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Global macro strategy

An explanation of the recent monetary acceleration in the US

Measured on a year-on-year percent change basis, M2 and M3 growth have both been accelerating in the US since late 2018. There are two main reasons why broad money growth acceleration has occurred, and in this article, we explain how both factors have contributed. The first factor has to do with the banking sector and its responses to changes in financial regulation and US Treasury funding strategy, whereas the second factor is associated with the so-called shadow banking sector, which has for a long time been relatively dormant.

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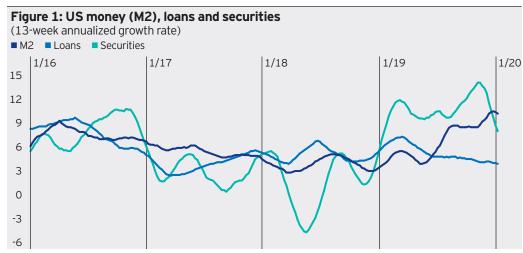
1. Changes in regulations and US Treasury funding policy

Recent changes in bank regulations in the past few years require banks to hold much more liquid portfolios than before the global financial crisis (GFC). Banks now need to hold a certain amount of High-Quality Liquid Assets (HQLAs) on their balance sheets (as assets) in order to meet short-term liabilities without resorting to money market borrowing. More specifically, Basel III requires banks to hold sufficient HQLAs to satisfy up to 30 days of net cash flows, formally called the Liquidity Coverage Ratio (LCR). HQLAs are classified into three distinct levels, which correspond to how liquid the assets are on banks' balance sheets. Level 1 HQLAs comprise primarily cash assets of banks at the US Federal Reserve (Fed), which were greatly expanded during the three programs of quantitative easing (QE) following the GFC. Level 2A and 2B assets consist primarily of short-dated US Treasury securities and debt securities issued by investment-grade corporates. However, these are considered less liquid and are subject to haircuts when used as collateral for borrowing from the US Federal Reserve (Fed), hence banks' preference for cash deposits at the Fed.

There are three factors that have contributed to a reduction of banks' holdings of HQLA. First, excess reserves, which are a liability of the Fed, declined as a result of the Fed shrinking its balance sheet between October 2017 and September 2019 (when it ceased to roll over its holdings of Treasury securities and mortgage-backed securities – sometimes called quantitative tightening, or QT). In addition, the steady increase in currency issuance has further eroded the reserves of commercial banks at the Fed. Third, and more recently, ahead of any possible problems with the debt ceiling, the US Treasury decided to rebuild its deposit balances from around USD130 billion in August to USD400 billion, draining USD270 billion from banks' reserves.¹ Together, these three factors have caused the HQLA ratio of commercial banks to fall from over 30% in 2014 to around 25% at the start of 2019, and 24% in recent months.²

In response to this, and to rebuild their HQLA levels, commercial banks increased purchases of short-dated Treasury securities (T-bills). This was facilitated by the USD1 trillion fiscal deficit in the US owing to the Trump administration tax cuts, and a Treasury decision in late 2018 to fund much more of it in the short-term markets. For the banks, this was manna from heaven!

When banks make loans, they credit the account of the borrower; similarly, when banks buy securities, they credit the deposit account of the seller or issuer, again creating new money in the process. The chart below shows the growth of M2 together with the growth of the two main corresponding assets of US commercial banks: loans and holdings of securities.



Source: Macrobond, US Federal Reserve, data from Jan. 4, 2016 to Jan. 13, 2020.

The light blue line shows the growth of commercial bank loans, which have grown at modest rates of 3-6% per annum since 2017. The turquoise line shows growth of commercial banks' securities, which increased significantly in 2019, and pushed up M2 growth from around 4% to around 8% per annum. The main point to remember is that when banks increase their assets, either by writing loans or purchasing securities, the liabilities of banks increase and therefore the broad money supply increases.

2. An upturn in shadow banking activity

Now let us consider what is happening in the shadow banking sector. Shadow banks are non-depository financial corporations that facilitate credit supply, and some of their liabilities are important components of the broad money supply (M3). Recently, there have been two shadow bank instruments that have increased significantly: money market fund shares and repurchase agreements (repos).

Previously there was widely reckoned to be a shortage of collateral in the US. With the surge in the federal deficit and the Treasury issuing many more T-bills, collateral for doing repos has become much more readily available. By their nature, money market funds primarily invest in short-dated Treasury securities and repos.

The graph below shows both M2 and our M3 proxy, which is constructed by adding large time deposits, institutional money market funds and repos to M2.



Source: Macrobond, US Federal Reserve, Federal Reserve Bank of New York, data from Jan. 3, 2000 to Jan. 13, 2020.

