

Investment Performance Review  
Period Ending September 30, 2017

**Village of Winnetka  
Police Pension Fund**

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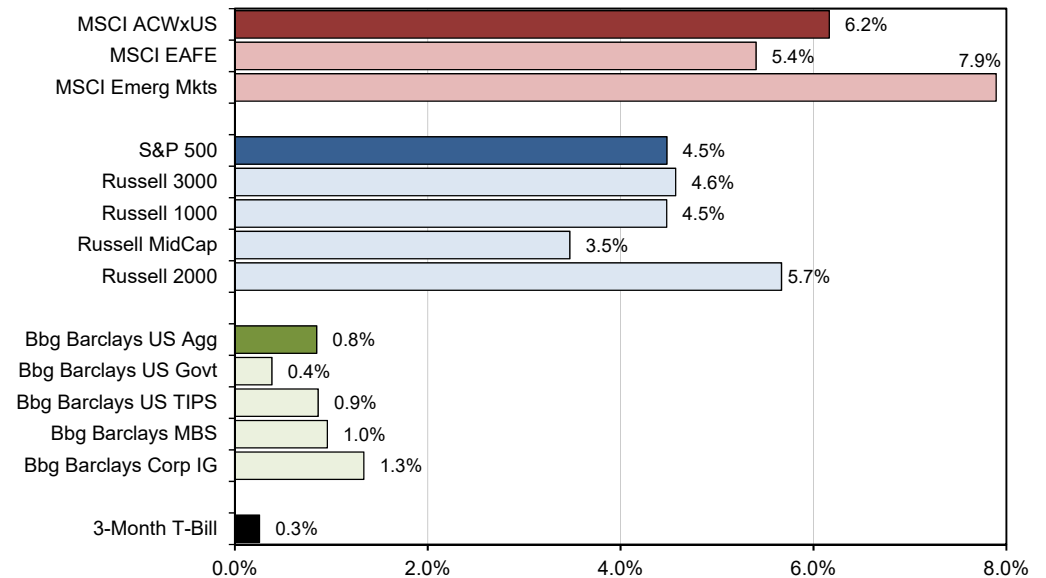


# 3rd Quarter 2017 Market Environment

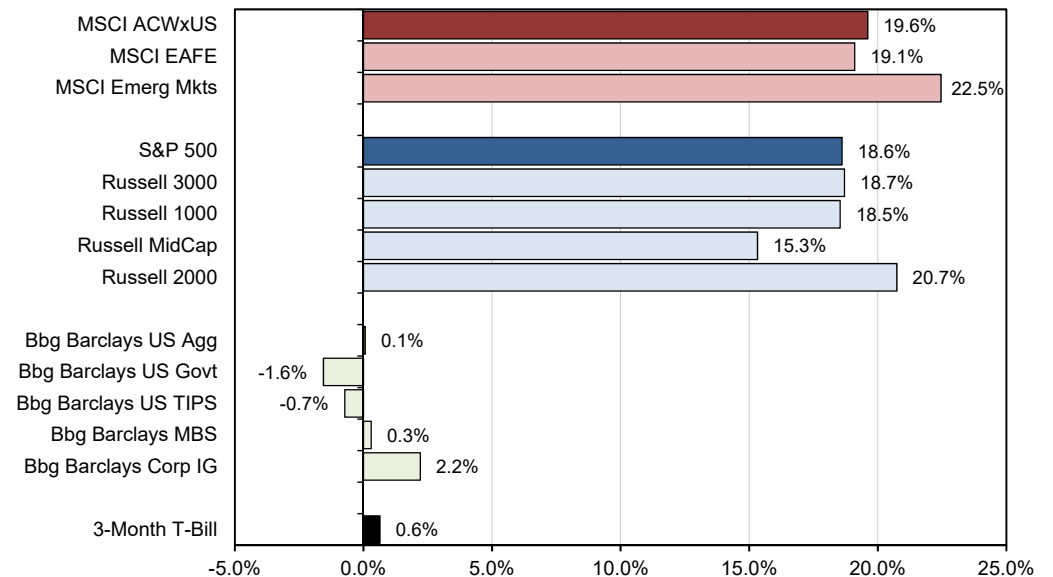


- Returns were positive for major equity and fixed income indices for the 3<sup>rd</sup> quarter of 2017. Broad domestic and international equity market performance was largely fueled by continued improvement in corporate earnings and macroeconomic data worldwide. Domestic equities trailed international indices during the quarter. While U.S. economic fundamentals and corporate earnings growth were viewed positively, market participants faced headwinds from increasing tension between the U.S. and North Korea, several major weather events and ongoing political concerns surrounding the pace of implementation of Trump administration expansive fiscal policy reforms. Despite these concerns, investor optimism remained high and many major domestic equity indices hit record levels during the quarter. Small cap equities outperformed large cap stocks for the quarter with the Russell 2000 Index returning 5.7% versus a 4.5% return for the S&P 500 Index. Small cap companies have also been the best performers domestically over the last 12 months, returning over 20%. While small cap equities lead the charge, all U.S. core market capitalization indices returned over 15% over the last year.
- International equity market benchmarks continued to outpace U.S. markets through the 3<sup>rd</sup> quarter of 2017 as both developed and emerging market international equities saw benefits from continued strength in global macroeconomic data, a weakening U.S. Dollar (USD) and ongoing accommodative global central bank policies. The improving economic fundamentals worldwide have led many international central banks to begin telegraphing an eventual reduction in stimulus going forward, with both the European Central Bank and the Bank of England expected to announce plans to reduce stimulus before year end. Emerging markets, which benefitted from a weakening USD and rising commodity prices during the period, continued their trend of outperformance relative to developed markets. The MSCI Emerging Market Index returned 7.9% for the quarter and a solid 22.5% for the 1-year period. While weaker by comparison, the developed market MSCI EAFE Index also posted robust performance, returning 5.4% for the quarter and 19.1% for the year.
- The yield curve continued to flatten through the 3<sup>rd</sup> quarter of 2017 as interest rates rose slightly from the prior quarter, but with greater magnitude in short-term maturities. The Federal Reserve announced that its plan to systematically shrink the size of its balance sheet would begin in October. Broad fixed income indices posted positive results with the bellwether Bloomberg Barclays U.S. Aggregate Index returning 0.8% for the quarter. Benefitting from tightening credit spreads, corporate credit has been the best performer among the investment grade sectors with the Bloomberg Barclays U.S. Corporate Investment Grade Index returning 1.3% and 2.2% over the quarter and 1-year period respectively.

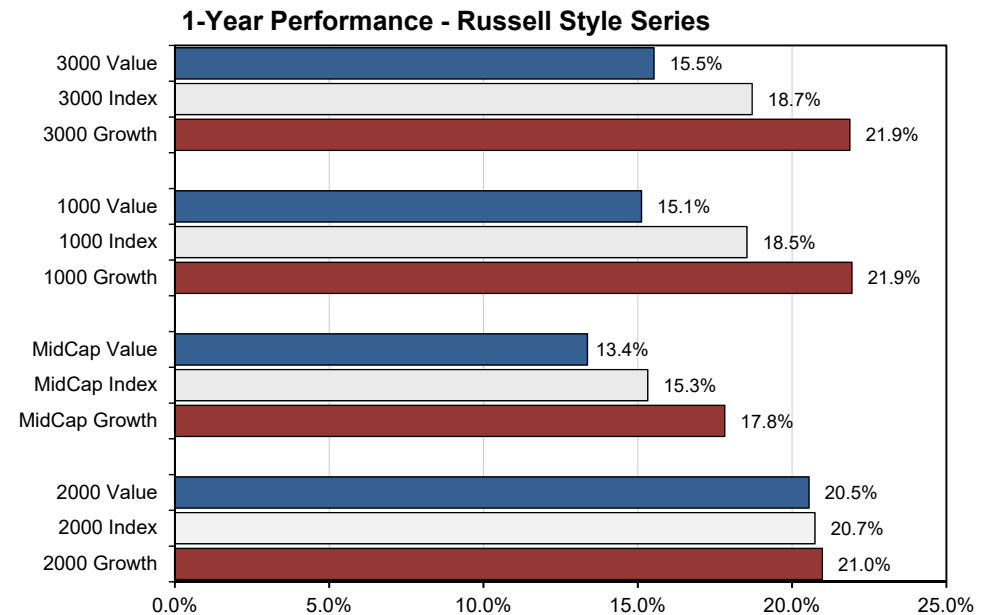
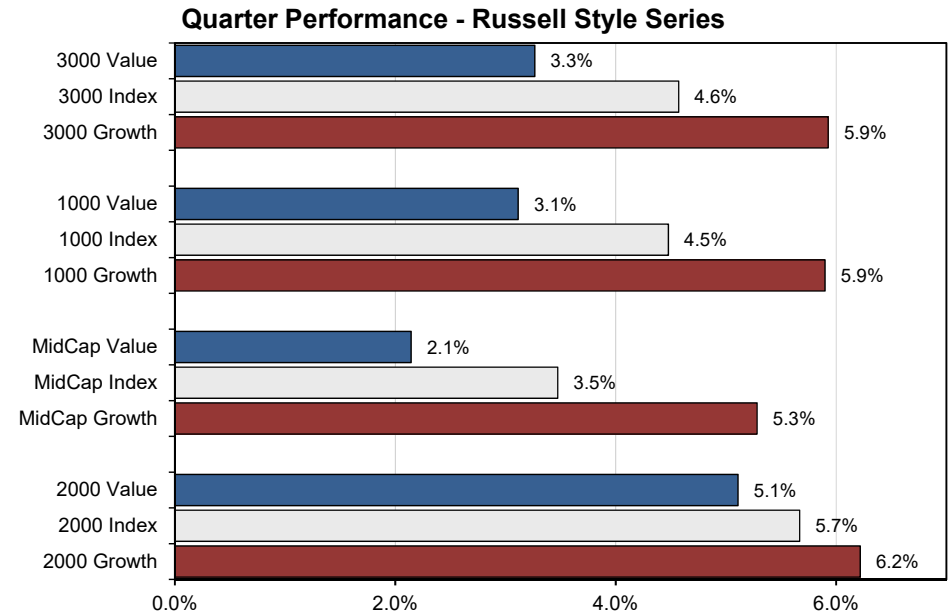
### Quarter Performance



