

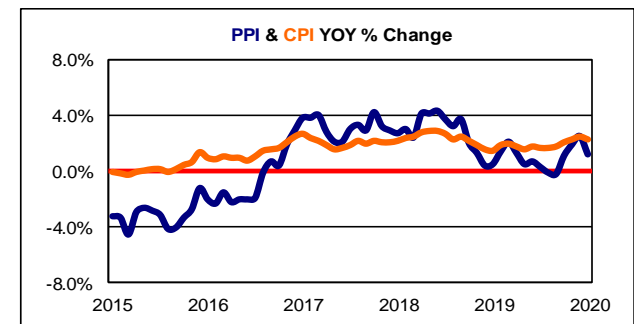
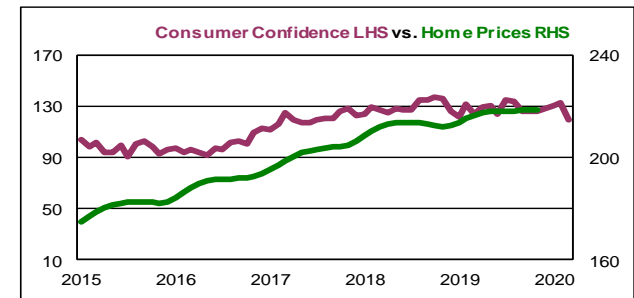
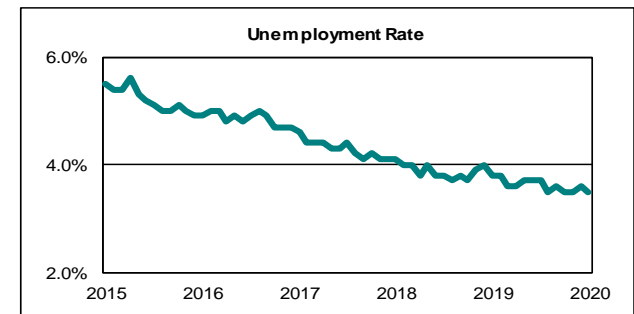
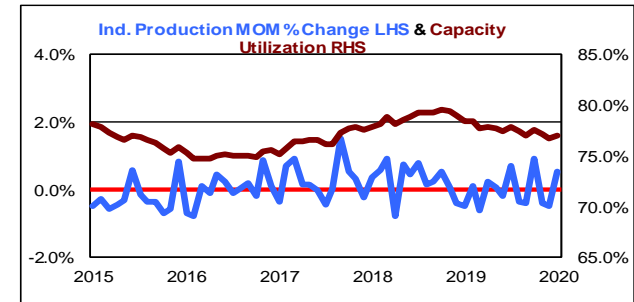
### Economic Overview

The current impact of the COVID-19 outbreak has rendered economic data from January and February virtually meaningless. As the world economy presses the Pause button in order to wage war on the coronavirus, we will likely see economic data in the coming weeks that resembles something on the order of a deep depression, not merely a recession. A glance at the chart below for Initial Jobless Claims, scary as it is, doesn't do justice to the staggering 3.3 million print that we saw last Thursday.

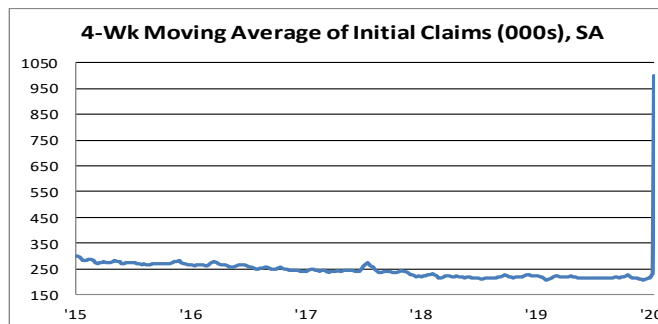
As bad as the numbers will be, markets are clearly reflecting the coming raft of bad news and pricing in a massive contraction in the US economy. Estimates for Q2 GDP range from -10% to a stunning -25% drop off. Before the gloom sets in too deeply, it's important to mention that most forecasts also call for a fairly rapid recovery. While economists debate the shape – V, U, L – it is widely accepted that this severe contraction will likely be limited to the March – June time period and by summer we should be seeing some sort of return to “normalcy”.

Building off our experiences during the credit bubble implosion of 2008-09, both the Federal Reserve and Congress hit this slowdown head-on with massive, almost unprecedented monetary and fiscal stimuli. As widespread as the economic dislocation is likely to be, there are resources for businesses to draw upon in order to try and maintain employees and keep the lights on. Further, there appears to be a commitment by both the Fed, as well as the President and Congress to do whatever it takes to ensure our economy recovers. Deficits be damned.

Some might argue that the earlier debate over Modern Monetary Theory has been settled – it is here. As is so-called “helicopter money” – that is the government sending checks to its citizens. The US deficit and national debt will continue to balloon, with the debt approaching perhaps 100% of GDP. While alarming, we are solidly in the majority that this is a problem for another day. And that day will come, when inflation surges and the Fed will be forced to reverse now decades of accommodative policy. But that's not a problem for today.



