Morgan Stanley

INVESTMENT MANAGEMENT

Global Fixed Income Bulletin

Putting Income Back into Fixed Income

FIXED INCOME TEAM | MACRO INSIGHT | OCTOBER 2022

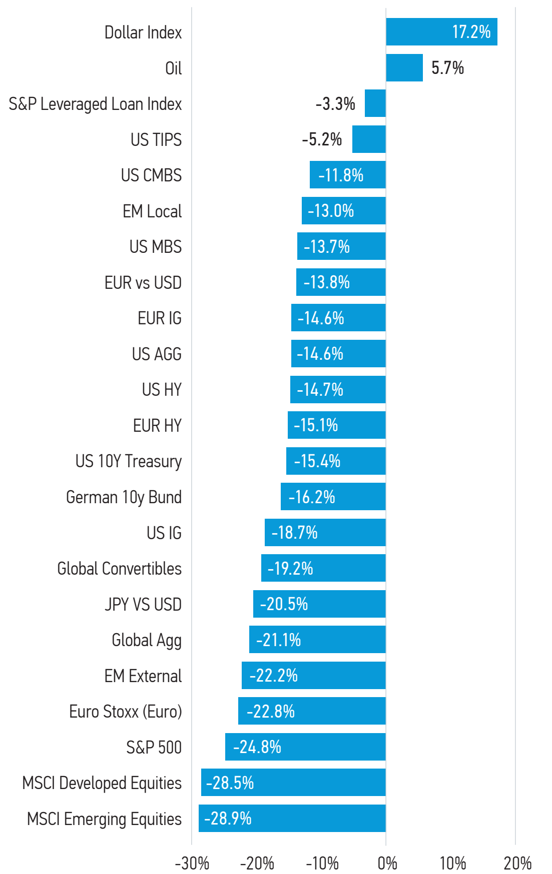
The bond market rout continued in September, which would have been even worse without a substantial rally over the last three days of the month. Bond market woes were caused by a litany of factors: better than expected U.S. employment, worse than expected inflation, the U.S. Federal Reserve (Fed) raising expected terminal rates meaningfully. These factors were compounded by the now infamous UK bond market meltdown over the second half of the month. Sovereign yields and credit spreads moved substantially higher in September. Credit markets were clearly impacted by the rise in yields, turmoil in the UK, and, maybe most importantly, the rising probability of a recession or hard landing. Also, not surprisingly, the U.S. dollar was strong once again, rising in value against almost all of the world's currencies. That's the bad news.

The good news is that yields across the fixed income universe reached levels that should provide decent protection against further rises in yields. For example, high quality 10-year investment grade financial debt now yields around 6%. Even if yields/spreads rise another 50-75 basis points (bps), total returns over 12-month periods should be positive—a major change from the beginning of the year. And, we believe, eventually the economy will soften, inflation pressures ameliorate and government bond yields will fall, further cushioning the impact of potentially wider spreads.

The news in September was generally negative for bonds. Whether it was a U.S. labor market showing no imminent signs of softening, or U.S. inflation (core CPI) rising from a 0.3% month-over-month change to a 0.6% month-over-month change. News from Europe

DISPLAY 1

Asset Performance Year-to-Date



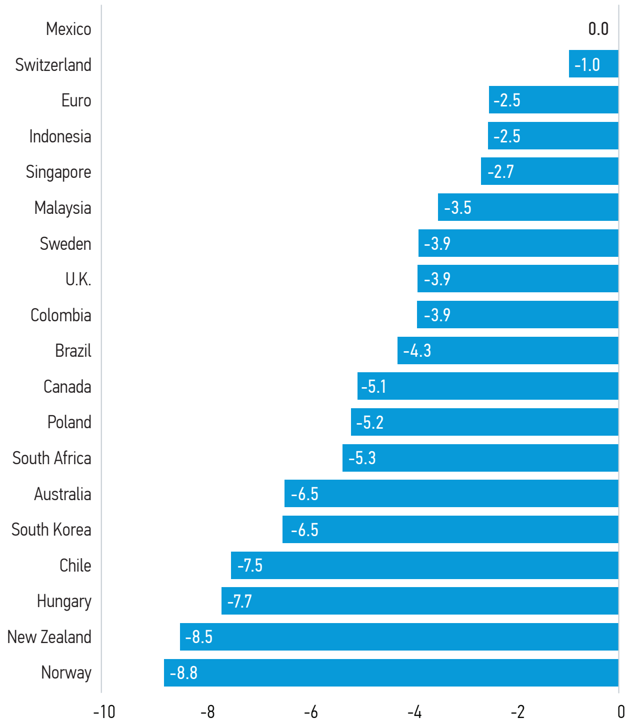
Note: USD-based performance. Source: Bloomberg. Data as of September 30, 2022. The indexes are provided for illustrative purposes only and are not meant to depict the performance of a specific investment. **Past performance is no guarantee of future results.** See pages 6-7 for index definitions.

