

Global Fixed Income Bulletin

What Could Break the Calm in the Markets?

FIXED INCOME | GLOBAL FIXED INCOME TEAM | MACRO INSIGHT | AUGUST 2017

Summary

The era of extraordinarily accommodative monetary policy seems to be ending. The question is, how quickly and whether central banks can become a source of volatility rather than calm. The Jackson Hole conference taking place the third week of August may play an important role in disseminating changing views of how central banks will approach the normalization process. In addition, after four successive U.S. inflation misses, there seems to be a good chance that inflation is likely to surprise on the upside given stable to improving underlying economic conditions and call into question the benign rate path currently priced into the U.S. yield curve. Anticipating increased policy noise ahead, we are being selective in what we invest and will focus on opportunities, such as in emerging market (EM) and credit-sensitive securitized markets, where fundamentals, yields and spread levels provide some cushion against potential rises in rate volatility.

DEVELOPED MARKET (DM) RATE/FOREIGN CURRENCY (FX): Risk-free yields were relatively unchanged in July. U.S. 10-year yields fell 1 basis point, while Germany 10-year yields rose 8 basis points and European periphery spreads tightened on the back of improving European fundamentals.¹ The dollar continued to weaken. The Federal Open Market Committee (FOMC) mentioned at its July meeting that balance sheet normalization should start “relatively soon,” a possible indication for its commencement in September.

We believe higher U.S. Treasury yields will depend on higher U.S. inflation. If inflation improves, we believe that the U.S. Treasury 10-year yield may end the year close to 2.60 percent and the 2-year to 10-year yield curve will be near 80 basis points. We do expect the Fed to start reducing its balance sheet in September and hike rates in December. Of course, this is highly dependent on the economic data, particularly inflation.

EMERGING MARKET (EM) RATE/FX: EM fixed income asset returns were positive in the month with investment-grade assets outperforming high-yield, currencies generally strengthened versus the U.S. dollar, and corporates outperformed sovereigns within dollar-denominated debt.

Many EM central banks remained de-coupled from the rate-hike cycle in the U.S. as they continued cutting policy rates to support growth and inflation targets. EM assets should be able to weather Fed rate hikes if driven by increasing U.S. growth; however, assets remain vulnerable to spikes in U.S. policy uncertainty from undue Fed hawkishness, or Chinese policy tightening triggering a sharper-than-expected growth downturn.

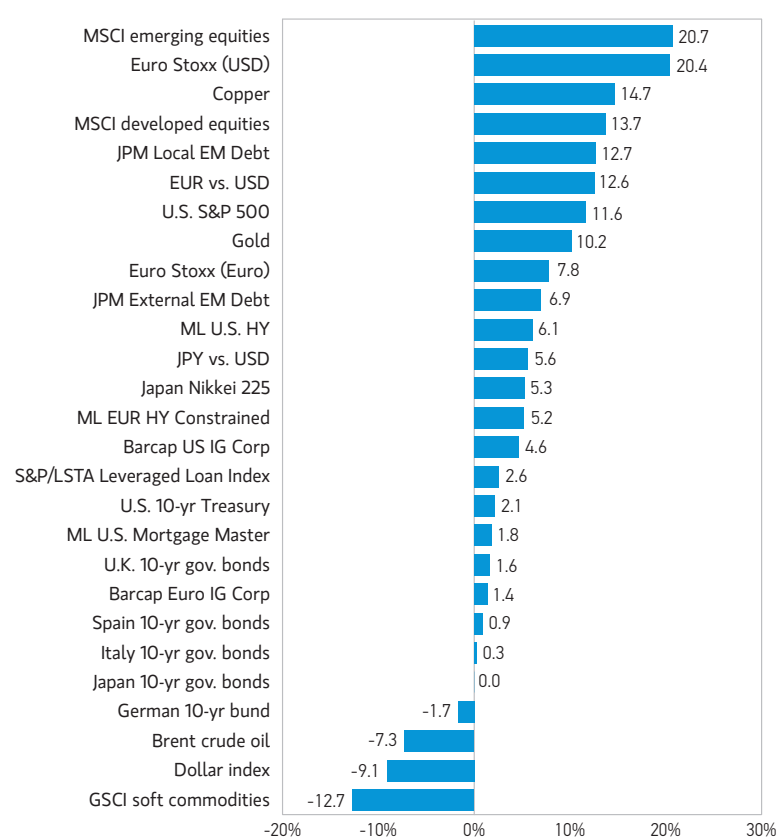
CREDIT: The United States investment-grade credit market enjoyed a quiet summer month, as index spreads continued to grind toward post-crisis lows. U.S. bank earnings were a focus early in July, with the money center and large brokers reporting revenues and earnings that generally beat expectations.

We are slightly more constructive on the U.S. market compared to the European market, mainly due to relative valuation. Given valuation levels, we do not expect a drastic move tighter in spreads; however, spreads are likely continue to grind tighter if the current environment persists.

¹ Source: Bloomberg. Data as of July 31, 2017.

SECURITIZED: Agency mortgage-backed securities (MBS) continued to perform in line with expectations in July. Non-agency MBS spreads widened slightly in the month, giving back some of the substantial gains of 2017, but cash flow and credit performance continued to improve. European MBS spreads were marginally tighter in July, and remain 30 to 60 basis points tighter in 2017.² Low interest rates and moderate signs of economic growth in Europe seem to be outweighing any material concerns over Brexit fallout.

Across most securitized markets, we have increased concerns about whether risk premiums (credit spreads) are sufficient compensation for even low fundamental risk levels at current valuations. Although we are less optimistic that spreads can continue to tighten meaningfully, we still maintain a credit bias in our portfolios given the broad strength of fundamental real estate and asset-backed conditions.