Key Data Points				
Name	Current	For	Previous	For
Retail Sales ex. Autos MOM %	-0.40%	February	0.60%	January
Housing Starts	1599K	February	1624K	January
Factory Orders MOM %	-0.50%	January	1.90%	December
Leading Indicators MOM %	0.10%	February	0.70%	January
Unit Labor Costs	0.90%	Q4 2019	0.20%	Q3 2019
GDP QOQ (Annualized)	2.10%	Q4 2019	2.10%	Q3 2019
Wholesale Inventories	-0.50%	February	-0.50%	January
MBA Mortgage Applications	15.30%	March	15.10%	February



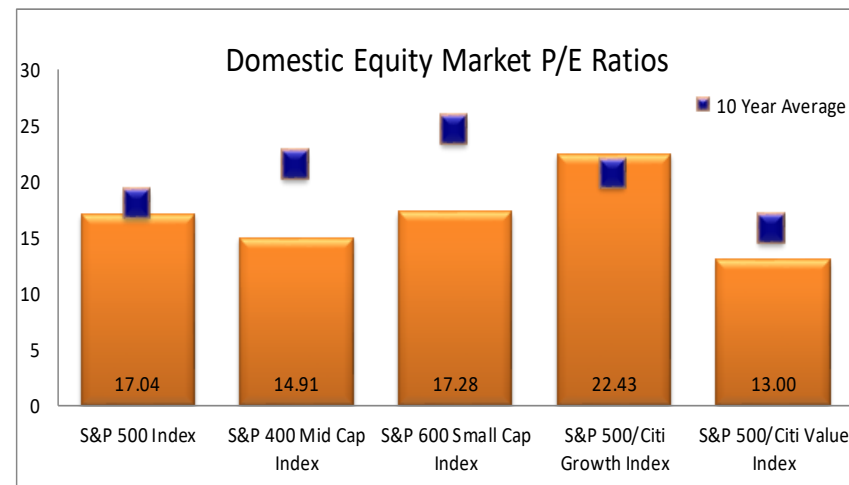


### Domestic Equity

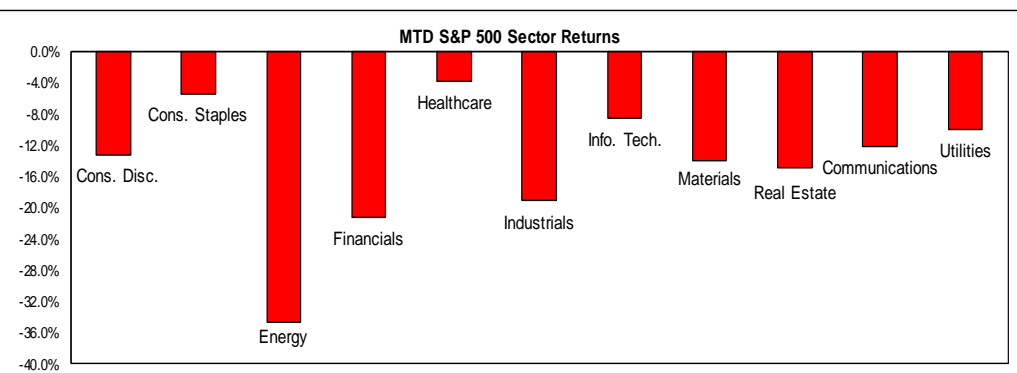
U.S. equities fell sharply in March with the benchmark S&P 500 Index falling -12.35% during the period. Mid- and Small-Caps, as measured by the S&P 400 and 600 Indices, fell even harder, losing -20.25% and -22.40%, respectively as fears of a coronavirus induced economic slowdown hit the smallest companies in the country. For the quarter, U.S. equities suffered their worst losses since 2008, with the S&P 500 Index losing -19.60%, while the aforementioned S&P 400 and 600 Indices were hardest hit, down -29.70% and -32.65% for the quarter. Taking a step back, while the month's decline was steep and quick, the broad market is down only -6.98% over the past 12 months.

Growth stocks, as measured by the S&P 500 Citi Growth Index outperformed the broader market in March, losing -9.96%, buoyed by the Technology sector. Value stocks, as measured by the S&P 500 Citi Value Index lost -15.25% on the month, dragged down by cyclical sectors such as Energy, Financials, and Industrials, those sectors most vulnerable to an economic slowdown. Additionally, the MSCI USA Extended ESG Focus Index again edged out the non-ESG screened S&P 500 Index by 15bps during the month, and 72bps for the quarter. These small outperformances can best be seen over a trailing 3-year period where the ESG screened index outperformed by +63bps annually. Not an insignificant sum when viewed through a longer term lens.

From a sector standpoint, the sectors that led the market into the end of 2019 and into February of 2020, namely Technology and Healthcare, were among the month's best performing sectors. Defensive sectors outperformed, especially the Consumer Staples sector, which lost -5.39% during the month, thanks to its relative defensiveness, high dividend yield, and the likely fact that many of its constituents may benefit from consumers stocking up on supplies due to coronavirus fears. Healthcare was the best performing sector during the period, down only -3.82%, while Technology lost -8.64%, both handily outperforming the broader S&P 500 Index. It should be noted that Technology is the only sector in positive territory over the past 12 months, up +10.43%. Furthermore, the NYSE Fang + Index, an index comprised of Facebook, Apple, Amazon, Netflix, Google, Alibaba, Baidu, NVIDIA, Tesla, and Twitter was down only -4.1% during the quarter, highlighting the concentrated nature of market leadership and the resiliency of Technology related stocks. Lastly, Amazon was up nearly 5% during the quarter; however, even as a nearly 40% weight in the Consumer Discretionary sector, the sector still lost -19.29% during the period over fears of slowing spending.



