2023 OUTLOOK

CEO'S PERSPECTIVE

GLOBAL EQUITIES

GLOBAL FIXED INCOME

EMERGING MARKETS

MUNICIPAL BONDS

2023 Outlook
CEO's Perspective

Financial Markets Return to Normalcy

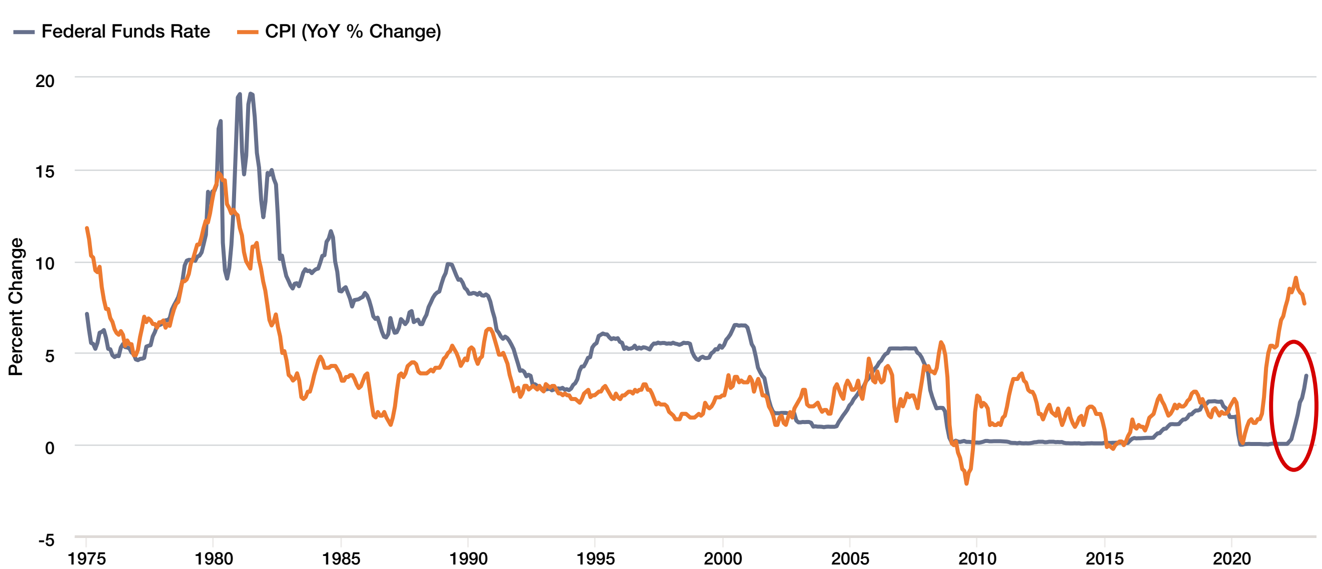
Jason Brady, CFA
President and Chief Executive Officer

The year 2022 was a wild year in markets, where several events and trends weighed on almost every market and investor. It's a market truism that everyone loses money in bear markets: Bears, Bulls, everyone. When a bear market in bonds, with one of the fastest and most significant rate rise periods in decades, is a significant headwind for all risk markets, it's pretty clear that there weren't a lot of places to hide.

It's worth unpacking what happened over the year, and why, because what happens in 2022 is the prologue to where we may go in 2023. This past year has been all about inflation and the reaction of global central banks. The seeds of the inflation that we have experienced globally in 2022 were sown over the course of the prior two years. It's hard to believe that as recently as March 2022 the Fed was still pressing on the gas with zero interest rates and a full-blown quantitative easing program. But as "transitory" became the most over-used word of the year, the Fed and other central banks found themselves far behind the curve and had to work hard to catch up to a galloping set of nominal (vs. real) GDP figures and widespread price spikes.

The chart below shows just how aggressively the Fed has tightened so far in the current cycle. Over the course of nine months through November 2022, the Fed has hiked its policy rate by 375 basis points (bps), while going back to 1975, the Fed's tightening cycles averaged about 500 bps over 20 months.