### 1-Year Performance



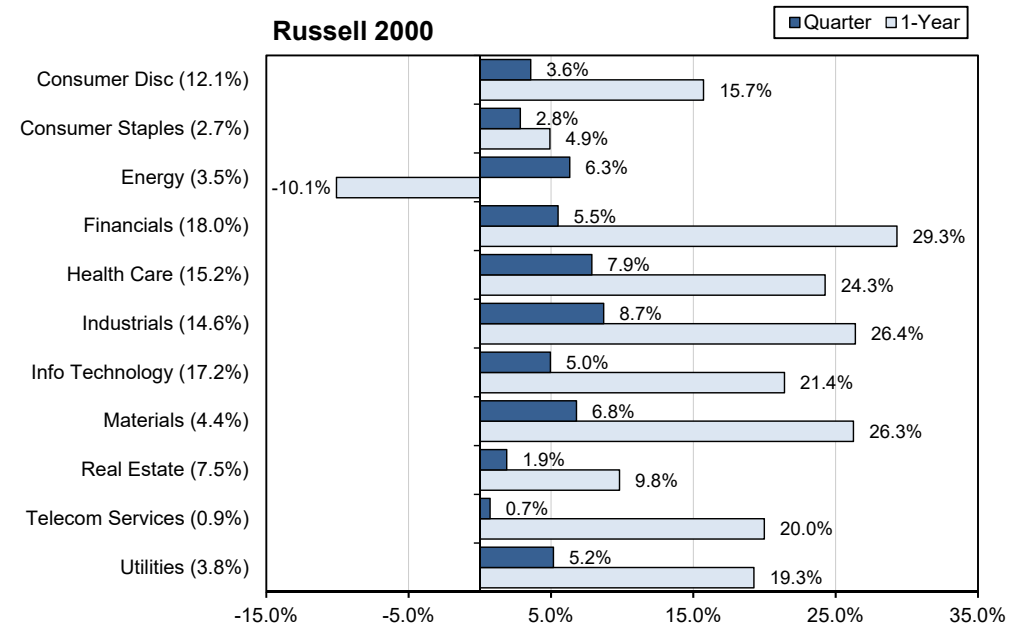
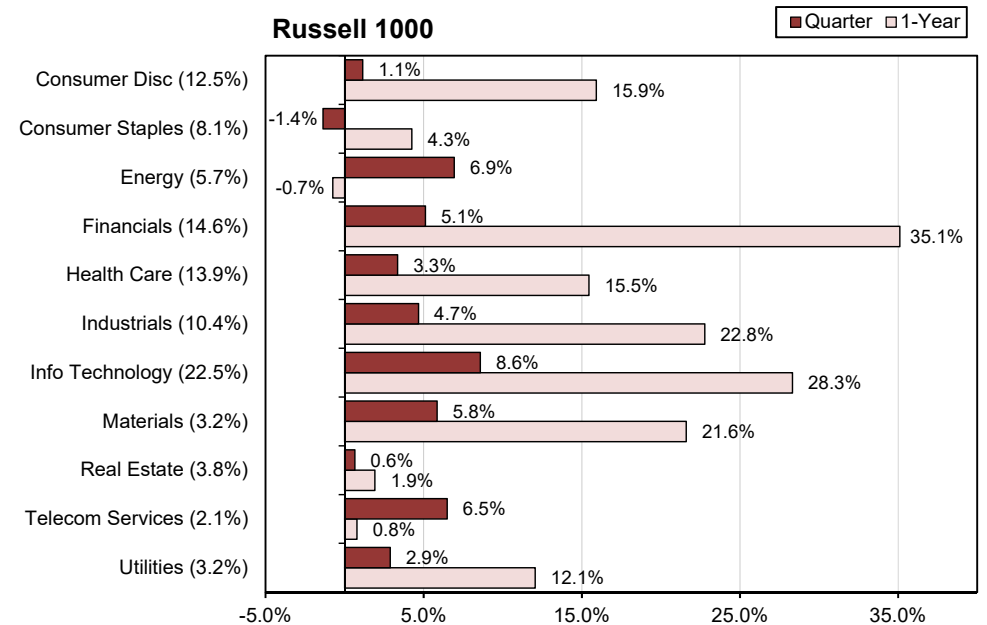
- Despite political gridlock in Washington, increased aggression between the U.S. and North Korea and several major weather events, including three hurricanes that caused catastrophic damage to Texas, Florida and Puerto Rico, domestic equity prices pushed higher during the 3<sup>rd</sup> quarter. U.S. equity index returns were positive across the style and capitalization spectrum for the 3<sup>rd</sup> quarter and trailing 1-year period. Encouraging economic data continued to facilitate gains in U.S. equity markets as positive trends in GDP, consumer and business sentiment, corporate earnings and employment continued throughout the period. Over the past twelve months, there has only been one instance of a negative quarterly return being posted by the Russell market cap and style indices, which was a -0.13% return by the Russell 2000 Value Index during 1Q 2017.
- Small cap stocks were the best performing capitalization segment across the spectrum for the 3<sup>rd</sup> quarter, bucking a year-to-date trend of large cap outperformance. The small cap Russell 2000 Index posted a 5.7% return for the period. While small cap stocks were the best performers, large and mid cap indices also posted solid returns. Interestingly, the returns for the large cap Russell 1000 Index outperformed the Russell MidCap Index, which is somewhat unusual during a period of small cap outperformance. Small cap stocks also outperform larger companies over the 1-year period, with the Russell 2000 returning 20.7% versus a return of 18.5% for the Russell 1000.
- The 3<sup>rd</sup> quarter built on year-to-date trends as growth style indices outperformed their value counterparts. Growth indices benefitted from significant overweight's to the information technology sector, which was the best performing sector during the 3<sup>rd</sup> quarter. Growth benchmarks also benefitted from their exposures to more cyclical names within the information technology, health care and industrials sectors. The Russell Midcap Value Index's return of 2.1% was the worst performing style index for the period. Over the 1-year period, growth indices outperform value indices across the market cap spectrum with the Russell 1000 Growth Index returning an impressive 21.9%. However, all market cap and style indices have returns in the double digits with most returning greater than 15% for the year.
- Domestic equity valuations appear stretched relative to historical levels based on Forward Price/Earnings ratios (P/E), with even the most reasonably valued indices trading well above their historical P/E valuations. Index P/E valuations range from 115% to 138% of their respective 15-year P/E averages. The mid cap core and small cap value indices appear the most inexpensive and the small cap growth and small cap core segments look the most overvalued.



- Sector performance within the Russell 1000 Index was largely positive for the 3<sup>rd</sup> quarter. Six of eleven economic sectors outpaced the Russell 1000 Index return, and ten of eleven sectors posted gains during the period. Technology stocks were the best performers, returning 8.6% for the quarter on the back of another strong earnings season. Energy and materials stocks also performed well relative to other sectors, rising 6.9% and 5.8% respectively, benefitting from increased commodity prices. Brent crude prices rose over 20% through the quarter as U.S. inventories fell faster than expected, there were concerns of potential supply disruptions in U.S. oil refining operations in Texas due to flooding caused by Hurricane Harvey, OPEC remained committed to limiting production overseas and the USD weakened. Industrial metal prices also rose on positive economic news out of China. Other cyclical sectors such as industrials and financials also posted strong results. Telecommunication services returned a notable 6.5% due to strong performance of the sector's largest weighted companies, Verizon and AT&T. Over the trailing 1-year period, financials and technology were the best performing sectors in the Russell 1000, returning 35.1% and 28.3% respectively. Ten of eleven large cap economic sectors posted positive returns for the year with seven posting double digit returns. Energy was the only large cap sector to post a negative return over the last year, returning -0.7%.

- Small cap sector results generally outperformed their large capitalization counterparts for the quarter. Four of eleven economic sectors outpaced the Russell 2000 Index return for the quarter, and all eleven sectors posted positive results for the period. Most of the sector trends observable in large cap index sector performance also impacted small cap sectors. However, small cap telecom services underperformed large cap telecom stocks meaningfully. Over the 1-year period, six of eleven sectors have returns greater than 20% and eight have posted double digit returns. Energy was the only Russell 2000 sector to post a negative return over last year, falling -10.1%.