and elsewhere also remained poor on the inflation front. It is likely. In our view, that Eurozone inflation will stay in double digits into 2023 at least. And, with fiscal policy easing to varying degrees, headwinds for monetary policy are likely to get a bit stronger given additional fiscal support to households and businesses. It seems nowhere in advanced economies is there optimism that central banks have hiked enough. Even in Australia, where the central bank surprised markets by "only" raising rates 25 bps rather than the expected 50 bps, the cumulative amount of tightening the central bank expects to deliver remained unchanged.

The impact of poor inflation data was felt particularly hard on real yields. The U.S. 10-year real yield rose almost 100 bps in the month, an amount rarely seen in any one-month period. This of course implied that inflation expectations fell over the month (nominal 10-year yields did not rise as much, meaning 10-year breakeven inflation spreads fell). This suggests the Fed has gained credibility in its inflation fight. In other words, the market increasingly believes Fed rhetoric that it will raise rates to "whatever it takes" to bring inflation down to target (circa 2%). It also implies higher probability of a recession in 2023 or a long period of subpar growth as that is what it usually takes to push inflation meaningfully lower.

Markets were additionally challenged by events in the UK. An unprecedented wave of selling, first of long-dated UK government bonds and then other Euro and USD denominated bonds, led to wild gyrations in UK government yields and significant price deterioration in corporate and securitized bonds. For example, the UK 30-year government bond yield was rising steadily over the month until September 27/28, when it suddenly rose 94 bps, only to fall 105 bps on September 28, after the Bank of England (BoE) announced it would buy billions of pounds of long gilts to ensure financial stability. While it clearly worked to stabilize the market, subsequently, 30-year gilt yields are back up 46 bps as of October 7. The index linked gilt market, a large market mostly used by UK insurance companies and pension funds, had even worse volatility. This episode was the first example of something "breaking" from the rapid rise in yields in 2022. Of course, it does seem leverage was the trigger, as it usually is during financial crises. Whether or not there are other skeletons lurking in investors' closets remains to be seen.

DISPLAY 2
Currency Monthly Changes Versus U.S. Dollar
(+ = appreciation)



Note: Positive change means appreciation of the currency against the USD.
Source: Bloomberg. Data as of September 30, 2022.

DISPLAY 3
Major Monthly Changes in 10-Year Yields and Spreads

COUNTRY	10-YR YIELD LEVEL (%)	MONTH CHANGE (BPS)	10-YR SPREAD (BPS)	MONTH CHANGE (BPS)
			(Spread over USTs)	
United States	3.83	+64		
United Kingdom	4.09	+129	26	+66
Germany	2.11	+57	-172	-7
Japan	0.24	+2	-358	-62
Australia	3.89	+29	6	-35
Canada	3.17	+6	-66	-58
New Zealand	4.30	+32	47	-31
EUROPE			(Spread over Bunds)	
France	2.72	+57	61	0
Greece	4.86	+75	275	+19
Italy	4.52	+63	241	+6
Portugal	3.18	+55	107	-2
Spain	3.29	+55	118	-2
EM	**10-YR LOCAL YIELD (%)**	**MTD CHANGE (BPS)**	**SPREAD (BPS)**	**MTD CHANGE (BPS)**
EM External Spreads			444	-14
EM Corporate Spreads			393	+4
EM Local Yields	6.89	-23		
			(Spread over USTs)	
Brazil	12.02	-28	819	-91
Colombia	12.78	+70	895	+7
Hungary	9.77	+96	594	+32
Indonesia	7.35	+24	352	-40
Malaysia	4.42	+43	59	-20
Mexico	9.65	+61	582	-3
Peru	8.77	+74	494	+10
Poland	7.15	+102	332	+38
South Africa	11.34	+45	751	-19
CREDIT			**SPREAD (BPS)**	**MTD CHANGE (BPS)**
U.S. IG			159	+19
EUR IG			225	+23
U.S. HY			552	+68
EUR HY			624	+72
SECURITIZED				
Agency MBS			172	+31
U.S. BBB CMBS			405	+5