Fed's Current Tightening Cycle Is the Most Aggressive in 40 Years

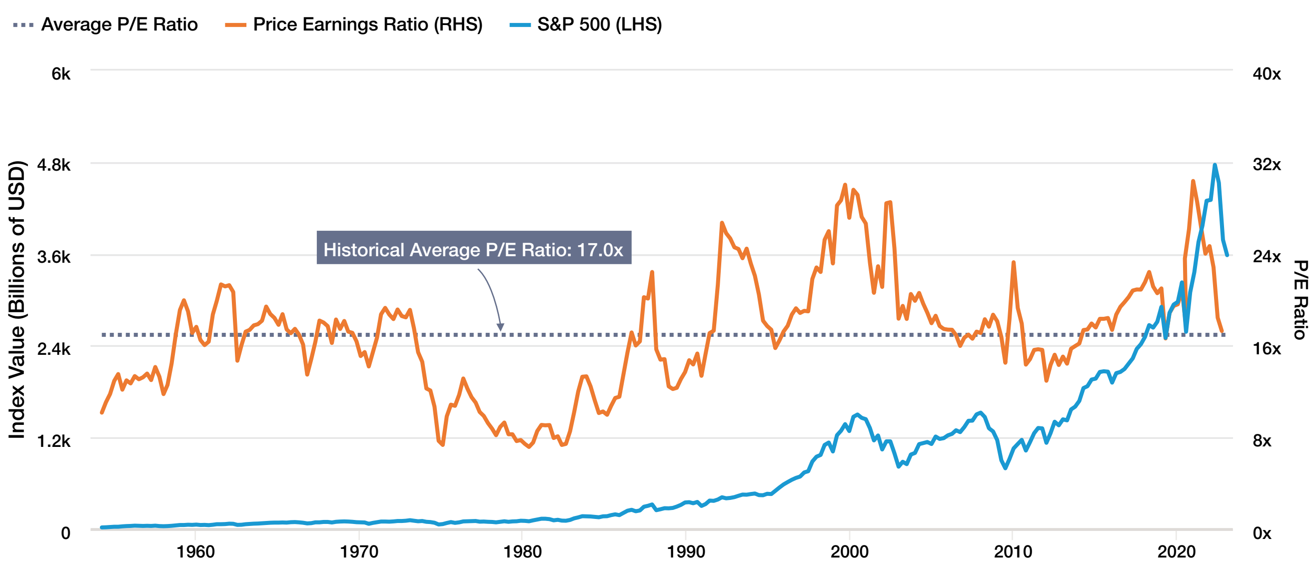


Sources: St. Louis Fed and Bloomberg

This rapidly changing environment continued to underline the close, and more recently positive, correlation between high quality bonds and risky assets like equities: If you held a 60/40 portfolio, 2022 has been a disaster. Equity multiples declined precipitously, as investors no longer had the TINA (There Is No Alternative) argument to stocks as real rates rose to much more "normal" levels.

As unusual as 2022 has been, it has really been the story of the "normalization" of financial markets, i.e., the return to long-term averages. As a result, high quality bonds may once again play a role in your portfolio in a way that has been denied to you for more than a decade. Credit spreads, while not dramatically interesting in themselves, have returned to long-term averages from very tight levels. Global equities, and in particular growth leadership names, have seen their multiples deflate significantly from historically high levels back towards longer term averages, even while earnings have generally held up relatively well. This environment would be one where the 60/40 portfolio has a strong comeback. In essence, we can think of 2022 as the year where we endured some significant, sharp and perhaps much-needed pain in order to exit from an unsustainable environment of negative real rates and malinvestment: We ripped off the Band-Aid, also known as the Fed "put" (where monetary policymakers will ride to the rescue if risky securities fall).

S&P 500 Price-to-Earnings Ratio Returned to Its 70-year Average



Source: Bloomberg

Now we are in a much better position to weather whatever storms 2023 may bring. Generally rising rate cycles have not ended well. Further, when markets lose confidence in the central bank "put" because inflation has been revived from the dead, it's likely that we will see further market volatility. While reasonable people can disagree about a global recession in 2023 (I think it will occur, but I'm worried that I have too much company in that prediction), what seems likely in a world where we hang on every economic data point and Fed speech, is that markets will probably price in recessions and booms many times over the course of the coming year.