- Using S&P 500 sector valuations as a proxy for the market, Forward P/E ratios for eight of the GICS sectors were higher than their long-term averages at quarter-end. Using these historical P/E measures, the energy, materials and utilities sectors appear the most extended. In contrast the technology, health care and telecommunications sectors were trading at a discount to their long-term average P/E ratios.



**The Market Environment**  
**Top 10 Index Weights & Quarterly Performance for the Russell 1000 & 2000**  
As of September 30, 2017

Top 10 Weighted Stocks				
Russell 1000	Weight	1-Qtr Return	1-Year Return	Sector
Apple Inc	3.35%	7.4%	38.8%	Information Technology
Microsoft Corp	2.33%	8.6%	32.4%	Information Technology
Facebook Inc A	1.66%	13.2%	33.2%	Information Technology
Amazon.com Inc	1.59%	-0.7%	14.8%	Consumer Discretionary
Berkshire Hathaway Inc B	1.47%	8.2%	26.9%	Financials
Johnson & Johnson	1.46%	-1.1%	13.0%	Health Care
Exxon Mobil Corp	1.45%	2.5%	-2.5%	Energy
JPMorgan Chase & Co	1.41%	5.1%	46.9%	Financials
Alphabet Inc C	1.21%	5.5%	23.4%	Information Technology
Alphabet Inc A	1.21%	4.7%	21.1%	Information Technology

Top 10 Weighted Stocks				
Russell 2000	Weight	1-Qtr Return	1-Year Return	Sector
Kite Pharma Inc	0.43%	73.4%	221.9%	Health Care
bluebird bio Inc	0.31%	30.7%	102.6%	Health Care
Exact Sciences Corp	0.27%	33.2%	153.7%	Health Care
Knight-Swift Transportation Hldgs A	0.25%	12.3%	45.8%	Industrials
MKS Instruments Inc	0.25%	40.6%	91.8%	Information Technology
Catalent Inc	0.24%	13.7%	54.5%	Health Care
Aspen Technology Inc	0.23%	13.7%	34.2%	Information Technology
Starwood Waypoint Homes	0.23%	6.7%	30.2%	Real Estate
MGIC Investment Corp	0.23%	11.9%	56.6%	Financials
Curtiss-Wright Corp	0.23%	13.9%	15.4%	Industrials

Top 10 Performing Stocks (by Quarter)				
Russell 1000	Weight	1-Qtr Return	1-Year Return	Sector
Juno Therapeutics Inc	0.01%	50.1%	49.5%	Health Care
NRG Energy Inc	0.03%	48.8%	130.0%	Utilities
Alnylam Pharmaceuticals Inc	0.04%	47.3%	73.3%	Health Care
Alcoa Corp	0.04%	42.8%	N/A	Materials
Take-Two Interactive Software Inc	0.04%	39.3%	126.8%	Information Technology
Orbital ATK Inc	0.03%	35.8%	77.0%	Industrials
International Game Technology PLC	0.01%	35.5%	4.5%	Consumer Discretionary
ACADIA Pharmaceuticals Inc	0.02%	35.1%	18.4%	Health Care
Spirit AeroSystems Holdings Inc	0.04%	34.3%	75.6%	Industrials
Gap Inc	0.03%	34.3%	38.3%	Consumer Discretionary

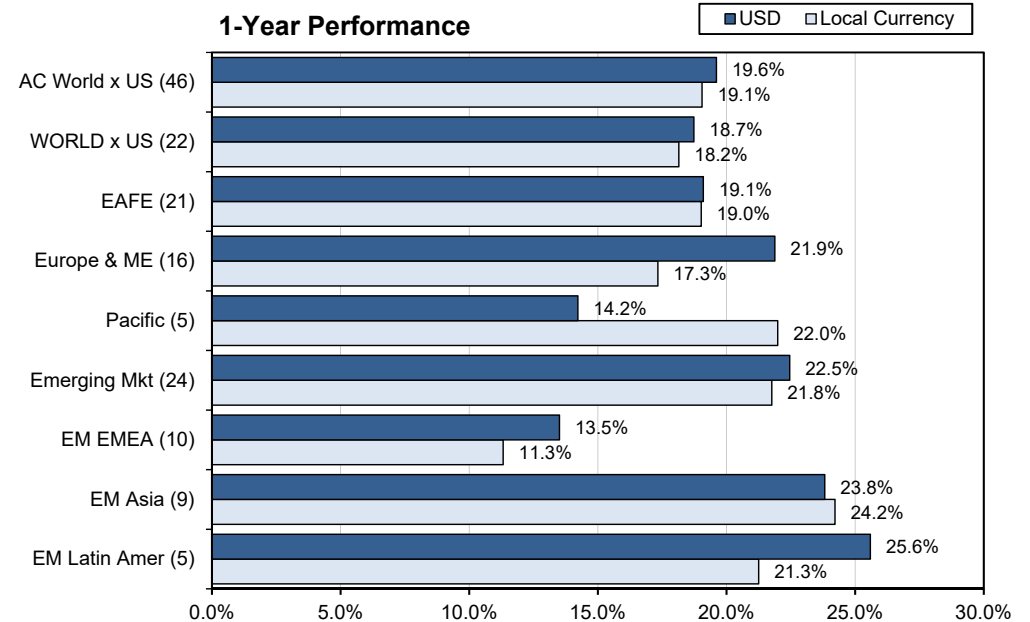
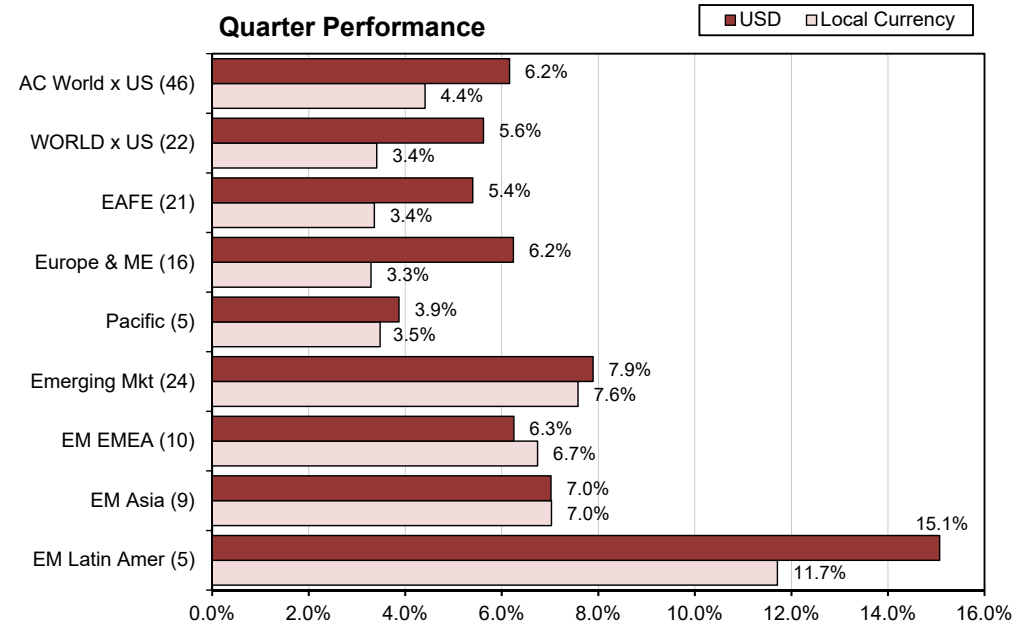
Top 10 Performing Stocks (by Quarter)				
Russell 2000	Weight	1-Qtr Return	1-Year Return	Sector
Veritone Inc	0.01%	288.1%	N/A	Information Technology
MyoKardia Inc	0.04%	227.1%	162.2%	Health Care
Madriral Pharmaceuticals Inc	0.01%	176.6%	254.7%	Health Care
Abeona Therapeutics Inc	0.02%	166.4%	184.2%	Health Care
Zogenix Inc	0.04%	141.7%	206.6%	Health Care
Voyager Therapeutics Inc	0.01%	129.8%	71.4%	Health Care
Dynavax Technologies Corp	0.06%	122.8%	105.0%	Health Care
Hertz Global Holdings Inc	0.06%	94.4%	-44.3%	Industrials
Intrepid Potash Inc	0.02%	92.9%	285.8%	Materials
Spectrum Pharmaceuticals Inc	0.05%	88.9%	201.3%	Health Care

Bottom 10 Performing Stocks (by Quarter)				
Russell 1000	Weight	1-Qtr Return	1-Year Return	Sector
Intercept Pharmaceuticals Inc	0.00%	-52.1%	-64.7%	Health Care
Uniti Group Inc	0.01%	-39.3%	-47.9%	Real Estate
Tahoe Resources Inc	0.01%	-38.8%	-58.1%	Materials
Spirit Airlines Inc	0.01%	-35.3%	-21.4%	Industrials
Rite Aid Corp	0.01%	-33.6%	-74.5%	Consumer Staples
DexCom Inc	0.02%	-33.1%	-44.2%	Health Care
Dick's Sporting Goods Inc	0.01%	-31.8%	-51.6%	Consumer Discretionary
Mednax Inc	0.02%	-28.6%	-34.9%	Health Care
Envision Healthcare Corp	0.02%	-28.3%	-33.0%	Health Care
Foot Locker Inc	0.02%	-28.1%	-47.0%	Consumer Discretionary