Positive Neutral Negative

Source: Bloomberg, JPMorgan. Data as of September 30, 2022.

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Fixed Income Outlook

The biggest takeaway from events and market movements in September is that it is too early to talk about central bank pivots and lower inflation. It seems that rate hikes as currently forecasted by major central banks are likely to be the minimum we can expect given the stubbornness of inflation and firmness of labor markets. The U.S., despite its significant economic slowdown this year, still has a large imbalance between aggregate demand and supply, not just in the labor market but in the economy overall. While it is not experiencing the energy shock Europe is facing, the trend in U.S. wages and hiring (both actual and intended) look to be too high, requiring the upgraded Fed rate forecasts and predicted path of hikes for the remainder of this year. They have also forewarned there will be more to come if this path does not suffice. Given that inflation remains stubbornly high, financial conditions, meaning rates, longer-maturity yields and credit spreads need to stay at elevated levels for a material period of time in order to grind down inflation. This will prevent any sustained rally in yields and spreads. The rallies we have seen, in July and over the last few days of September, have proven to be short lived as the hoped for Fed pivot did not come.

Of course, as the Fed ups the ante so to speak, the probability of an overshoot (tightening too much) grows, which could result in a significant economic slowdown, or a financial accident. The volatility witnessed in the UK in recent weeks is something of a warning shot for investors to get their financial houses in order to withstand higher yields. As per usual, stresses in the system and negative feedback loop to the economy are due to leverage. The issue in the UK bond market was not about solvency but about leverage. It was about borrowing to increase returns. Live by the sword, die by the sword. It is difficult to know how much private sector financial leverage exists in the global economy, but the degree to which there will be dispersions of performance will likely hinge critically on who has the most levered or least levered investment or business model. The Fed has been clear about this. Get your balance sheet/investment portfolio prepared for a slower economy and higher, sustained yields.

Over the past 25 years, when problems arose, central banks, particularly the Fed (the world's central bank) provided a put which markets could exercise if times got really tough. If rate hikes caused too much pain they would be reversed quickly. However, today the situation is the opposite. There is too much inflation. Too much demand. Too little supply. Too low unemployment rates. Without saying so explicitly, central banks will welcome higher unemployment if it helps reduce inflation. What this means is that unless there is a dramatic change in the economic/labor market situation, modest improvements in job openings, hiring, even inflation will not cause the Fed to pivot. And, improvements will have to be sustained over many months.

What does this mean for bond markets? European bonds remain challenged by the highest inflation rates in the world. Usually we think of Europe as being a poster child for low inflation and secular stagnation. Now, we have stagflation. Bonds, in or view, will continue to struggle as the European Central Bank (ECB) attempts to raise rates enough to bring down inflation while acknowledging that a significant portion of inflation, maybe 40-50% is due to factors (energy) they cannot control. But, what they cannot do is allow an inflationary spiral and let current inflation become embedded in the economy, even at significantly lower levels than today. The good news is that bond markets mostly understand this and price in meaningful increases in interest rates, as do credit spreads. Unfortunately, it is too early to declare the all-clear. Risks are likely still skewed to even higher yields even at the expense of a deeper economic downturn.

The U.S. economy looks to be amongst the most resilient of advanced economies. This is both good and bad. It means U.S. credit markets remain in good shape fundamentally in that corporate. But it also means that robust private sector balance sheets and income generation will make it harder for the Fed to slow the economy. While it is still possible that a soft landing will be achieved, it becomes more difficult. There is little to stop 10-year U.S. yields from breaching the 4% level over the remainder of the year. And, while bonds are no doubt more attractive than they were in July, we are wary that there is more pain to come and investors should remain patient in adding interest rate and credit risk to portfolios. Most emerging markets, while further along the rate hiking path, remain in the throes of too high inflation and more rate hikes.