Domestic Equity Returns						
Name	MTD	QTD	YTD	1 Year	3 Year	5 Year
S&P 500 Index	-12.35%	-19.60%	-19.60%	-6.99%	5.09%	6.71%
MSCI USA Extended ESG Focus Index	-12.20%	-18.88%	-18.88%	-5.72%	5.72%	N/A
S&P 400 Mid Cap Index	-20.25%	-29.70%	-29.70%	-22.53%	-4.10%	0.55%
S&P 600 Small Cap Index	-22.40%	-32.65%	-32.65%	-25.92%	-5.38%	0.40%
S&P 500/Citi Growth Index	-9.96%	-14.51%	-14.51%	-2.48%	9.58%	9.46%
S&P 500/Citi Value Index	-15.25%	-25.34%	-25.34%	-12.22%	0.04%	3.43%



S&P 500 Sector Returns							
Sector	MTD	QTD	YTD	1 Year	3 Year	5 Year	% of S&P 500
Consumer Discretionary	-13.24%	-19.29%	-19.29%	-10.77%	5.68%	7.35%	10.30%
Consumer Staples	-5.39%	-12.74%	-12.74%	-0.59%	2.86%	5.18%	8.57%
Energy	-34.80%	-50.45%	-50.45%	-52.42%	-21.61%	-14.20%	2.57%
Financials	-21.31%	-31.95%	-31.95%	-17.20%	-2.34%	3.32%	10.41%
Healthcare	-3.82%	-12.67%	-12.67%	-1.01%	8.16%	6.01%	15.05%
Industrials	-19.18%	-27.05%	-27.05%	-19.50%	-1.82%	2.94%	8.24%
Information Technology	-8.64%	-11.93%	-11.93%	10.43%	17.61%	17.03%	25.16%
Materials	-14.06%	-26.14%	-26.14%	-16.57%	-2.80%	0.57%	2.40%
Real Estate	-14.95%	-19.21%	-19.21%	-11.33%	2.94%	2.37%	2.93%
Communication Services*	-12.14%	-16.95%	-16.95%	-3.32%	-0.30%	3.66%	10.93%
Utilities	-10.01%	-13.50%	-13.50%	-1.40%	6.23%	8.27%	3.45%

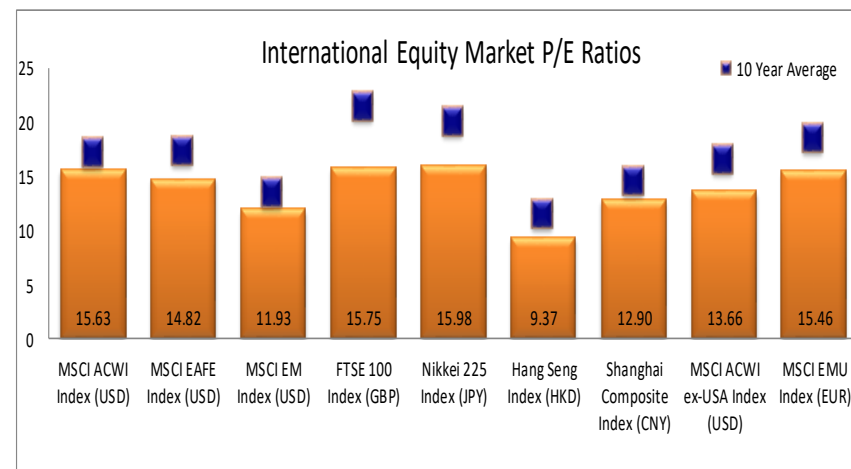
\*The S&P 500 Communication Services Sector was reclassified from the Telecommunications Sector on September 21st, 2018

### International Equity

International equities were also hard hit in March, with Developed Markets, as measured by the MSCI EAFE Index down -13.27% for the period. Emerging Markets, as measured by the MSCI EM Index fared slightly worse, down -15.41% for the period. Broadly speaking, no matter where you were invested, it was hard to be spared, with the broadest measure of global stocks, the MSCI All Country World Index (ACWI) down -13.45% for the month. For the quarter, Developed Markets lost -22.72%, while somewhat surprisingly (given plummeting oil prices and a strong U.S. Dollar) Emerging Markets were down only -23.59%. Globally speaking, the MSCI ACWI Index lost -21.26% for the quarter, only slightly worse off than the S&P 500 (-19.60%).

At the regional level, the Eurozone, as measured by the MSCI EMU Index lost -17.19% in EUR terms on the month, and -25.00% for the quarter. The Eurozone was the epicenter of the pandemic for most of the month, although that's now shifted to New York. With its fragmented fiscal abilities, leverage to China, and a worsening crisis in Italy and Spain, the Eurozone was largely put on ice during the month. Despite a pledge to start buying bonds again from the ECB, and a surprisingly large (as a percentage of GDP) fiscal stimulus package from Germany, the Euro continued to weaken against the U.S. Dollar and Eurozone equities sold off. The United Kingdom, as measured by the FTSE 100 Index didn't fare much better, down -13.40% in GBP terms for the month, and -23.81% for the quarter. Similar to the Eurozone, it likely didn't help that many companies cut their dividends for the year amidst the crisis. A surprising bright spot during the month was Japan, with the Nikkei 225 Index down -9.76% in JPY terms; however for the quarter Japan was not spared, with the benchmark index down -19.29%.

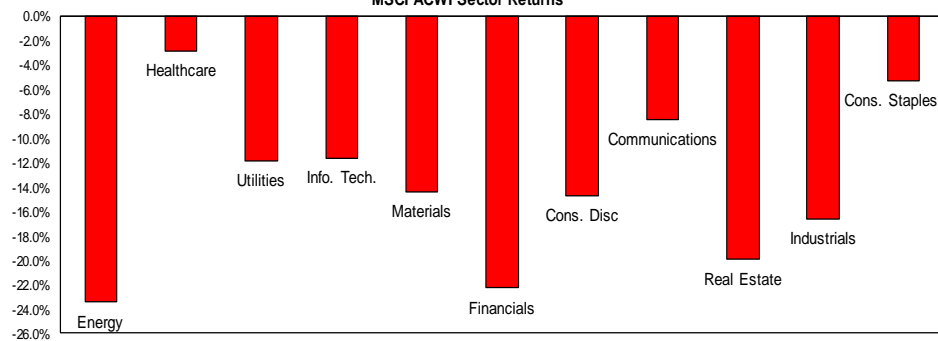
At the sector level, all 11 GICS sectors finished the month in negative territory. With oil prices plummeting, it's no surprise that Energy was the worst performing sector during the month, down a whopping -23.45% (and -38.29% for the quarter). Like in the U.S., Healthcare and Consumer Staples were the best performing sectors, down -2.83% and -5.31% respectively.