DISPLAY 1**Asset Performance Year-to-Date**

Note: U.S. dollar-based performance. Source: Thomson Reuters Datastream. Data as of July 31, 2017. 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 12 and 13 for index definitions.**

DISPLAY 2**Major Monthly Changes in 10-Year Yields and Spreads**

DM	RATES		CURRENCY
	LEVEL	CHANGE (BPS)	CHANGE (%)
United States	2.29	-1	
United Kingdom	1.23	-3	1.46
Germany	0.54	8	3.64
Japan	0.08	0	1.93
EM Spreads			
EM External	323	-4	
EM Local Yields	6		
EM Corporate	248	-6	
Credit Spreads			
U.S. IG	102	-7	
EUR IG	92	-10	
U.S. HY	352	-12	
EUR HY	248	-28	
Securitized Spreads			
Agency MBS	13	-6	
U.S. BBB CMBS	365	-11	

Source: Bloomberg, JP Morgan. Data as of July 31, 2017.

² Source: JP Morgan. Data as of July 31, 2017.

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Fixed Income Outlook

July was a benign month for markets overall and was almost volatility free. At July monetary meetings, the Fed and European Central Bank (ECB) followed their old scripts and indicated that any normalization would be very gradual. Steady monetary policy and continued improvements in fundamentals pushed risk markets higher. With corporates reporting healthy profits, equity performance continued to be strong throughout the period, particularly in the United States, where the S&P rose nearly 2 percent. The VIX hit all-time lows and spreads tightened. One notable loser was the dollar, which continued to weaken against major currencies as good growth in these economies drive their currencies higher.

Though July was uneventful, the era of extraordinarily accommodative monetary policy seems to be ending. The question is how quickly and whether central banks can become a source of volatility rather than calm. We think central bankers will use the Jackson Hole meeting in the third week of August, which in recent years has become the forum to communicate new policies and messages, to focus the markets' attention on likely changes to policy later in the year and into 2018.

Another catalyst for higher rates could come from inflation. After four successive U.S. inflation misses, the idea that the Fed will be extremely cautious and gradual with rate hikes has become the consensus. The market is pricing only around two and a half hikes from now until 2019. A "high" inflation shift would genuinely surprise markets, and call into question whether more hikes need to be priced. At the same time, we think inflation in the U.S. may have bottomed and could start to rise. Any lagged effects of deflationary pressures

from China and commodity prices should be lifting, which together with recent dollar weakness should boost import prices. If inflation surprises to the upside, the entire U.S. curve should reprice higher and flatten.

On the fiscal side, we think the lightening of regulatory burden is an underappreciated form of stimulus. Estimates from Congressional bills show that new regulation since 2003 have generated more than \$1 trillion in additional costs.³ Below the commotion of health care and tax legislation, federal agencies under President Donald Trump have been cutting the regulatory burden, either halting new regulation or loosening enforcement of existing ones. Since inauguration, the administration has passed the fewest number of regulations in any comparable period since 1994.⁴ The change in regulatory culture could be a significant, though less visible way to boost growth.

Given how much risky assets have rallied, supported by low rates, if rates were to rise due to more Fed tightening (or expectations thereof), assets with the biggest recent inflows and with the most stretched valuations look most vulnerable. For instance, investment-grade industrial spreads are near post-crisis lows, despite rising leverage. We prefer select EMs and credit-sensitive securitized markets. Securitized markets, in particular, have received relatively less inflows compared to other credit sectors. Carry in many local EM markets still look attractive given fundamentals and risk; real rate differential to DM is still 200 basis points off of post-crisis lows. Anticipating more policy noise ahead, we are more selective and will focus on opportunities where the yield and spread can provide a measure of protection against potential increases in rates and rate volatility.

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	MONTHLY REVIEW OUTLOOK

³ Source: American Action Forum, www.regrodeo.com. Data as of July 31, 2017.

⁴ Source: Politico. Data as of July 31, 2017

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Developed Market

Monthly Review

Risk-free yields were relatively unchanged in July. U.S. Treasury 10-year yields fell 1 basis point. Germany 10-year yields rose 8 basis points, while European periphery spreads tightened as a result of improving fundamentals in Europe.⁵ Portugal yields decreased by 15 basis points. Canadian yields increased by 30 basis points as the central bank hiked rates by 25 basis points in July.⁶

The dollar continued to weaken. European currencies outperformed, with Norwegian kroner, Hungarian forint and Swedish kroners among the top-performing currencies. The euro gained 3.6 percent versus the dollar. Oil rose from \$48 to \$52 per barrel in the month, which supported risk sentiment in the month.⁷

In the U.S., the Fed kept policy unchanged at the July meeting. The committee mentioned that balance sheet normalization should start “relatively soon,” a possible indication for its commencement in September. In terms of data, inflation weakened further in June, with headline Consumer Price Index (CPI) inflation down to 1.6 percent from 1.9 percent previously. However, Gross Domestic Product (GDP) rebounded from first-quarter weakness, with second-quarter growth at 2.6 percent quarter-on-quarter, above 1.2 percent previously.

In the eurozone, the ECB left policy unchanged at the July meeting. President Mario Draghi maintained that policy would remain in place until the outlook for inflation is firm. In June, inflation did strengthen, rising to 1.1 percent from 0.9 percent previously.

In the U.K., data was generally weaker in June. Wage growth decreased to 1.8 percent year-on-year, from 2.1

DISPLAY 3

Government Bond Yields for Major Economies

COUNTRY	10YR YIELD LEVEL (%)	MONTH CHANGE (BPS)	10YR SPREAD (BPS)	MONTH CHANGE (BPS)	2S - 10S YIELD CURVE (BPS)	MONTH CHANGE (BPS)
			(Spread over USTs)			
United States	2.29	● -1			95	2
United Kingdom	1.23	● -3	-106	● -2	96	6
Germany	0.54	● 8	-175	● 9	122	19
Japan	0.08	● 0	-221	● 1	20	-1
Australia	2.68	● 8	38	● 9	89	2
Canada	2.06	● 30	-24	● 30	74	8
New Zealand	2.98	● 0	69	● 1	89	17
Europe			(Spread over Bunds)			
Belgium	0.82	● 2	28	● -5	132	5
France	0.80	● -1	26	● -9	125	5
Germany	0.54	● 8			122	19
Greece	5.40	● -3	486	● -10	195	37
Ireland	0.84	● -6	30	● -14	129	7
Italy	2.09	● -6	155	● -14	229	3
Netherlands	0.66	● 0	11	● -8	130	8
Portugal	2.88	● -15	234	● -22	276	-13
Spain	1.50	● -4	96	● -12	182	2
Denmark	0.67	● -1	12	● -8	125	4
Norway	1.67	● 2	113	● -6	104	0
Sweden	0.74	● 8	20	● 0	141	13
Switzerland	0.05	● 7	-50	● -1	81	3