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	MONTHLY REVIEW	OUTLOOK
Developed Market Rate/ Foreign Currency	September was anything but boring when it came to developed market rates. Yields broadly were higher, while volatility reached historic levels. Notably, the U.K. bond market faced serious disruptions following tax cut announcements and an implosion in pension funds, which permeated across global markets. In general, central bankers across the world made it clear that combatting inflation was their sole focus, even if it meant that growth may have to slow. As a result, yields, especially real yields, rose.[1]	As central banks continue to tighten monetary policy, it seems more and more unlikely that a “soft landing” can be achieved. As a result, rates are likely to remain higher for longer, but volatility across markets is also going to continue as uncertainty remains. Regarding foreign exchange, the U.S. dollar has benefited from the tighter Fed policy and growing global growth concerns, and we believe this will continue.
Emerging Market Rate/ Foreign Currency	Emerging Markets Debt (EMD) took a turn in September following a rally from mid-July to mid-August. The corporate index within the EMD universe was once again the best performing. Rising U.S. Treasury yields directly hurt both hard currency indices further given their relatively long U.S. duration profiles.[2]	The macro environment remains quite challenging with hawkish monetary policy from most central banks, slowing global growth, a strong U.S. dollar, China slowing and the ongoing Russia/Ukraine war. We expect macro market events to continue to drive market sentiment. That said, valuations across the EMD universe seem to be pricing in these risks more aggressively than many other areas of global capital markets. We will watch the results of the 20th Party Congress carefully and expect President Xi to maintain his ultimate authority. We expect markets to place an emphasis on differentiation amongst countries and credits.

[1] Source: Bloomberg. Data as of September 30, 2022.

[2] Source: Bloomberg. Data as of September 30, 2022. EM corporates represented by The **JP Morgan CEMBI Broad Diversified Index**.

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	MONTHLY REVIEW	OUTLOOK
Corporate Credit	U.S. IG corporates outperformed Euro IG corporates. Generally, financials underperformed non-financials, BBBs underperformed higher-rated, and short-dated paper widened more than longer-dated. Market drivers in the month continued to be the macro, as markets reacted to actions and forward guidance of Central Banks in response to the elevated inflationary environment.[3] The tone in the high yield market continued to sour in September amidst growing concern over the forward path of monetary policy. Trading volume remained relatively light and investors tended to favor a move up-in-quality as economic concerns mounted. The higher quality segments of the high yield market generally outperformed. The top-performing sectors for the month were transportation, energy and electric utility.[4] Global convertibles fell with other risk assets in September. The Refinitiv Global Convertibles Focus Index ended the month down though outperforming both MSCI Global equities and the Bloomberg Global Credit index. Convertibles demonstrated good convexity in the past quarter as bonds reached their bond floors and exhibited more downside stability.[5] The senior floating-rate corporate loan market maintained its leadership position against the backdrop of volatile capital markets in September, outpacing the deeper losses broadly experienced in equity and fixed income markets at large. Loans were not immune to September's gloomier investor sentiment and flight-to-quality positioning, however.[6]	Looking forward, market valuations are pricing a very negative outcome for corporate downgrades and defaults. We view corporate fundamentals to be resilient and companies as having built liquidity in recent quarters and implemented cost efficiencies under the COVID-era. We expect margins to be pressured and top line revenue to be challenging but given the starting point we believe corporates will be able to manage a slowdown without significant downgrades or defaults (base case low default and mild recession). We remain cautious on the U.S. high yield market as we enter the fourth quarter. The health of corporate fundamentals should begin to decline amid slowing global growth. The current level of defaults and distress remain low albeit are rising. It will be important to reassess issuers and rebalance portfolios in light of the potential risks ahead, while at the same time positioning for solid performance through the credit cycle. We believe careful credit risk management is the best course to navigating this market.
Securitized Products	September was another difficult month, as interest rates rose sharply again, and both agency MBS spreads and securitized credit spreads widened further. Securitized portfolios outperformed most other sectors as their shorter durations lessened the mark-to-market impacts and higher cashflow carry also helped offset losses. Current coupon agency MBS spreads widened and the Bloomberg MBS Index return was negative. U.S. Non-agency RMBS spreads also widened in September, as distressed selling and increasing liquidity concerns weighed on the markets. U.S. ABS spreads were slightly wider in September, despite being supported by the lack of new issuance. U.S. CMBS widened too as fundamental credit conditions remain challenging. European securitized markets remain under pressure and European securitized spreads widened significantly over the month.[7]	Our fundamental securitized credit outlook remains positive. We believe securitized credit spreads now offer attractive risk premiums for risk. Credit spreads for many securitized sectors remain at levels last seen at the depths of the pandemic, but credit conditions appear materially better today than during that period.