Bottom 10 Performing Stocks (by Quarter)				
Russell 2000	Weight	1-Qtr Return	1-Year Return	Sector
Versartis Inc	0.00%	-86.0%	-80.0%	Health Care
Otonomy Inc	0.00%	-82.8%	-82.1%	Health Care
Genocea Biosciences Inc	0.00%	-72.0%	-71.5%	Health Care
Babcock & Wilcox Enterprises Inc	0.01%	-71.7%	-79.8%	Industrials
Ominto Inc	0.00%	-70.5%	38.0%	Information Technology
Axovant Sciences Ltd	0.01%	-70.3%	-50.9%	Health Care
RAIT Financial Trust	0.00%	-64.9%	-75.1%	Real Estate
Radisys Corp	0.00%	-63.6%	-74.4%	Information Technology
CPI Card Group Inc	0.00%	-58.6%	-79.7%	Information Technology
Tintrix Inc	0.00%	-56.8%	N/A	Information Technology



- International equity returns for the 3<sup>rd</sup> quarter were largely driven by ongoing improvement in the global economy and continued weakness in the USD. These trends, in tandem with rising commodity prices, helped emerging markets continue their 2017 outperformance relative to developed market equities. While USD strength remains on the high side of its 10-year range, the USD continued its year-to-date decline against most major currencies through the period. This provided additional tailwinds to international index returns denominated in USD. The recent weakness in USD is also visible in the 1-year performance for broad international indices, with most indices showing stronger returns in terms of USD. However, Asian-Pacific markets stand out as an exception.
- Returns for broad developed market international indices were broadly positive for the 3<sup>rd</sup> quarter in both USD and local currency terms with the MSCI EAFE Index returning 5.4% and 3.4% respectively. Eurozone, U.K. and Japanese markets advanced on the back of positive macroeconomic data and improvement in corporate earnings. As economic data has continued to stabilize, many developed market central banks have started to take a less accommodative stance toward monetary policy and economic stimulus. In Europe, European Central Bank (ECB) President Mario Draghi acknowledged that the ECB has been discussing plans to begin the wind down of their quantitative easing program. Investors are expecting a formal announcement in October. In the U.K., the Bank of England telegraphed that an interest rate hike was likely before the end of the year, and in Canada, the Bank of Canada raised interest rates twice this quarter. Despite increased tensions with North Korea and the early dissolution of the lower house of parliament by Prime Minister Abe leading to snap elections in October, Japanese equities rose over the quarter. Performance for the past year has been strong on an absolute basis with the MSCI EAFE Index returning 19.1% and 19.0% in USD and local currency terms respectively.
- A supportive global economic environment, increasing commodity prices and a weakening USD led to continued growth in emerging market equity prices. The MSCI Emerging Market Index outperformed developed markets during the 3<sup>rd</sup> quarter, returning 7.9% and 7.6% in USD and local currency terms respectively. Returns in China, Brazil and Russia were particularly strong as China advanced on an improving growth outlook, Brazil on improving political stability and progress on social and economic reform initiatives, and Russia largely on improvement in oil prices. One year returns on the MSCI Emerging Market Index are an impressive 22.5% in USD terms and 21.8% in terms of local currency.



**The Market Environment**  
**U.S. Dollar International Index Attribution & Country Detail**  
As of September 30, 2017

MSCI - EAFE	Sector Weight	Quarter Return	1-Year Return
Consumer Discretionary	12.2%	7.4%	20.3%
Consumer Staples	11.2%	0.8%	6.2%
Energy	5.1%	13.4%	22.1%
Financials	21.5%	5.2%	32.5%
Health Care	10.6%	0.7%	7.8%
Industrials	14.4%	6.3%	21.8%
Information Technology	6.3%	8.6%	28.5%
Materials	7.9%	11.0%	27.6%
Real Estate	3.5%	3.2%	5.9%
Telecommunication Services	4.1%	1.7%	4.4%
Utilities	3.4%	4.3%	11.6%
<b>Total</b>	<b>100.0%</b>	<b>5.4%</b>	<b>19.1%</b>

MSCI - ACWxUS	Sector Weight	Quarter Return	1-Year Return
Consumer Discretionary	11.3%	7.0%	19.7%
Consumer Staples	9.6%	1.1%	5.7%
Energy	6.6%	12.7%	17.5%
Financials	23.3%	6.1%	28.8%
Health Care	7.9%	0.8%	7.2%
Industrials	11.8%	5.6%	20.7%
Information Technology	11.2%	10.0%	35.1%
Materials	7.9%	10.7%	25.0%
Real Estate	3.2%	6.1%	10.3%
Telecommunication Services	4.2%	2.4%	5.4%
Utilities	3.1%	4.6%	10.5%
<b>Total</b>	<b>100.0%</b>	<b>6.2%</b>	<b>19.6%</b>

MSCI - Emerging Mkt	Sector Weight	Quarter Return	1-Year Return
Consumer Discretionary	10.3%	5.0%	16.3%
Consumer Staples	6.5%	2.5%	3.8%
Energy	6.8%	12.9%	21.2%
Financials	23.4%	7.2%	21.7%
Health Care	2.3%	3.3%	2.9%
Industrials	5.4%	1.7%	12.6%
Information Technology	27.6%	11.0%	40.5%
Materials	7.2%	10.1%	28.0%
Real Estate	2.9%	17.9%	29.9%
Telecommunication Services	5.1%	3.3%	6.3%
Utilities	2.6%	6.4%	7.2%
<b>Total</b>	<b>100.0%</b>	<b>7.9%</b>	<b>22.5%</b>

Country	MSCI-EAFE Weight	MSCI-ACWxUS Weight	Quarter Return	1-Year Return
Japan	23.0%	15.9%	4.0%	14.1%
United Kingdom	17.8%	12.3%	5.2%	14.6%
France	10.8%	7.5%	8.4%	30.6%
Germany	9.8%	6.8%	7.7%	26.1%
Switzerland	8.2%	5.7%	2.0%	15.7%
Australia	6.8%	4.7%	3.1%	13.1%
Netherlands	3.7%	2.6%	9.3%	28.4%
Spain	3.5%	2.4%	4.3%	32.0%
Hong Kong	3.5%	2.4%	5.1%	16.3%
Sweden	2.9%	2.0%	5.5%	24.3%
Italy	2.5%	1.7%	13.7%	45.6%
Denmark	1.9%	1.3%	7.7%	20.3%
Singapore	1.3%	0.9%	3.1%	18.7%
Belgium	1.2%	0.8%	9.2%	6.2%
Finland	1.0%	0.7%	3.3%	20.2%
Norway	0.7%	0.5%	19.2%	28.9%
Israel	0.5%	0.3%	-12.7%	-13.0%
Ireland	0.5%	0.3%	6.1%	14.4%
Austria	0.3%	0.2%	12.7%	59.3%
Portugal	0.2%	0.1%	13.2%	22.6%
New Zealand	0.2%	0.1%	-0.1%	-2.0%
<b>Total EAFE Countries</b>	<b>100.0%</b>	<b>69.2%</b>	<b>5.4%</b>	<b>19.1%</b>
Canada		6.7%	7.9%	15.0%
<b>Total Developed Countries</b>		<b>75.9%</b>	<b>5.6%</b>	<b>18.7%</b>
China		7.1%	14.7%	33.0%
Korea		3.6%	2.7%	24.8%
Taiwan		2.8%	0.8%	19.9%
India		2.0%	3.0%	14.2%
Brazil		1.8%	23.0%	29.2%
South Africa		1.5%	3.8%	7.6%
Mexico		0.8%	1.5%	16.2%
Russia		0.8%	17.6%	19.6%
Indonesia		0.6%	-1.1%	5.9%
Malaysia		0.6%	1.8%	6.2%
Thailand		0.5%	10.5%	20.7%
Poland		0.3%	9.3%	51.2%
Chile		0.3%	16.9%	35.6%
Philippines		0.3%	3.0%	2.1%
Turkey		0.3%	0.3%	14.5%
United Arab Emirates		0.2%	4.1%	6.4%
Qatar		0.1%	-6.9%	-14.9%
Colombia		0.1%	6.5%	12.7%
Peru		0.1%	14.1%	32.3%
Greece		0.1%	-12.2%	30.9%
Hungary		0.1%	9.6%	42.8%
Czech Republic		0.0%	10.0%	21.5%
Egypt		0.0%	2.2%	-17.7%
Pakistan		0.0%	-16.5%	-7.1%
<b>Total Emerging Countries</b>		<b>24.1%</b>	<b>7.9%</b>	<b>22.5%</b>
<b>Total ACWxUS Countries</b>		<b>100.0%</b>	<b>6.2%</b>	<b>19.6%</b>

