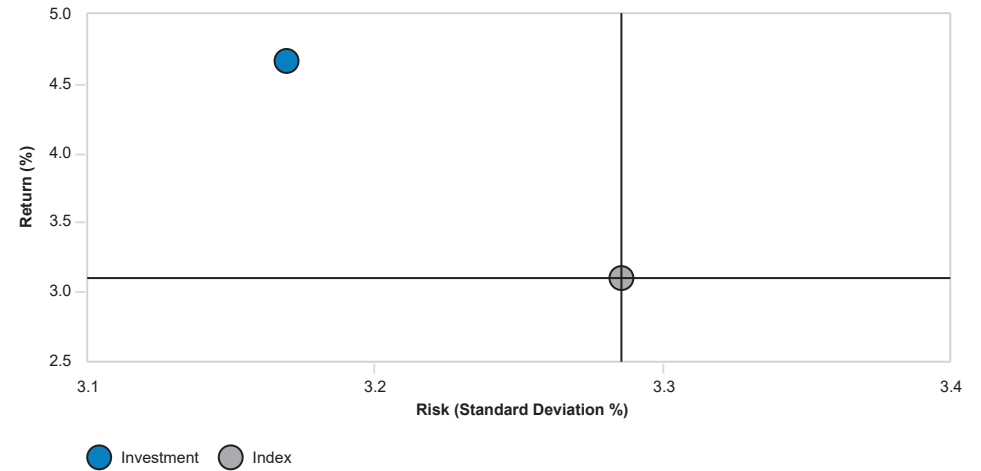
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	4.67	3.17	1.09	112.63	16	74.04	4
Index	3.10	3.29	0.60	100.00	16	100.00	4

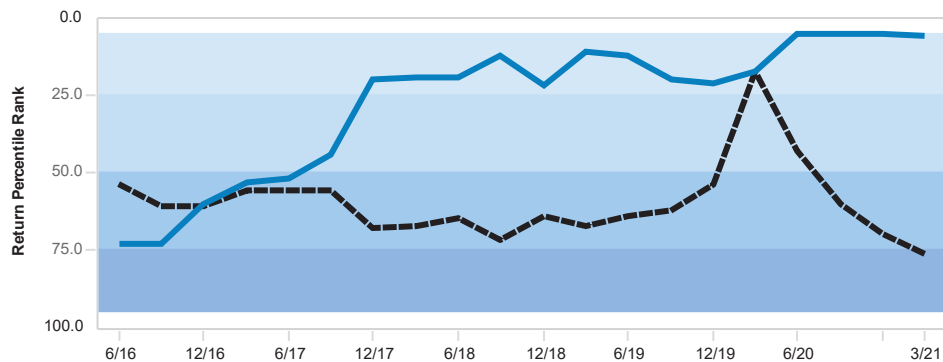
Risk and Return 3 Years



Risk and Return 5 Years

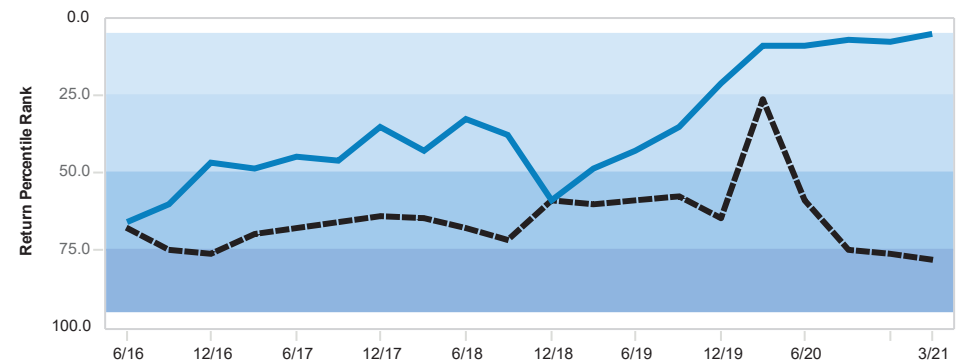


3 Year Rolling Percentile Rank IM U.S. Broad Market Core Fixed Income (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	14 (70%)	1 (5%)	5 (25%)	0 (0%)
Index	20	1 (5%)	1 (5%)	17 (85%)	1 (5%)

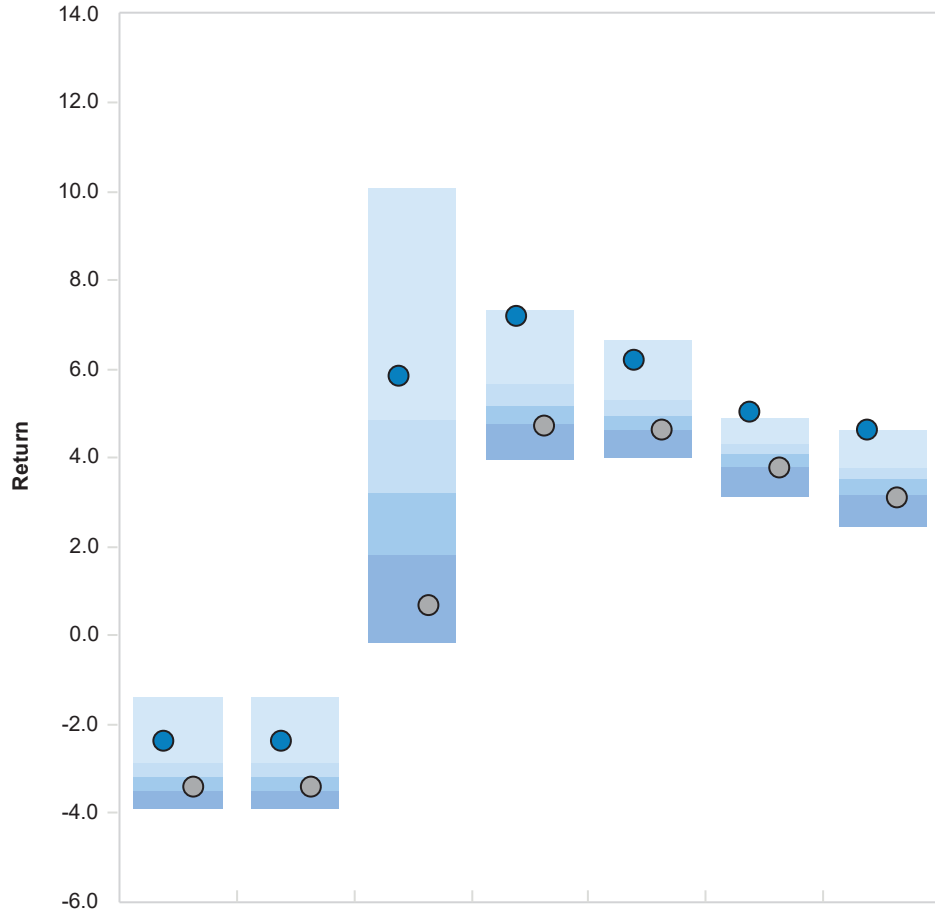
5 Year Rolling Percentile Rank IM U.S. Broad Market Core Fixed Income (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	6 (30%)	11 (55%)	3 (15%)	0 (0%)
Index	20	0 (0%)	1 (5%)	16 (80%)	3 (15%)

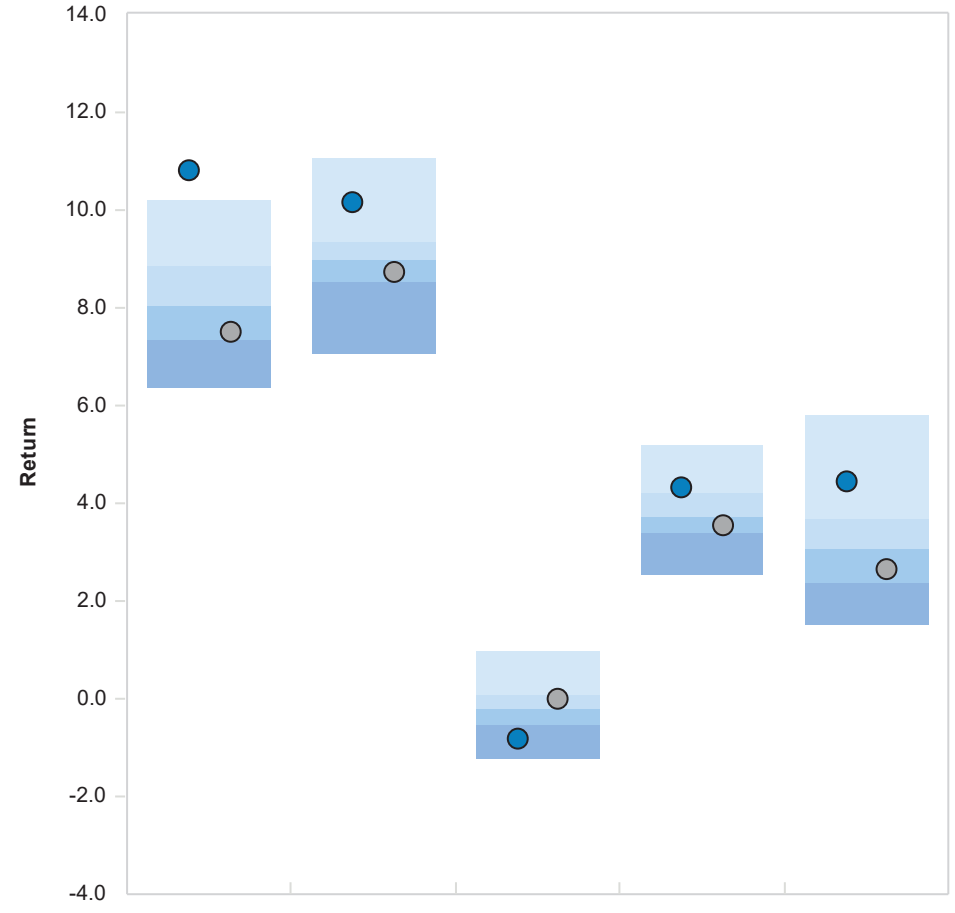


Peer Group Analysis - IM U.S. Broad Market Core Fixed Income (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	-2.36 (11)	-2.36 (11)	5.86 (17)	7.22 (6)	6.24 (6)	5.07 (5)	4.67 (5)
● Index	-3.38 (60)	-3.38 (60)	0.71 (86)	4.74 (79)	4.65 (76)	3.78 (77)	3.10 (78)
Median	-3.17	-3.17	3.22	5.21	4.99	4.12	3.53

Peer Group Analysis - IM U.S. Broad Market Core Fixed Income (SA+CF)



	2020	2019	2018	2017	2016
● Investment	10.80 (3)	10.15 (10)	-0.81 (88)	4.33 (18)	4.45 (11)
● Index	7.51 (70)	8.72 (68)	0.01 (31)	3.54 (63)	2.65 (66)
Median	8.05	8.97	-0.21	3.73	3.05

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	1.68 (18)	1.36 (30)	5.19 (25)	2.20 (38)	0.48 (15)	2.30 (44)
Index	0.67 (80)	0.62 (83)	2.90 (83)	3.15 (16)	0.18 (45)	2.27 (52)
Median	1.05	1.06	4.38	1.52	0.16	2.28



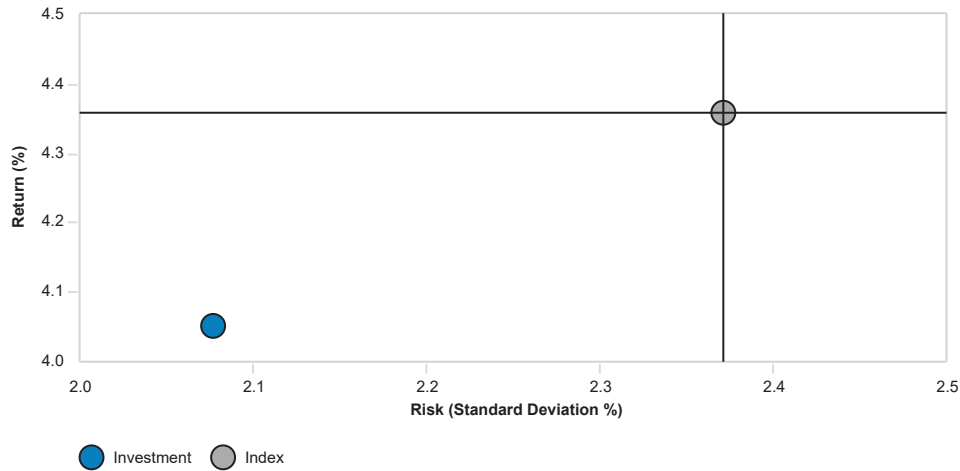
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	4.05	2.08	1.26	87.58	11	71.56	1
Index	4.36	2.37	1.21	100.00	11	100.00	1

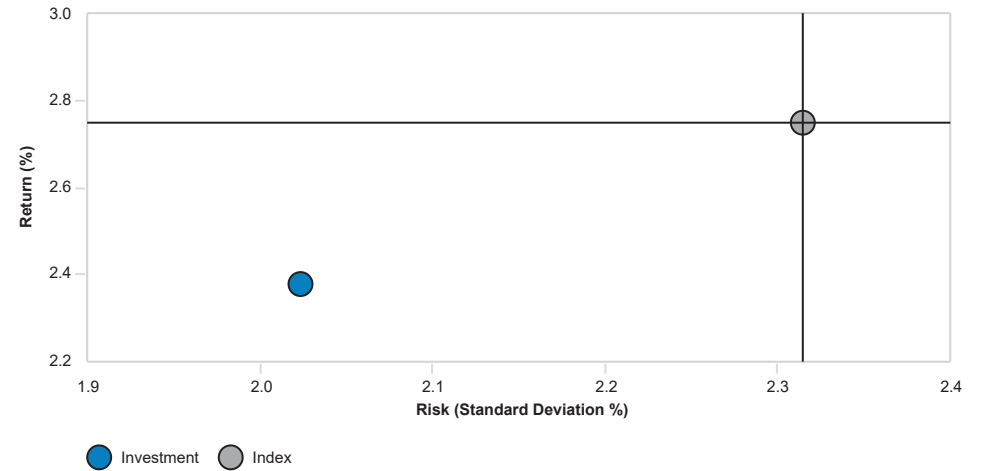
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	2.38	2.02	0.62	85.45	16	83.87	4
Index	2.75	2.31	0.70	100.00	16	100.00	4

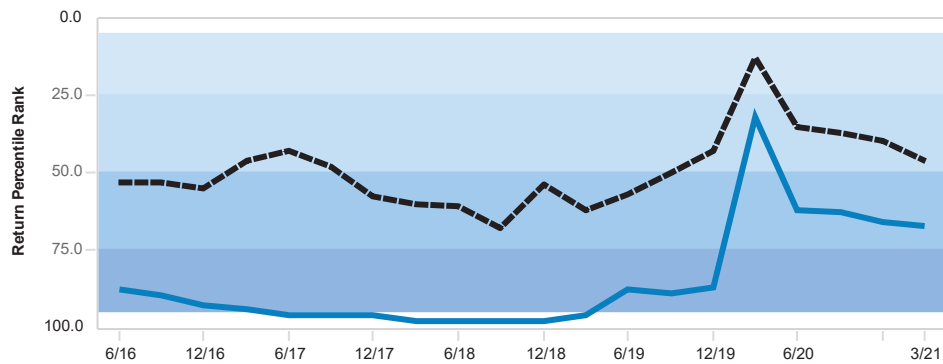
Risk and Return 3 Years



Risk and Return 5 Years

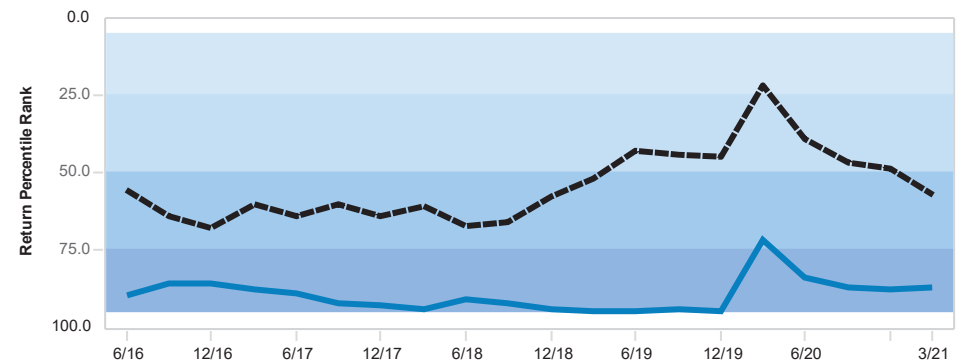


3 Year Rolling Percentile Rank IM U.S. Intermediate Duration (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	0 (0%)	1 (5%)	4 (20%)	15 (75%)
Index	20	1 (5%)	9 (45%)	10 (50%)	0 (0%)