Source: Bloomberg, Data as of July 31, 2017.

percent year-on-year.⁸ Inflation also seems to be coming off of the highs, with headline at 2.6 percent year-on-year, down from 2.9 percent. Bank of England (BoE) Governor Mark Carney had commented that some removal of monetary stimulus may be necessary. However, Deputy Governor Ben Broadbent later mentioned that he is not ready to raise rates yet.

In Japan, the Bank of Japan (BoJ) kept policy unchanged at its July meeting. The BoJ pushed back plans to reach its 2 percent inflation target to 2019, from 2018.

Outlook

We believe higher U.S. Treasury yields will depend on higher U.S. inflation.

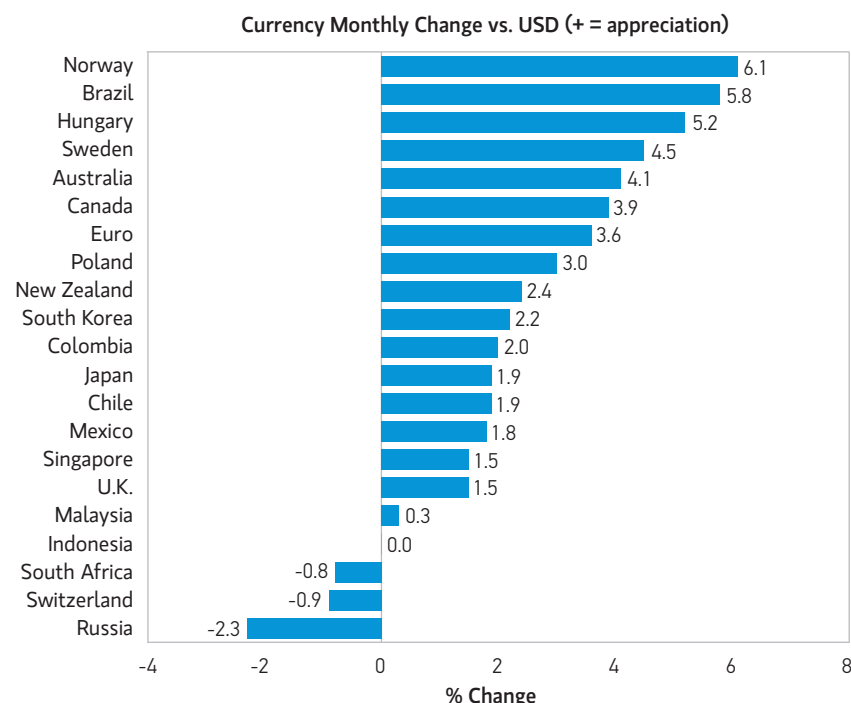
⁵ Source: Bloomberg. Data as of July 31, 2017.

⁶ Source: Bloomberg. Data as of July 31, 2017.

⁷ Source: Bloomberg. Data as of July 31, 2017.

⁸ Source: Bloomberg. Data as of July 31, 2017.

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DISPLAY 4**Currency Monthly Changes Versus U.S. Dollar**

Source: Bloomberg. Data as of July 31, 2017. Note: Positive change means appreciation of the currency against the U.S. dollar.

Until then, they are likely to remain in a range and the yield curve will continue to flatten. If inflation rises, we believe that U.S. Treasury 10-year yields may end the year close to 2.60 percent and the 2-year to 10-year yield curve will be near 80 basis points. We do expect the Fed to start reducing its balance sheet in September and hike rates in December. Of course, this is very dependent on economic data.

We believe the ECB as well as the performance of bunds hold the key to performance across global treasury markets. Our analysis indicates that bunds are leading while other global government markets are following. In 2H17 bunds will not only respond to economic conditions, but also to be a

pre-planned exit of quantitative easing (QE) and the prospect of less negative interest rates in 2018. As such, we believe bund yields will rise toward year-end and, as a result, are less favorable on U.S. and German duration.

Peripheral European bonds are likely to remain well bid and narrow in spread with Germany, provided that economic and political risks remain tame. In the U.K., we see opportunities to be underweight gilts as inflation expectations may continue to rise from prior weak currency effects.

In other DMs, we expect Japanese Government Bond (JGB) yields to remain low but talk of exiting yield curve control may push 10-year JGBs slightly above 0.10 percent. We believe being

overweight Australian government bonds is a good hedge to the risk of a deeper than expected slowing in China.

In terms of currencies, the U.S. dollar is likely to move sideways in the months ahead as growth around the world matches or exceeds that in the U.S. In many ways, the dollar, particularly against the euro, has fallen much farther than justified by relative rate or growth differentials. The unexpected strength in the euro has more to do with expectations of a dovish Fed and a hawkish ECB, expectations which could easily not be realized. Europe in general has been strengthening, and we are positive on euro-linked currencies such as Swedish kroner, Czech koruna and Polish zloty. EM currencies look interesting in a more robust global growth world and we think can outperform versus the U.S. and Australian dollars. However, for certain EM currencies, Trump's protectionist agenda will remain a source of volatility.

Emerging Markets

Monthly Review

EM fixed income asset returns were positive in the month, with investment-grade assets outperforming high-yield, currencies generally strengthening versus the U.S. dollar, and corporates outperforming sovereigns within dollar-denominated debt. After a slow start to the month investors increased exposure to EM fixed income, allocating \$4.2 billion across hard currency, local currency and blended strategies, bringing the year-to-date total to \$68.5 billion. There was a continuation of U.S. dollar weakness and euro strength, driven by perceptions of a more hawkish ECB and a less hawkish Fed, an (even) lower probability assigned to fiscal and tax reform (and thus, reflation) out of the U.S., and no material pick-up in hard U.S. economic data.