### International Equity Returns

Name	MTD	QTD	YTD	1 Year	3 Year	5 Year
MSCI ACWI Index (USD)	-13.45%	-21.26%	-21.26%	-10.76%	2.06%	3.43%
MSCI EAFE Index (USD)	-13.27%	-22.72%	-22.72%	-13.90%	-1.27%	-0.06%
MSCI EAFE Ext. ESG Focus Index (USD)	-13.15%	-22.40%	-22.40%	-12.98%	-1.06%	N/A
MSCI EM Index (USD)	-15.41%	-23.59%	-23.59%	-17.42%	-1.29%	0.02%
MSCI EM Ext. ESG Focus Index (USD)	-15.62%	-23.45%	-23.45%	-16.83%	-1.22%	N/A
FTSE 100 Index (GBP)	-13.40%	-23.81%	-23.81%	-18.44%	-4.17%	0.56%
Nikkei 225 Index (JPY)	-9.76%	-19.29%	-19.29%	-8.92%	2.06%	1.67%
Hang Seng Index (HKD)	-9.53%	-15.88%	-15.88%	-15.75%	2.93%	2.57%
Shanghai Composite Index (CNY)	-4.51%	-9.83%	-9.83%	-8.84%	-2.95%	-4.00%
MSCI ACWI ex-USA Index (USD)	-14.42%	-23.27%	-23.27%	-15.14%	-1.45%	-0.12%
MSCI EMU Index (EUR)	-17.19%	-25.00%	-25.00%	-15.25%	-4.03%	-1.38%

### MSCI ACWI Sector Returns



### MSCI ACWI Ex U.S. Sector Returns

Sector	MTD	QTD	YTD	1 Year	3 Year	5 Year	% of ACWI
Energy	-23.45%	-38.29%	-38.29%	-36.52%	-7.81%	-3.36%	10.29%
Healthcare	-2.83%	-8.83%	-8.83%	5.18%	6.60%	1.98%	6.78%
Utility	-11.86%	-14.78%	-14.78%	-5.07%	4.65%	4.97%	6.15%
Information Technology	-11.63%	-17.50%	-17.50%	1.61%	8.35%	8.32%	8.82%
Materials	-14.38%	-27.36%	-27.36%	-22.41%	-3.64%	-0.31%	6.27%
Financials	-22.28%	-30.94%	-30.94%	-24.46%	-7.10%	-3.63%	18.85%
Consumer Discretionary	-14.68%	-24.17%	-24.17%	-12.66%	-2.13%	-1.48%	11.21%
Communication Services*	-8.51%	-14.07%	-14.07%	-9.58%	-2.38%	-2.05%	7.67%
Real Estate**	-19.91%	-27.49%	-27.49%	-25.65%	-3.50%	N/A	3.29%
Industrials	-16.59%	-26.15%	-26.15%	-16.72%	-2.51%	0.02%	10.25%
Consumer Staples	-5.31%	-14.70%	-14.70%	-9.50%	0.96%	2.24%	10.42%

\*The MSCI ACWI Ex U.S. Communication Services Sector was reclassified on November 30th, 2018 \*\*The MSCI ACWI Ex. USA Real Estate Sector was developed on August 31st, 2016



### Fixed Income

U.S. Treasury and Government Agency bonds were by far the best performers over the past month. This is due to spread widening (a negative for a bond's price) in non-governmental bonds. The spread widening was driven by the growing unease regarding the impact of the Coronavirus.

Concerns of an economic slowdown motivated Jerome Powell's Federal Reserve to reduce the Fed Funds rate twice in March, at "emergency meetings," held prior to the previously scheduled meeting on March 17/18.

Growing bond market illiquidity is what drove the Federal Reserve to flex its 13(3) powers, which had not been used since the Financial Crisis of 2008-09. The new and improved Fed programs allow it to purchase municipal and corporate debt in addition to the more traditional Treasury and Agency Mortgage bond purchases. The securities they acquire are held by the Treasury, as the Fed is not allowed to have non-governmental investments on its balance sheet.

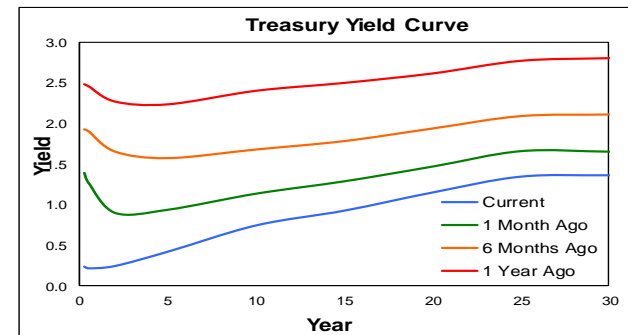
Investment Grade Corporate and High Yield bonds have fallen out of favor due to the concerns of the economic effects of the current non-essential business shut down and significant furloughing of the workforce. The drop in oil prices has severely pressured the credit quality of many companies in the energy sector. Spread widening was also experienced in Emerging Market bonds.

A portion of the spread widening was certainly due to increased concerns about default during an economic slowdown. The other piece, which has magnified the negative price impact, is market illiquidity. The rush out of "risk" assets was so quick, and so severe, that the number of buyers willing to offer a reasonable price for anything that was not a Treasury bond was few to none. Even high-quality municipal bonds were affected, with their prices gapping lower as the market froze up and the only bidder was someone bottom fishing, offering a price that might be 10% to 20% below what would be considered "fair value."