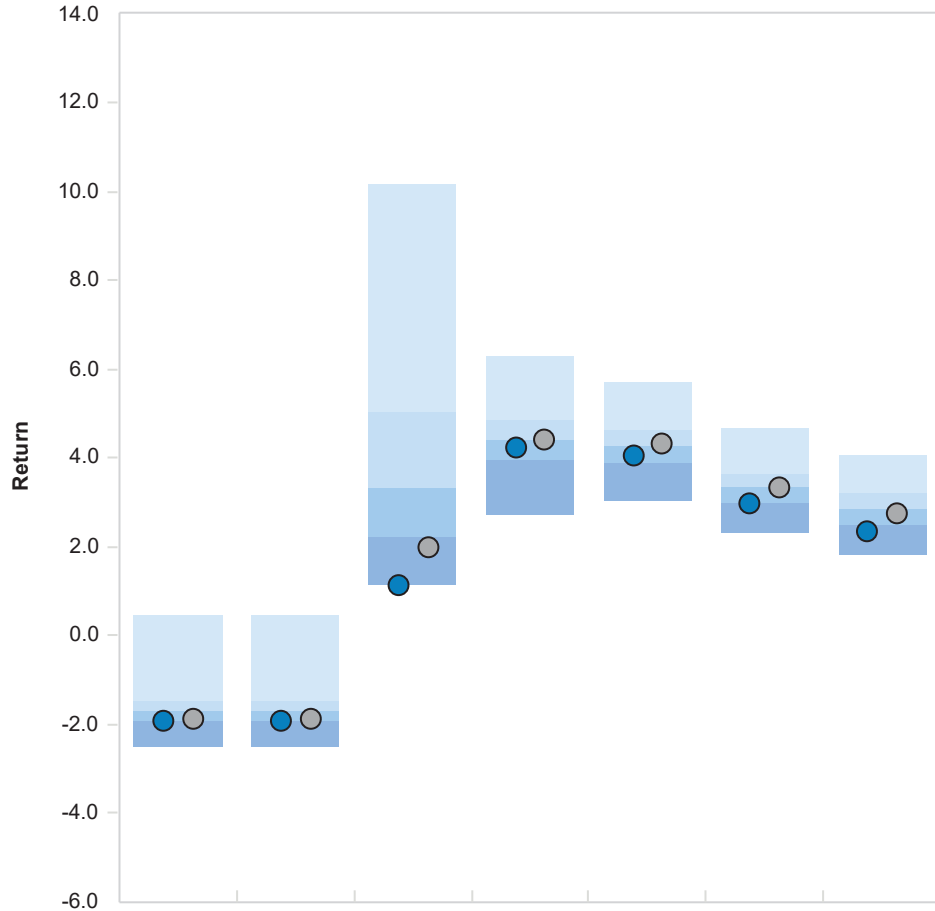
5 Year Rolling Percentile Rank IM U.S. Intermediate Duration (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	0 (0%)	0 (0%)	1 (5%)	19 (95%)
Index	20	1 (5%)	6 (30%)	13 (65%)	0 (0%)

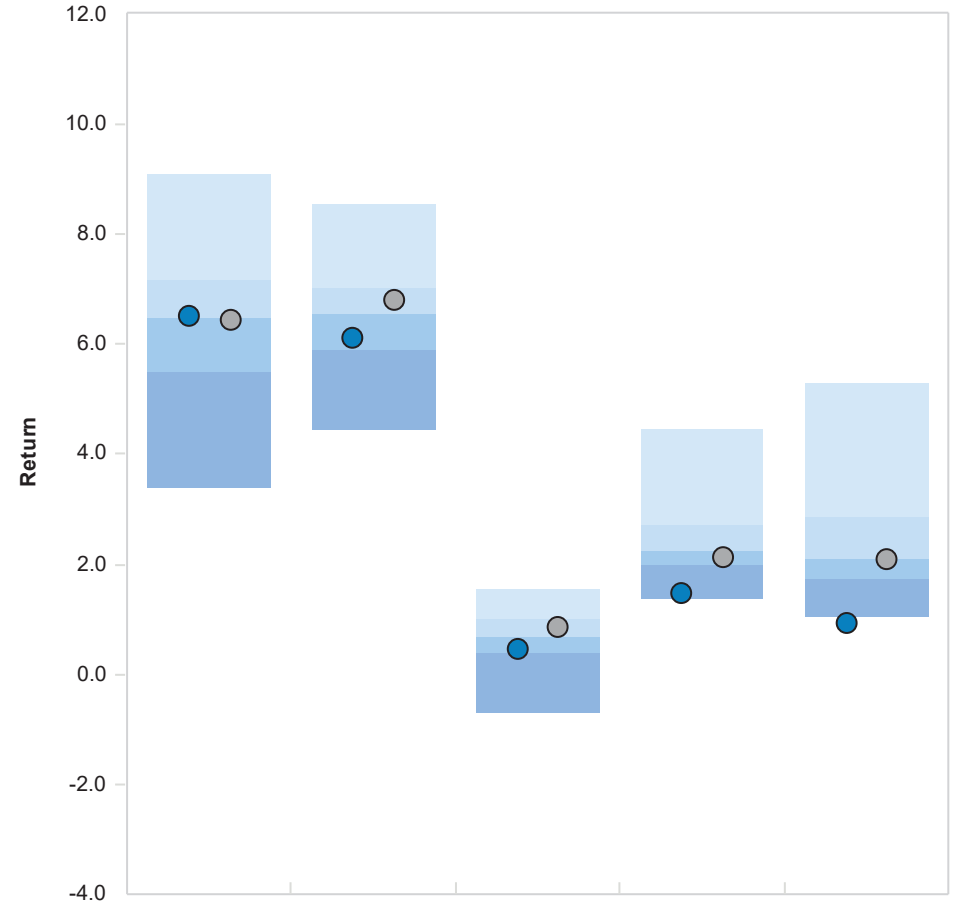


Peer Group Analysis - IM U.S. Intermediate Duration (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	-1.90 (72)	-1.90 (72)	1.15 (95)	4.24 (63)	4.05 (67)	2.97 (80)	2.38 (87)
● Index	-1.86 (68)	-1.86 (68)	2.01 (82)	4.42 (51)	4.36 (46)	3.34 (52)	2.75 (57)
Median	-1.69	-1.69	3.36	4.43	4.31	3.36	2.84

Peer Group Analysis - IM U.S. Intermediate Duration (SA+CF)



	2020	2019	2018	2017	2016
● Investment	6.52 (47)	6.11 (71)	0.47 (67)	1.49 (91)	0.92 (97)
● Index	6.43 (52)	6.80 (39)	0.88 (37)	2.14 (64)	2.08 (51)
Median	6.47	6.55	0.68	2.24	2.10

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	0.36 (85)	0.60 (68)	2.13 (94)	3.30 (6)	0.31 (65)	1.24 (73)
Index	0.48 (73)	0.61 (67)	2.81 (80)	2.40 (20)	0.37 (49)	1.37 (47)
Median	0.62	0.77	3.67	0.94	0.37	1.35



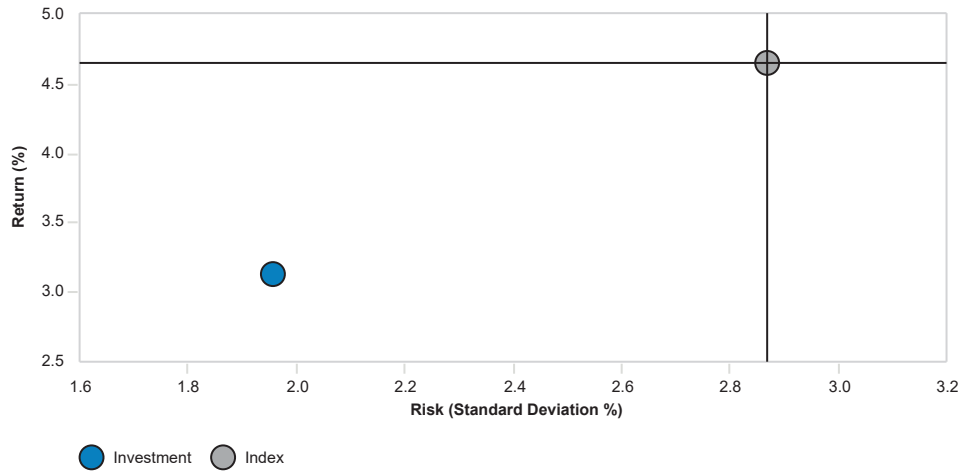
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	3.14	1.96	0.87	66.38	10	63.15	2
Index	4.65	2.87	1.08	100.00	10	100.00	2

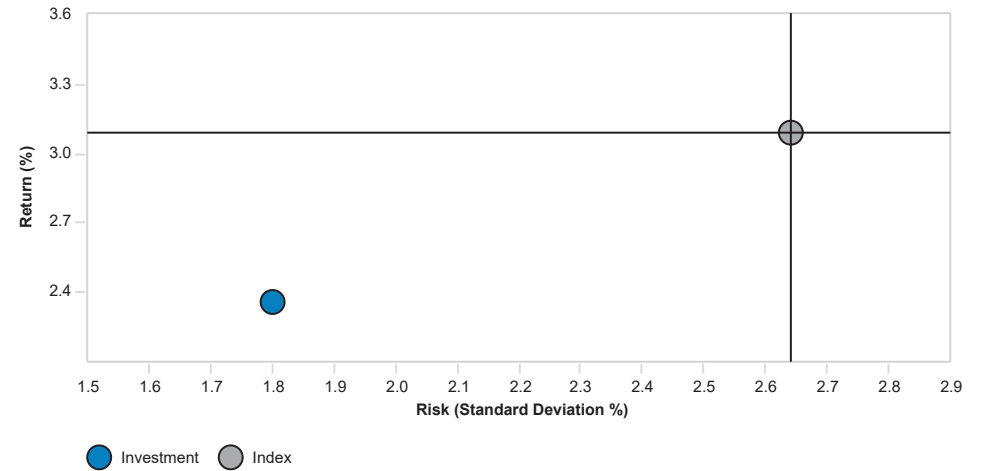
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	2.36	1.80	0.68	70.40	16	61.81	4
Index	3.09	2.64	0.73	100.00	15	100.00	5

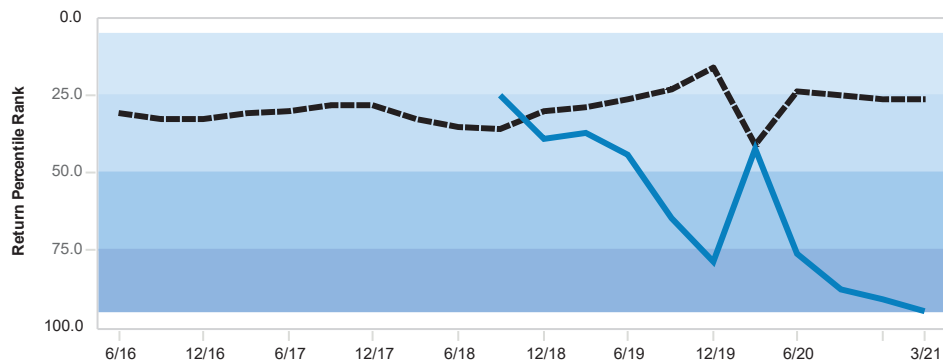
Risk and Return 3 Years



Risk and Return 5 Years

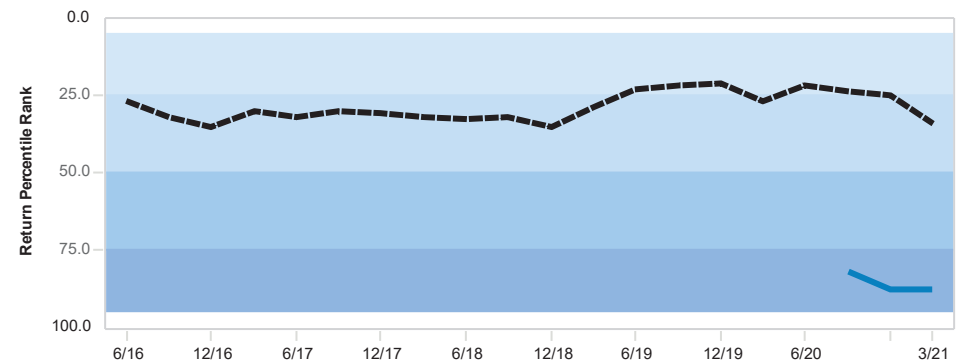


3 Year Rolling Percentile Rank IM U.S. Intermediate Duration (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	11	1 (9%)	4 (36%)	1 (9%)	5 (45%)
Index	20	4 (20%)	16 (80%)	0 (0%)	0 (0%)

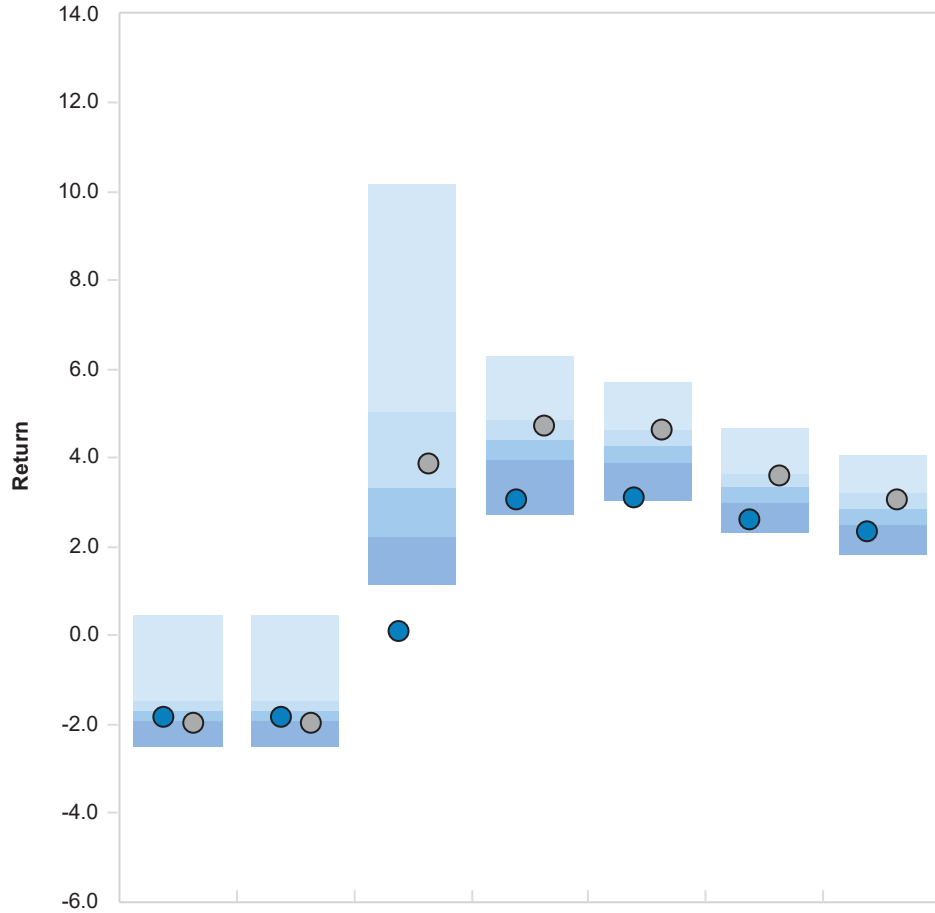
5 Year Rolling Percentile Rank IM U.S. Intermediate Duration (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	3	0 (0%)	0 (0%)	0 (0%)	3 (100%)
Index	20	6 (30%)	14 (70%)	0 (0%)	0 (0%)

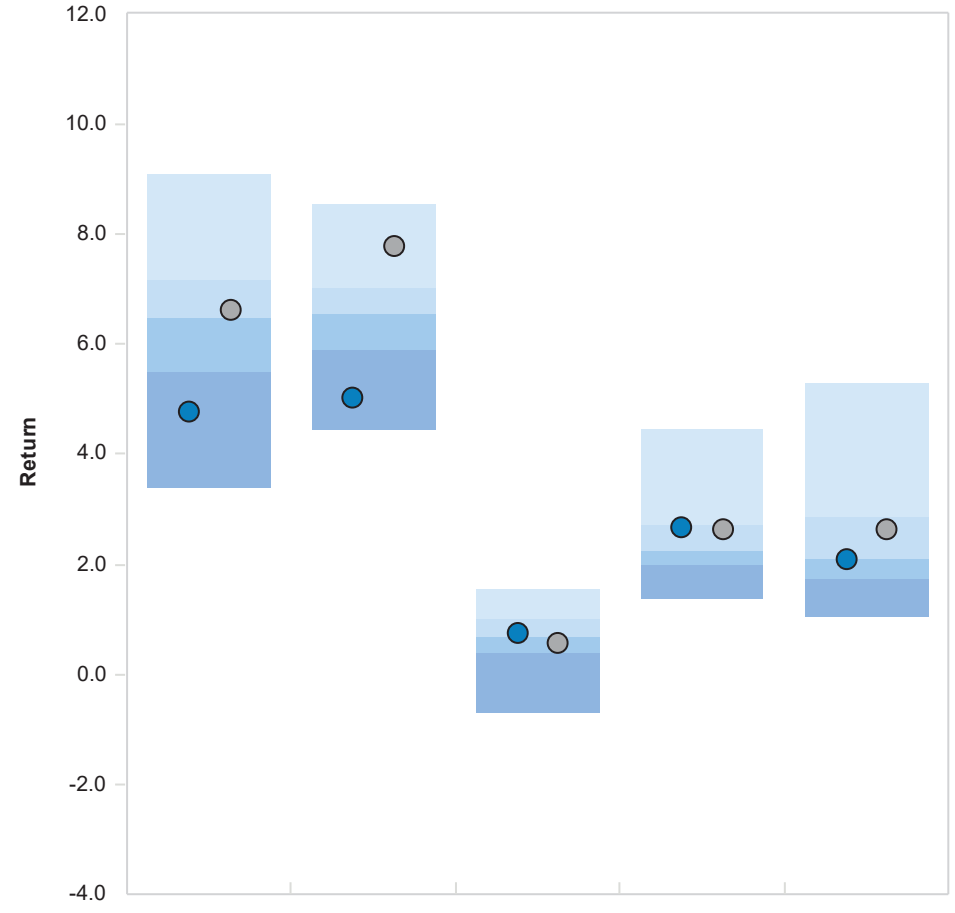


Peer Group Analysis - IM U.S. Intermediate Duration (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	-1.83 (67)	-1.83 (67)	0.09 (99)	3.06 (94)	3.14 (95)	2.63 (94)	2.36 (88)
● Index	-1.93 (77)	-1.93 (77)	3.89 (42)	4.72 (31)	4.65 (26)	3.62 (33)	3.09 (34)
Median	-1.69	-1.69	3.36	4.43	4.31	3.36	2.84

Peer Group Analysis - IM U.S. Intermediate Duration (SA+CF)



	2020	2019	2018	2017	2016
● Investment	4.79 (88)	5.02 (94)	0.74 (48)	2.68 (28)	2.10 (51)
● Index	6.62 (44)	7.78 (12)	0.58 (59)	2.65 (28)	2.63 (33)
Median	6.47	6.55	0.68	2.24	2.10

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	0.33 (88)	-0.44 (100)	2.07 (95)	2.77 (11)	0.25 (80)	1.10 (83)
Index	0.84 (36)	0.82 (48)	4.20 (35)	0.65 (55)	0.59 (14)	1.49 (20)
Median	0.62	0.77	3.67	0.94	0.37	1.35