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DISPLAY 5

Major Economic Data Releases

COUNTRY			LATEST CONSENSUS PREVIOUS			AS OF
U.S.	Labor	Non-farm Payrolls (1000s)	222	178	152	6/30/2017
		Unemployment rate (%)	4.4	4.3	4.3	6/30/2017
		Participation rate (%)	62.8		62.7	6/30/2017
		Average Hourly Earnings (%YoY)	2.3		2.4	6/30/2017
	Activity	ISM Manufacturing	57.8	55.3	54.9	6/30/2017
		GDP (%QoQ, saar)	2.6	2.7	1.2	6/30/2017
		GDP (%YoY)	2.1		2	6/30/2017
		Inflation CPI (%YoY)	1.6	1.7	1.9	6/30/2017
		Core CPI (%YoY)	1.7	1.7	1.7	6/30/2017
Euro Area	Labor	Unemployment rate (%)	9.1	9.2	9.2	6/30/2017
	Activity	PMI Manufacturing	56.8	57	57	7/31/2017
		GDP (%QoQ)	0.5	0.5	0.6	3/31/2017
		GDP (%YoY)	1.9	1.7	1.9	3/31/2017
	Inflation	CPI (%YoY)	1.3	1.3	1.4	6/30/2017
		Core CPI (%YoY)	1.1	1.1	0.9	6/30/2017
U.K.	Labor	Unemployment rate (%)	4.5	4.6	4.6	5/31/2017
		Average Weekly Earnings (%)	1.8	1.8	2.1	5/31/2017
	Activity	PMI Manufacturing	54.3	56.3	56.3	6/30/2017
		GDP (%QoQ)	0.3	0.3	0.2	6/30/2017
		GDP (%YoY)	1.7	1.7	2	6/30/2017
	Inflation	CPI (%YoY)	2.6	2.9	2.9	6/30/2017
		Core CPI (%YoY)	2.4	2.6	2.6	6/30/2017
Japan	Activity	PMI Manufacturing	52.4		53	6/30/2017
		GDP (%QoQ, saar)	1	2.4	1.4	3/31/2017
		GDP (%YoY)	1.3		1.6	3/31/2017
	Inflation	CPI (%YoY)	0.4	0.4	0.4	6/30/2017
		Core CPI (ex food and energy, %YoY)	-0.2		-0.2	6/30/2017

Source: Bloomberg. Data as of July 31, 2017.

Better-than-expected economic data in China contributed to the rebound in prices for copper, iron ore and coal partly retracing year-to-date weakness, while gold prices continued to climb upwards. Many EM central banks remained de-coupled from the rate-hike cycle in the U.S. as they continued cutting policy rates to support growth and inflation targets. Despite political noise rising, volatility has not yet manifested in financial markets. Tensions on the Korean peninsula simmered as North Korea's government conducted missile tests and the U.S., South Korea and Japan worked to formulate a response. The U.S. Congress passed new sanctions aimed at Russia, which require the president's signature. The sanctions prompted the Russian government to order the expulsion of U.S. embassy staff as well as rebukes from European allies over the potential impact to their energy security and economic interests.

EXTERNAL: EM external sovereign and quasi-sovereign debt returned 0.66 percent in the month, bringing year-to-date performance to 6.90 percent, as measured by the JP Morgan EMBI Global Index.⁹ Higher-yielding, lower-rated credits underperformed lower-yielding, higher-rated credits in the month. With a rebound in commodity prices, energy exporting countries were some of the strongest outperformers in the month with the exception of Venezuela, whose bonds suffered for domestic reasons. Overall, bonds from Iraq, Mongolia, Trinidad and Tobago, Ecuador, Ivory Coast, Zambia, Dominican Republic, Azerbaijan, Ukraine and Nigeria outperformed the broader market, while those from Venezuela, Pakistan, Argentina, El Salvador, Bolivia and Lithuania lagged.

DOMESTIC: EM domestic debt returned 2.07 percent in the month, bringing year-to-date performance to 12.65

⁹ Source: JP Morgan. Data as of July 31, 2017.

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percent as measured by the JP Morgan GBI-EM Global Diversified Index.¹⁰ EM currencies strengthened 1.57 percent versus the U.S. dollar and EM bonds returned 0.51 percent in local terms.¹¹ Within the domestic debt universe, currency strength versus the U.S. dollar drove the outperformance of Brazil, Hungary, Czech Republic, Romania, Poland and Thailand. Conversely, bonds from Argentina, Russia, Indonesia, Philippines, Malaysia and Turkey lagged the broader market.

Local bond performance in Colombia was negative despite the central bank (Banrep) lowering the policy rate 25 basis points to 5.5 percent, in line with consensus expectations. The vote was split, with one board member hawkishly voting to leave the policy rate unchanged while the rest of the members voting for a cut of 25 basis points. CPI is expected to increase soon as the base effect from last year food's disinflation kicks in. As long year-over-year headline CPI continues to increase, Banrep will likely remain on hold as the ex-ante central bank's real rate is close to its neutral level. Even though activity would warrant a looser stance, a current account deficit to be financed by portfolio flows along with expansionary fiscal warrants caution. In India, July Purchasing Managers Index (PMI) data plunged at the steepest pace since the financial crisis, on the back of expected Goods and Service Tax (GST)-related disruption. While the weakness was across the board—contracting output, domestic new orders and input purchases—we expect such effects to be temporary.