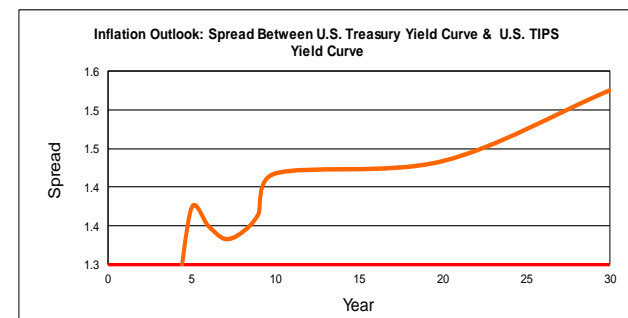
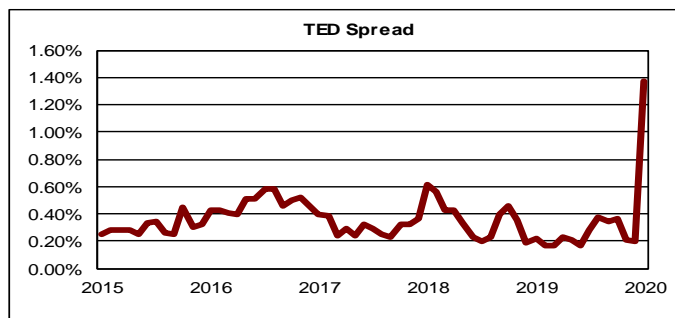
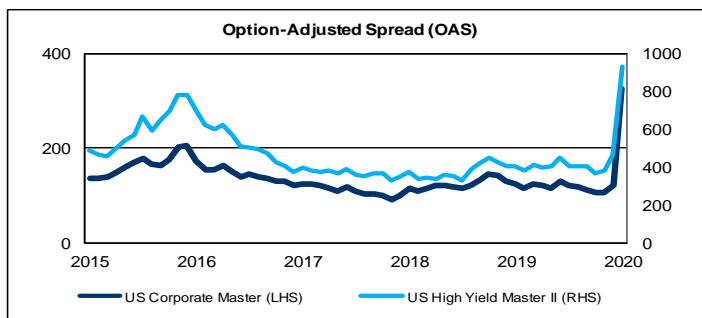
Once the Fed's new bond buying mandates were announced, liquidity began to return to the fixed income markets. Bond pricing has recovered significantly in the Municipal and Investment Grade corporate bonds markets. Even High Yield bond spreads tightened on the news of Fed intervention in the credit markets.

Central Bank Activity				
Name	Current	1 Month Ago	6 Months Ago	1 Year Ago
Fed Funds Rate	0.25%	1.75%	2.00%	2.50%
Bank of Japan Target Rate	0.10%	0.10%	0.10%	0.10%
European Central Bank Rate	0.00%	0.00%	0.00%	0.00%
Bank of England Official Bank Rate	0.10%	0.75%	0.75%	0.75%

Fixed Income Returns				
Name	MTD	QTD	YTD	1 Year
Bloomberg Barclays US Government Index	2.84%	8.08%	8.08%	13.56%
Bloomberg Barclays US Agg Index	-0.59%	3.15%	3.15%	9.34%
Bloomberg Barclays US Corporate Index	-7.09%	-3.63%	-3.63%	5.42%
Bloomberg Barclays US Corporate High Yield Index	-11.46%	-12.68%	-12.68%	-7.11%
Bloomberg Barclays EM USD Agg Index	-10.68%	-9.48%	-9.48%	-2.90%
Bloomberg Barclays Global Agg Treasuries USD Index	-0.08%	3.40%	3.40%	8.40%
Bloomberg Barclays Municipal Index	-3.63%	-0.63%	-0.63%	4.03%
S&P Green Bond Select Index Total Return	-4.58%	-1.62%	-1.62%	2.53%



U.S. Treasury Yields									
Period	3 Month	6 Month	2 Year	5 Year	10 Year	15 Year	20 Year	25 Year	30 Year
Current	0.24%	0.22%	0.25%	0.42%	0.74%	0.92%	1.15%	1.34%	1.36%
1 Month Ago	1.39%	1.27%	0.90%	0.94%	1.14%	1.29%	1.47%	1.66%	1.66%
6 Months Ago	1.93%	1.90%	1.65%	1.57%	1.68%	1.78%	1.94%	2.09%	2.11%
1 Year Ago	2.49%	2.46%	2.28%	2.24%	2.41%	2.51%	2.62%	2.78%	2.81%