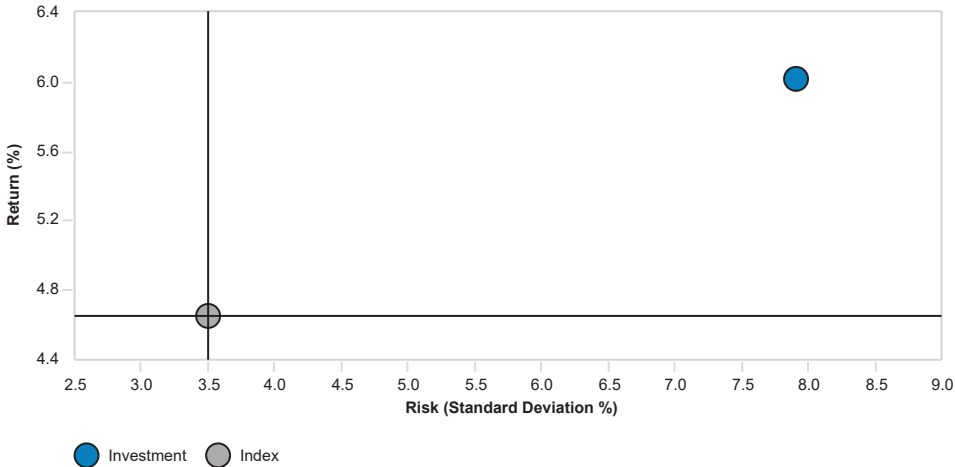
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	6.02	7.90	0.59	122.45	9	103.69	3
Index	4.65	3.51	0.91	100.00	10	100.00	2

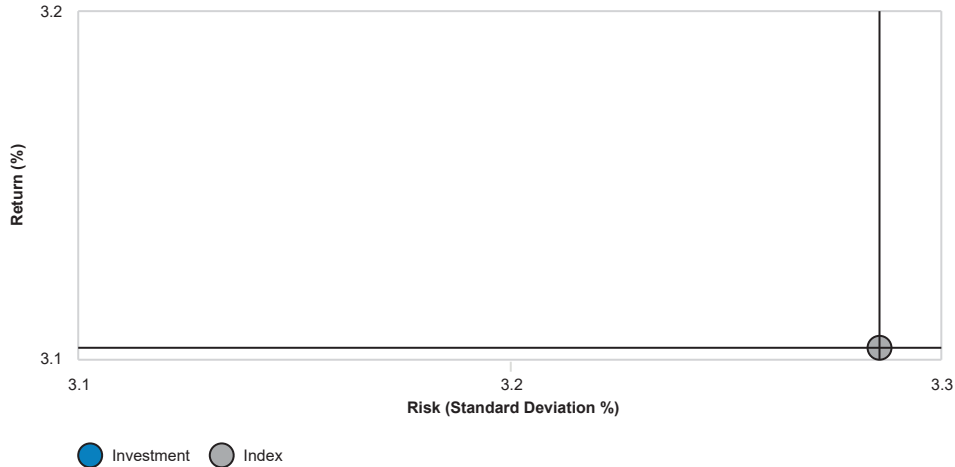
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Index	3.10	3.29	0.60	100.00	16	100.00	4

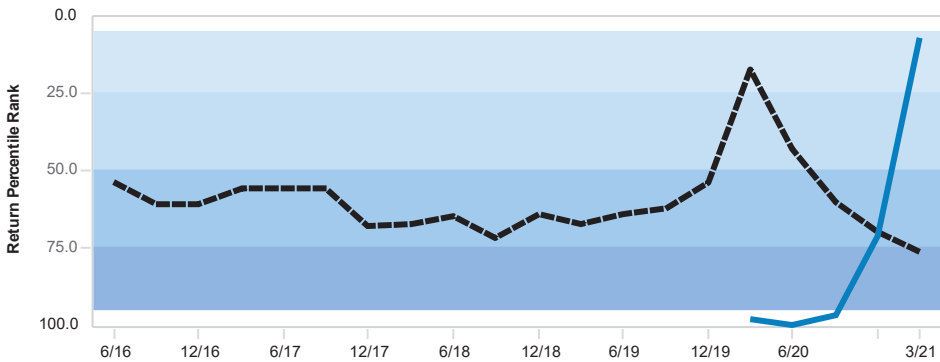
Risk and Return 3 Years



Risk and Return 5 Years

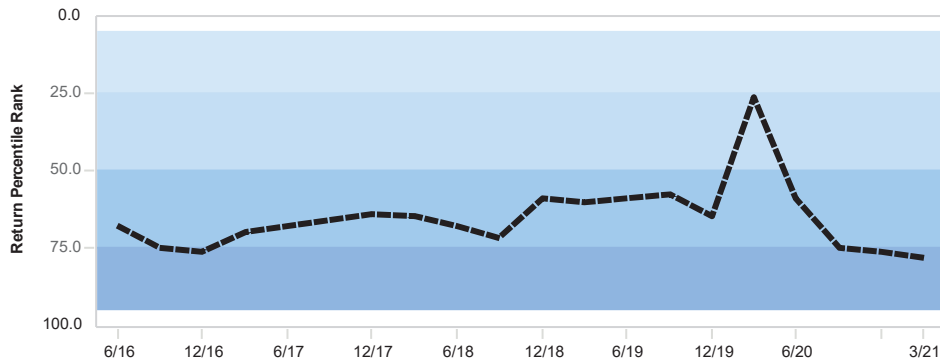


3 Year Rolling Percentile Rank IM U.S. Broad Market Core Fixed Income (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	5	1 (20%)	0 (0%)	1 (20%)	3 (60%)
Index	20	1 (5%)	1 (5%)	17 (85%)	1 (5%)

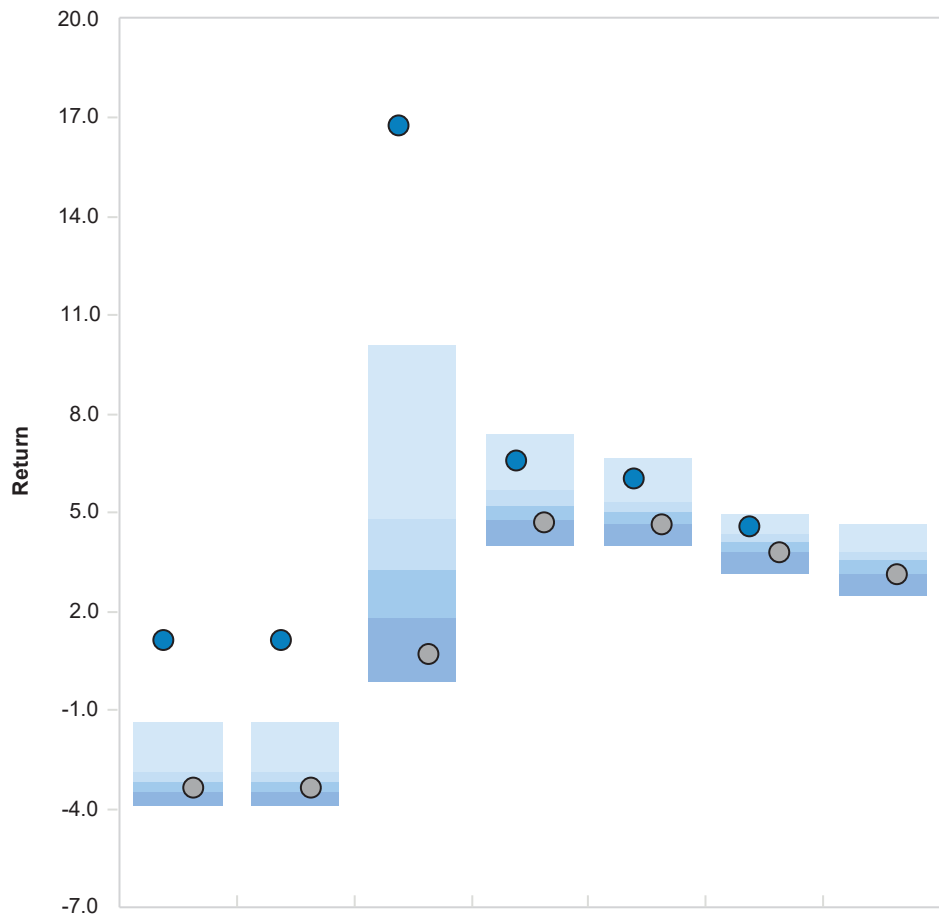
5 Year Rolling Percentile Rank IM U.S. Broad Market Core Fixed Income (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	0	0	0	0	0
Index	20	0 (0%)	1 (5%)	16 (80%)	3 (15%)

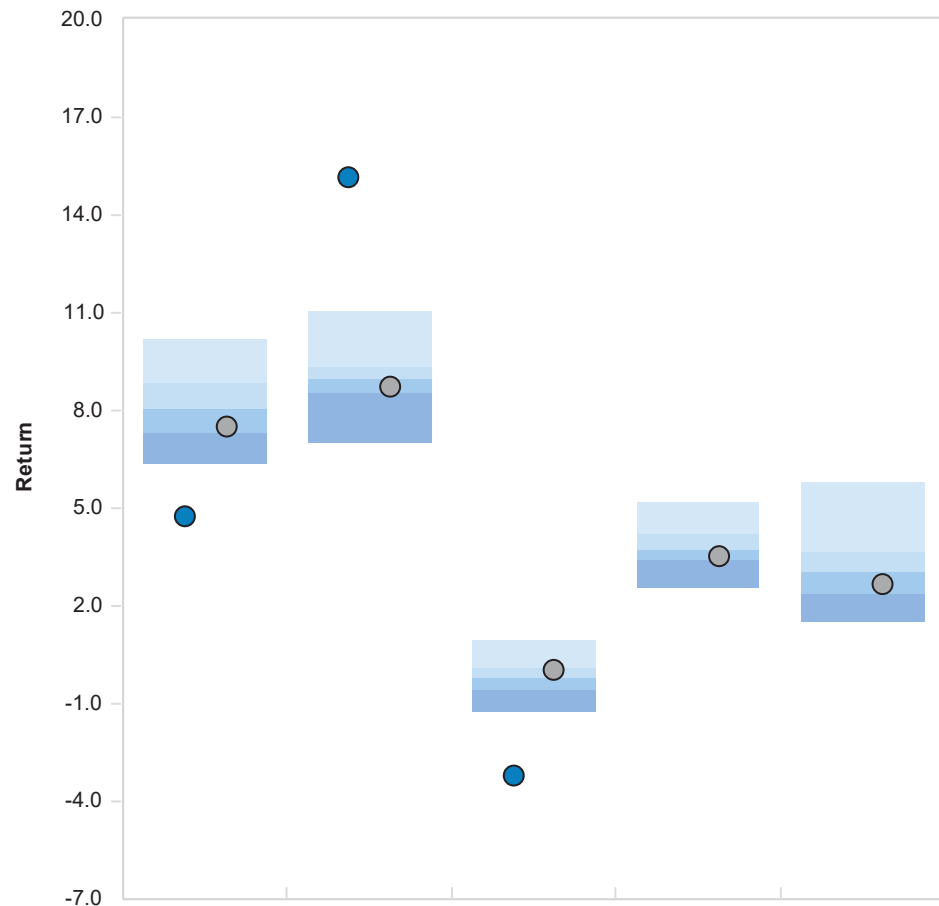


Peer Group Analysis - IM U.S. Broad Market Core Fixed Income (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	1.16 (1)	1.16 (1)	16.80 (1)	6.57 (6)	6.02 (7)	4.57 (12)	N/A
● Index	-3.38 (60)	-3.38 (60)	0.71 (86)	4.74 (79)	4.65 (76)	3.78 (77)	3.10 (78)
Median	-3.17	-3.17	3.22	5.21	4.99	4.12	3.53

Peer Group Analysis - IM U.S. Broad Market Core Fixed Income (SA+CF)



	2020	2019	2018	2017	2016
● Investment	4.78 (98)	15.16 (2)	-3.20 (100)	N/A	N/A
● Index	7.51 (70)	8.72 (68)	0.01 (31)	3.54 (63)	2.65 (66)
Median	8.05	8.97	-0.21	3.73	3.05

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	6.38 (1)	3.80 (1)	4.58 (45)	-9.26 (99)	1.53 (4)	2.39 (29)
Index	0.67 (80)	0.62 (83)	2.90 (83)	3.15 (16)	0.18 (45)	2.27 (52)
Median	1.05	1.06	4.38	1.52	0.16	2.28



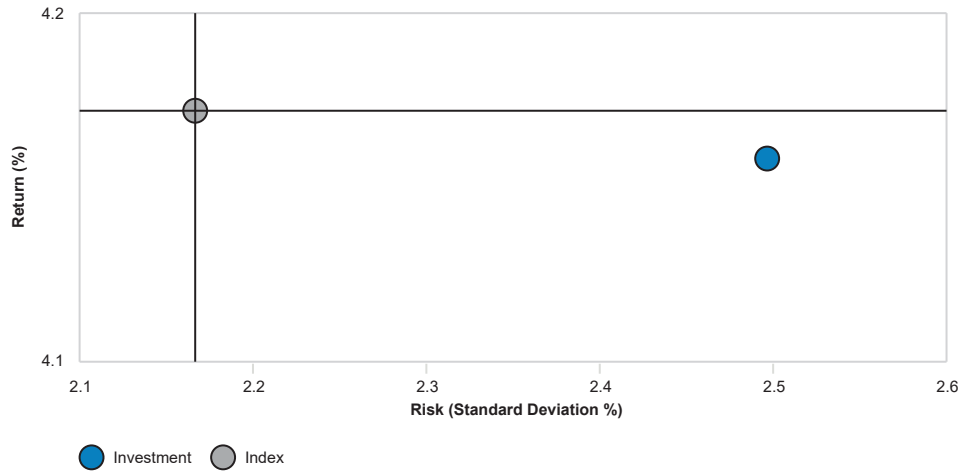
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	4.16	2.50	1.05	104.45	10	120.34	2
Index	4.17	2.17	1.26	100.00	11	100.00	1

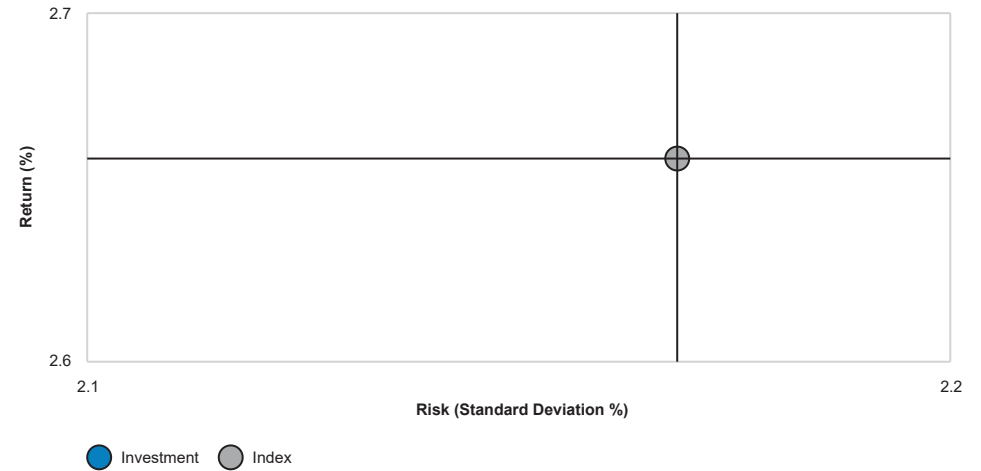
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Index	2.66	2.17	0.71	100.00	16	100.00	4

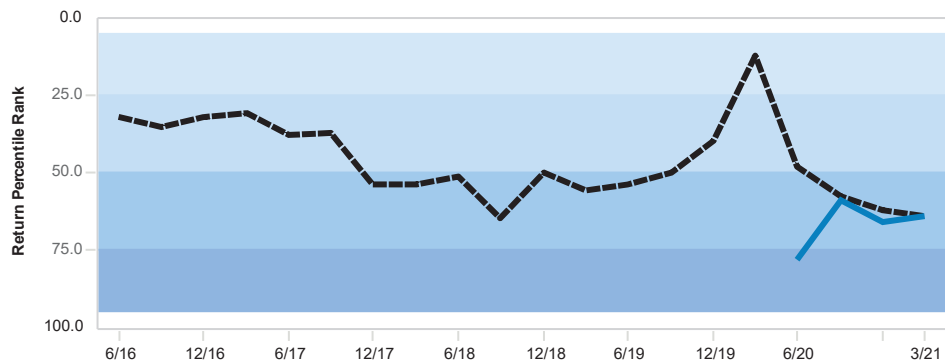
Risk and Return 3 Years



Risk and Return 5 Years

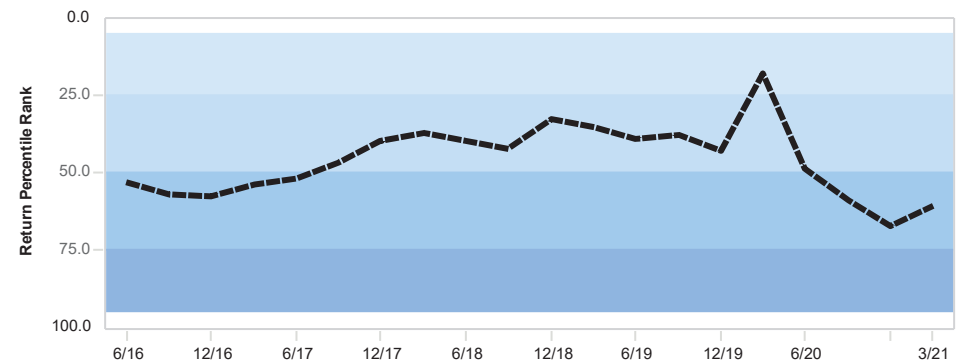


3 Year Rolling Percentile Rank IM U.S. Intermediate Duration (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	4	0 (0%)	0 (0%)	3 (75%)	1 (25%)
Index	20	1 (5%)	10 (50%)	9 (45%)	0 (0%)