[3] Source: Bloomberg Indices: U.S. Corporate Index and the European Aggregate Corporate Index. Data as of September 30, 2022.

[4] Source: J.P. Morgan and Bloomberg US Corporate High Yield Index. Data as of September 30, 2022.

[5] Source: Refinitiv Global Convertibles Focus Index. Data as of September 30, 2022.

[6] Source: S&P/LSTA Leveraged Loan Index. Data as of September 30, 2022.

[7] Source: Bloomberg, as of September 30, 2022.

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Risk Considerations

Diversification neither assures a profit nor guarantees against loss in a declining market.

There is no assurance that a portfolio will achieve its investment objective. Portfolios are subject to **market risk**, which is the possibility that the market values of securities owned by the portfolio will decline and that the value of portfolio shares may therefore be less than what you paid for them. Market values can change daily due to economic and other events (e.g. natural disasters, health crises, terrorism, conflicts and social unrest) that affect markets, countries, companies or governments. It is difficult to predict the timing, duration, and potential adverse effects (e.g. portfolio liquidity) of events. Accordingly, you can lose money investing in a portfolio. **Fixed-income securities** are subject to the ability of an issuer to make timely principal and interest payments (credit risk), changes in interest rates (interest rate risk), the creditworthiness of the issuer and general market liquidity (market risk). In a rising interest-rate environment, bond prices may fall and may result in periods of volatility and increased portfolio redemptions. In a declining interest-rate environment, the portfolio may generate less income. **Longer-term securities** may be more sensitive to interest rate changes. Certain **U.S. government securities** purchased by the strategy, such as those issued by Fannie Mae and Freddie Mac, are not backed by the full faith and credit of the U.S. It is possible that these issuers will not have the funds to meet their payment obligations in the future. **Public bank loans** are subject to liquidity risk and the credit risks of lower-rated securities. **High-yield securities (junk bonds)** are lower-rated securities that may have a higher degree of credit and liquidity risk. **Sovereign debt securities** are subject to default risk. **Mortgage- and asset-backed securities** are sensitive to early prepayment risk and a higher risk of default, and may be hard to value and difficult to sell (**liquidity risk**). They are also subject to credit, market and interest rate risks. The **currency market** is highly volatile. Prices in these markets are influenced by, among other things, changing supply and demand for a particular currency; trade; fiscal, money and domestic or foreign exchange control programs and policies; and changes in domestic and foreign interest rates. Investments in **foreign markets** entail special risks such as currency, political, economic and market risks. The risks of investing in **emerging market** countries are greater than the risks generally associated with foreign investments. **Derivative instruments** may disproportionately increase losses and have a significant impact on performance. They also may be subject to counterparty, liquidity, valuation, and correlation and market risks. **Restricted and illiquid securities** may be more difficult to sell and value than publicly traded securities (liquidity risk). Due to the possibility that prepayments will alter the cash flows on **collateralized mortgage obligations (CMOs)**, it is not possible to determine in advance their final maturity date or average life. In addition, if the collateral securing the CMOs or any third-party guarantees are insufficient to make payments, the portfolio could sustain a loss.

DEFINITIONS

Basis point: One basis point = 0.01%.

INDEX DEFINITIONS

The indexes shown in this report are not meant to depict the performance of any specific investment, and the indexes shown do not include any expenses, fees or sales charges, which would lower performance. The indexes shown are unmanaged and should not be considered an investment. It is not possible to invest directly in an index.