It is clear that growth in M2 and M3 increased in 2019, with M3 broad money growth slightly under 10% over the past year. This is the highest rate of broad money (M3) growth in the years following the GFC.

Separately, in September the Fed miscalculated the amount of reserves that banks and primary dealers would need to keep overnight rates at the federal funds target rate, so when a quarterly corporate tax payment due on Sept. 15 coincided with the settlement date for a large issue of Treasury securities, repo rates spiked. To keep overnight rates in line with the target, the Fed has supplied more cash to the market on a daily or short-term basis (see more about these measures in the Q&A at the end of this report). These short-term injections of funds do not in themselves add to the money supply but are aimed at keeping repo rates in line with the federal funds target. Nevertheless, the Fed's three rate cuts along with the greater availability of money market funds to supply cash to primary dealers via repo is another factor easing financial conditions.

John Greenwood, Chief Economist, Adam Burton, Assistant Economist

¹ Source: US Federal Reserve, as of Aug. 20, 2019.

² Source: US Federal Reserve, as of Dec. 31, 2014, Jan. 31 2019 and Nov. 31, 2019.

Global macro strategy (continued) Interest rate outlook

US: Underweight. US interest rates currently offer a poor risk-reward trade-off, in our view. Factors that have driven risk aversion over the past several months have shown signs of improving: global trade tensions appear to be heading toward resolution and the chances of a hard Brexit have declined. While the impact of the coronavirus presents a risk, global growth is improving. Improved global growth combined with easier US financial conditions should pave the way for higher longer-term interest rates in the next several months. However, we do not expect sharp increases in interest rates until inflation conditions improve, which we believe is unlikely in the medium term.

Europe: Neutral. This year started with a bid to core government bonds on the back of an unexpected rise in geopolitical tensions between the US and Iran. The moves have since retraced as tensions diminished. In the eurozone, recent data suggest that the economy may be bottoming out, despite few signs of a rebound in the manufacturing sector. We expect an accommodative European Central Bank (ECB) to remain on hold in 2020 with a high hurdle to either hike or cut rates as it conducts its strategic policy review.

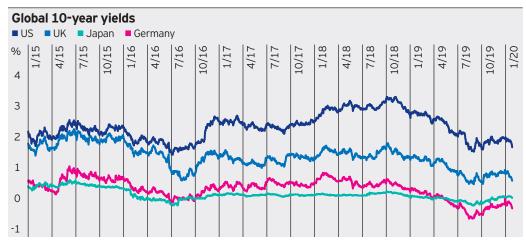
China: Neutral. The coronavirus outbreak could negatively impact market risk sentiment, potentially leading to rates market outperformance in the near term. However, in the medium term, Chinese policy makers continue to bolster economic growth with fiscal measures and risk sentiment could recover, which could impact rates market supply-demand dynamics. Chinese onshore government bonds continue to provide a yield pick-up versus major developed market bonds, such as US, German and Japanese bonds. Their attractiveness could be further helped by stabilization of the renminbi against the US dollar and major bond index inclusions in 2020.

Japan: Neutral. Shorter-term (under 10-years) Japanese government bond (JGB) yields have risen over the last month. However, with 10-year yields now around zero, the upside for yields going forward is probably limited. In contrast, longer-term yields have remained rangebound since their September spike, due to domestic demand. The resulting bull flattening of the yield curve has narrowed the spread between 10-year and 20-year yields to its lowest level since 2016, when quantitative easing (QE) purchases were far higher and were expected to rise. It appears unlikely that the JGB curve will flatten significantly from here, as carry improves in the short end and there is an increased likelihood that the Bank of Japan (BoJ) leans against the move by cutting long-end QE operations, as it did in September.

UK: Underweight. The Conservative party's decisive election victory reduces the probability of near-term Bank of England (BoE) rate cuts and increases the probability of a near-term bounce in growth, as uncertainty declines. Both are supportive of higher yields, in our view, particularly in the context of reduced global uncertainty.

Canada: Overweight. The Bank of Canada (BoC) finally acknowledged concerns (that we share) about a weakening outlook for consumer spending. As current policy no longer appears appropriate, we are anticipating a rate cut in the first half of 2020. A new central bank governor has yet to be named to replace current President Stephen Poloz at midyear, but the policy transition should not change our outlook for lower rates in Canada and outperformance of Canadian fixed income.

Australia: Overweight. Australian 10-year bonds have sold off since the Reserve Bank of Australia's (RBA) Dec. meeting, underperforming US Treasuries. In the context of weak domestic data and increased downside risk from the bush fires, Australian bonds now look cheap, in our view, especially on a cross-market basis, with the RBA more likely to cut rates than the Fed.