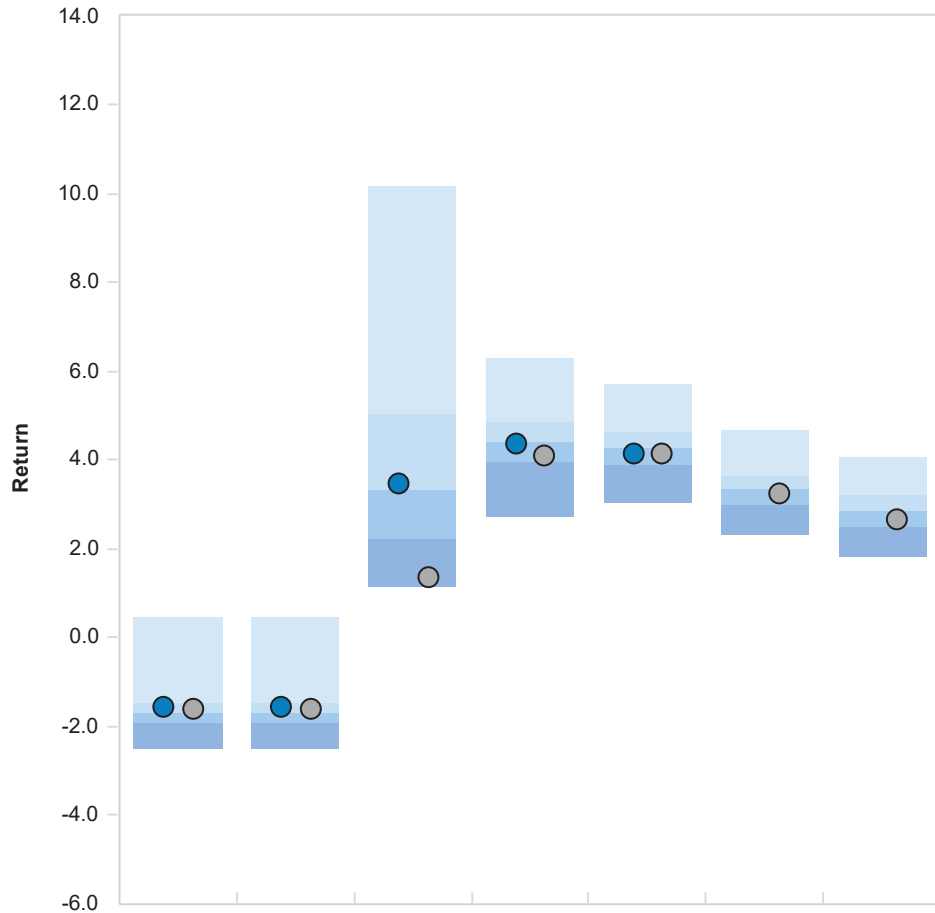
5 Year Rolling Percentile Rank IM U.S. Intermediate Duration (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	0	0	0	0	0
Index	20	1 (5%)	11 (55%)	8 (40%)	0 (0%)

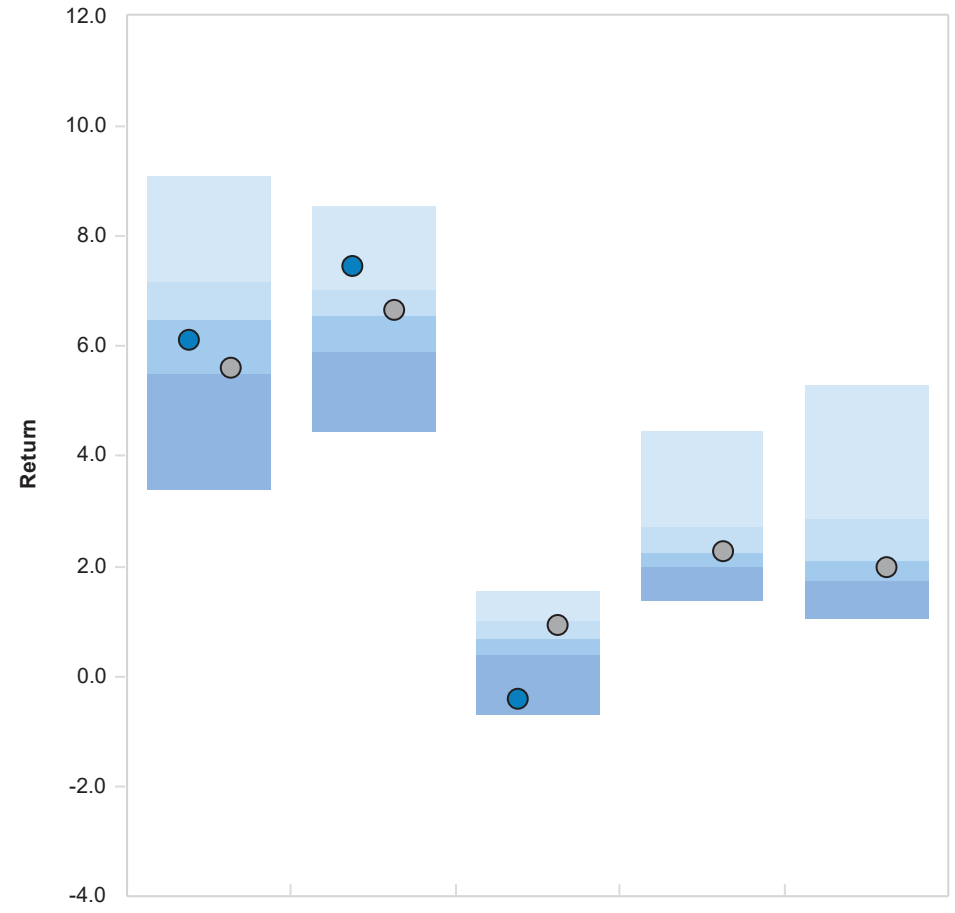


Peer Group Analysis - IM U.S. Intermediate Duration (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	-1.53 (32)	-1.53 (32)	3.49 (47)	4.40 (51)	4.16 (64)	N/A	N/A
● Index	-1.61 (38)	-1.61 (38)	1.38 (91)	4.10 (69)	4.17 (64)	3.24 (63)	2.66 (61)
Median	-1.69	-1.69	3.36	4.43	4.31	3.36	2.84

Peer Group Analysis - IM U.S. Intermediate Duration (SA+CF)



	2020	2019	2018	2017	2016
● Investment	6.13 (65)	7.47 (15)	-0.40 (94)	N/A	N/A
● Index	5.60 (74)	6.67 (44)	0.92 (34)	2.27 (48)	1.97 (60)
Median	6.47	6.55	0.68	2.24	2.10

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	0.71 (45)	0.78 (49)	3.54 (54)	0.98 (50)	0.24 (81)	1.59 (13)
Index	0.42 (77)	0.48 (82)	2.13 (94)	2.49 (19)	0.47 (33)	1.38 (42)
Median	0.62	0.77	3.67	0.94	0.37	1.35



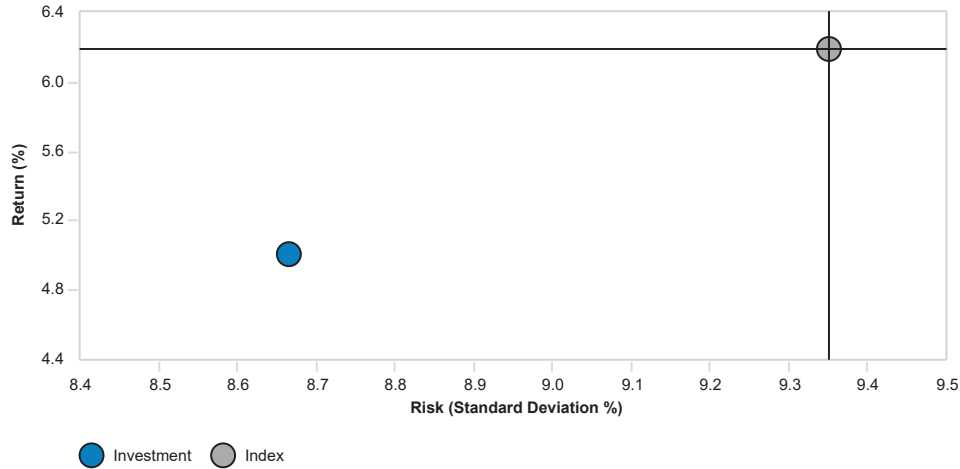
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	5.01	8.67	0.43	88.85	10	95.63	2
Index	6.19	9.35	0.53	100.00	10	100.00	2

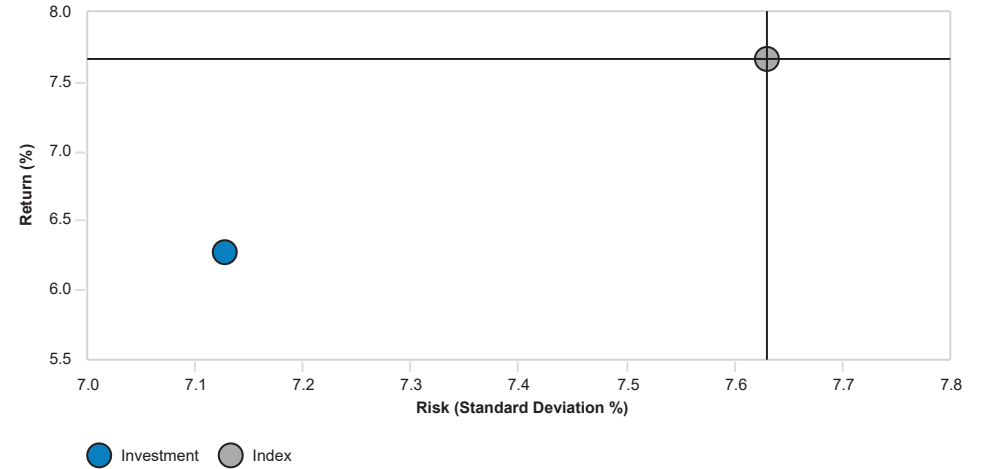
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	6.28	7.13	0.72	89.40	17	101.07	3
Index	7.67	7.63	0.84	100.00	17	100.00	3

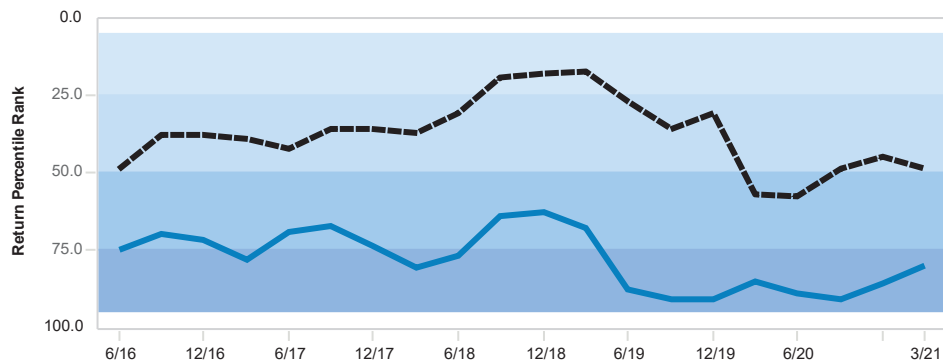
Risk and Return 3 Years



Risk and Return 5 Years

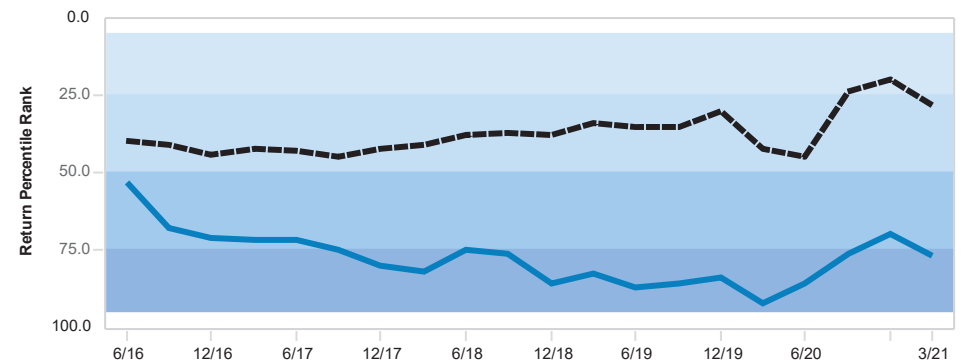


3 Year Rolling Percentile Rank IM U.S. High Yield Bonds (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	0 (0%)	0 (0%)	9 (45%)	11 (55%)
Index	20	3 (15%)	15 (75%)	2 (10%)	0 (0%)

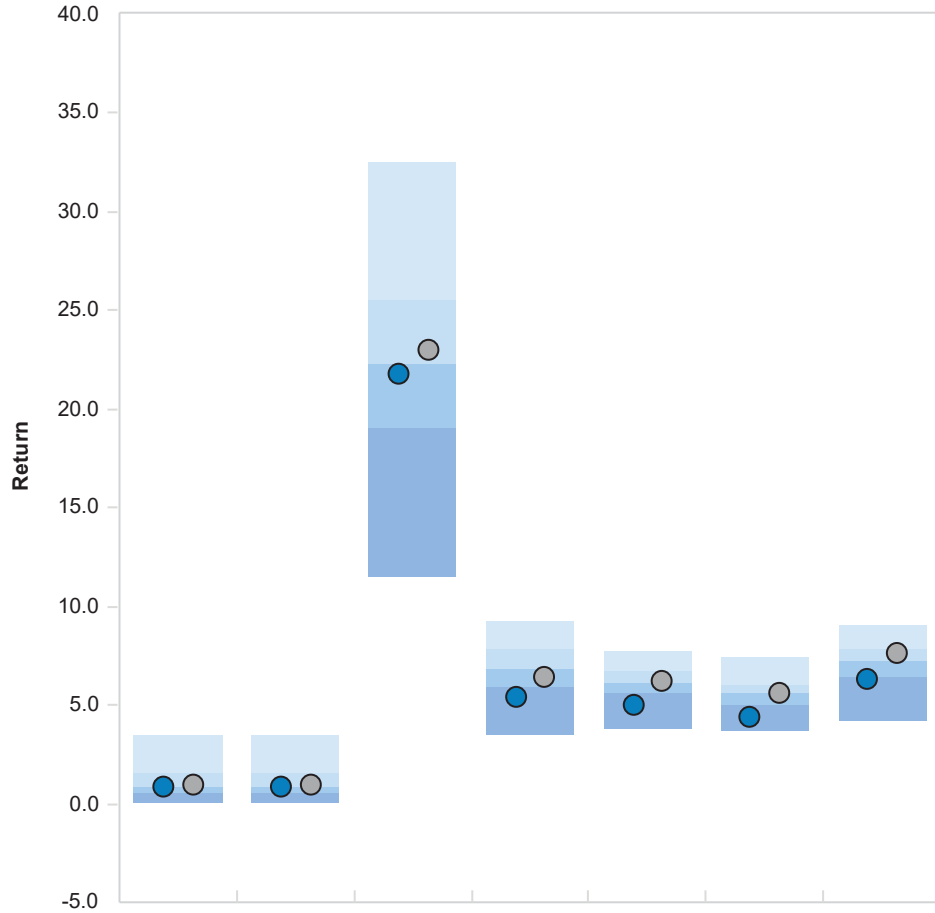
5 Year Rolling Percentile Rank IM U.S. High Yield Bonds (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	0 (0%)	0 (0%)	8 (40%)	12 (60%)
Index	20	2 (10%)	18 (90%)	0 (0%)	0 (0%)

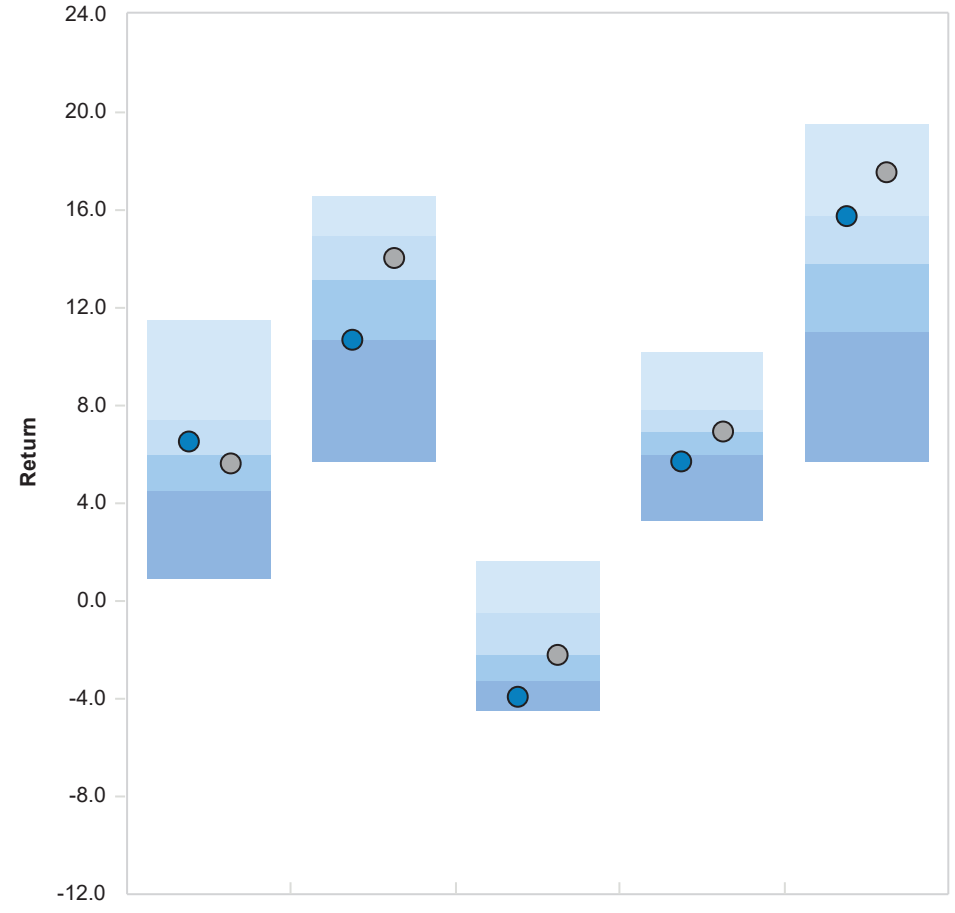


Peer Group Analysis - IM U.S. High Yield Bonds (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	0.82 (57)	0.82 (57)	21.81 (53)	5.46 (79)	5.01 (80)	4.39 (87)	6.28 (77)
● Index	0.94 (48)	0.94 (48)	22.96 (44)	6.41 (66)	6.19 (49)	5.57 (53)	7.67 (28)
Median	0.90	0.90	22.33	6.82	6.13	5.58	7.26