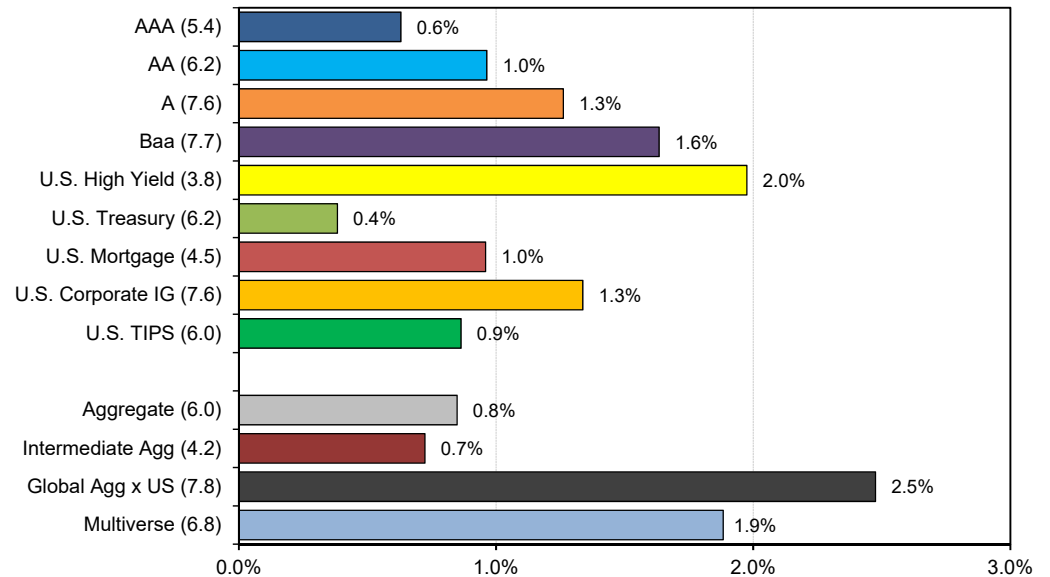
Source: MSCI Global Index Monitor (Returns are Net in USD)



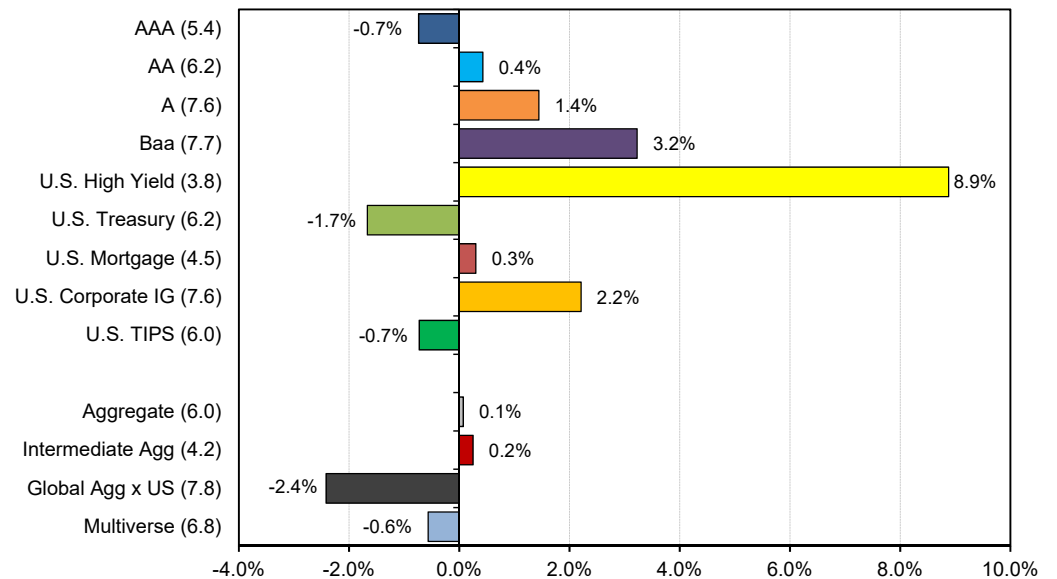


- Broad fixed income benchmarks gained ground during the 3<sup>rd</sup> quarter. The Bloomberg Barclays U.S. Aggregate Index ended the quarter with a 0.8% gain despite modestly rising interest rates. Interest rates fell during the first half of the quarter when investors looked to safe-haven assets as international relations between the U.S. and North Korea began to deteriorate and extreme weather created anxiety in markets. However, rates reversed course in the beginning of September, ending slightly higher than where they began the period. The Federal Open Market Committee (FOMC) voted not to increase short-term interest rates during the third quarter, but market expectations are for one additional increase prior to year end. While inflation remains subdued, the Fed feels the economy is tracking to be healthy enough to warrant continued tightening. This caused a flattening of the yield curve as short-term market yields rose more aggressively than rates on long-term maturities. The Fed also announced that its plan to gradually reduce its balance sheet by slowing the rate of reinvestment of the Treasury and mortgage backed securities (MBS) it holds on its books as the securities mature would begin in October. The amount reinvested each month will fall systematically, reducing the size of the Fed's balance sheet over time. This can be viewed as further tightening of monetary policy. This put additional upward pressure on interest rates as the quarter came to a close. The Bloomberg Barclays U.S. Aggregate Index stayed slightly positive over the 1-year period returning 0.1%, with the various investment grade sectors posting mixed results.
- Lower quality bonds outperformed higher quality issues for both the quarter and 1-year period as contracting credit spreads from improvements in economic fundamentals acted as a tailwind to these issues. During the 3<sup>rd</sup> quarter, credit spreads for high yield debt decreased by 17 bps versus only 8 bps for investment grade (IG) corporate issues. BAA issues more than doubled the return of AAA securities for the second straight quarter, returning 1.6% versus a 0.6% return for AAA debt. High yield debt continues to be the largest beneficiary of the strengthening economy, returning 2.0% for the quarter and 8.9% for the 1-year period.
- A review of sector performance shows that IG credit has continued its 2017 trend of outperformance versus Treasuries and MBS securities. As previously mentioned, corporate issues benefited from tightening credit spreads throughout the period. Treasuries were the worst performer due to their higher duration and expectations for additional tightening of monetary policy. MBS also benefitted from some spread compression through the quarter, but enthusiasm for these securities was dimmed by the Fed's planned balance sheet reduction strategy. Treasury securities posted the worst returns for the quarter, appreciating 0.4%. U.S. IG corporate bonds were the best performing IG sector over the 1-year period, returning 2.2%.