CORPORATE: EM corporate debt returned 0.79 percent in the month, as measured by the JP Morgan CEMBI Broad Diversified Index.¹² Higher-yielding, lower-quality companies outperformed higher-rated companies in the month. From a regional perspective, companies in Africa (Nigeria), Latin

DISPLAY 6

EM External and Local Spread Changes

COUNTRY	USD SPREAD (BPS)	MTD CHANGE (BPS)	INDEX LOCAL YIELD (%)	MTD CHANGE (BPS)
Brazil	263	 -21	US IG	-68
Colombia	194	 -6	6.6	+31
Hungary	112	 -11	2.0	+9
Indonesia	182	 -13	7.2	+10
Malaysia	135	 +3	4.0	+5
Mexico	237	 -18	7.0	+3
Peru	152	 +7	5.6	-4
Philippines	93	 -2	4.8	+4
Poland	65	 +3	2.8	+3
Russia	181	 +5	7.8	+4
South Africa	272	 -7	9.3	-9
Turkey	280	 -13	10.5	+11
Venezuela	2977	 +513	-	-

Source: JP Morgan. Data as of July 31, 2017.

America (Brazil, Jamaica and Mexico), and Europe (Ukraine and Kazakhstan) led the market, while those from Asia (Macau, Singapore and Thailand) and the Middle East (Saudi Arabia, Bahrain and UAE) lagged. From a sector perspective, companies in metals and mining, infrastructure, pulp and paper, technology, media and telecom (TMT) and transport sectors outperformed the broader market, while those in the diversified, utilities, real estate and financial sectors lagged.

Outlook

From a fundamental perspective, EM economies, in aggregate, have continued to improve. The EM/DM growth differential appears to be recovering in favor of EM as the negative growth impacts from Brazil and Russia lessen.

China's growth slowdown is likely to continue in the medium term, with better-than-expected short-term growth likely to be challenged by policy-induced tightening in financial conditions. In the U.S., reflation hopes are now centered solely on the passage of fiscal reform, which if successfully executed, could be reflected in stronger U.S. growth in 2018. Volatility has remained low as investor concerns have been offset by global central bank liquidity, despite Fed rate hikes and talk of balance sheet reduction. This positive fundamental outlook could be threatened by a variety of factors including a sharp return of volatility, monetary policy missteps, or a flare-up in geopolitical tensions. However, a turn toward de-globalization, particularly stemming from the U.S., seems less likely as North American Free Trade

¹⁰ Source: JP Morgan. Data as of July 31, 2017.

¹¹ Source: JP Morgan. Data as of July 31, 2017.

¹² Source: JP Morgan. Data as of July 31, 2017.

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Agreement (NAFTA) repudiation fears have declined and renegotiation has become the preferred strategy.

We remain optimistic about the prospects for EM fixed income in the second half of 2017 as country fundamentals and the macro environment remain supportive, with those countries that rely most on global trade potentially challenged. The various factors both pushing and pulling investors into EM fixed income remain in place: DM yields remain very low, economic data in EM appears to be recovering, Fed rate hikes are likely to remain gradual, U.S. protectionist inclinations have diminished, and concerns of a sharp slowdown in China have eased. We believe that EM assets should be able to weather Fed rate hikes if driven by increasing U.S. growth and not inflation; however, assets remain vulnerable to spikes in U.S. policy uncertainty from undue Fed hawkishness, or Chinese policy tightening triggering a sharper-than-expected growth downturn.

Credit

Monthly Review

CORPORATE INVESTMENT-GRADE

The United States credit market enjoyed a quiet summer month, as indices continued to grind towards post-crisis lows. In investment grade, spread dispersion was rather low in July, but Financials slightly outperformed Industrials (driven by strong performance by subordinated bonds), while BBB-rated credits only slightly outperformed A-rated credits. Interestingly, a parallel shift tighter across ratings may indicate a broader reduction in liquidity premium, rather than an emphasis on credit and default risk. At the sector level, investment grade Energy and Auto credits performed well and continued to recover from earlier underperformance in the year. The Communications

space, particularly Telecoms, tightened but underperformed the broader market given continued M&A rumors and significant supply from a major telecom company.

The star performers of the U.S. credit market continue to be high-yield and convertible bonds, which were both supported by a strong rally in U.S. equities, and continue to be attractive asset classes in the relentless global hunt for yield. In July, lower-quality high-yield credits outperformed the broader market, reflective of the continued bullish tone in that market. The high-yield new issue market continued to be robust and well-supported, highlighting continued strong technicals and access to capital markets. As equities continued their steady rise that began last November, led by a return to global growth, convertibles continued their strong recovery in the performance of cyclical sectors. July saw positive returns from all major convertibles sectors; however, consumer discretionary and technology sectors outperformed the broader market. Convertible market supply is typically quiet in summer months, but the market did absorb some interesting new issues, including a \$1billion new issue in Asia.

July was uneventful on the macroeconomic news front. As a result, sector and idiosyncratic news stories captured the market's attention during the month. US bank earnings were a focus early in July, with the money center and large brokers reporting revenues and earnings that generally beat expectations. Earnings results were not as bad as anticipated, as the market feared that the recent lull in M&A activity and lower market volatility would more pervasively impact bank earnings. Net interest income was slightly disappointing, as the flattening of the yield curve has offset some of the benefits of recent rate hikes. Importantly from a creditor's perspective, asset quality remains very

healthy despite some normalization on the consumer side (particularly in autos and credit cards). The rise in home prices continues to support mortgage books while commercial lending continues to recover after last year's Energy weakness. Capitalization levels remain robust, but we believe that we should not expect them to improve further as we anticipate payout ratios will increase. This upsurge is a result of the recent stress test (CCAR) results, which have afforded banks permission by the Fed to increase payout ratios towards 100% after being 70-80% for the past several years.

The Communications sector remained topical in July. The sector has experienced heightened M&A activity and rumors in the past several months. In July, AT&T came to market to fund its planned acquisition of Time Warner Inc. The result was a \$22.5bn multi-tranche deal, the third largest U.S. corporate new issue in history, behind jumbo deals from Verizon and Anheuser-Busch InBev in recent years. Despite its large size and the near ubiquity of AT&T debt, the new issue was several times oversubscribed, and was another demonstration of the very strong technicals supporting the investment grade credit markets. We have become increasingly constructive on AT&T relative to Verizon and participated in the new issue where appropriate.