Peer Group Analysis - IM U.S. High Yield Bonds (SA+CF)



	2020	2019	2018	2017	2016
● Investment	6.53 (41)	10.71 (75)	-3.94 (89)	5.69 (80)	15.78 (25)
● Index	5.60 (62)	14.05 (41)	-2.22 (51)	6.97 (49)	17.56 (9)
Median	5.94	13.18	-2.22	6.93	13.82

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	6.26 (41)	4.63 (43)	8.67 (65)	-11.83 (42)	2.19 (65)	1.16 (66)
Index	6.30 (39)	4.92 (26)	9.23 (51)	-13.32 (64)	2.85 (21)	0.92 (77)
Median	5.86	4.49	9.29	-12.18	2.39	1.30



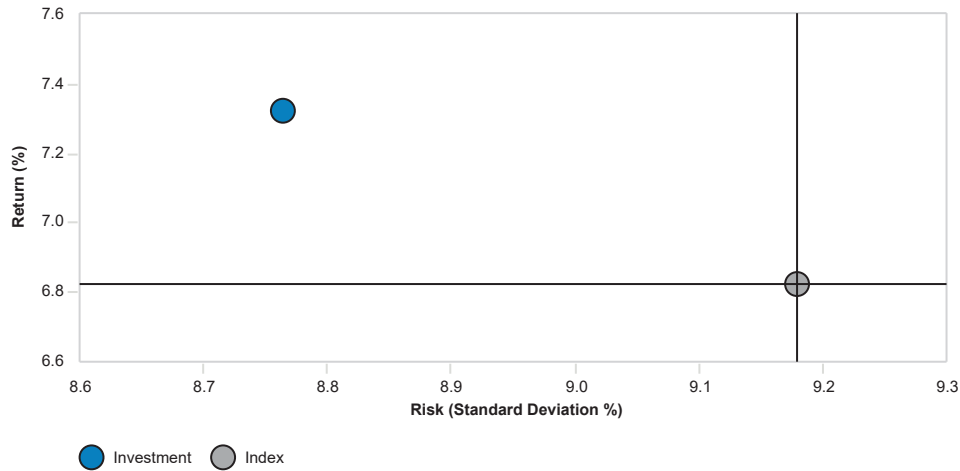
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	7.32	8.76	0.67	100.57	10	94.71	2
Index	6.82	9.18	0.60	100.00	10	100.00	2

Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Index	8.04	7.50	0.90	100.00	17	100.00	3

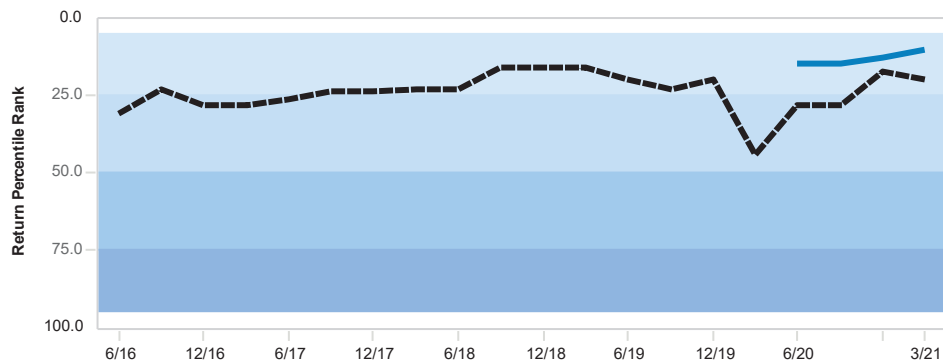
Risk and Return 3 Years



Risk and Return 5 Years

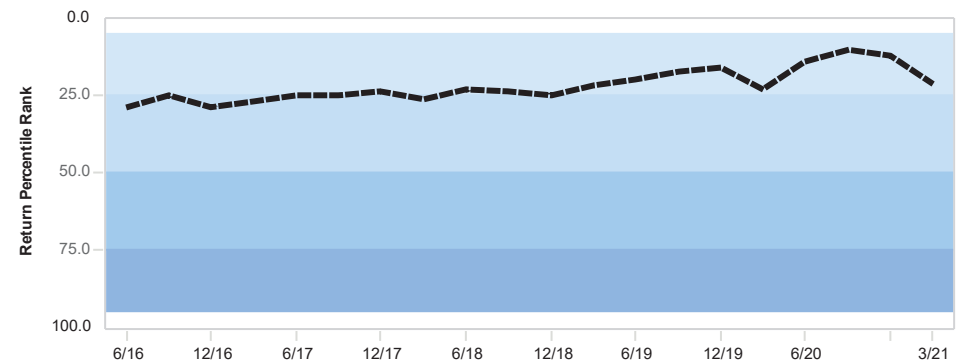


3 Year Rolling Percentile Rank IM U.S. High Yield Bonds (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	4	4 (100%)	0 (0%)	0 (0%)	0 (0%)
Index	20	13 (65%)	7 (35%)	0 (0%)	0 (0%)

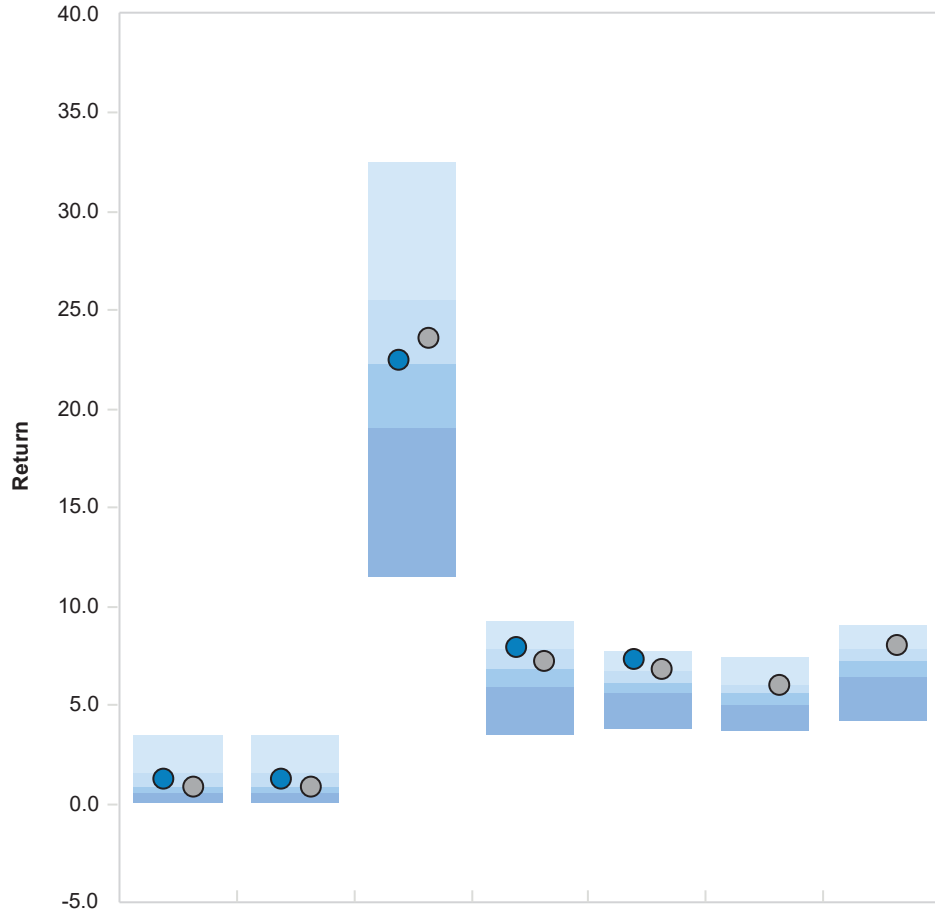
5 Year Rolling Percentile Rank IM U.S. High Yield Bonds (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	0	0	0	0	0
Index	20	16 (80%)	4 (20%)	0 (0%)	0 (0%)

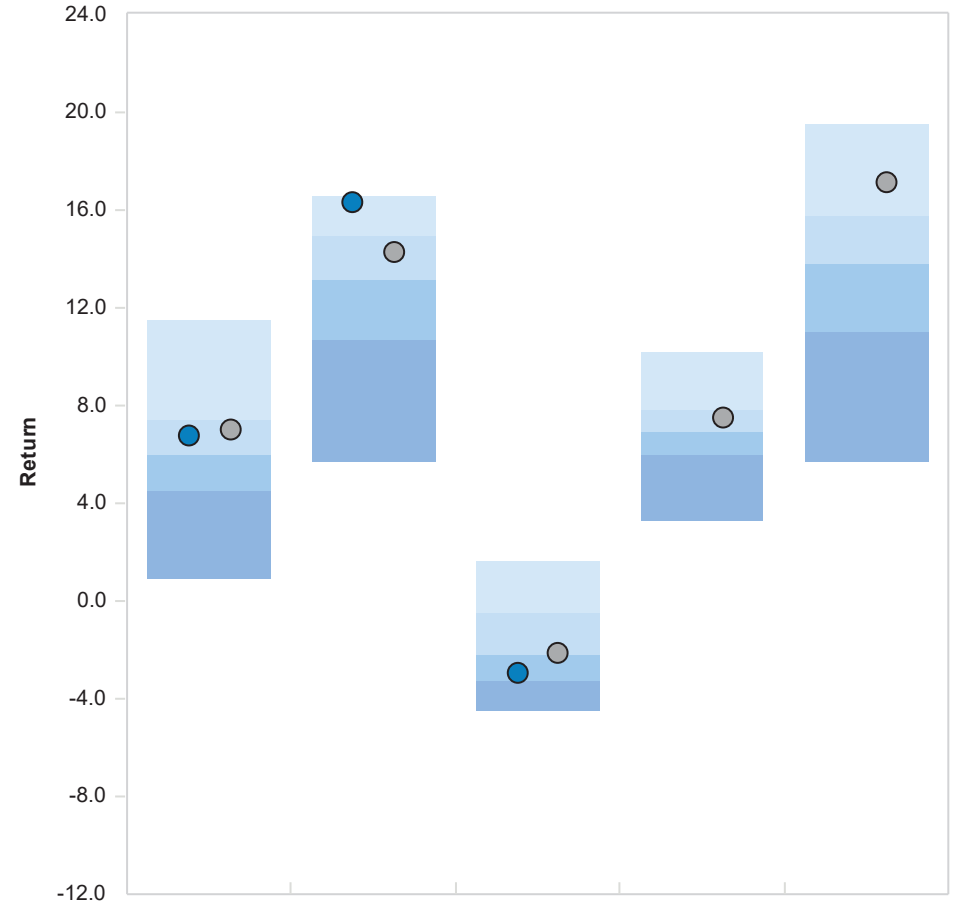


Peer Group Analysis - IM U.S. High Yield Bonds (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	1.27 (37)	1.27 (37)	22.53 (47)	7.91 (19)	7.32 (10)	N/A	N/A
● Index	0.86 (54)	0.86 (54)	23.65 (39)	7.27 (36)	6.82 (20)	6.05 (23)	8.04 (21)
Median	0.90	0.90	22.33	6.82	6.13	5.58	7.26

Peer Group Analysis - IM U.S. High Yield Bonds (SA+CF)



	2020	2019	2018	2017	2016
● Investment	6.78 (37)	16.30 (7)	-2.90 (70)	N/A	N/A
● Index	7.05 (31)	14.32 (33)	-2.08 (47)	7.50 (37)	17.13 (14)
Median	5.94	13.18	-2.22	6.93	13.82

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	5.56 (59)	4.51 (50)	9.67 (41)	-11.74 (39)	3.49 (5)	1.50 (35)
Index	6.44 (35)	4.58 (46)	10.14 (33)	-12.68 (58)	2.61 (37)	1.33 (45)
Median	5.86	4.49	9.29	-12.18	2.39	1.30



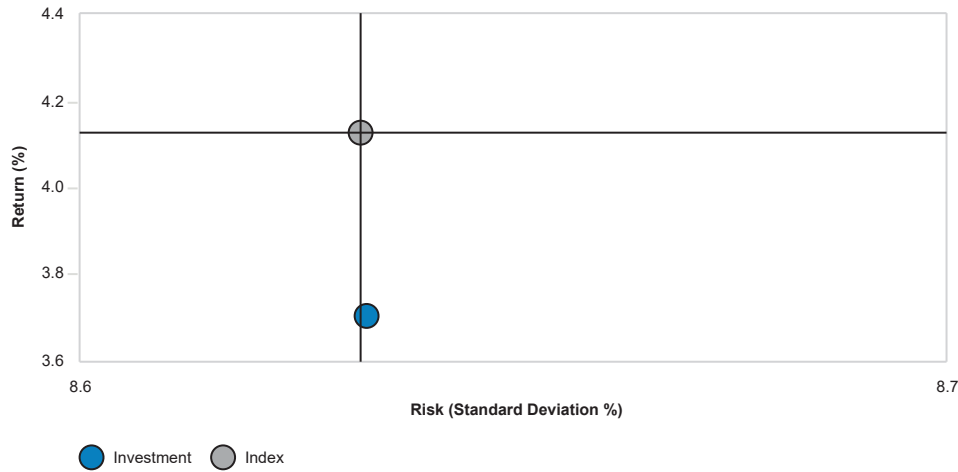
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	3.70	8.63	0.29	94.28	9	96.91	3
Index	4.13	8.63	0.34	100.00	10	100.00	2

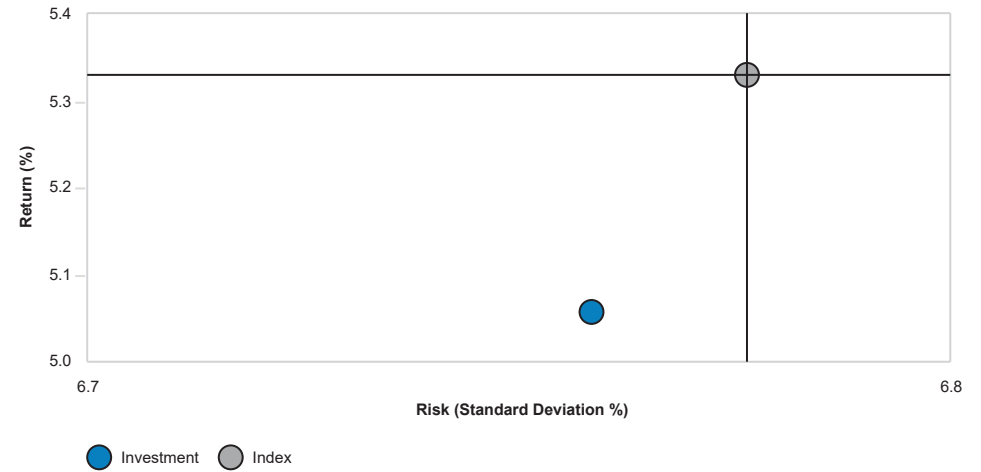
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	5.06	6.76	0.58	93.92	17	92.09	3
Index	5.33	6.78	0.62	100.00	18	100.00	2