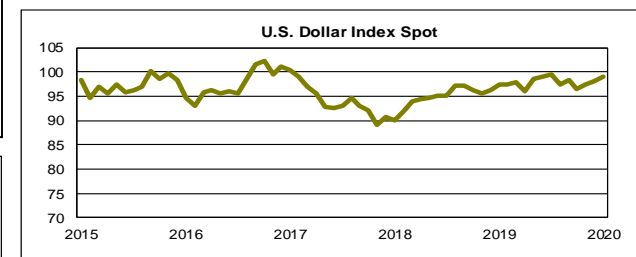
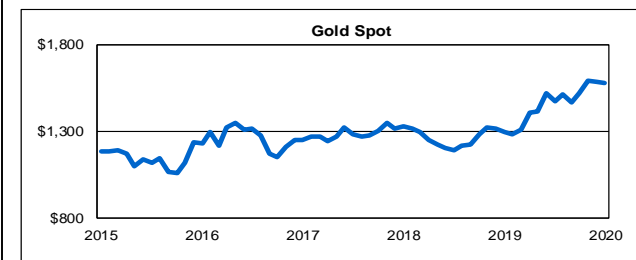
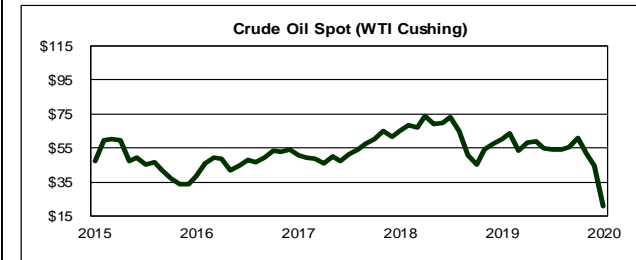
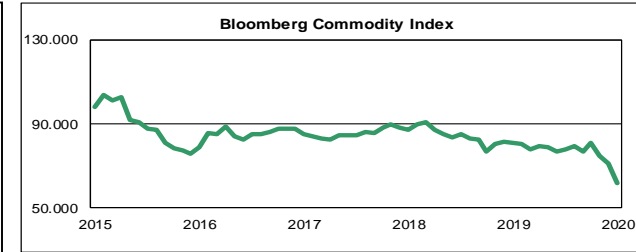
### Alternative Investments

Alternative investments largely were not spared during the March selloff. Treasury yields plummeted and demand for U.S. Dollars surged. The Federal Reserve stepped in to announce multiple new liquidity measures, bond buying programs, dollar swap lines, and even the purchase of ETFs (handled by BlackRock, of course). While the Dollar, as measured by the DXY Index, surged intra-month, it receded near the end of March after coordinated global central bank monetary policy actions. The DXY index finished the month up +0.93% to close at 99.05, the highest monthly close since September 2019.

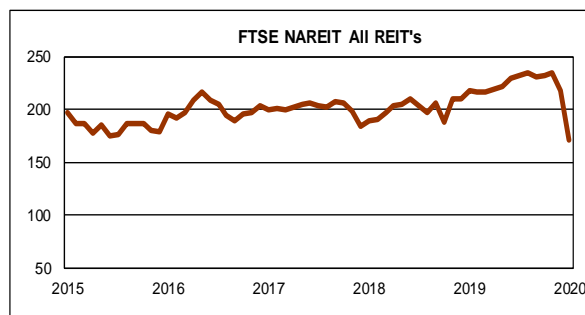
With investors flocking to safe havens, Gold continued to be a bright spot (pun intended), although it ended the month of March down -0.54%, likely caught in the crossfire of margin calls, rebalancing, and the fact that it is one of very few assets to post a positive return for the quarter, up +3.95%. Gold's monthly closing price of \$1,577 per ounce represents one of the highest monthly closes in more than five years, with the others coming this year. Gold remains a suitable hedger against lower interest rates, extreme levels of volatility, and continued fears over the coronavirus. Speaking of volatility, it should be noted that the CBOE Volatility Index, known as the VIX, closed the month at 53.54 after hitting an *intra-month all-time high* above 80. With the S&P 500 averaging +/-5% daily moves in March, it's no wonder that investors flocked to havens.

Perhaps the most shocking economic event of the month was a surprise announcement from Saudi Arabia that they would be ramping up oil production to at least 13 million barrels per day causing a price war with Russia, OPEC, and U.S. Shale. With a significant oversupply of crude oil ready to hit the market, and already weakening demand prior to the coronavirus, the world is again awash in crude oil. West Texas Intermediate (WTI) crude oil lost -52.24% *during the month*, or more than \$24/barrel, to close at \$20.48/barrel, the lowest monthly close in nearly two decades. WTI has lost -66.46% of its value this year. With plummeting crude prices, it's likely to continue to put strains on cash strapped oil and gas companies within the Energy sector, as evidenced by then -34.80% monthly return for the S&P 500 Energy sector, and a -50.45% year to date loss. Weakness in crude oil dragged the Bloomberg Commodity Index lower by -12.85% on the month and -23.53% on the year.

From a currency standpoint, the Canadian Loonie lost more than -5% on the month to close at \$1.41 CAD/USD, and the pound losing more than -3% to close at \$1.24 USD/GBP. The Euro and Yen were largely unchanged. Looking at nine Hedge Fund strategies, all lost value in March, and are in negative territory for the year, lacking immunity from the global risk-off trade.



Hedge Funds						
Name	MTD	QTD	YTD	1 Year	3 Year	5 Year
Global Hedge	-5.93%	-6.90%	-6.90%	-1.44%	-0.55%	-0.66%
Convertible Arbitrage	-6.24%	-5.76%	-5.76%	-1.58%	0.96%	1.87%
Equity Hedge (L/S)	-9.53%	-13.28%	-13.28%	-9.39%	-2.34%	-1.76%
Equity Market Neutral	-5.91%	-7.78%	-7.78%	-8.99%	-4.23%	-2.57%
Event Driven	-5.39%	-5.42%	-5.42%	3.18%	-1.69%	-0.06%
Macro	-0.96%	-1.33%	-1.33%	4.35%	1.12%	-1.14%
Merger Arbitrage	-6.85%	-7.16%	-7.16%	-5.28%	-2.31%	0.56%
Relative Value Arbitrage	-6.28%	-5.66%	-5.66%	-2.04%	0.69%	-0.13%
Absolute Return	-5.55%	-5.83%	-5.83%	-2.26%	0.15%	0.52%



Spot Rates					
Description	Current	1 Month Ago	3 Months Ago	6 Months Ago	1 Year Ago
CAD / USD	1.41	1.34	1.30	1.32	1.33
JPY / USD	107.54	107.89	108.61	108.08	110.86
USD / GBP	1.24	1.28	1.33	1.23	1.30
USD / EUR	1.10	1.10	1.12	1.09	1.12

**S&P 500 Index (SPX)** – Standard and Poor’s 500 Index is a capitalization-weighted index of 500 stocks. The index is designed to measure performance of the broad domestic economy through changes in the aggregate market value of 500 stocks representing all major industries.