**Quarter Performance**

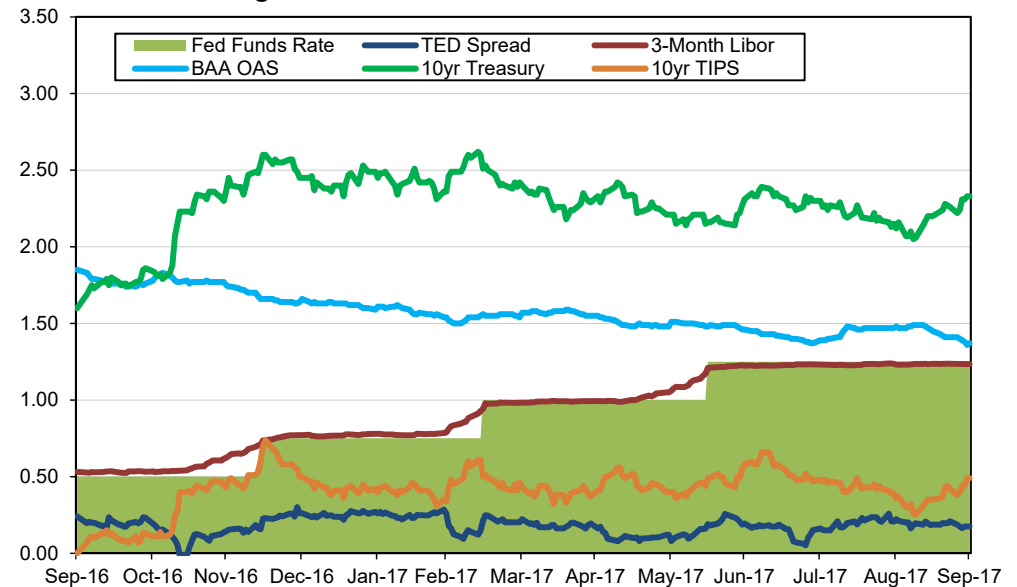


**1-Year Performance**

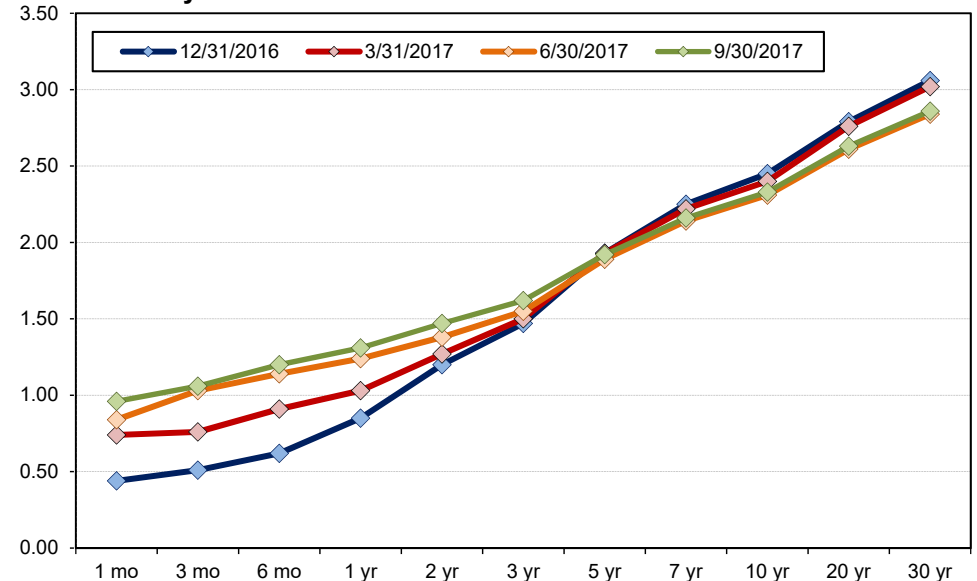


- Global fixed income indices also posted strong results for the quarter. Global benchmarks are impacted by the same local yield and duration factors as domestic benchmarks. While these indices have relatively high durations, the returns of these indices are also significantly influenced by fluctuations in their currency denomination relative to the USD. This currency effect can either be an offsetting benefit to negative yield and duration factors in a rising rate environment as it has been year-to-date, or it can further exacerbate negative performance as it did in 2016. Led by a weakening USD, global bond indices outperformed domestic issues for the for the quarter. However, hawkish comments from several global central banks muted returns during the final month of the period. Global bonds have had a currency effect tailwind so far in 2017, but global bond returns still trail domestic indices over the 1-year period, primarily due to their relative underperformance in the 4<sup>th</sup> quarter of 2016. The Bloomberg Barclays Aggregate ex U.S. posted a -2.4% return for the period.
- Much of the index performance detailed in the bar graphs on the previous page is visible on a time series basis by reviewing the line graphs to the right. The '1-Year Trailing Market Rates' chart illustrates that the 10-year Treasury yield (green line) rose dramatically in the 4<sup>th</sup> quarter of 2016, held largely steady during the 1<sup>st</sup> quarter of 2017 and then gradually fell through most of 2<sup>nd</sup> quarter before spiking at the end of June. As described on the last page, rates then fell through the first half of quarter before rising to the levels where they began the quarter. The yield on the 10-year Treasury has fallen to 2.33% from 2.45% at the start of the year. 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 issues. This line illustrates a steady decline in credit spreads throughout 2016 and 2017. This decline is equivalent to an interest rate decrease on corporate bonds, which produces a tailwind for corporate bond index returns. These credit spreads have tightened by about 48 bps over the last 12-months. The green shading at the bottom of the graph illustrates the gradual increase in the Federal Funds Rate due to a less accommodative Fed monetary policy.
- The lower graph provides a snapshot of the U.S. Treasury yield curve at each of the last four calendar quarters. As mentioned, the yield curve continues to flatten as yields on shorter-term maturities have risen, while interest rates on the long end of the curve (5-years and beyond) have generally declined. Interest rate movement during the quarter was relatively muted, especially at the long end of the curve. However, the significant upward shift in short-term interest rates and decline of long-term interest rates since the end of 2016 is clearly visible.

1-Year Trailing Market Rates



Treasury Yield Curve



<b>1 Quarter</b>	<b>Market Value 07/01/2017</b>	<b>Net Flows</b>	<b>Return On Investment</b>	<b>Market Value 09/30/2017</b>
<b>Police Total Fund</b>	<b>29,019,585</b>	<b>-93,499</b>	<b>805,165</b>	<b>29,731,250</b>
<b>Total Domestic Equity</b>	<b>13,170,973</b>	<b>-353,480</b>	<b>558,928</b>	<b>13,376,421</b>
Seizert Capital	4,940,920	-145,794	202,421	4,997,548
Holland Capital Management	4,871,270	-4,957,794	86,523	-
Vanguard Growth Index (VIGAX)	-	4,944,382	143,507	5,087,889
T. Rowe Price (TRMCX)	1,344,057	-194,274	35,373	1,185,156
Prudential (TASVX)	2,014,725	-	91,104	2,105,829
<b>Total International Equity</b>	<b>3,922,630</b>	<b>-</b>	<b>141,747</b>	<b>4,064,377</b>
Harbor International (HAINX)	3,922,630	-	141,747	4,064,377
<b>Total Domestic Fixed Income</b>	<b>9,693,541</b>	<b>-7,323</b>	<b>65,903</b>	<b>9,752,121</b>
C.S. McKee	4,765,303	-3,573	32,674	4,794,404
Great Lakes Advisors	4,928,238	-3,750	33,229	4,957,717
<b>Total Real Estate</b>	<b>1,852,018</b>	<b>-</b>	<b>37,836</b>	<b>1,889,853</b>
Principal Real Estate	1,852,018	-	37,836	1,889,853
Cash	380,423	267,303	751	648,477



<b>Fiscal Year To Date</b>				
	<b>Market Value 01/01/2017</b>	<b>Net Flows</b>	<b>Return On Investment</b>	<b>Market Value 09/30/2017</b>
<b>Police Total Fund</b>	<b>28,118,329</b>	<b>-913,225</b>	<b>2,526,146</b>	<b>29,731,250</b>
<b>Total Domestic Equity</b>	<b>13,025,268</b>	<b>-1,151,884</b>	<b>1,503,037</b>	<b>13,376,421</b>
Seizert Capital	4,871,328	-384,256	510,476	4,997,548
Holland Capital Management	4,411,465	-5,120,474	709,009	-
Vanguard Growth Index (VIGAX)	-	4,944,382	143,507	5,087,889
T. Rowe Price (TRMCX)	1,458,513	-354,274	80,917	1,185,156
Prudential (TASVX)	2,283,962	-237,262	59,129	2,105,829
<b>Total International Equity</b>	<b>3,468,362</b>	<b>-100,000</b>	<b>696,015</b>	<b>4,064,377</b>
Harbor International (HAINX)	3,468,362	-100,000	696,015	4,064,377
<b>Total Domestic Fixed Income</b>	<b>9,555,324</b>	<b>-21,893</b>	<b>218,690</b>	<b>9,752,121</b>
C.S. McKee	4,701,224	-10,643	103,823	4,794,404
Great Lakes Advisors	4,854,100	-11,250	114,867	4,957,717
<b>Total Real Estate</b>	<b>1,782,643</b>	<b>-</b>	<b>107,210</b>	<b>1,889,853</b>
Principal Real Estate	1,782,643	-	107,210	1,889,853
Cash	286,731	360,552	1,194	648,477

<b>1 Year</b>	<b>Market Value 10/01/2016</b>	<b>Net Flows</b>	<b>Return On Investment</b>	<b>Market Value 09/30/2017</b>
<b>Police Total Fund</b>	<b>28,373,541</b>	<b>-1,650,058</b>	<b>3,007,767</b>	<b>29,731,250</b>
<b>Total Domestic Equity</b>	<b>12,525,769</b>	<b>-1,441,121</b>	<b>2,291,774</b>	<b>13,376,421</b>
Seizert Capital	4,540,056	-390,498	847,990	4,997,548
Holland Capital Management	4,431,371	-5,128,469	697,098	-
Vanguard Growth Index (VIGAX)	-	4,944,382	143,507	5,087,889
T. Rowe Price (TRMCX)	1,615,400	-629,274	199,030	1,185,156
Prudential (TASVX)	1,938,942	-237,262	404,149	2,105,829
<b>Total International Equity</b>	<b>3,938,876</b>	<b>-400,000</b>	<b>525,502</b>	<b>4,064,377</b>
Harbor International (HAINX)	3,938,876	-400,000	525,502	4,064,377
<b>Total Domestic Fixed Income</b>	<b>9,742,326</b>	<b>-29,230</b>	<b>39,025</b>	<b>9,752,121</b>
C.S. McKee	4,783,212	-14,230	25,422	4,794,404
Great Lakes Advisors	4,959,114	-15,000	13,603	4,957,717
<b>Total Real Estate</b>	<b>1,739,623</b>	<b>-</b>	<b>150,230</b>	<b>1,889,853</b>
Principal Real Estate	1,739,623	-	150,230	1,889,853
Cash	426,948	220,292	1,237	648,477