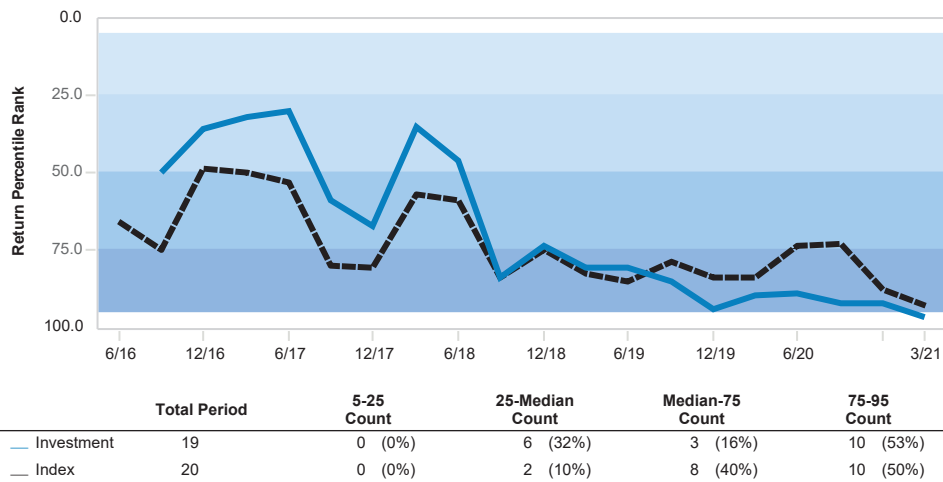
Risk and Return 3 Years



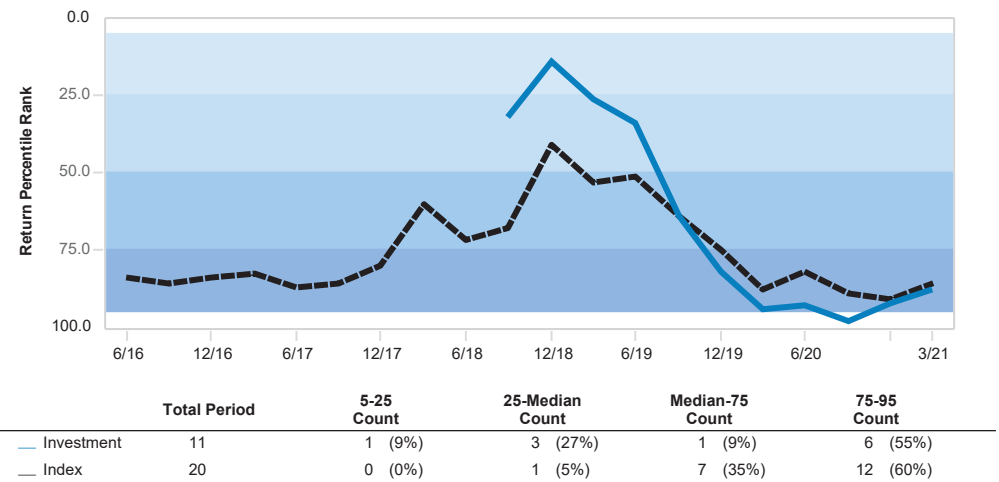
Risk and Return 5 Years



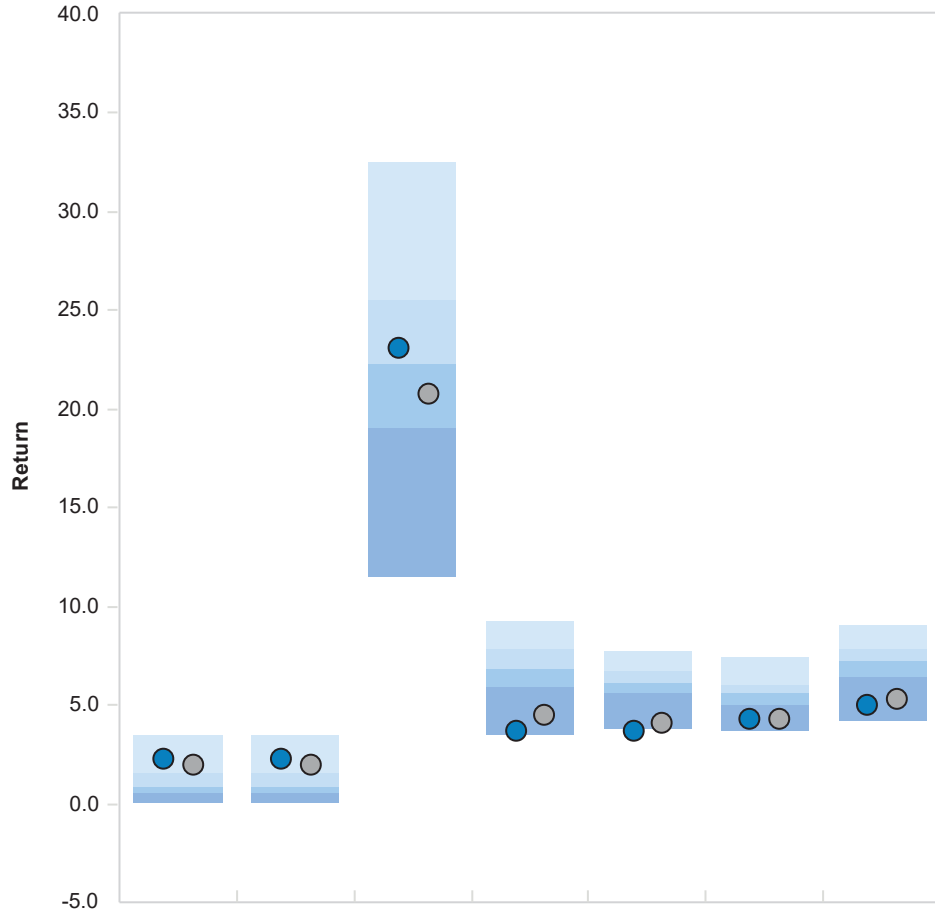
3 Year Rolling Percentile Rank IM U.S. High Yield Bonds (SA+CF)



5 Year Rolling Percentile Rank IM U.S. High Yield Bonds (SA+CF)

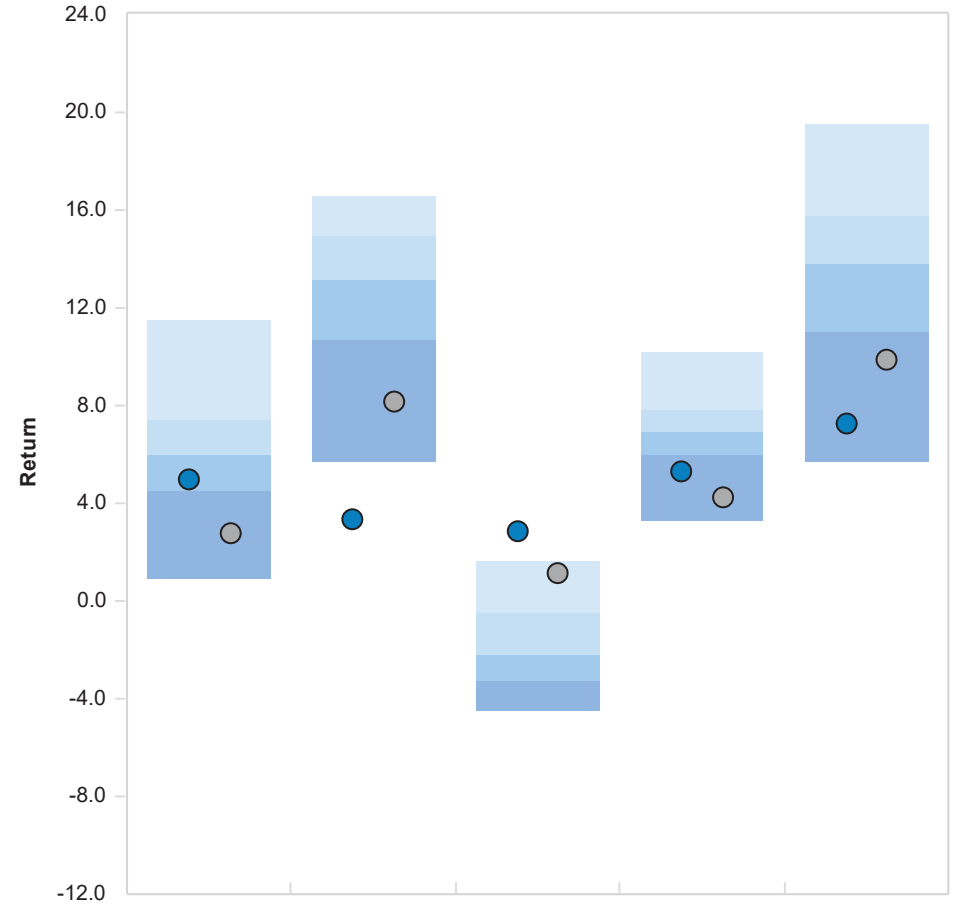


Peer Group Analysis - IM U.S. High Yield Bonds (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	2.25 (14)	2.25 (14)	23.15 (43)	3.68 (94)	3.70 (97)	4.29 (88)	5.06 (88)
● Index	2.01 (18)	2.01 (18)	20.77 (60)	4.53 (88)	4.13 (93)	4.26 (88)	5.33 (86)
Median	0.90	0.90	22.33	6.82	6.13	5.58	7.26

Peer Group Analysis - IM U.S. High Yield Bonds (SA+CF)



	2020	2019	2018	2017	2016
● Investment	4.98 (70)	3.31 (99)	2.84 (2)	5.31 (86)	7.28 (91)
● Index	2.78 (86)	8.16 (85)	1.14 (10)	4.25 (90)	9.87 (81)
Median	5.94	13.18	-2.22	6.93	13.82

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	5.39 (66)	4.64 (43)	9.21 (51)	-12.83 (59)	0.32 (100)	-1.15 (96)
Index	3.63 (88)	4.12 (69)	9.71 (39)	-13.18 (64)	1.67 (80)	0.92 (77)
Median	5.86	4.49	9.29	-12.18	2.39	1.30



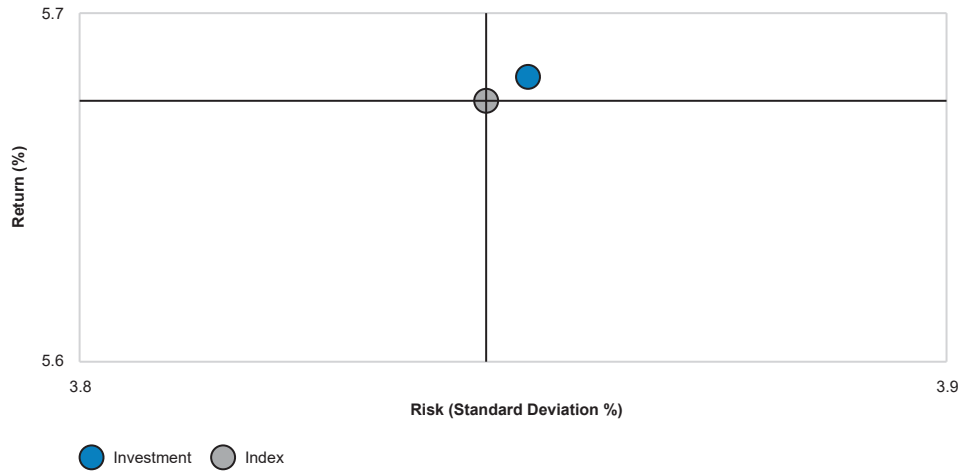
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	5.68	3.85	1.06	100.03	9	99.87	3
Index	5.68	3.85	1.06	100.00	9	100.00	3

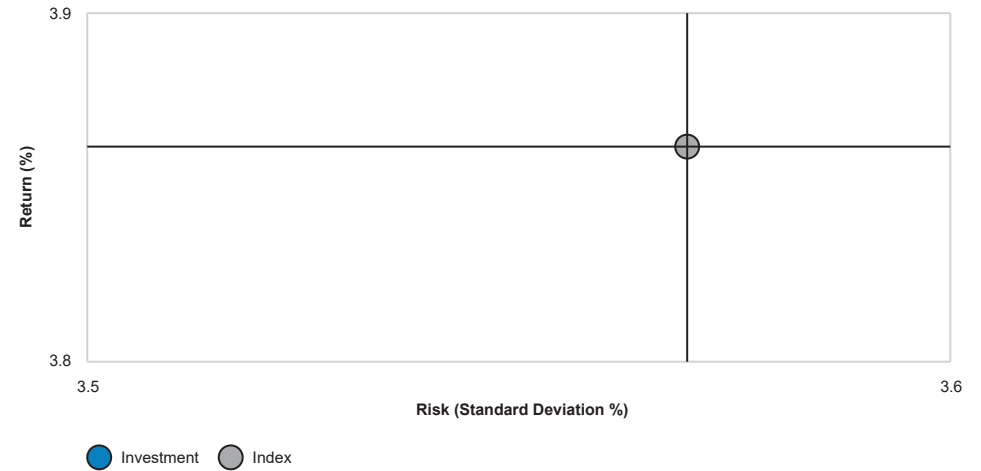
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Index	3.86	3.57	0.75	100.00	14	100.00	6

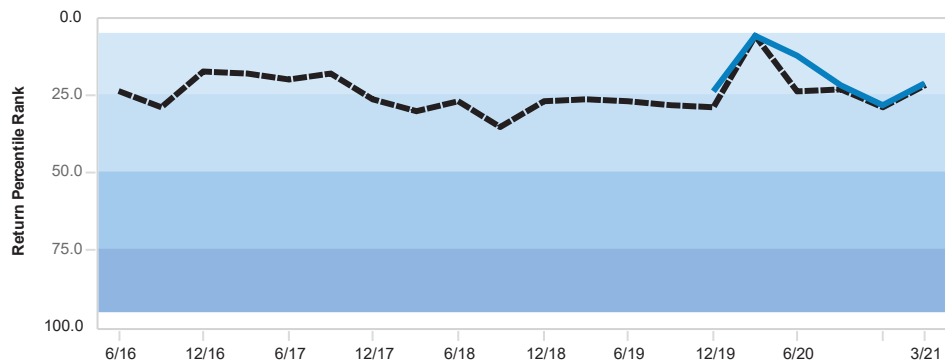
Risk and Return 3 Years



Risk and Return 5 Years

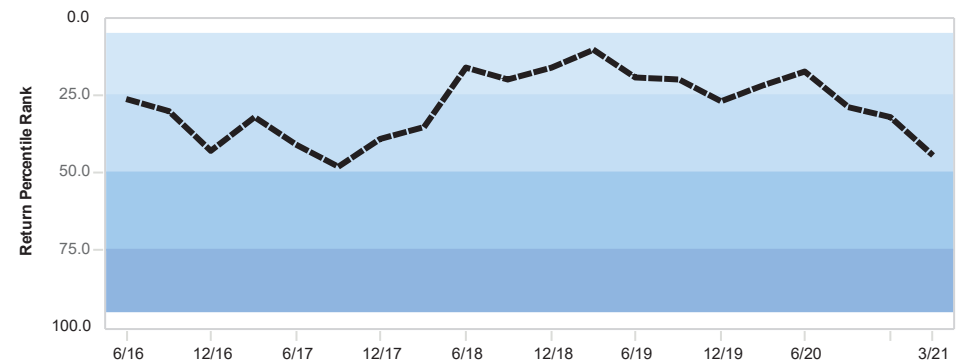


3 Year Rolling Percentile Rank IM U.S. TIPS (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	6	5 (83%)	1 (17%)	0 (0%)	0 (0%)
Index	20	9 (45%)	11 (55%)	0 (0%)	0 (0%)

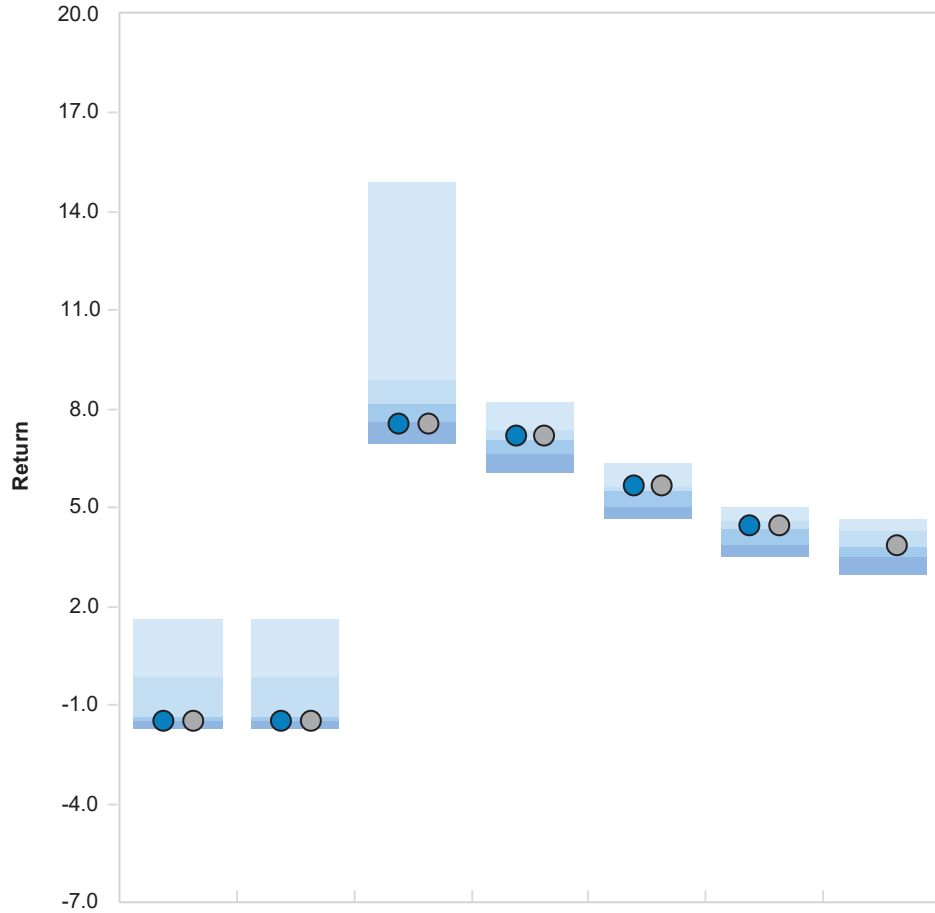
5 Year Rolling Percentile Rank IM U.S. TIPS (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	0	0	0	0	0
Index	20	8 (40%)	12 (60%)	0 (0%)	0 (0%)

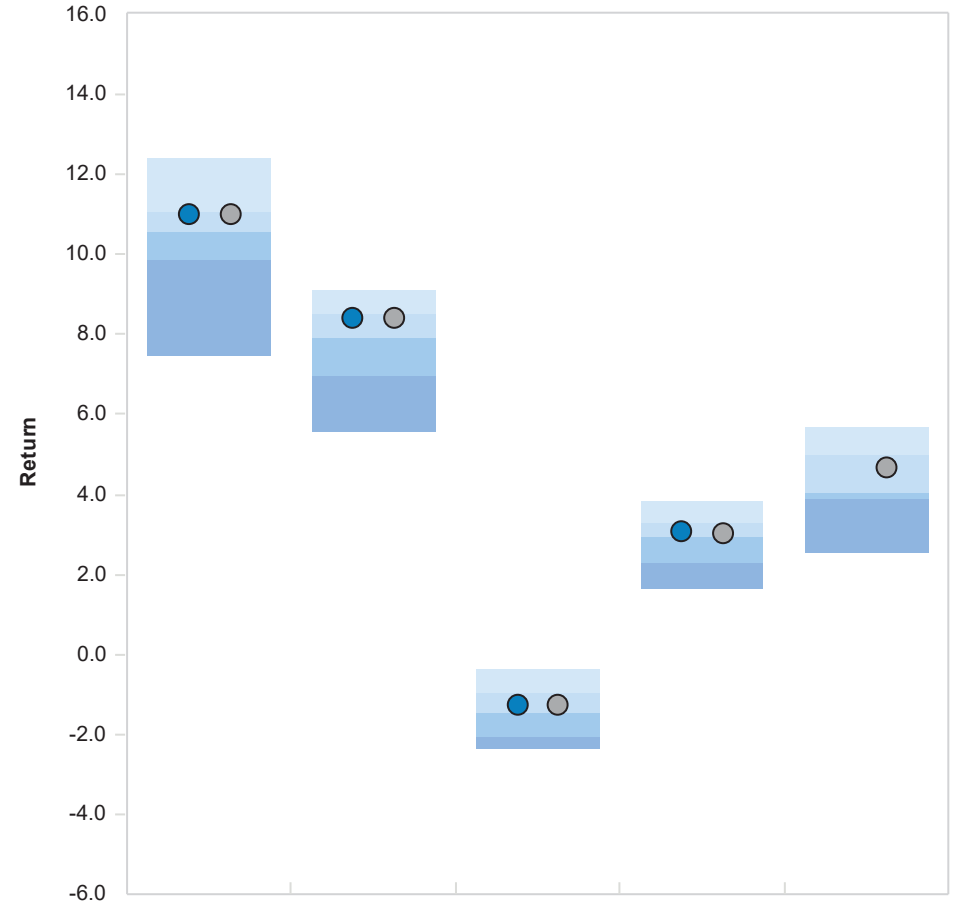


Peer Group Analysis - IM U.S. TIPS (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	-1.48 (74)	-1.48 (74)	7.55 (77)	7.20 (31)	5.68 (21)	4.49 (29)	N/A
● Index	-1.47 (73)	-1.47 (73)	7.54 (77)	7.19 (32)	5.68 (22)	4.47 (32)	3.86 (44)
Median	-1.36	-1.36	8.15	7.07	5.52	4.32	3.80