Source: Bloomberg L.P., data from Jan. 2, 2015 to Jan. 27, 2020. Past performance is not indicative of future results.

Rob Waldner, Chief Strategist and Head of Macro Research, James Ong, Director-Derivative Portfolio Management, Noelle Corum, Associate Portfolio Manager, Reine Bitar, Portfolio Manager, Yi Hu, Head of Asia Credit Research, Michael Siviter, Senior Fixed Income Portfolio Manager, Avi Hooper, Portfolio Manager, Scott Case, Portfolio Manager

Currency outlook

USD: Underweight. Three main factors have caused us to downgrade the US dollar to underweight: global growth is improving (good global growth has historically been negative for the US dollar); the Fed has telegraphed that it is on hold, despite better growth data; and other factors that have caused global risk aversion, such as trade tensions and Brexit uncertainty, have improved. We expect these conditions to lead to US dollar depreciation against most currencies in the near term.

EUR: Neutral. We expect eurozone growth to stabilize around current below-trend levels of around 1% and the ECB to remain accommodative in the near term. Political uncertainty and weak economic data, and the negative cost of carry, should keep the euro range-bound versus the US dollar in the near term.

RMB: Neutral. The renminbi has appreciated against the US dollar in recent weeks, driven by a softer US dollar and details on the Phase 1 deal between China and the US. In the near term, the outbreak of the coronavirus could impact risk sentiment, including the performance of the renminbi, which may hover around 6.90. In the medium term, rising allocations to China's assets, including equities and bonds, could support the renminbi's performance, sending the renminbi/US dollar exchange rate to around 6.70-6.80.

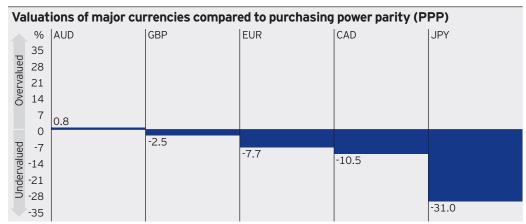
JPY: Overweight. The yen briefly benefited from risk aversion associated with US-Iran tensions but quickly gave up gains, largely due to resilient risk assets and continued capital outflows out of Japan. Nevertheless, at current levels, we believe the yen offers an attractive hedge to weaker global growth and increased market volatility. The collapse in currency volatility makes expressing yen longs via options particularly attractive, in our view.

GBP: Overweight. The Conservative Party's decisive election victory ensures that the UK will leave the European Union (EU) on the basis of the Withdrawal Agreement negotiated by PM Boris Johnson in October. Although the end-state of UK-EU relations is still undefined, and Johnson has committed to a relatively "hard" form of Brexit and not to extend the transition beyond 2020, the balance of risk appears toward a softening of Johnson's stance rather than a hardening. The Government will likely want to avoid making Brexit a front-page issue, as it has campaigned on "getting Brexit done". A No Deal end to the transition would likely also harm newly converted Conservative voters in the North and Midlands, where much of the UK's manufacturing is located, and could further antagonize Scottish voters, who are increasingly supportive of independence ahead of the 2021 Scottish elections.

Sterling has rallied sharply over the past five months and now sits at its post-2016 tradeweighted high. We believe further upside will be dependent on the growth dividend from post-election certainty and the tone of negotiations with the EU regarding a free trade agreement.

CAD: Neutral. Canadian assets remain in demand by global investors. We expect capital and portfolio inflows to support the currency, despite interest rate cuts by the BoC. The stabilization of global trade tensions should lead to improved export performance, while a weaker domestic economy will likely weaken imports. We expect an improving external balance to provide additional currency support.

AUD: Neutral. Historically, the Australian dollar has been more sensitive to global risk sentiment and commodity prices than domestic developments. Consequently, as global factors have become supportive, further RBA cuts are likely to have only a minor downside impact on the Australian dollar in the near term. This is especially the case given the country's supportive external balances and the prevalence of short market positioning.



Source: Bloomberg L.P., data as of Jan. 27, 2020.

Rob Waldner, Chief Strategist and Head of Macro Research, James Ong, Director Derivative Portfolio Management, Noelle Corum, Associate Portfolio Manager, Michael Siviter, Senior Portfolio Manager, Yi Hu, Head of Asia Credit Research, Avi Hooper, Portfolio Manager, Scott Case, Portfolio Manager This section highlights the key themes driving Invesco Fixed Income's global credit research process and views. Themes are updated based on evolving trends and expectations.