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The **Bloomberg Euro Aggregate Corporate Index (Bloomberg Euro IG Corporate)** is an index designed to reflect the performance of the euro-denominated investment-grade corporate bond market.

The **Bloomberg Global Aggregate Corporate Index** is the corporate component of the Bloomberg Global Aggregate index, which provides a broad-based measure of the global investment-grade fixed income markets.

The **Bloomberg US Corporate High Yield Index** measures the market of USD-denominated, non-investment grade, fixed-rate, taxable corporate bonds. Securities are classified as high yield if the middle rating of Moody’s, Fitch, and S&P is Ba1/BB+/BB+ or below. The index excludes emerging market debt.

The **Bloomberg US Corporate Index** is a broad-based benchmark that measures the investment grade, fixed-rate, taxable, corporate bond market.

The **Bloomberg US Mortgage Backed Securities (MBS) Index** tracks agency mortgage-backed pass-through securities (both fixed-rate and hybrid ARM) guaranteed by Ginnie Mae (GNMA), Fannie Mae (FNMA) and Freddie Mac (FHLMC). The index is constructed by grouping individual TBA-deliverable MBS pools into aggregates or generics based on program, coupon and vintage. Introduced in 1985, the GNMA, FHLMC and FNMA fixed-rate indexes for 30- and 15-year securities were backdated to January 1976, May 1977 and November 1982, respectively. In April 2007, agency hybrid adjustable-rate mortgage (ARM) pass-through securities were added to the index.

Consumer Price Index (CPI) is a measure that examines the weighted average of prices of a basket of consumer goods and services, such as transportation, food and medical care.

Euro vs. USD—Euro total return versus US dollar.

German 10YR bonds—Germany Benchmark 10-Year Datastream Government Index; **Japan 10YR government bonds**—Japan Benchmark 10-Year Datastream Government Index; and **10YR US Treasury**—US Benchmark 10-Year Datastream Government Index.

The **ICE BofAML European Currency High-Yield Constrained Index (ICE BofAML Euro HY constrained)** is designed to track the performance of euro- and British pound sterling-denominated below investment-grade corporate debt publicly issued in the eurobond, sterling

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The **ICE BofAML US Mortgage-Backed Securities (ICE BofAML US Mortgage Master) Index** tracks the performance of US dollar-denominated, fixed-rate and hybrid residential mortgage pass-through securities publicly issued by US agencies in the US domestic market.

The **ICE BofAML US High Yield Master II Constrained Index (ICE BofAML US High Yield)** is a market value-weighted index of all domestic and Yankee high-yield bonds, including deferred-interest bonds and payment-in-kind securities. Its securities have maturities of one year or more and a credit rating lower than BBB-/Baa3, but are not in default.

The **ISM Manufacturing Index** is based on surveys of more than 300 manufacturing firms by the Institute of Supply Management. The ISM Manufacturing Index monitors employment, production inventories, new orders and supplier deliveries. A composite diffusion index is created that monitors conditions in national manufacturing based on the data from these surveys.

Italy 10-Year Government Bonds—Italy Benchmark 10-Year Datastream Government Index.

The **JP Morgan CEMBI Broad Diversified Index** is a global, liquid corporate emerging markets benchmark that tracks US-denominated corporate bonds issued by emerging markets entities.

The **JPMorgan Government Bond Index**—emerging markets (**JPM local EM debt**) tracks local currency bonds issued by emerging market governments. The index is positioned as the investable benchmark that includes only those countries that are accessible by most of the international investor base (excludes China and India as of September 2013).

The **JPMorgan Government Bond Index Emerging Markets (JPM External EM Debt)** tracks local currency bonds issued by emerging market governments. The index is positioned as the investable benchmark that includes only those countries that are accessible by most of the international investor base (excludes China and India as of September 2013).

The **JP Morgan Emerging Markets Bond Index Global (EMBI Global)** tracks total returns for traded external debt instruments in the emerging markets and is an expanded version of the EMBI+. As with the EMBI+, the EMBI Global includes US dollar-denominated Brady bonds, loans and eurobonds with an outstanding face value of at least $500 million.