Peer Group Analysis - IM U.S. TIPS (SA+CF)



	2020	2019	2018	2017	2016
● Investment	11.02 (28)	8.43 (28)	-1.27 (38)	3.10 (40)	N/A
● Index	10.99 (31)	8.43 (28)	-1.26 (38)	3.01 (46)	4.68 (40)
Median	10.57	7.92	-1.44	2.91	4.02

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	1.60 (58)	3.04 (56)	4.27 (56)	1.70 (14)	0.79 (36)	1.35 (25)
Index	1.62 (42)	3.03 (57)	4.24 (57)	1.69 (14)	0.79 (36)	1.35 (25)
Median	1.62	3.15	4.41	0.67	0.74	1.16



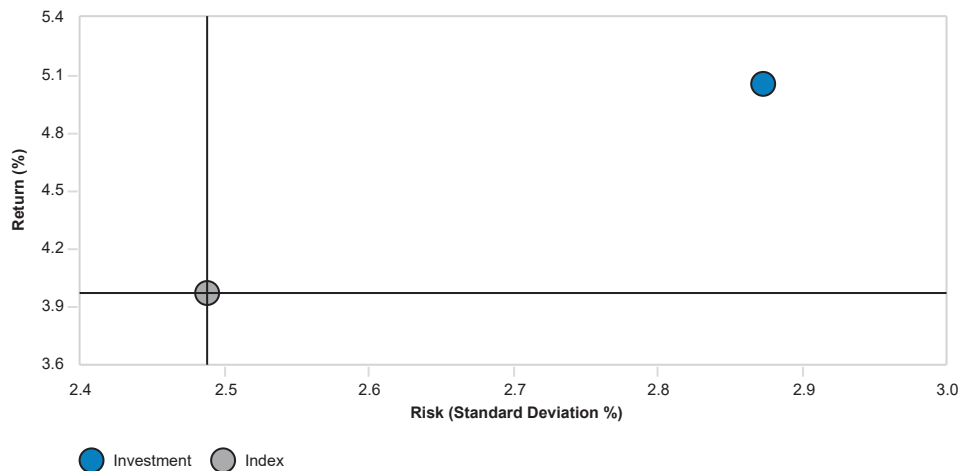
Historical Statistics 3 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	5.06	2.87	1.24	124.13	11	105.82	1
Index	3.97	2.49	1.00	100.00	11	100.00	1

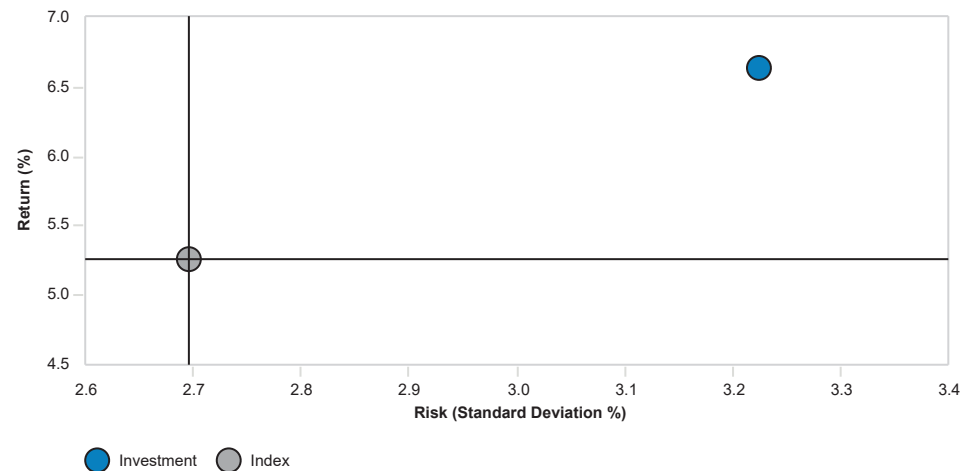
Historical Statistics 5 Years

	Return	Standard Deviation	Sharpe Ratio	Up Market Capture	Up Quarters	Down Market Capture	Down Quarters
Investment	6.64	3.22	1.66	124.22	19	105.82	1
Index	5.26	2.70	1.49	100.00	19	100.00	1

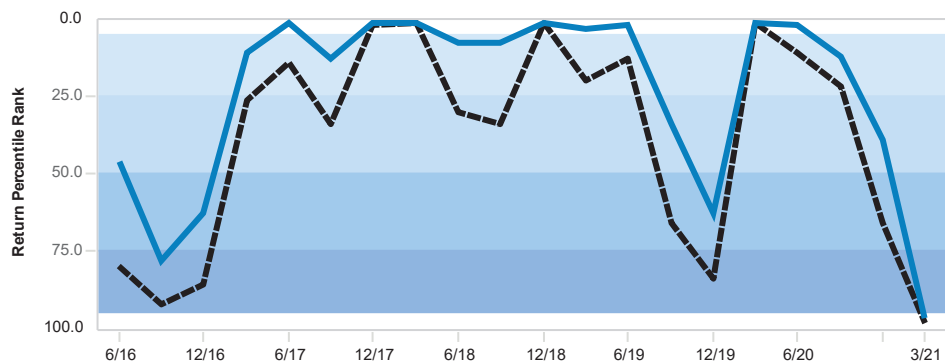
Risk and Return 3 Years



Risk and Return 5 Years

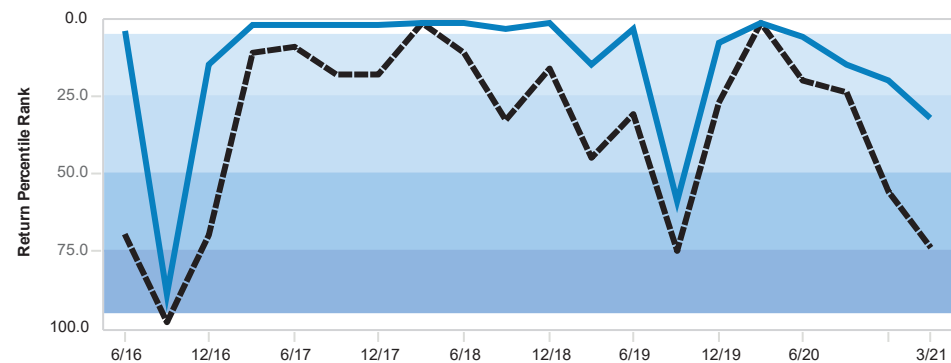


3 Year Rolling Percentile Rank IM U.S. REIT (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	13 (65%)	3 (15%)	2 (10%)	2 (10%)
Index	20	9 (45%)	4 (20%)	2 (10%)	5 (25%)

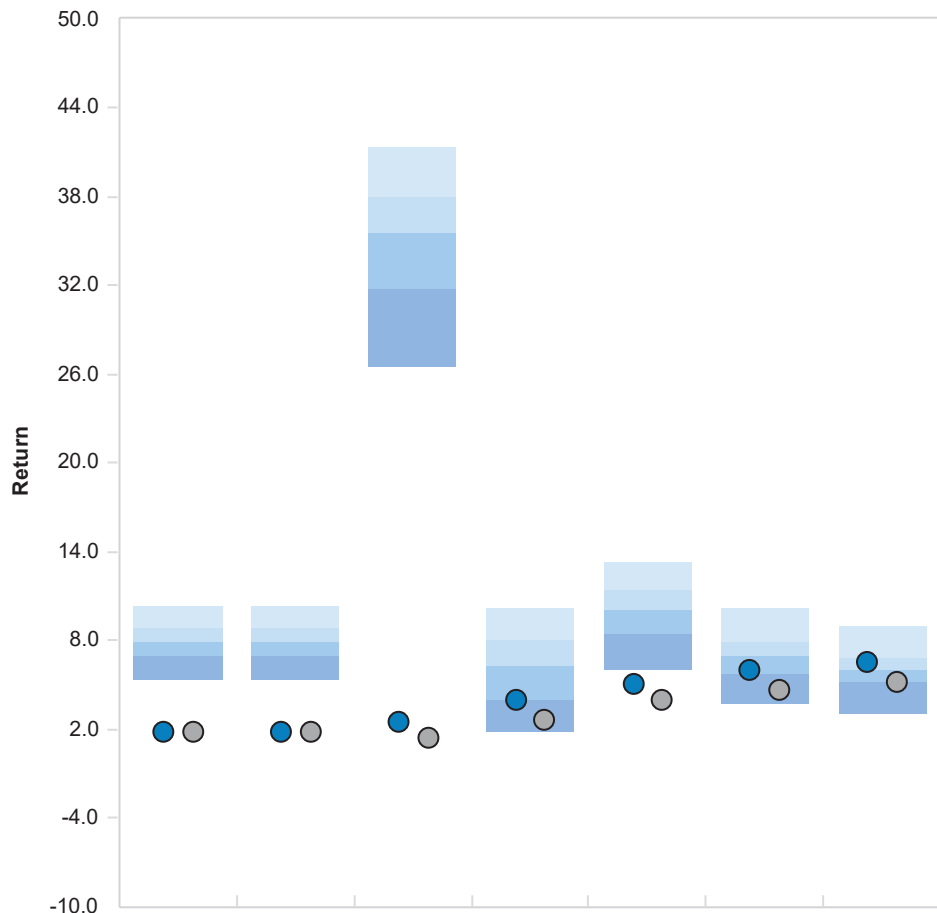
5 Year Rolling Percentile Rank IM U.S. REIT (SA+CF)



	Total Period	5-25 Count	25-Median Count	Median-75 Count	75-95 Count
Investment	20	17 (85%)	1 (5%)	1 (5%)	1 (5%)
Index	20	10 (50%)	4 (20%)	5 (25%)	1 (5%)

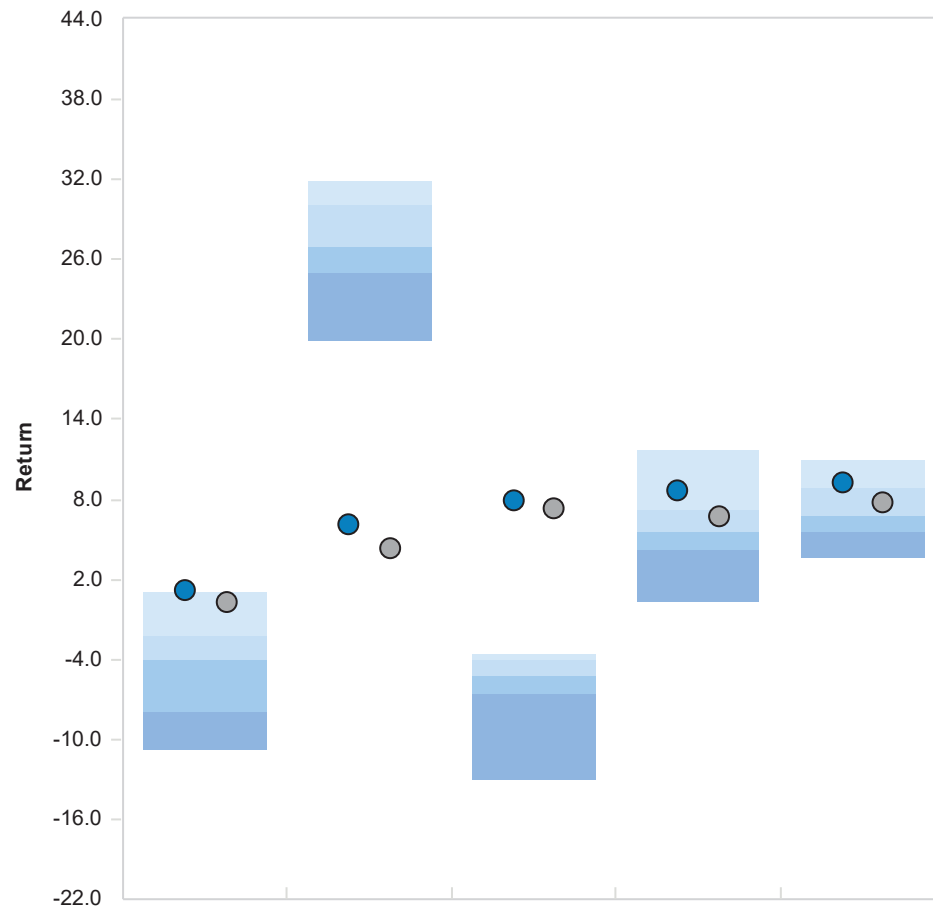


Peer Group Analysis - IM U.S. REIT (SA+CF)



	QTR	YTD	1 YR	2 YR	3 YR	4 YR	5 YR
● Investment	1.91 (100)	1.91 (100)	2.57 (100)	4.01 (75)	5.06 (97)	5.99 (73)	6.64 (32)
● Index	1.91 (100)	1.91 (100)	1.50 (100)	2.71 (93)	3.97 (98)	4.75 (89)	5.26 (74)
Median	7.99	7.99	35.54	6.35	10.07	6.94	6.10

Peer Group Analysis - IM U.S. REIT (SA+CF)



	2020	2019	2018	2017	2016
● Investment	1.26 (2)	6.17 (100)	7.96 (1)	8.75 (12)	9.23 (23)
● Index	0.34 (9)	4.39 (100)	7.36 (1)	6.66 (30)	7.79 (40)
Median	-4.05	26.87	-5.19	5.53	6.73

Comparative Performance

	1 Qtr Ending Dec-2020	1 Qtr Ending Sep-2020	1 Qtr Ending Jun-2020	1 Qtr Ending Mar-2020	1 Qtr Ending Dec-2019	1 Qtr Ending Sep-2019
Investment	1.47 (100)	1.06 (73)	-1.85 (100)	0.61 (1)	1.53 (17)	1.41 (100)
Index	1.10 (100)	0.27 (88)	-1.75 (100)	0.75 (1)	1.27 (22)	1.08 (100)
Median	10.15	1.63	11.98	-23.75	0.33	7.00



**Private Equity Summary of Partnership
Total Private Equity w Life Settlement Composite**

As of March 31, 2021

Private Equity Summary of Partnership

Partnerships	Vintage Year	Capital Commitment \$	Market Value \$
Total Private Equity w Life Settlement Composite		324,900,410	208,670,707
Accolade Partners V	2015	3,000,000	4,562,381
Accolade Partners VI	2018	3,000,000	2,141,304
Adams Street 2003 U.S Fund	2003	13,733,000	1,610,780
Adams Street 2008 Global	2008	10,000,000	6,256,676
Adams Street 2009 Global	2009	5,000,000	3,984,213
Auldbrass Spec Opps II	2018	4,000,000	2,455,944
Birchmere Ventures IV	2012	525,000	211,987
BlackRock Multi-Alternative Opps	2016	3,000,000	1,150,410
Blackstone Tac Op I	2012	2,000,000	681,051
Blackstone Tac Op II	2015	3,000,000	1,460,463
Blackstone Tac Op III	2019	5,000,000	3,080,469
CCA Black	2015	7,500,000	8,011,292
CCA Blue	2013	3,800,000	2,370,239
CCA Green	2009	15,000,000	-
CCA Longevity Fund VI LP	2019	5,000,000	4,597,401
Commonfund Venture Partners XII	2018	3,000,000	2,025,071
Constitution Ironsides Direct Investment Fund IV	2016	3,000,000	2,542,311
Constitution Ironsides Opportunities Fund	2018	4,000,000	3,305,208
Constitution Ironsides Partnership Fund II	2011	6,000,000	20,388
Constitution Ironsides Partnership Fund III	2014	8,000,000	5,159,122
Crestline Opportunity Fund III	2016	4,000,000	3,282,603
Crestline Recovery II	2011	3,000,000	356,172
DCM Fund IV	2015	3,000,000	3,191,498
Draper Triangle II	2005	10,000,000	223,927
Draper Triangle III	2013	13,500,000	11,550,364
Emerald Advisors Fin Srv I	2018	2,000,000	1,030,973
Entrust Special Opportunities Fund III	2015	3,000,000	1,616,995
Entrust Special Opportunities Fund IV	2018	3,000,000	3,291,153
Farol Fund II	2020	4,000,000	3,467,778
Five Points III	2017	3,000,000	2,638,195
Glouston Private Equity Opportunities IV	2011	3,000,000	446,867
Goldman Sachs Private Equity Partners 2004	2005	10,000,000	411,696
Greenspring Early Stage I LP	2018	4,000,000	3,262,361
Greenspring Opportunities II-A	2013	3,000,000	1,767,282
Greenspring Opportunities III	2014	3,000,000	4,246,738
Greenspring Opportunities IV	2015	3,000,000	5,744,826
Greenspring Opportunities V	2018	3,000,000	3,908,226
Greenspring Secondaries I	2014	1,000,000	1,598,229
Greenspring Secondaries II	2016	2,000,000	3,036,432

*Data Sources:
Market Values - BNY Mellon and Investment Managers
Commitments - Asset Strategies*