Global investment themes Global credit themes

Asset class themes

Investment grade (IG): Easy financial conditions and trade resolution are supportive but earnings outlook mixed; lower net supply is positive

Rationale

We expect US corporate credit fundamentals to improve across most sectors in the coming year. Although 2019 operating results were pressured by the first-half 2019 government shutdown, extended trade policy uncertainty and a stronger US dollar, earnings growth is still positive. Operating margins remain around historical highs, which supports improved free cash flow metrics. In addition, we are seeing pressure from shareholders to decrease leverage through management incentives.

Macro headline risk is declining as the Phase I trade agreement was recently signed. The ultimate scope and timing of more meaningful US-China trade negotiations remains in question, but progress is visible. Policymakers on both sides have adopted more accommodative measures aimed at supporting economic activity that have dampened the negative effects on fundamentals. The recent spread of the Coronavirus in China is raising another global risk, although we believe the impact of this will likely be transitory.

Market technicals remain supportive as net issuance is expected to be modest in 2020, while demand remains positive. However, there is uncertainty around supply expectations as low US Treasury yields could entice corporate issuers to increasingly tender and refinance higher coupon debt. In addition, low corporate credit yields and elevated equity market volatility could spur additional merger and acquisition (M&A) related issuance. From a demand perspective, foreign investor demand for US IG credit is expected to improve due to declining hedging costs.

In Europe, manufacturing data are stabilizing but the fundamental outlook remains constrained by low 2020 growth expectations. Nevertheless, European issuers generally carry less debt on their balance sheets and are benefiting from negative sovereign yields and strong technical demand from yield-starved investors and central bank buying.

IFI strategy

We remain constructive on US IG credit, despite challenging valuations. We favor US and Europe over Asia. Key market drivers we are monitoring include 1) the pace at which major central banks respond to slower global growth and the impact on the US dollar and global credit flows 2) potential US fiscal and regulatory policy changes 3) the continued strength and resilience of the US consumer and 4) the potential impact of the coronavirus outbreak on aggregate demand and margins.

High yield (HY): After a strong 2019 we expect muted returns with potentially greater volatility

Rationale

High yield returns were strong in 2019, amid a favorable backdrop for risk and a rally in duration. As we enter 2020, overall economic and high yield fundamentals remain in good shape. Leverage has risen but remains in check. Importantly, most of the issuance over the last year was directed at refinancing efforts, which has allowed companies to push out maturities and lower interest expenses. Our main concern lies with valuations, which are close to historical tights. However, we expect default rates to remain below the historical average, with stressed issuers concentrated within a few sectors.

IFI strategy

Given the juxtaposition of supportive fundamentals and high valuations, we are taking a more cautious approach to the market. In particular, we are wary of the overvalued segments.

Emerging markets (EM): Will the growth momentum continue? Rationale

EM growth bottomed in 2019 and the market is expecting a rebound in 2020. This expectation rests on a recovery in a handful of important regional economies, such as Brazil, on optimism that structural reform will help it emerge from its long downturn, Turkey, on expectations it will recover from a deep recession, Russia amid expectations it will enact more monetary and fiscal stimulus and India, if growth can return to potential. However, recovery in these individual economies is not without risks and we also would like to see a broader pick-up across EM to boost confidence in a sustained improvement in EM-DM growth differentials. Momentum in global soft data improved at the end of 2019 and Asian export data continue to rebound. Easy global financial conditions have been supportive of higher yielding assets with optimism already reflected in the pricing of risk assets, such as EM hard currency credit spreads

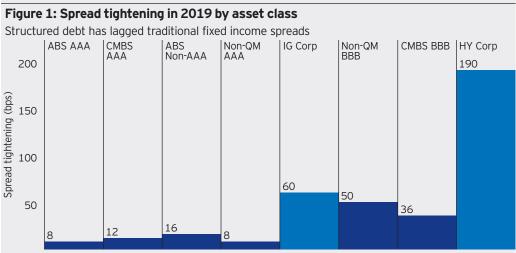
IFI strategy

We are selective on credits due to the mix of improving fundamentals but moderately rich valuations. We favor credits with strong fundamentals and a focus on idiosyncratic country level dynamics - we screen for names with strong reform prospects and improving macro stories. We are rotating into higher quality HY credits, such as BBs, and IG credits, such as BBs, that have an expanded buyer base, better mix of valuations, especially compared to DM credit markets, and improving macro trajectories.