Like the United States, the European credit markets enjoyed another strong month across the credit spectrum, as the markets were supported by more evidence of a stronger European economy. The ECB stated that it was pleased to see deflation risks diminishing, but said that inflation was still below target. The markets took this as a sign that policy accommodation would only be removed at a gradual pace. We anticipate that the reduction in the ECB's bond buying program will probably be announced at the next meeting in September. Similar to the

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U.S., European Financials outperformed Industrials, and subordinated insurance bonds did particularly well; however, all credit sectors in Europe saw tighter spreads. The sector that saw the smallest rally was Autos, as the leading players in the German car industry were accused of possible collusion. At the end of the month, spreads in the Tobacco sector were wider as the FDA announced it is considering tightening regulation of the industry. While European high yield markets saw some weakness in the beginning of July, reflective of concerns surrounding potential removal of monetary stimulus by the European Central banks, a number of more dovish comments later in the month resulted in strong performance for the asset class. Interestingly, at the end of July, the European high yield market reported a new record low yield.

CORPORATE HIGH-YIELD

The U.S. high-yield market was firm again in July as it produced total returns of +1.11 percent.¹³ Over the course of the month, lower-quality high-yield credits outperformed the broader market, reflective of the broader bullish tone in credit markets. On a total return basis, the CCC-rated index returned +1.61 percent, while the BB-rated and B-rated indices returned +1.01 percent and +1.04 percent, respectively.¹⁴ Over the course of July, the high-yield market priced 11 new issues, for a total of \$11 billion in U.S. dollar-denominated debt.¹⁵

Global convertible bonds returned 77 basis points in July as both underlying components, global bonds and global stocks delivered positive returns.¹⁶ Equities continued their steady rise that began last November, led by a return to global growth, which has provided a particularly strong recovery in the performance of cyclical sectors. July saw

DISPLAY 7

Credit Sector Changes

SECTOR	USD SPREAD LEVEL (BPS)	MONTH CHANGE (BPS)	EUR SPREAD LEVEL (BPS)	MONTH CHANGE (BPS)
Index Level	102	-7	92	-10
Industrial Basic Industry	129	-10	83	-8
Industrial Capital Goods	80	-6	76	-8
Industrial Consumer Cyclical	96	-7	100	-2
Industrial Consumer Noncyclicals	87	-8	80	-9
Industrial Energy	136	-8	95	-9
Industrial Technology	84	-6	66	-13
Industrial Transportation	97	-5	82	-8
Industrial Communications	139	-2	98	-13
Industrial Other	90	+0	116	-8
Utility Electric	100	-9	85	-9
Utility Natural Gas	107	-9	89	-8
Utility Other	121	-8	93	-7
Financial Inst. Banking	91	-7	84	-10
Financial Inst. Brokerage	103	-6	92	-8
Financial Inst. Finance Companies	99	-3	81	-9
Financial Inst. Insurance	106	-6	162	-24
Financial Inst. REITS	124	-8	103	-7
Financial Inst. Other			123	-11

Source: Bloomberg Barclays. Data as of July 31, 2017. The indexes are provided for illustrative purposes only and are not meant to depict the performance of a specific investment.

positive returns from all major sectors; however, consumer discretionary and technology sectors outperformed the broader market. Convertible market supply is typically quiet in summer months, but the market did absorb some interesting new issues, including a \$1 billion new issue in Asia, where Shanghai Ports issued a bond that

converts into the Postal Savings Bank of China.

After a weak start to the month, European high-yield recovered in the second half, and ultimately closed out the month of July with strong returns. At the end of the month, the European high-yield market reported a new record low yield of 3.28 percent.¹⁷

¹³ Source: Bloomberg Barclays. Data as of July 31, 2017.

¹⁴ Source: Bloomberg Barclays. Data as of July 31, 2017.

¹⁵ Source: Bloomberg Barclays. Data as of July 31, 2017.

¹⁶ Source: Bloomberg Barclays. Data as of July 31, 2017.

¹⁷ Source: Bloomberg Barclays. Data as of July 31, 2017.

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The index generated an excess return of 0.78 percent and a total return of 0.63 percent, bringing year-to-date total returns to 4.54 percent.¹⁸ The weakness early in the month reflected market concerns surrounding potential removal of monetary stimulus by the European central banks after comments made by President Draghi at the ECB conference in Sintra, Portugal, at the end of June. After a number of more dovish comments from members of the central bank, we saw markets take a more benign view on future policy. This combined with some very strong economic releases during the month, resulted in the market's strong returns.

Outlook

We entered 2017 expecting an investment-grade corporate bond market characterized by competing tensions between fundamentals, valuation and technicals. Beneath the surface, we saw divergences between these factors across financials and nonfinancials and between the U.S. and Europe. Now, at the midpoint of the year, many of these tensions remain the same. As we weigh and sum them, we find ourselves still constructive on the investment-grade corporate market, with somewhat better (or at least not worse) fundamentals, but facing somewhat more expensive valuations. After being very constructive, we are now modestly constructive.

Overall, we are slightly more constructive on the U.S. market compared to the euro market. This is mostly due to relative valuation. In terms of fundamentals, U.S. banking and other financials remain very strong with high capital levels and improving profitability. We have been concerned about the pace of leveraging of U.S. industrials, though this trend has

ameliorated in 2017 due to a pause in M&A and share buybacks combined with improving corporate earnings.

In Europe, the debt-equity cycle is much less advanced and the pressure on leverage is much lower. At a macro-level, the election of President Emmanuel Macron in France removes the risk of an anti-European Union project government. Macron was elected on a platform promising structural reform (particularly labor reform) which is pro-growth and viewed as a market positive.

In summary, while spreads are trading inside long-term median levels, we remain cautiously optimistic about investment-grade credit. Technicals remain supportive and fundamentals do not seem to be deteriorating further, though they remain stretched for many nonfinancials. Financial fundamentals remain strong and continue to improve.