The **JP Morgan GBI-EM Global Diversified Index** is a market-capitalization weighted, liquid global benchmark for US-dollar corporate emerging market bonds representing Asia, Latin America, Europe and the Middle East/Africa.

JPY vs. USD—Japanese yen total return versus US dollar.

The **Markit ITraxx Europe Index** comprises 125 equally weighted credit default swaps on investment grade European corporate entities, distributed among 4 sub-indices: Financials (Senior & Subordinated), Non-Financials and HiVol.

The **Nikkei 225 Index (Japan Nikkei 225)** is a price-weighted index of Japan's top 225 blue-chip companies on the Tokyo Stock Exchange.

The **MSCI AC Asia ex-Japan Index (MSCI Asia ex-Japan)** captures large- and mid-cap representation across two of three developed markets countries (excluding Japan) and eight emerging markets countries in Asia.

The **MSCI All Country World Index (ACWI, MSCI global equities)** is a free float-adjusted market capitalization weighted index designed to measure the equity market performance of developed and emerging markets. The term "free float" represents the portion of shares outstanding that are deemed to be available for purchase in the public equity markets by investors. The performance of the Index is listed in US dollars and assumes reinvestment of net dividends.

MSCI Emerging Markets Index (MSCI emerging equities) captures large- and mid-cap representation across 23 emerging markets (EM) countries.

The **MSCI World Index (MSCI developed equities)** captures large and mid-cap representation across 23 developed market (DM) countries.

Purchasing Managers Index (PMI) is an indicator of the economic health of the manufacturing sector.

The **Refinitiv Convertible Global Focus USD Hedged Index** is a market weighted index with a minimum size for inclusion of $500 million (US), 200 million (Europe), 22 billion Yen, and $275 million (Other) of Convertible Bonds with an Equity Link.

The **Russell 2000® Index** is an index that measures the performance of the 2,000 smallest companies in the Russell 3000 Index.

The **S&P 500® Index (US S&P 500)** measures the performance of the large-cap segment of the US equities market, covering approximately 75 percent of the US equities market. The index includes 500 leading companies in leading industries of the US economy.

S&P CoreLogic Case-Shiller US National Home Price NSA Index seeks to measure the value of residential real estate in 20 major US metropolitan areas: Atlanta, Boston, Charlotte, Chicago, Cleveland, Dallas, Denver, Detroit, Las Vegas, Los Angeles, Miami, Minneapolis, New York, Phoenix, Portland, San Diego, San Francisco, Seattle, Tampa and Washington, D.C.

The **S&P/LSTA US Leveraged Loan 100 Index (S&P/LSTA Leveraged Loan Index)** is designed to reflect the performance of the largest facilities in the leveraged loan market.

The **S&P GSCI Copper Index (Copper)**, a sub-index of the S&P GSCI, provides investors with a reliable and publicly available benchmark for investment performance in the copper commodity market.

The **S&P GSCI Softs (GSCI soft commodities) Index** is a sub-index of the S&P GSCI that measures the performance of only the soft commodities, weighted on a world production basis. In 2012, the S&P GSCI Softs Index included the following commodities: coffee, sugar, cocoa and cotton.

Spain 10-Year Government Bonds—Spain Benchmark 10-Year Datastream Government Index.

The **Thomson Reuters Convertible Global Focus USD Hedged Index** is a market weighted index with a minimum size for inclusion of $500 million (US), 200 million euro (Europe), 22 billion yen, and $275 million (Other) of convertible bonds with an equity link.

U.K. 10YR government bonds—U.K. Benchmark 10-Year Datastream Government Index. For the following Datastream government bond indexes, benchmark indexes are based on single bonds. The bond chosen for each series is the most representative bond available for the given maturity band at each point in time. Benchmarks are selected according to the accepted conventions within each market. Generally, the benchmark bond is the latest issue within the given maturity band; consideration is also given to yield, liquidity, issue size and coupon.

The **US Dollar Index (DXY)** is an index of the value of the United States dollar relative to a basket of foreign currencies, often referred to as a basket of US trade partners' currencies.

The **Chicago Board Options Exchange (CBOE) Market Volatility (VIX) Index** shows the market's expectation of 30-day volatility.

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