Structured debt: We believe structured securities offer compelling value relative to some traditional fixed income sectors

Rationale

Commercial mortgage-backed securities, non-agency residential mortgage-backed securities and asset-backed securities experienced materially less credit spread tightening in 2019 compared to the corporate bond sector, as shown in Figure 1. Following this move, structured securities currently offer higher yields for similar, and, in many cases, superior risk profiles. Further, we believe positive consumer and real estate fundamentals are supportive of securitized collateral and offer potential diversification away from fundamental concerns in traditional fixed income sectors.



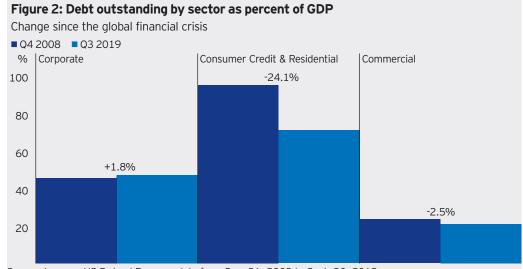
Source: Invesco, Bloomberg L.P., Bank of America Merrill Lynch, data from Jan. 2, 2019 to Dec. 31, 2019.

Given the magnitude of spread tightening that occurred across fixed income credit last year, it appears likely that coupon carry will represent a larger share of excess returns in 2020. Outsized carry is available across securitized subsectors, and is especially attractive in senior classes, in our view, considering the flatness of the credit curve. Spreads in some corners of the market, such as Non-QM RMBS, remain well wide of 2018 tights due in part to technical pressures that we expect to stabilize. This points to potential for modest spread tightening to further benefit relative returns. The sector also offers reduced interest rate exposure without spread concession through an abundance of shorter duration ABS and Non-Agency RMBS profiles.

Positive credit fundamentals

Considering the maturity of the cycle, we believe fundamentals will be an increasingly important driver of investment performance in the coming year to the extent that the Fed remains on hold, which is current market consensus. ABS and Non-Agency RMBS offer exposure to the strength of consumers, while CMBS and Non-Agency RMBS would potentially benefit from positive trends in real estate.

Favorable labor market conditions, robust wage growth, increasing home values and stock prices and an elevated savings rate have strengthened household net worth. As shown in Figure 2, households and commercial mortgage borrowers have de-levered since the financial crisis, in contrast to the corporate sector. Along with conservative lending standards, these tailwinds should drive strong consumer and residential mortgage loan performance.



Source: Invesco, US Federal Reserve, data from Dec. 31, 2008 to Sept. 30, 2019.

We expect positive trends in commercial and residential property prices to persist due to limited supply, low vacancy rates, strong demographics and attractive financing costs. Finally, despite the inherent strengths of the underlying collateral, credit enhancement within securitization structures has improved since the financial crisis, providing investors with an additional measure of potential credit protection.

IFI strategy

Compelling value in structured securities - including carry and potential for modest spread tightening - and solid fundamentals contrasts with the risks of historically tight spreads, weaker earnings, and rising leverage in traditional fixed income credit investments. Given a shallow credit curve, we currently see more value in higher quality structured securities, including AAA and AA CMBS as well as senior classes of Non-QM RMBS and esoteric ABS. Security selection remains critical, in our view, given tiering among sponsors and across subsectors. We expect new issues to price at a material concession to the secondary market as investors remain sensitive to supply technicals. Considering the strengths of structured securities in the current environment, we believe the sector is well positioned to demonstrate strong relative performance this year across a range of risk market outcomes.

Sector themes

Commodities: Growth slowdown has softened sentiment and demand Rationale

Demand for commodities has softened amid global growth deceleration, declining manufacturing and inventory build-ups. Steel markets have been negatively affected by overheating production in most regions, leading to sharp price declines in the last few quarters. Overall sentiment in commodities is especially negative despite the recently signed US-China Phase 1 trade deal, given late-cycle concerns and potential demand side repercussions stemming from the coronavirus outbreak.

Shareholder-friendly capital allocation policies, including large dividend pay-outs and share repurchase programs have been neutral for corporate credit profiles, with funding often supported by asset sales and/or free cash flow generation. However, these shareholder-oriented policies have had limited de-leveraging impact over the past year, as shareholder returns have generally been prioritized over additional debt reduction.

Geopolitical risk remains at the forefront of investors' minds, notably as it relates to oil, following the recent escalation of tensions between Iran and the US. On top of the factors noted above, assuming persistent geopolitical tensions and a potential months-long economic impact of the coronavirus outbreak, our team anticipates near-term downward price pressure for most commodities.

IFI strategy

We favor copper producers and certain Russian steelmakers, which tend to benefit from better supply/demand dynamics and more attractive bond valuations. We favor selected exploration and production oil companies located in Latin America and Russian oil and gas producers. We also remain constructive on certain US exploration and production companies with low-cost shale assets and US midstream companies focused on cost of capital optimization and active de-leveraging to stabilize or maintain investment grade ratings.