**S&P 500 Sector Indices (S5COND, S5CONS, S5ENRS, S5FINL, S5HLTH, S5INDU, S5INFT, S5MATR, S5TELS, S5UTIL, S5RLST)** – The S&P 500 is broken down into eleven sub-indices according to the Global Industry Classification Standard (GICS) sectors. These eleven sectors include Consumer Discretionary, Consumer Staples, Energy, Financials, Health Care, Industrials, Information Technology, Materials, Communication Services, Utilities, and Real Estate.

**S&P 400 Mid Cap Index (MID)** – Standard and Poor’s Mid Cap 400 Index is a capitalization-weighted index, which measures the performance of the mid-range sector of the U.S. stock market.

**S&P 600 Small Cap Index (SML)** – Standard & Poor’s Small Cap 600 Index is a capitalization-weighted index that measures the performance of selected U.S. stocks with a small market capitalization.

**S&P 500/Citigroup Growth Index (SGX)** – The S&P 500/Citigroup Growth Index is a market capitalization-weighted index. All the stocks in the underlying parent index are allocated into value or growth. Stocks that do not have pure value or pure growth characteristics have their market caps distributed between the value & growth indices.

**S&P 500/Citigroup Value Index (SVX)** – The S&P 500/Citigroup Value Index is a market capitalization-weighted index. All the stocks in the underlying parent index are allocated into value or growth. Stocks that do not have pure value or pure growth characteristics have their market caps distributed between the value & growth indices.

**MSCI AC World Index (MXWD)** – The MSCI AC World Index is a free float-weighted equity index. The index includes both emerging and developed world markets.

**MSCI EAFE Index (MXEA)** – The MSCI EAFE Index is a capitalization-weighted index that monitors the performance of stocks from developed markets in Europe, Australia-Asia, and the Far East.

**MSCI Emerging Market Index (MXEF)** – The MSCI Emerging Market Index is a free-float weighted index that is designed to measure the equity performance of international emerging markets.

**FTSE 100 Index (UKX)** – The FTSE 100 Index is a capitalization-weighted index of the 100 most highly capitalized companies traded on the London Stock Exchange. The equities use an investability quotient weighting in the index calculation.

**Nikkei 225 Stock Average Index (NKY)** – The Nikkei-225 Stock Average is a price-weighted average of 225 top-rated Japanese companies listed in the First Section of the Tokyo Stock Exchange.

**Hang Seng Index (HSI)** – The Hang Seng is a free-float capitalization-weighted index of selected companies from the Stock Exchange of Hong Kong. The components of the index are divided into four sub-indexes: Commerce and Industry, Finance, Utilities, and Properties.

**Shanghai Stock Exchange Composite Index (SHCOMP)** – The Shanghai Stock Exchange Composite Index is a capitalization-weighted index. The index tracks the daily price performance of all A-shares and B-shares listed on the Shanghai Stock Exchange.

**MSCI USA Extended ESG Focus Index**- The Index is designed to maximize exposure to positive environmental, social and governance (ESG) factors while exhibiting risk and return characteristics similar to those of the MSCI USA Index.

**MSCI EAFE Extended ESG Focus Index**- The Index is designed to maximize exposure to positive environmental, social and governance (ESG) factors while exhibiting risk and return characteristics similar to those of the MSCI EAFE Index.

**MSCI Emerging Markets Extended ESG Focus Index**- The Index is designed to maximize exposure to positive environmental, social and governance (ESG) factors while exhibiting risk and return characteristics similar to those of the MSCI Emerging Markets Index.

**MSCI ACWI ex USA Index (MXWDU)** – The MSCI ACWI ex USA Index is a free-float weighted index.

**MSCI ACWI ex USA Sector Indices**– The MSCI ACWI ex USA Index is broken down into eleven sub-indices according to the Global Industry Classification Standard (GICS) sectors. These eleven sectors include Consumer Discretionary, Consumer Staples, Energy, Financials, Health Care, Industrials, Information Technology, Materials, Communication Services, Utilities, and Real Estate.

**MSCI EMU Index (MXEM)** – The MSCI EMU (European Economic and Monetary Union) Index is a free-float weighted equity index.

**Bloomberg Barclays Global Treasuries USD Hedged Index (LGRTRUH)**– The Bloomberg Barclays Global Treasury Index tracks fixed-rate, local currency government debt of investment grade countries. The index represents the treasury sector of the Global Aggregate Index and contains issues from 37 countries denominated in 24 currencies.

**Bloomberg Barclays Municipal Bond Index (LMBITR)**– The Bloomberg Barclays Municipal Bond Index covers the USD-denominated long-term tax exempt bond market. The index has four main sectors: state and local general obligation bonds, revenue bonds, insured bonds, and prerefunded bonds.

**Bloomberg Barclays U.S. Government Index**- Bloomberg Barclays US Government Bond Index is comprised of the US Treasury and US Agency Indices. The index includes US dollar-denominated, fixed-rate, nominal US Treasuries and US agency debentures (securities issued by US government owned or government sponsored entities, and debt explicitly guaranteed by the US government).

**Bloomberg Barclays EM Hard Currency Aggregate Index (LG20TRUU)**- The Bloomberg Barclays Emerging Markets Hard Currency Aggregate Index is a hard currency Emerging Markets debt benchmark that includes USD-denominated debt from sovereign, quasi-sovereign, and corporate EM issuers.