Our broad views of the market remain largely unchanged as we head into August. While spreads are trading inside of long-term medians, we expect them to continue to grind tighter. U.S. technicals are generally supportive but remain tested by high FX hedging costs, which have the potential to discourage European and Asian investors from tapping the U.S. markets. Fundamentals, while stretched for many nonfinancials, do not seem to be deteriorating further and remain strong for financials. We want to remain long risk and carry to profit in an environment of continued tightening or range bound spreads, but have continued to de-risk portfolios to reflect tighter valuations and more balanced upside/downside. We continue to seek opportunities in high-yield or convertible bonds, where appropriate, which are sectors that tend to perform better in latter stages of the business cycle.

Securitized Products

Monthly Review

Agency MBS continued to perform in-line with expectations in July, while credit-related securitized assets continued their 2017 outperformance. Nominal spreads on current coupon agency MBS tightened 2 basis points in July to 91 basis points above interpolated treasuries, while the option-adjusted spreads (OAS) tightened 6 basis points to 13 basis points above interpolated treasuries as volatility and prepayment concerns declined.¹⁹ The Bloomberg Barclays Capital U.S. MBS Index finished up 0.46 percent in July, and is up 1.80 percent through the first seven months of 2017.²⁰ The Fed purchased approximately \$25 billion agency MBS in July in order to maintain their agency MBS portfolio at \$1.75 trillion. However, the FOMC statement from the July meeting suggested that the Fed could begin to taper its MBS reinvestments "relatively soon." The Fed purchased almost \$400 billion agency residential mortgage-backed securities (RMBS) in 2016, and are on pace for over \$300 billion in 2017, but we believe that ending or slowing this reinvestment could have a significant negative impact on agency MBS.²¹

Non-agency MBS spreads widened slightly in July, giving back some of the substantial gains of 2017, but cash flow and credit performance continued to improve. Fundamental U.S. housing market and mortgage market conditions remain positive. National home prices were up 1.0 percent in May, and are up 5.6 percent over the past year.²² Home prices are up 42 percent nationally from the lows in 2012, and have now surpassed pre-crisis peak levels from July 2006 to set new highs. Mortgage

¹⁸ Source: Bloomberg Barclay's. Data as of July 31, 2017.

¹⁹ Source: Yield Book. Data as of July 31, 2017.

²⁰ Source: Barclays. Data as of July 31, 2017.










²¹ Source: Federal Reserve Bank of New York. Data as of July 31, 2017.

²² Source: S&P Case-Shiller U.S. National Home Price Index. Data as of July 31, 2017.

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DISPLAY 8

Key Data for Non-Agency MBS

		LATEST	PREVIOUS	UNIT	CHANGE OVER 1 YEAR	UNIT	AS OF
Prices	National Home Prices	 0.21	0.29	% MoM	 5.6	% YoY	5/31/2017
	Existing Home Sales	 5.5	5.62	MM homes			6/30/2017
	Existing Home Sales	 -1.8	1.1	% MoM	 0.7	% YoY	6/30/2017
Inventory	Housing Inventory	 -0.5		% MoM	 -7.1	% YoY	
	Housing Inventory (months supply)	 4.3	4.2	Months supply	4.6	Level last yr	6/30/2017
Defaults	New Defaults	 0.60	0.64	% annualized	0.65	Level last yr	6/1/2017

Source: Bloomberg. Data as of Jul 31, 2017.

performance also remains strong. New defaults declined to a 0.60 percent annual rate in June, down from the 0.64 percent level in May 2017 and at the lowest levels over the past 10 years.²³ With unemployment low, the economy slowly improving and homes remaining generally affordable at current mortgage rates, we expect mortgage credit performance to continue to improve.

Commercial mortgage-backed securities (CMBS) performance continues to diverge depending on different collateral compositions. Since the beginning of the year, spreads on CMBX 6 BBB- (2012 vintage), which has 35 percent retail exposure, are wider by 148 basis points, while spreads on CMBX 9 BBB- (2015 vintage), which has only 26 percent retail exposure, are tighter by 18 basis points.²⁴ The increasing announcements of retail store closings and poor retail earnings are

causing credit concerns for many retail properties. Non-agency CMBS issuance totaled just over \$6 billion in July, roughly on average pace for the year, and lifting the 2017 year-to-date total to \$42 billion for the seven months of 2017.²⁵ We expect non-agency CMBS issuance to slow slightly in the second half of the year, and still expect roughly \$50-60 billion in total new issuance volumes for all of 2017.

Fundamentally, CMBS performance remains on reasonably solid ground, although there are some areas of concern. Commercial real estate prices fell 0.2 percent in June, and are now down 0.9 percent in 2017, but prices are still essentially flat over the past 12 months. After several years of 10+ percent annual increases, commercial real estate prices have flattened over the past year, but we do not expect price

changes to turn materially negative given the continued strength of the U.S. economy. Mall vacancy rates inched up 0.2 percent to 8.1 percent during the second quarter of 2017, and the leasing of vacant retail space fell to the lowest rate since 2011 during the quarter.²⁶ Although retail-oriented CMBS has been hardest hit, non-agency CMBS more broadly has been one of the worst-performing credit sectors over the last couple years, lagging most of the tightening seen in other credit sectors. While we do see some signs of concern, overall we believe CMBS represents one of the more attractive credit sectors from a relative value perspective.

European MBS spreads were marginally tighter in July, and remain 30 to 60 basis points tighter in 2017.²⁷ Low-interest rates and moderate signs of economic growth in Europe seem to be outweighing any material concerns over Brexit fallout. The ECB resumed asset-backed securities (ABS) purchases in June, after two months of portfolio declines, purchasing €0.5 billion. The ECB held €24.1 billion of European ABS at the end of June 2017.²⁸ We expect securitized issuance to remain relatively light in 2017 given regulatory constraints.