Technology, media and telecommunications (TMT): Wireless merger outcome will likely set the tone for the sector

Rationale

We eagerly await a decision on a pending major US wireless merger, which will likely drive a majority of sector outcomes in 2020. Investors, especially private equity, are focused on amassing the building blocks of 5G spectrum, fiber, and tower assets. We expect this trend to gain momentum following the merger outcome.

IFI strategy

We continue to find attractive opportunities in telecom linked to infrastructure assets. These companies, which, in some cases have struggled with poor growth prospects, suddenly find themselves in an enviable situation as value emerges within their asset base.

Michael Hyman, CIO Global Investment Grade and Emerging Markets, Joe Portera, CIO High Yield and Multi-Sector Credit, Mario Clemente, Head of Structured Investments This section highlights the views of Invesco Fixed Income's credit analysts across a broad range of fixed income assets managed by Invesco.

Global credit strategy

Emerging markets corporate credit outlook Q1 2020

After a year dominated by geopolitical tensions, slowing economic growth and dovish central banks, we believe emerging market (EM) corporates are on track for an improved 2020. We expect EM default rates to remain low due to prudent liability management and improved earnings and 2020 market performance should be boosted by strong demand for EM corporate bonds, fueled by their attractive yield versus developed markets.

Global macro backdrop improving

EM corporate fundamentals weakened in 2019, initially due to decelerating economic growth that led to earnings recession and, ultimately, weaker cash flow generation and increased leverage (after three years of improvement). EM growth slowed from 5.1% in Q3 2018 to 4.5% in Q3 2019, leading to reduced 2020 consensus growth expectations.¹ On the positive side, companies have reduced capital expenditures and consequently face smaller financing requirements in 2020.

Global growth had been pulled down by increased US-China trade tensions, reflected in weaker global container port volumes and freight rates between Chinese and US ports, to the benefit of shipping between China and Europe, which was boosted by the Chinese Belt and Road Initiative.

The US-China Phase-1 trade deal signed on Jan. 15 could be the first step toward a deescalation in tensions between the two countries and benefit the global economy. The USD200 billion, two-year deal includes a substantial increase in Chinese imports from the US, covering manufacturing goods, agricultural products, energy and services. In return, the US has agreed to reduce tariffs on USD120 billion of Chinese imports. While the Phase-1 agreement should hold until the Nov. 2020 US presidential election, and lead to fewer negative trade-related headlines, its implementation and the remaining challenges surrounding the more decisive Phase-2 deal could affect its durability over its two-year term. Unresolved points of contention remain, related to currency devaluation, subsidies, telecom equipment manufacturer Huawei and its 5G technology, Western companies' access to the Chinese market, including financial services, and the protection of intellectual property rights.

EM credit fundamentals improving

Against this improved global backdrop, green shoots are noticeable in EM, reflected in the Markit Emerging Markets Composite PMI, which improved from June to December 2019, driven by a 1.1 point increase in the Manufacturing PMI to 51.0 and a 1.7 point increase in the Services PMI to 52.4.³ The Emerging Market Citi Economic Surprise Index has also improved and consensus expectations for EM economic growth are starting to be revised upward, after several quarters of downgraded expectations.

On the corporate side, earnings per share (EPS) growth has been stabilizing, with increased balance between earnings "beats and misses", potentially indicating the end of downward revisions to growth expectations. Some EPS growth expectations have already started to be revised up, potentially signaling a positive inflection point.



Source: Bloomberg L.P., data from June 13, 2003 to Jan. 24, 2020. MSCI is Morgan Stanley Capital International which is an index that measures stock market performance in certain areas. EPS is earnings per share. Ebitda is earnings before interest, taxes, depreciation and amortization. GDP is gross domestic product.

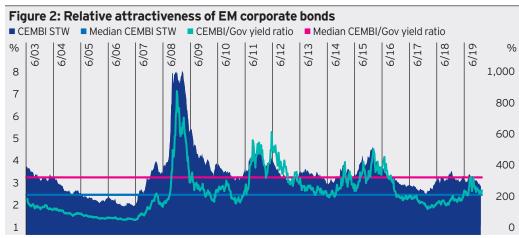
Over the past few years, the average credit quality of the JP Morgan Corporate Emerging Market Bond Index (CEMBI) has been deteriorating from BB+ in Jan. 2016 to BB+/BB currently, driven by the increased weight of CCC and single-B issuers. However, EM corporate default rates have been on the decline, from 0.9% in Dec. 2018 to 0.3% in Dec. 2019, (driven by Latin America), outperforming global default rates, which increased by 0.6% to 3.0% over the same period. In 2020, Moody's expects the base case global default rate to increase to 3.3%. We expect the EM corporate default rate to remain below the global average at around 1%, supported by the improving growth outlook.