**Bloomberg Barclays U.S. Aggregate Bond Index (LBSTRUU)**- The Bloomberg Barclays US Aggregate Bond Index is a broad-based benchmark that measures the investment grade, US dollar-denominated, fixed-rate taxable bond market. The index includes Treasuries, government-related and corporate securities, MBS (agency fixed-rate and hybrid ARM pass-throughs), ABS and CMBS (agency and non-agency).

**Bloomberg Barclays U.S. Corporate Index (LUACTRUU)**- The Bloomberg Barclays US Corporate Bond Index measures the investment grade, fixed-rate, taxable corporate bond market. It includes USD denominated securities publicly issued by US and non-US industrial, utility and financial issuers.

**Bloomberg Barclays U.S. Corp High Yield Index (LFTR ML U.S. Corporate Index (COA0))** – The Bloomberg Barclays US Corporate High Yield Bond Index measures the USD-denominated, high yield, below-investment grade fixed-rate corporate bond market.

**S&P Green Bond Select Index (SPGRSLLT)**- The S&P Green Bond Select Index is a market value-weighted subset of the S&P Green Bond Index that seeks to measure the performance of green-labeled bonds issued globally, subject to stringent financial and extra-financial eligibility criteria.

**ML U.S. Corporate Index (COA0)** – The Merrill Lynch U.S. Corporate Index tracks the performance of U.S. dollar denominated investment grade corporate debt publicly issued in the U.S. domestic market.

**ML U.S. High Yield Index (H0A0)** – The Merrill Lynch U.S. High Yield Index tracks the performance of U.S. dollar denominated below investment grade corporate debt publicly issued in the U.S. domestic market.

**FTSE NAREIT All REITs Index (FNAR)** – The FTSE NAREIT All REITs Index is a free float adjusted market capitalization-weighted index that includes all tax qualified REITs listed in the NYSE, AMEX, and NASDAQ National Market.

**Bloomberg Commodity Index (BCOM)** – Bloomberg Commodity Index (BCOM) is calculated on an excess return basis and reflects commodity futures price movements. The index rebalances annually weighted 2/3 by trading volume and 1/3 by world production and weight-caps are applied at the commodity, sector and group level for diversification. Roll period typically occurs from 6th-10th business day based on the roll schedule.

**U.S. Dollar Index (DXY)** – The U.S. Dollar Index (USDIX) indicates the general int'l value of the USD. The USDIX does this by averaging the exchange rates between the USD and 6 major world currencies. The ICE US computes this by using the rates supplied by some 500 banks.

**HFRX Global Hedge Fund Index (HFRXGL)** – The HFRX Global Hedge Fund Index is designed to be representative of the overall composition of the hedge fund universe. It is comprised of all eligible hedge fund strategies.

**HFRX Convertible Arbitrage Index (HFRXCA)** – The HFRX Convertible Arbitrage Index is designed to reflect the general performance of strategies in which the investment thesis is predicated on realization of a spread between related instruments in which one or multiple components of the spread is a convertible fixed income instrument.

**HFRX Distressed Securities Index (HFRXDS)** – The HFRX Distressed Securities Index is designed to reflect the general performance of strategies focused on corporate fixed income instruments, primarily on corporate credit instruments of companies trading at significant discounts to their value at issuance of obliged (par value) at maturity as a result of either formal bankruptcy proceeding or financial market perception of near term proceedings.

**HFRX Macro Index (HFRXM)** – The HFRX Macro Index reflects the general performance of strategies in which the investment process is predicated on movements in underlying economic variables and the impact these have on equity, fixed income, hard currency, and commodity markets.

**HFRX Equity Hedge Index (HFRXEH)** – The HFRX Equity Hedge Index is designed to reflect the general performance of strategies that maintain both long and short positions in primarily equity and equity derivative securities. A wide variety of investment processes can be employed to arrive at an investment decision, including both quantitative and fundamental techniques. Strategies can be broadly diversified or narrowly focused.

**HFRX Equity Market Neutral Index (HFRXEMN)** – The HFRX Equity Market Neutral Index is designed to reflect the general performance of strategies that employ sophisticated quantitative techniques of analyzing price data to ascertain information about future price movement and relationships between securities.

**HFRX Event Driven Index (HFRXED)** – The HFRX Event Driven Index reflects the general performance of strategies that maintain positions in companies currently or prospectively involved in corporate transactions of a wide variety including, but not limited to, mergers, restructurings, financial distress, tender offers, shareholder buybacks, debt exchanges, security issuance, or other capital structure adjustments.

**HFRX Merger Arbitrage Index (HFRXMA)** – The HFRX Merger Arbitrage Index reflects the general performance of strategies which employ an investment process primarily focused on opportunities in equity and equity related instruments of companies which are current engaged in a corporate transaction.

**HFRX Relative Value Arbitrage Index (HFRXRVA)** – The HFRX Relative Value Arbitrage Index reflects the general performance of strategies that maintain positions in which the investment thesis is predicated on realization of a valuation discrepancy in the relationship between multiple securities.

#### **Economic Data Sources:**

**PPI & CPI** – Bureau of Labor Statistics  
**Unemployment Rate** – Bureau of Labor Statistics  
**Consumer Confidence** – Conference Board  
**S&P/Case-Shiller Composite 20** – Case-Shiller  
**Industrial Production** – Federal Reserve  
**Capacity Utilization** – Federal Reserve  
**Retail Sales** – U.S. Census Bureau  
**Housing Starts** – U.S. Department of Commerce  
**Factory Orders** – U.S. Census Bureau  
**Leading Indicators** – Conference Board  
**Unit Labor Costs** – Bureau of Labor Statistics  
**GDP** – Bureau of Economic Analysis  
**Wholesale Inventories** – U.S. Census Bureau  
**MBA Mortgage Applications** – Mortgage Bankers Association  
**4-Week Moving Average of Initial Claims, SA** – Bureau of Labor Statistics

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