**Private Equity Summary of Partnership
Total Private Equity w Life Settlement Composite
As of March 31, 2021**

Partnerships	Vintage Year	Capital Commitment \$	Market Value \$
iNetworks INOF II	2013	-	6,291,029
iNetworks Opportunity Fund	2013	11,000,000	14,531,704
iNetworks Opportunity Fund II	2020	12,500,000	6,326,223
JMI Equity Fund IX-A	2019	3,000,000	2,762,462
Mellon PAM Fund V	2005	10,000,000	626,944
Mesirow Partners Fund IV	2006	17,000,000	5,039,304
North Haven Capital Partners VI	2015	3,000,000	2,124,256
North Haven Senior Loan Fund	2018	4,000,000	1,534,896
Pharos Capital Partners III	2013	3,000,000	3,932,721
PLSG Accelerator Fund	2011	250,000	216,156
ValStone Partners IV	2008	20,000,000	1
ValStone Partners V	2013	20,000,000	22,473,688
ValStone Partners VI	2017	20,000,000	17,872,154
Valstone Senior Living	2018	13,092,410	14,240,145



Historical Hybrid Composition
Total Fund Policy Index
As of March 31, 2021

Historical Hybrid Composition			
Allocation Mandate	Weight (%)	Allocation Mandate	Weight (%)
Jan-1979		Jun-2010	
Russell 3000 Index	65.00	Wilshire 5000 Total Market TR Index	20.00
Blmbg. Barc. U.S. Aggregate Index	35.00	MSCI AC World ex USA (Net)	25.00
Mar-2007		Blmbg. Barc. U.S. Aggregate Index	14.00
Wilshire 5000 Total Market TR Index	45.00	FTSE High Yield Market Capped Index	10.00
MSCI EAFE (Net) Index	10.00	Bloomberg Barclays U.S. TIPS Index	6.00
Blmbg. Barc. U.S. Aggregate Index	25.00	Bloomberg Commodity Index Total Return	5.00
Bloomberg Commodity Index Total Return	5.00	NCREIF Fund Index-Open End Diversified Core Equity (VW) (Net) Monthly	10.00
NCREIF Fund Index-Open End Diversified Core Equity (VW) (Net) Monthly	5.00	Private Equity Composite	10.00
Private Equity Composite	5.00	Mar-2013	
90 Day U.S. Treasury Bill	5.00	Wilshire 5000 Total Market TR Index	16.10
Sep-2008		MSCI AC World ex USA (Net)	18.90
Wilshire 5000 Total Market TR Index	45.00	Blmbg. Barc. U.S. Aggregate Index	10.00
MSCI AC World ex USA (Net)	10.00	FTSE High Yield Market Capped Index	12.00
Blmbg. Barc. U.S. Aggregate Index	25.00	Bloomberg Barclays U.S. TIPS Index	5.00
Bloomberg Commodity Index Total Return	5.00	Bloomberg Commodity Index Total Return	8.00
NCREIF Fund Index-Open End Diversified Core Equity (VW) (Net) Monthly	5.00	NCREIF Fund Index-Open End Diversified Core Equity (VW) (Net) Monthly	10.00
Private Equity Composite	5.00	Private Equity Composite	20.00
90 Day U.S. Treasury Bill	5.00	Apr-2016	
Dec-2008		Wilshire 5000 Total Market TR Index	15.00
Wilshire 5000 Total Market TR Index	35.00	MSCI AC World ex USA (Net)	15.00
MSCI AC World ex USA (Net)	15.00	Blmbg. Barc. U.S. Aggregate Index	10.00
Blmbg. Barc. U.S. Aggregate Index	20.00	FTSE High Yield Market Capped Index	12.00
FTSE High Yield Market Capped Index	5.00	Bloomberg Barclays U.S. TIPS Index	8.00
Bloomberg Barclays U.S. TIPS Index	5.00	Bloomberg Commodity Index Total Return	2.50
Bloomberg Commodity Index Total Return	5.00	NCREIF Fund Index-Open End Diversified Core Equity (VW) (Net) Monthly	10.00
NCREIF Fund Index-Open End Diversified Core Equity (VW) (Net) Monthly	7.50	Private Equity Composite	22.50
Private Equity Composite	5.00	Alerian MLP Index	5.00
90 Day U.S. Treasury Bill	2.50	Jan-2019	
Sep-2009		Wilshire 5000 Total Market TR Index	16.50
Wilshire 5000 Total Market TR Index	30.00	MSCI AC World ex USA (Net)	16.50
MSCI AC World ex USA (Net)	20.00	Blmbg. Barc. U.S. Aggregate Index	12.50
Blmbg. Barc. U.S. Aggregate Index	15.00	FTSE High Yield Market Capped Index	12.00
FTSE High Yield Market Capped Index	10.00	Bloomberg Barclays U.S. TIPS Index	5.00
Bloomberg Barclays U.S. TIPS Index	7.50	NCREIF Fund Index-Open End Diversified Core Equity (VW) (Net) Monthly	12.50
Bloomberg Commodity Index Total Return	2.50	Private Equity Composite	20.00
NCREIF Fund Index-Open End Diversified Core Equity (VW) (Net) Monthly	10.00	Alerian MLP Index	5.00
Private Equity Composite	5.00		



Allocation Mandate	Weight (%)
Mar-2021	
Russell 3000 Index	16.50
MSCI AC World ex USA (Net)	16.50
Blmbg. Barc. U.S. Aggregate Index	12.50
FTSE High Yield Market Capped Index	12.00
Bloomberg Barclays U.S. TIPS Index	5.00
NCREIF Fund Index-Open End Diversified Core Equity (VW) (Net) Monthly	12.50
Liquid Policy Benchmark	5.00
Total Private Equity w Life Settlement Composite	20.00



Historical Hybrid Composition

Allocation Mandate

Weight (%)

Nov-1993

Wilshire 5000 Total Market TR Index

100.00

Mar-2021

Russell 3000 Index

100.00



Historical Hybrid Composition	
Allocation Mandate	Weight (%)
Dec-2000	
MSCI EAFE (Net) Index	100.00
Sep-2008	
MSCI AC World ex USA (Net)	100.00
Mar-2015	
MSCI AC World ex USA IMI (Net)	100.00
Mar-2021	
MSCI AC World ex USA (Net)	100.00



Historical Hybrid Composition

Allocation Mandate

Weight (%)

Mar-2021

S&P 500 Index	30.00
S&P MidCap 400 Index	2.00
S&P SmallCap 600 Index	10.50
MSCI EAFE IMI (Net)	16.90
MSCI Emerging Markets IMI (Net)	6.10
Blmbg. Barc. U.S. Aggregate Index	25.00
ICE BofAML 1-3 Year Treasury	4.50
FTSE NAREIT Equity REIT Index	5.00



	Estimated Annual Fee (%)	Market Value (\$)	Estimated Annual Fee (\$)	Fee Schedule
Domestic Equity				
SSgA S&P 500 Index	0.02	104,550,326	25,910	0.03 % of First \$50 M 0.02 % Thereafter Minimum Fee: \$10,000
Fragasso Large Core (EMWO)	0.61	6,304,002	38,645	1.00 % of First \$0 M 0.95 % of Next \$0 M 0.75 % of Next \$1 M 0.65 % of Next \$2 M 0.55 % of Next \$3 M 0.50 % of Next \$3 M 0.25 % of Next \$3 M 0.20 % Thereafter
Twin Capital Enhanced Equity	0.35	35,891,029	125,619	0.35 % of Assets
Earnest Small Value	0.90	16,519,815	148,899	1.00 % of First \$10 M 0.75 % of Next \$15 M 0.60 % of Next \$25 M 0.50 % Thereafter
Emerald Advisors Small Cap	0.73	15,541,396	113,248	1.00 % of First \$2 M 0.75 % of Next \$8 M 0.60 % Thereafter
Emerald Advisors All Cap (EMWO)	0.60	5,790,127	34,741	0.60 % of Assets
Ethos (EMWO)	0.47	1,975,837	9,286	0.47 % of Assets
CIM Small Cap (EMWO)	0.69	6,084,398	41,838	0.75 % of First \$5 M 0.40 % of Next \$10 M 0.25 % Thereafter
Cookson Peirce (EMWO)	0.50	735,546	3,678	0.50 % of Assets
International Equity				
SSgA ACWI ex US	0.08	37,847,078	30,278	0.08 % of Assets
Baillie Gifford Intl Equity	0.61	81,978,998	500,072	0.61 % of Assets
FIAM Select International Equity	0.31	41,842,836	130,476	0.34 % of First \$25 M 0.27 % of Next \$25 M 0.24 % of Next \$150 M 0.20 % Thereafter
Segall, Bryant & Hamill	0.64	34,604,835	220,327	0.75 % of First \$15 M 0.55 % of Next \$20 M 0.45 % of Next \$30 M 0.35 % Thereafter
Global Equity				
Columbus Macro (EMWO)	0.70	1,408,144	9,857	0.70 % of Assets



	Estimated Annual Fee (%)	Market Value (\$)	Estimated Annual Fee (\$)	Fee Schedule
Core Fixed w Israel Bonds				
C S McKee	0.25	38,446,030	96,115	0.25 % of Assets
Federated Core Broad	0.29	34,528,279	98,821	0.30 % of First \$25 M 0.25 % of Next \$25 M 0.20 % Thereafter
CIM Investment Mgmt	0.25	23,636,469	59,091	0.25 % of Assets
StoneRidge Partners (EMWO)	0.30	5,458,158	16,374	0.30 % of Assets
Gridiron Capital Fixed Income (EMWO)	0.65	4,809,185	31,260	0.65 % of Assets
FNB (EMWO)	0.35	2,803,123	9,811	0.35 % of First \$5 M 0.30 % of Next \$5 M 0.25 % of Next \$10 M 0.20 % Thereafter
Israel Bonds	0.20	7,425,382	14,851	0.20 % of Assets
High Yield Fixed				
Oaktree High Yield	0.50	66,645,039	333,225	0.50 % of Assets
Federated High Yield	0.45	53,158,302	239,212	0.45 % of Assets
Sound Point	1.00	3,512,425	35,124	1.00 % of Assets
TIPS Fixed				
MCM TIPS	0.03	39,942,901	11,983	0.03 % of First \$50 M 0.02 % of Next \$50 M 0.01 % Thereafter
Real Estate				
Morgan Stanley Prime Property Fund	0.84	74,490,799	625,723	0.84 % of Assets
Oaktree Real Estate [^]	2.20	6,948,844	152,875	2.20 % of Assets
Washington Alliance (EMWO)	1.50	12,824,195	192,363	1.50 % of Assets
Washington Alliance II (EMWO)	1.50	1,236,379	18,546	1.50 % of Assets
Siguler Guff Distressed RE [^]	1.20	9,303,460	111,642	1.20 % of Assets
ERECT Fund II	1.35	10,215,645	137,911	1.35 % of Assets
Hedge Fund				
Gridiron Capital Multi-Asset (EMWO)	0.75	3,212,566	24,094	Performance Based 0.75 and 10.00
Liquid Policy Portfolio				
BlackRock Liquidity iShares Public Pension Fund*	0.08	24,814,935	19,852	0.08 % of Assets
Investments ex Private Equity		814,486,486	3,661,744	

[^] Due to limitations in reporting as a result of the variable and commitment based fee structure, AndCo calculated an approximation for this noted fee schedule. This figure demonstrates the "effective" basis point charge, computed based on the most recently available assessed quarterly fee + expenses, divided by the ending market value. The actual fee schedule can be found in Appendix A.
* Estimated fee based on average of underlying funds



Oaktree Real Estate Opportunities VI LP Fee Calculation

The annual Management Fee shall be an amount equal to the sum of the amounts determined with respect to each Limited Partner as follows: (a) prior to the end of the Investment Period, the product of the Management Fee Percentage attributable to such Limited Partner's Capital Commitment and the Capital Commitment of such Limited Partner and (b) from and after the day following the end of the Investment Period, the product of the Management Fee Percentage attributable to such Limited Partner's Capital Commitment and the lesser of (i) such Limited Partner's allocable portion of the Aggregate Contributed Capital and (ii) such Limited Partner's allocable portion of the cost basis of the Permitted Investments held by the Fund as of the end of the next-to-last month of the immediately preceding calendar quarter.

Siguler Guff Distressed Real Estate Opportunities Fund II, LP Fee Calculation

A management fee shall be payable with respect to each Limited Partner by the Partnership to the Investment Manager (the "Management Fee") quarterly in arrears on the last day of each fiscal quarter. Up to and including the end of the Direct Investment Commitment Period or, if earlier, the date on which pursuant to Section 7.03(b) the Partners and Parallel Company Partners have voted to require the General Partner to cease making both Direct Investments and additional commitments to Funds (the "Investment Termination Date"), the Management Fee, for each Limited Partner, shall be payable at that Limited Partner's Blended Rate multiplied by the aggregate amount of such Limited Partner's Capital Commitment. From and after the end of the Direct Investment Commitment Period or, if earlier, the Investment Termination Date, the Management Fee, for each Limited Partner, shall be payable at that Limited Partner's Applicable Percentage (as hereinafter defined) per annum multiplied by the aggregate amount of such Limited Partner's Capital Commitment. The "Blended Rate" shall be a percentage of a Limited Partner's Capital Commitment calculated by combining (x) one percent (1%) per annum on the first \$10,000,000 of such Limited Partner's Capital Commitment, (y) eighty-five one hundredths of one percent (0.85%) per annum on the next \$40,000,000 of such Limited Partner's Capital Commitment and (z) five tenths of one percent (0.50%) per annum on such Limited Partner's remaining Capital Commitment. The "Applicable Percentage" shall represent an amount equal to eighty percent (80%) of the Blended Rate used to calculate the Management Fee for the preceding year. For example, in the first year following the termination of the Direct Investment Commitment Period or the Investment Termination Date, as the case may be, the Applicable Percentage with respect to Limited Partners with Capital Commitments less than or equal to \$10,000,000 (and therefore with Blended Rates of 1%) shall be 0.80% (80% of 1%), and for the following year, the Applicable Percentage shall be 0.64% (80% of 0.80%).

Active Return	- Arithmetic difference between the manager's performance and the designated benchmark return over a specified time period.
Alpha	- A measure of the difference between a portfolio's actual performance and its expected return based on its level of risk as determined by beta. It determines the portfolio's non-systemic return, or its historical performance not explained by movements of the market.
Beta	- A measure of the sensitivity of a portfolio to the movements in the market. It is a measure of the portfolio's systematic risk.
Consistency	- The percentage of quarters that a product achieved a rate of return higher than that of its benchmark. Higher consistency indicates the manager has contributed more to the product's performance.
Distributed to Paid In (DPI)	- The ratio of money distributed to Limited Partners by the fund, relative to contributions. It is calculated by dividing cumulative distributions by paid in capital. This multiple shows the investor how much money they got back. It is a good measure for evaluating a fund later in its life because there are more distributions to measure against.
Down Market Capture	- The ratio of average portfolio performance over the designated benchmark during periods of negative returns. A lower value indicates better product performance
Downside Risk	- A measure similar to standard deviation that utilizes only the negative movements of the return series. It is calculated by taking the standard deviation of the negative quarterly set of returns. A higher factor is indicative of a riskier product.
Excess Return	- Arithmetic difference between the manager's performance and the risk-free return over a specified time period.
Excess Risk	- A measure of the standard deviation of a portfolio's performance relative to the risk free return.
Information Ratio	- This calculates the value-added contribution of the manager and is derived by dividing the active rate of return of the portfolio by the tracking error. The higher the Information Ratio, the more the manager has added value to the portfolio.
Public Market Equivalent (PME)	- Designs a set of analyses used in the Private Equity Industry to evaluate the performance of a Private Equity Fund against a public benchmark or index.
R-Squared	- The percentage of a portfolio's performance that can be explained by the behavior of the appropriate benchmark. A high R-Squared means the portfolio's performance has historically moved in the same direction as the appropriate benchmark.
Return	- Compounded rate of return for the period.
Sharpe Ratio	- Represents the excess rate of return over the risk free return divided by the standard deviation of the excess return. The result is an absolute rate of return per unit of risk. A higher value demonstrates better historical risk-adjusted performance.
Standard Deviation	- A statistical measure of the range of a portfolio's performance. It represents the variability of returns around the average return over a specified time period.
Total Value to Paid In (TVPI)	- The ratio of the current value of remaining investments within a fund, plus the total value of all distributions to date, relative to the total amount of capital paid into the fund to date. It is a good measure of performance before the end of a fund's life
Tracking Error	- This is a measure of the standard deviation of a portfolio's returns in relation to the performance of its designated market benchmark.
Treynor Ratio	- Similar to Sharpe ratio but utilizes beta rather than excess risk as determined by standard deviation. It is calculated by taking the excess rate of return above the risk free rate divided by beta to derive the absolute rate of return per unit of risk. A higher value indicates a product has achieved better historical risk-adjusted performance.
Up Market Capture	- The ratio of average portfolio performance over the designated benchmark during periods of positive returns. A higher value indicates better product performance.



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AndCo uses time-weighted calculations which are founded on standards recommended by the CFA Institute. The calculations and values shown are based on information that is received from custodians. AndCo analyzes transactions as indicated on the custodian statements and reviews the custodial market values of the portfolio. As a result, this provides AndCo with a reasonable basis that the investment information presented is free from material misstatement. This methodology of evaluating and measuring performance provides AndCo with a practical foundation for our observations and recommendations. Nothing came to our attention that would cause AndCo to believe that the information presented is significantly misstated.

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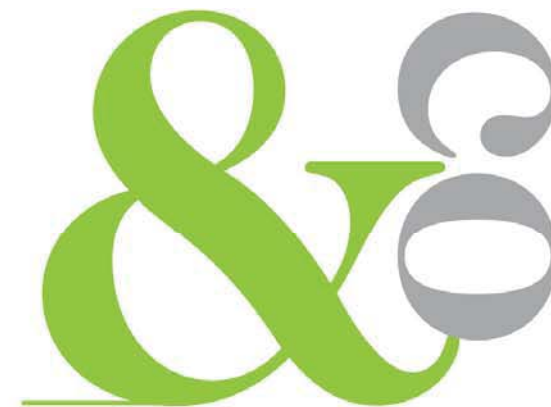
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