EM technicals improving

Easier global financial conditions have boosted EM corporate assets in the past year, with major central banks cutting rates and providing some form of quantitative easing, i.e. bond purchases. As a result, EM corporate yields have declined by about 2% to 4.3% over the past year, with the EM spread-to-worst declining by 110 basis points to 251 basis points since early 2019. Strong performance so far this year has been driven by forecasts of a potential economic recovery. We believe this exposes the market to potential re-pricing if early green shoots do not flourish.

However, global demand for the asset class continues to benefit from low and increasingly negative real yields in developed markets, fueling a search for yield. EM ETFs have experienced strong inflows year-to-date, especially hard currency funds. At the same time, new bond supply has been strong, with Asia accounting for about 60 percent of issuance. This supply has been well absorbed, as reflected in the good performance of new issues on their first day of trading. Going forward, JP Morgan expects the net financing need of EM corporates to decline sharply, from USD112 billion in 2019 to USD5 billion in 2020, which should further support technicals.

Global credit strategy (continued)



Source: JP Morgan, data from June 27, 2003 to Jan. 20, 2020. CEMBI STW is the JP Morgan Coporate Emerging Markets Bond Index spread to worst.

Fabrice Pellous, Senior Credit Analyst

¹ Source: Bloomberg L.P., data from Sept. 30, 2018 to Sept. 30, 2019.

² Source: WSJ Survey: US China Agreement will boost growth, Jan. 16, 2020.

³ Source: Markit Emerging Markets Composite PMI, data from June 30 to Dec. 31, 2019.

⁴ Source: JP Morgan, data from Jan. 31, 2016 to Jan. 28, 2020.

⁵ Source: JP Morgan, data from Dec. 31, 2018 to Dec. 31, 2019.

⁶ Source: Moody's December Default Report, Jan. 9, 2019.

⁷ Source: Corporate Emerging Market Bond Index, data as of Jan. 17, 2020.

⁸ Source: Invesco, data from Jan. 1, 2020 to Jan. 28, 2020.

⁹ Source: JP Morgan, Emerging Markets Corporate Outlook and Strategy, Nov. 27, 2019.



Justin Mandeville Portfolio Manager



Marques Mercier Head of Government Portfolio Management

The bottom line

The Fed is well-equipped to handle repo market volatility

Last fall's volatility in the market for repurchase agreements (repos) raised concerns about potential market action at year-end, when pressures are often amplified. We ask the Global Liquidity team to review how year-end 2019 played out and share what they expect in the coming months regarding repo market volatility and the Fed's ability to control it.

Q: Following volatility last fall, there was concern about a year-end spike in reporates. Did it materialize?

Marques: The overnight repo markets were calm over year-end and the anticipated volatility never materialized. Overnight funding rates remained within the Fed's target range, even though the term repo markets had priced in higher repo rates leading up to year-end. This market action dispelled concerns about the Fed's capacity to control rates at the short-end of the yield curve.

Q: What helped mitigate funding pressures at year-end?

Justin: A few factors played a key role in alleviating year-end pressures:

- The Fed's injection of liquidity into the banking system via USD255 billion in temporary open market operations (TOMO), including overnight and term repo operations, conducted with primary dealers, and USD157 billion in Treasury bill purchases.
- The preparedness of market participants, who appeared sufficiently funded approaching year-end. In addition, banks adjusted their repo balance sheets toward the end of December, reducing leverage while maintaining sufficient capacity to participate in the overnight funding markets.
- Finally, the Fed lowered the rate on its foreign repo facility to match the overnight repo rate offered to domestic institutions. This rate adjustment incentivized foreign institutions to reallocate their cash into alternatives such as Treasury bills, putting downward pressure on interest rates at the front-end of the curve.

Q: Were the Fed's temporary open market operations fully utilized?

Marques: At year-end, the Fed's overnight repo operations were well under-subscribed. Of the USD480 billion of total capacity the Fed provided via TOMO and Treasury bill purchases, market participants utilized only USD412 billion. This demonstrates the success of the Fed's operations in distributing liquidity to a broad spectrum of participants.

Q: Now that year-end is behind us, will the Fed continue to provide liquidity to the market through open market operations?

Justin: Ideally, the Fed would like to remove itself from the repo markets, which we anticipate will occur in a timely and gradual process to avoid market disruption and maintain stability in the funding markets. On Jan. 14 the Fed released an updated schedule of its TOMO, which shows that the facility will remain in place for at least a few more months, but with a reduction in the size of the 14-day term operations by USD5 billion beginning in February.