Comparative Performance														
	QTR		FYTD		1 YR		3 YR		5 YR		7 YR		10 YR	
<b>Police Total Fund</b>	<b>2.77</b>	<b>(81)</b>	<b>9.13</b>	<b>(82)</b>	<b>11.02</b>	<b>(71)</b>	<b>6.66</b>	<b>(42)</b>	<b>8.37</b>	<b>(45)</b>	<b>8.35</b>	<b>(48)</b>	<b>6.83</b>	<b>(2)</b>
Police - Total Fund Policy	3.04	(71)	9.01	(83)	11.16	(70)	7.05	(25)	8.41	(43)	8.23	(55)	6.15	(20)
All Master Trust - Total Fund Median	3.37		10.99		12.02		6.46		8.25		8.30		5.50	
<b>Police Total Fund</b>	<b>2.77</b>	<b>(94)</b>	<b>9.13</b>	<b>(94)</b>	<b>11.02</b>	<b>(78)</b>	<b>6.66</b>	<b>(40)</b>	<b>8.37</b>	<b>(48)</b>	<b>8.35</b>	<b>(53)</b>	<b>6.83</b>	<b>(1)</b>
Police - Total Fund Policy	3.04	(79)	9.01	(95)	11.16	(77)	7.05	(20)	8.41	(45)	8.23	(59)	6.15	(25)
Master Trust >=45% and <65% Equity Median	3.40		11.12		11.98		6.46		8.31		8.37		5.66	
<b>Total Domestic Equity</b>	<b>4.30</b>	<b>(51)</b>	<b>12.09</b>	<b>(49)</b>	<b>19.18</b>	<b>(37)</b>	<b>10.56</b>	<b>(33)</b>	<b>14.64</b>	<b>(23)</b>	<b>14.46</b>	<b>(21)</b>	<b>8.84</b>	<b>(18)</b>
Russell 3000 Index	4.57	(44)	13.91	(38)	18.71	(42)	10.74	(30)	14.23	(29)	14.28	(25)	7.57	(39)
IM U.S. Equity (SA+CF+MF) Median	4.33		11.79		17.79		9.33		13.07		12.93		7.08	
Seizert	4.16	(48)	10.92	(45)	19.18	(37)	9.61	(39)	15.38	(16)	14.26	(31)	N/A	
Russell 1000 Value Index	3.11	(78)	7.92	(85)	15.12	(77)	8.53	(63)	13.20	(64)	13.24	(61)	5.92	(84)
IM U.S. Large Cap Value Equity (SA+CF) Median	4.07		10.48		17.95		9.05		13.81		13.54		7.06	
Vanguard Growth Index (VIGAX)	N/A		N/A		N/A		N/A		N/A		N/A		N/A	
CRSP U.S. Large Cap Growth TR Index	4.86	(68)	20.37	(63)	19.86	(54)	11.56	(40)	14.32	(42)	14.41	(36)	8.37	(36)
Russell 1000 Growth Index	5.90	(35)	20.72	(58)	21.94	(26)	12.69	(19)	15.26	(21)	15.41	(13)	9.08	(17)
IM U.S. Large Cap Growth Equity (MF) Median	5.48		21.71		20.04		11.11		13.93		13.84		7.92	
T. Rowe Price (TRMCX)	2.97	(47)	6.16	(64)	13.78	(62)	9.72	(16)	13.91	(29)	13.27	(27)	9.02	(5)
Russell Midcap Value Index	2.14	(66)	7.43	(48)	13.37	(69)	9.19	(27)	14.33	(17)	13.76	(11)	7.85	(30)
IM U.S. Mid Cap Value Equity (MF) Median	2.90		7.21		14.79		8.15		13.06		12.53		7.11	
Prudential (TASVX)	4.52	(62)	2.73	(75)	21.01	(25)	11.11	(28)	N/A		N/A		N/A	
Russell 2000 Value Index	5.11	(48)	5.68	(40)	20.55	(32)	12.12	(19)	13.27	(43)	12.80	(38)	7.14	(49)
IM U.S. Small Cap Value Equity (MF) Median	4.98		4.55		18.61		9.98		12.54		12.49		7.08	
<b>Total International Equity</b>	<b>3.61</b>	<b>(88)</b>	<b>20.28</b>	<b>(60)</b>	<b>15.11</b>	<b>(87)</b>	<b>3.63</b>	<b>(72)</b>	<b>6.57</b>	<b>(75)</b>	<b>6.10</b>	<b>(41)</b>	<b>1.43</b>	<b>(56)</b>
MSCI AC World ex USA Index (Net)	6.16	(36)	21.13	(46)	19.61	(33)	4.70	(50)	6.97	(61)	5.25	(71)	1.28	(58)
IM International Large Cap Equity (MF) Median	5.60		20.74		18.47		4.69		7.32		5.84		1.70	
Harbor (HAINX)	3.61	(88)	20.28	(50)	15.11	(93)	3.63	(73)	6.57	(80)	N/A		N/A	
MSCI AC World ex USA Index (Net)	6.16	(32)	21.13	(44)	19.61	(33)	4.70	(48)	6.97	(62)	5.25	(58)	1.28	(41)
IM International Large Cap Core Equity (MF) Median	5.61		20.15		18.94		4.55		7.30		5.39		0.94	

Returns for periods greater than one year are annualized.  
Returns are expressed as percentages.



Comparative Performance

Total Fund

As of September 30, 2017

	QTR		FYTD		1 YR		3 YR		5 YR		7 YR		10 YR	
<b>Total Domestic Fixed Income</b>	<b>0.68</b>	<b>(74)</b>	<b>2.29</b>	<b>(78)</b>	<b>0.40</b>	<b>(83)</b>	<b>2.44</b>	<b>(69)</b>	<b>1.91</b>	<b>(74)</b>	<b>2.67</b>	<b>(73)</b>	<b>4.13</b>	<b>(67)</b>
Police - Total Domestic Fixed Policy	0.72	(71)	2.34	(77)	0.25	(86)	2.25	(74)	1.75	(78)	2.39	(78)	3.86	(74)
IM U.S. Fixed Income (SA+CF) Median	0.97		3.58		1.37		3.14		2.78		3.68		4.77	
<b>C.S. McKee</b>	<b>0.69</b>	<b>(60)</b>	<b>2.21</b>	<b>(83)</b>	<b>0.53</b>	<b>(66)</b>	<b>2.55</b>	<b>(40)</b>	<b>1.94</b>	<b>(56)</b>	<b>N/A</b>		<b>N/A</b>	
Bloomberg Barclays US Interm Agg Index	0.72	(49)	2.34	(77)	0.25	(85)	2.25	(72)	1.75	(72)	2.46	(68)	3.83	(82)
IM U.S. Intermediate Duration (SA+CF) Median	0.72		2.57		0.67		2.43		1.98		2.72		4.17	
<b>Great Lakes</b>	<b>0.67</b>	<b>(63)</b>	<b>2.37</b>	<b>(74)</b>	<b>0.28</b>	<b>(82)</b>	<b>2.33</b>	<b>(63)</b>	<b>1.88</b>	<b>(62)</b>	<b>N/A</b>		<b>N/A</b>	
Bloomberg Barclays US Interm Agg Index	0.72	(49)	2.34	(77)	0.25	(85)	2.25	(72)	1.75	(72)	2.46	(68)	3.83	(82)
IM U.S. Intermediate Duration (SA+CF) Median	0.72		2.57		0.67		2.43		1.98		2.72		4.17	
<b>Real Estate</b>														
Principal Real Estate	2.04	(N/A)	6.01	(N/A)	8.64	(N/A)	N/A		N/A		N/A		N/A	
NCREIF Fund Index-ODCE (EW) (Net)	0.00	(N/A)	3.15	(N/A)	5.16	(N/A)	9.50	(N/A)	10.28	(N/A)	11.28	(N/A)	3.78	(N/A)
IM U.S. Open End Private Real Estate (SA+CF) Median	N/A		N/A		N/A		N/A		N/A		N/A		N/A	
<b>Cash</b>	<b>0.11</b>		<b>0.20</b>		<b>0.21</b>		<b>0.10</b>		<b>0.08</b>		<b>0.09</b>		<b>0.38</b>	
90 Day U.S. Treasury Bill	0.27		0.57		0.64		0.28		0.20		0.16		0.45	

Returns for periods greater than one year are annualized.  
Returns are expressed as percentages.