Outlook

After the significant tightening of credit spreads over the past year, we are becoming more cautious on credit-sensitive securitized assets. While we believe that real estate and consumer credit conditions remain positive, credit spreads in many securitized sectors have tightened to levels not seen since before the financial crisis. Across most securitized markets, with the exception of a few subsectors of the CMBS market, we do not foresee any significant near-term credit concerns,

²³ Source: S&P Experian First Mortgage Default Index. Data as of July 31, 2017.

²⁴ Source: Markit. Data as of July 31, 2017.

²⁵ Source: Bank America. Data as of July 31, 2017.

²⁶ Source: REIS Inc. Data as of July 31, 2017.

²⁷ Source: JP Morgan. Data as of July 31, 2017.

²⁸ Source: European Central Bank. Data as of July 31, 2017.

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but we have concerns about whether risk premiums (credit spreads) are sufficient compensation for even low fundamental risk levels at current valuations in many sectors. We continue to see a number of idiosyncratic credit opportunities that offer attractive value, but more broadly, we are finding credit-oriented securitized products to be relatively expensive versus historical levels.

Although we are reducing our heretofore positive credit outlook, we still maintain a credit bias given the broad strength of fundamental real estate and asset-backed conditions. Mortgage rates remain close to historical levels, which support affordability and debt service coverage for both residential and commercial borrowers. Despite the recovery of home prices over the past several years, homes remain historically affordable on a national level when comparing median incomes to the cost of owning a median-priced home at current mortgage rates. Consumer spending has been slowly increasing, benefiting many sectors of commercial real estate, although traditional shopping malls continue to suffer from store closings as many national retailers face increasing competition from on-line shopping. For U.S. credit-oriented securitized products, we continue to favor legacy non-agency RMBS, seasoned non-retail CMBS and nontraditional U.S. ABS.

We also remain cautious on agency MBS. While the relative value of agency MBS has improved given its

recent underperformance versus other securitized assets, agency MBS remains expensive by historical comparison and potentially faces significant supply headwinds as the Fed begins to slow its agency MBS reinvestments and let its \$1.75 trillion portfolio run off. The Fed has been the largest buyer of agency MBS over the past eight years, and net market float of agency MBS should increase as the Fed slows its purchases. We believe agency MBS spreads—which are near the tightest levels over the past 10 years on a nominal spread basis for current coupon MBS—could widen to more historically normal levels as the Fed slows its purchases.

Within agency MBS, we still favor higher coupon 30-year MBS over lower coupon 30-year MBS and over 15-year MBS. Higher coupon 30-year MBS offer greater duration-adjusted and option-adjusted carry, and are poised to outperform in a stable or marginally rising interest rate environment. We are more favorable on to be announced (TBA) MBS exposure relative to specified pools, as TBA rolls are currently offering better carry than most specified pools, now that cash backing TBA positions are generating higher returns. We are less favorable on agency collateralized mortgage obligations (CMO), as most interest-only securities (IOs) do not appear to offer compelling risk-adjusted returns at current prices.

We remain positive on European securitized credit opportunities. The ECB and BoE continue to provide

accommodative interest rate policies which are beneficial to residential and commercial real estate values and consumer balance sheets. Home prices have been steadily improving across Europe over the last couple of years, buoyed by historically low mortgage rates and the improving economies. We remain cautious on recently originated U.K. residential loans and London-based commercial real estate properties, due to Brexit concerns, but we still like very seasoned (10-years or more) U.K. RMBS, which have benefited from significant home price appreciation over the past 10 years and from the proven reliability of the remaining borrowers in the trusts, who have demonstrated their ability to continue making payments over the last 10 years and during difficult economic times.

We also find attractive relative value in seasoned peripheral RMBS, which are benefiting from rising home prices, and attractive value in non-U.K. CMBS, which are generally performing well as the European economies strengthen—and which could selectively benefit from potential Brexit-related relocation of London financial personnel. Overall, European new securitized issuance remains light, largely constrained by new securitization requirements and more onerous accounting treatment for securitized assets, but we continue to see a number of attractive secondary market securitized opportunities.

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The **National Association of Realtors Home Affordability Index** compares the median income to the cost of the median home.

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

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.

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 U.S. dollar-denominated Brady bonds, loans and eurobonds with an outstanding face value of at least \$500 million.

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

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

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.

The **Bloomberg Barclays U.S. 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.

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 **U.S. 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 U.S. trade partners' currencies.

Italy 10YR govt bonds — Italy Benchmark 10-Year Datastream Government Index.

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

Spain 10YR govt bonds — Spain Benchmark 10-Year Datastream Government Index.

The **BofA Merrill Lynch European Currency High-Yield Constrained Index (ML 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 domestic or euro domestic markets by issuers around the world.

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

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).

U.K. 10YR govt 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.

German 10YR bonds — Germany Benchmark 10-Year Datastream Government Index; **Japan 10YR govt bonds** — Japan Benchmark 10-Year Datastream Government Index; and **10YR U.S. Treasury** — U.S. Benchmark 10-Year Datastream Government Index.

The **BofA Merrill Lynch U.S. Mortgage-Backed Securities (ML U.S. Mortgage Master) Index** tracks the performance of U.S. dollar denominated, fixed-rate and hybrid residential mortgage pass-through securities publicly issued by U.S. agencies in the U.S. domestic market.

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

The **Bloomberg Barclays U.S. Corporate Index (Barclays U.S. IG Corp)** is a broad-based benchmark that measures the investment-grade, fixed-rate, taxable, corporate bond market.

The **Bank of America Merrill Lynch United States High Yield Master II Constrained Index (Merrill Lynch U.S. 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.

JPY vs. USD — Japanese Yen total return versus USD.

Euro vs. USD — Euro total return versus USD.

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

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 **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.

The **Dow Jones Commodity Index Gold (Gold)** is designed to track the gold market through futures contracts.

The **JPMorgan Government Bond Index** — Emerging Markets (JPM local EM debt) tracks local currency bonds issued by Emerging

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The ICE Brent Crude futures contract (**Brent crude oil**) is a deliverable contract based on EFP delivery with an option to cash settle.

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.

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