Q: What do you expect in terms of market action and Fed moves in the coming months? Marques: The supply/demand imbalance dilemma within the overnight funding market has been recalibrated primarily due to the Fed's liquidity injections. We expect volatility to remain muted in the coming months, as these injections have also provided psychological assurance to market participants that the stabilization of the overnight funding market is a priority. The Fed has committed to maintaining permanent open market operations of USD60 billion a month through the second quarter, and would gradually reduce temporary open market operations after the April 15 tax deadline. By then, we believe a sufficient level of reserves will have accumulated in the banking system. The key to determining if the Fed has successfully attained the optimal balance of reserves will be the performance of reporates - i.e. if they remain within the upper and lower bounds of the federal funds rate.

Q: What has been the biggest takeaway from the September spike in repo rates?

Justin: We believe the most important lesson from this experience has been understanding the systemic importance of reserve management and the maintenance of adequate liquidity in the repo market. When the dislocation in repo rates occurred, the biggest concern centered on the Fed's ability to provide sufficient liquidity to the market and the ability of bank reserves to make their way to institutions that do not have direct access to the Fed. We believe the Fed has demonstrated that it has the necessary tools to inject liquidity and return stability to the markets. The Fed's task ahead is to determine the appropriate level of reserves to maintain in the system to avoid a repeat of September's events.

Please read the Investment risk section at the end of this publication.

Invesco Fixed Income

Team contributors

Senior Editor - Ann Ginsburg

Atlanta

Rob Waldner

Chief Strategist and Head of Macro Research +1 404 439 4844 robert.waldner@invesco.com

Mario Clemente

Head of Structured Investments +1 404 439 4614 mario.clemente@invesco.com

James Ong

Director-Derivative Portfolio Management +1 404 439 4762 james.ong@invesco.com

Avi Hooper

Portfolio Manager +1 404 439 4877 avi.hooper@invesco.com

Justin Mandeville

Portfolio Manager +1 404 439 4701 justin.mandeville@invesco.com

Ann Ginsburg

Head of Thought Leadership, Fixed Income +1 404 439 4860 ann.ginsburg@invesco.com

Joseph Portera

CIO, High Yield and Multi-Sector Credit +1 404 439 4814 joseph.portera@invesco.com

Paul English

Head of US IG Research +1 404 439 4819 paul.english@invesco.com

Noelle Corum

Associate Portfolio Manager +1 404 439 4836 noelle.corum@invesco.com

Scott Case

Portfolio Manager +1 404 439 4775 scott_case@invesco.com

Marques Mercier

Head of Government Portfolio Management +1 404 439 4786 marques.mercier@invesco.com

Michael Hyman

CIO, Global Investment Grade and Emerging Markets +1 404 439 4827 michael.hyman@invesco.com

London

John Greenwood

Chief Economist +44 20 3753 0500 john.greenwood@invesco.com

David Todd

Head Global Corporate Credit Research +44 20 3219 2727 david.todd@invesco.com

Michael Siviter

Senior Fixed Income Portfolio Manager +44 20 7034 3893 michael.siviter@invesco.com

Adam Burton

Assistant Economist +44 20 3753 0500 adam.burton@invesco.com

Reine Bitar

Portfolio Manager +44 20 7959 1689 reine.bitar@invesco.com

Fabrice Pellous

Senior Credit Analyst +44 20 3219 2731 michael.siviter@invesco.com

Hong Kong

Yi Hu

Head of Asia Credit Research +852 3128 6815 yi.hu@invesco.com

Recent IFI publications

- 1. Multi-sector asset allocation report Q1 2020, Jan. 2020
- IFI Global Investors' Summit November 2019, Jan. 2020, Rob Waldner, Chief Strategist and Head of Macro Research and Tony Wong, Head of Fixed Income Investments
- 3. Asia's US dollar bond market: A new asset class, June 2019, Ken Hu, ClO Asia Pacific, Yifei Ding, Portfolio Manager, Haidan Zhong, Client Portfolio Manager
- Chinese onshore bonds: A market too important to ignore?, June 2019, Yi Hu, Head of Asia Credit Research
- 5. China embarks on Digital Silk Road, May 2019, Adrian Garcia, Senior Credit Analyst
- 6. Progress report on SOFR, May 2019, Justin Mandeville, Portfolio Manager

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Further information is available using the contact details shown:

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- Issued in **Spain** by Invesco Asset Management SA, Sucursal en España, C/ GOYA, 6 3°, 28001 Madrid, Spain
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