**Comparative Performance**  
**Total Fund**  
**1 Year Ending**

Comparative Performance																		
	Sep-2017		Sep-2016		Sep-2015		Sep-2014		Sep-2013		Sep-2012		Sep-2011		Sep-2010		Sep-2009	
<b>Police Total Fund</b>	<b>11.02</b>	<b>(70)</b>	<b>10.10</b>	<b>(35)</b>	<b>-0.74</b>	<b>(48)</b>	<b>10.37</b>	<b>(39)</b>	<b>11.60</b>	<b>(54)</b>	<b>14.33</b>	<b>(75)</b>	<b>2.63</b>	<b>(19)</b>	<b>7.79</b>	<b>(88)</b>	<b>8.40</b>	<b>(6)</b>
Police - Total Fund Policy	11.16	(69)	10.36	(29)	0.01	(33)	9.69	(50)	11.26	(58)	16.12	(61)	0.06	(59)	8.86	(72)	2.43	(47)
All Master Trust - Total Fund Median	12.00		9.39		-0.88		9.67		11.84		16.97		0.53		9.89		2.12	
<b>Police Total Fund</b>	<b>11.02</b>	<b>(78)</b>	<b>10.10</b>	<b>(35)</b>	<b>-0.74</b>	<b>(45)</b>	<b>10.37</b>	<b>(37)</b>	<b>11.60</b>	<b>(60)</b>	<b>14.33</b>	<b>(95)</b>	<b>2.63</b>	<b>(10)</b>	<b>7.79</b>	<b>(95)</b>	<b>8.40</b>	<b>(3)</b>
Police - Total Fund Policy	11.16	(76)	10.36	(27)	0.01	(27)	9.69	(51)	11.26	(67)	16.12	(81)	0.06	(49)	8.86	(80)	2.43	(42)
Master Trust >=45% and <65% Equity Median	11.97		9.58		-1.06		9.72		12.08		17.83		-0.01		10.14		1.70	
<b>Total Domestic Equity</b>	<b>19.18</b>	<b>(37)</b>	<b>16.11</b>	<b>(20)</b>	<b>-2.33</b>	<b>(63)</b>	<b>18.10</b>	<b>(23)</b>	<b>24.06</b>	<b>(47)</b>	<b>27.10</b>	<b>(55)</b>	<b>2.29</b>	<b>(22)</b>	<b>10.36</b>	<b>(58)</b>	<b>1.93</b>	<b>(16)</b>
Russell 3000 Index	18.71	(42)	14.96	(28)	-0.49	(48)	17.76	(26)	21.60	(59)	30.20	(30)	0.55	(35)	10.96	(53)	-6.42	(59)
IM U.S. Equity (SA+CF+MF) Median	17.79		12.18		-0.74		14.04		23.27		27.79		-1.32		11.28		-5.18	
Seizert	19.18	(37)	19.23	(10)	-7.33	(86)	21.35	(20)	27.96	(20)	27.46	(59)	-2.45	(66)	13.43	(20)	N/A	
Russell 1000 Value Index	15.12	(77)	16.19	(26)	-4.42	(65)	18.89	(42)	22.30	(61)	30.92	(26)	-1.89	(62)	8.90	(55)	-10.62	(84)
IM U.S. Large Cap Value Equity (SA+CF) Median	17.95		13.19		-3.29		18.35		23.76		28.29		-0.99		9.29		-5.91	
Holland	N/A		11.21	(56)	4.13	(41)	16.73	(65)	20.59	(48)	25.98	(69)	N/A		N/A		N/A	
Russell 1000 Growth Index	21.94	(38)	13.76	(22)	3.17	(55)	19.15	(39)	19.27	(64)	29.19	(38)	3.78	(30)	12.65	(35)	-1.85	(37)
IM U.S. Large Cap Growth Equity (SA+CF) Median	20.82		11.62		3.60		18.11		20.26		27.64		1.37		11.27		-3.06	
Vanguard Growth Index (VIGAX)	N/A		N/A		N/A		N/A		N/A		N/A		N/A		N/A		N/A	
CRSP U.S. Large Cap Growth TR Index	19.86	(54)	13.56	(19)	2.00	(60)	19.38	(20)	17.81	(68)	30.07	(26)	1.02	(46)	11.32	(38)	-4.02	(65)
Russell 1000 Growth Index	21.94	(26)	13.76	(17)	3.17	(41)	19.15	(22)	19.27	(53)	29.19	(33)	3.78	(18)	12.65	(24)	-1.85	(41)
IM U.S. Large Cap Growth Equity (MF) Median	20.04		10.82		2.59		16.89		19.44		27.09		0.64		10.12		-2.65	
T. Rowe Price (TRMCX)	13.78	(62)	19.73	(5)	-3.03	(54)	16.76	(13)	24.36	(93)	28.40	(40)	-2.85	(35)	11.81	(81)	7.30	(4)
Russell Midcap Value Index	13.37	(69)	17.26	(8)	-2.07	(42)	17.46	(11)	27.77	(53)	29.28	(32)	-2.36	(26)	16.93	(19)	-7.12	(87)
IM U.S. Mid Cap Value Equity (MF) Median	14.79		13.39		-2.70		13.93		28.09		27.63		-3.93		14.86		-4.00	
Prudential (TASVX)	21.01	(25)	17.76	(35)	-3.74	(42)	N/A		N/A		N/A		N/A		N/A		N/A	
Russell 2000 Value Index	20.55	(32)	18.81	(18)	-1.60	(29)	4.13	(62)	27.04	(63)	32.63	(31)	-5.99	(71)	11.84	(59)	-12.61	(77)
IM U.S. Small Cap Value Equity (MF) Median	18.61		16.55		-4.21		5.29		28.50		29.85		-3.70		13.55		-7.76	

Returns for periods greater than one year are annualized.  
Returns are expressed as percentages.





**Comparative Performance**  
**Total Fund**  
**1 Year Ending**

	Sep-2017	Sep-2016	Sep-2015	Sep-2014	Sep-2013	Sep-2012	Sep-2011	Sep-2010	Sep-2009
<b>Total International Equity</b>	<b>15.11 (87)</b>	<b>7.76 (31)</b>	<b>-10.30 (79)</b>	<b>1.95 (75)</b>	<b>21.15 (38)</b>	<b>21.33 (5)</b>	<b>-9.25 (26)</b>	<b>6.05 (40)</b>	<b>4.23 (22)</b>
MSCI AC World ex USA Index (Net)	19.61 (33)	9.26 (18)	-12.16 (88)	4.77 (40)	16.48 (76)	14.49 (63)	-10.81 (44)	7.56 (27)	5.89 (14)
IM International Large Cap Equity (MF) Median	18.47	5.87	-7.87	4.34	19.83	16.15	-11.17	4.00	1.23
Harbor (HAINX)	15.11 (93)	7.76 (20)	-10.30 (77)	1.95 (73)	21.15 (53)	21.33 (3)	N/A	N/A	N/A
MSCI AC World ex USA Index (Net)	19.61 (33)	9.26 (11)	-12.16 (84)	4.77 (31)	16.48 (77)	14.49 (55)	-10.81 (33)	7.56 (8)	5.89 (11)
IM International Large Cap Core Equity (MF) Median	18.94	5.85	-7.98	3.56	21.44	14.80	-11.29	3.38	1.61
<b>Total Domestic Fixed Income</b>	<b>0.40 (83)</b>	<b>4.00 (70)</b>	<b>2.94 (26)</b>	<b>2.83 (74)</b>	<b>-0.55 (62)</b>	<b>4.86 (78)</b>	<b>4.33 (45)</b>	<b>6.42 (78)</b>	<b>9.50 (68)</b>
Police - Total Domestic Fixed Policy	0.25 (86)	3.57 (76)	2.95 (26)	2.74 (75)	-0.71 (65)	4.31 (81)	3.76 (55)	6.34 (79)	8.31 (73)
IM U.S. Fixed Income (SA+CF) Median	1.37	5.69	2.03	4.61	0.02	7.75	3.96	9.42	11.75
C.S. McKee	0.53 (66)	4.01 (43)	3.13 (21)	2.50 (71)	-0.41 (62)	4.41 (81)	N/A	N/A	N/A
Bloomberg Barclays US Interm Agg Index	0.25 (85)	3.57 (72)	2.95 (31)	2.74 (58)	-0.71 (77)	4.31 (84)	4.22 (23)	7.52 (77)	9.69 (81)
IM U.S. Intermediate Duration (SA+CF) Median	0.67	3.91	2.70	2.89	-0.27	5.56	3.61	8.26	11.51
Great Lakes	0.28 (82)	4.00 (45)	2.77 (44)	3.14 (38)	-0.68 (76)	5.34 (56)	N/A	N/A	N/A
Bloomberg Barclays US Interm Agg Index	0.25 (85)	3.57 (72)	2.95 (31)	2.74 (58)	-0.71 (77)	4.31 (84)	4.22 (23)	7.52 (77)	9.69 (81)
IM U.S. Intermediate Duration (SA+CF) Median	0.67	3.91	2.70	2.89	-0.27	5.56	3.61	8.26	11.51
<b>Real Estate</b>									
Principal Real Estate	8.64 (N/A)	9.14 (96)	N/A	N/A	N/A	N/A	N/A	N/A	N/A
NCREIF Fund Index-ODCE (EW) (Net)	5.16 (N/A)	9.69 (87)	13.82 (70)	11.44 (88)	11.46 (82)	10.69 (83)	17.02 (48)	5.24 (68)	-36.63 (55)
IM U.S. Open End Private Real Estate (SA+CF) Median	N/A	11.14	15.54	12.90	13.22	12.90	16.62	6.39	-34.80
Cash	0.21	0.04	0.04	0.07	0.05	0.10	0.10	0.10	0.44
90 Day U.S. Treasury Bill	0.64	0.18	0.03	0.04	0.08	0.05	0.13	0.12	0.38

Returns for periods greater than one year are annualized.  
Returns are expressed as percentages.



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<b>Active Return</b>	- Arithmetic difference between the manager's performance and the designated benchmark return over a specified time period.
<b>Alpha</b>	- 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.
<b>Beta</b>	- A measure of the sensitivity of a portfolio to the movements in the market. It is a measure of the portfolio's systematic risk.
<b>Consistency</b>	- 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.
<b>Distributed to Paid In (DPI)</b>	- 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.
<b>Down Market Capture</b>	- The ratio of average portfolio performance over the designated benchmark during periods of negative returns. A lower value indicates better product performance
<b>Downside Risk</b>	- 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.
<b>Excess Return</b>	- Arithmetic difference between the manager's performance and the risk-free return over a specified time period.
<b>Excess Risk</b>	- A measure of the standard deviation of a portfolio's performance relative to the risk free return.
<b>Information Ratio</b>	- 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.
<b>Public Market Equivalent (PME)</b>	- 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.
<b>R-Squared</b>	- 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.
<b>Return</b>	- Compounded rate of return for the period.
<b>Sharpe Ratio</b>	- 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.
<b>Standard Deviation</b>	- 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.
<b>Total Value to Paid In (TVPI)</b>	- 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
<b>Tracking Error</b>	- This is a measure of the standard deviation of a portfolio's returns in relation to the performance of its designated market benchmark.
<b>Treynor Ratio</b>	- 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.
<b>Up Market Capture</b>	- 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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