So again, though it will be stormy, prices have moved significantly to pay investors for that uncertainty. From my seat, much higher yields and much lower equity valuation multiples have given our investment team at Thornburg a lot more to think about and the opportunity to add significant value for our clients. Add that to the fact that our team is built to benefit from the complexity of challenging markets (both from an asset class and a volatility perspective), and I'm very much looking forward to 2023. Because we specialize in an ability to take our fundamental asset-level work and then compare opportunities by looking across silos in markets, we believe we have a sustainable competitive advantage relative to our peers where we choose to compete. This is especially true as markets have both grown larger and more interdependent. Like many other volatile times that I've experienced in 16 years at Thornburg (2008, 2012, 2015/6, 2018, 2020, and 2022), I believe that 2023 will be an important time for our strategies. As we often say, we build our reputation in tough times and difficult market environments. I've seen our investment philosophy and process succeed most particularly in times like we are now experiencing.

I'm honored to present our 2023 Outlook, which demonstrates Thornburg's thinking across various asset classes and geographies. I hope you enjoy what follows, and thank you for your time, attention and business.

Jason Brady

CEO, President, and Portfolio Manager

2023 Outlook
Global Equities

Thornburg

Volatility Will Persist–Focus on Income, Fundamentals and Valuations

Ben Kirby, CFA
Co-head of Investments and Managing Director

After a prolonged period of historically easy monetary policy, inflation became the driving force behind markets in 2022. While the reality of the Russia-Ukraine crisis, supply chain disruptions and zero-COVID lockdowns in China had real implications on global equities, they were overshadowed by how aggressively central bankers acted in an attempt to bring down inflation. Stretched valuations deflated significantly in the U.S. and abroad with longer duration growth stocks especially sensitive to rising rates over the past 12 months.

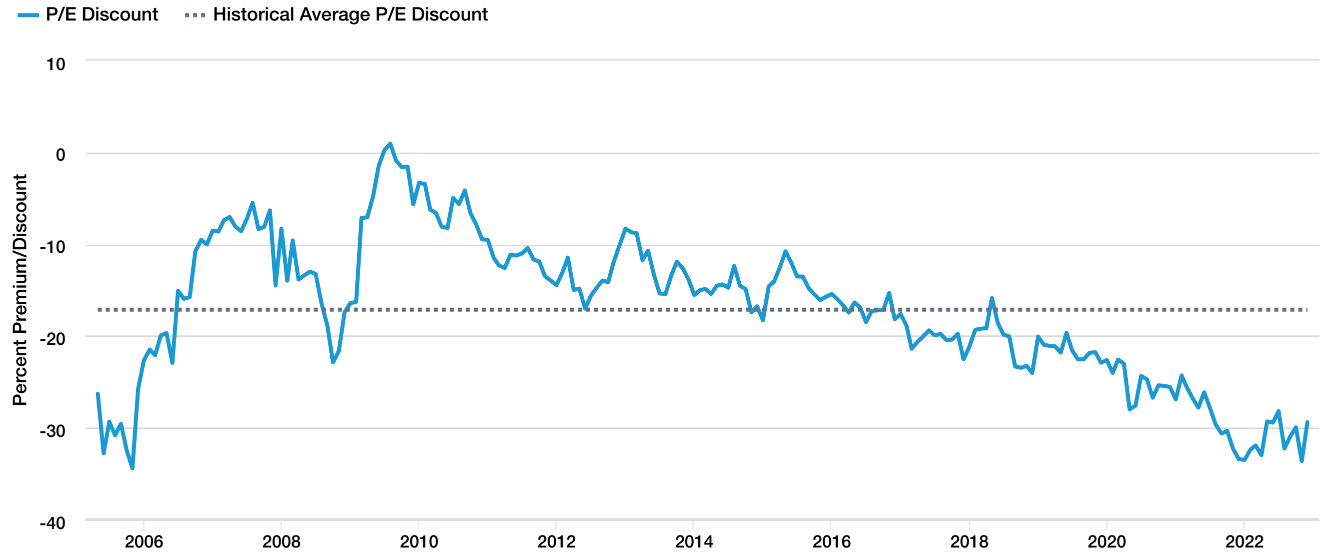
Entering 2023, we continue to navigate through foggy conditions, and the outlook requires an even greater-than-normal degree of humility as portfolio managers. After decades of relative price stability, are we transitioning to a structurally higher inflationary regime, or is this a temporary dislocation due to policy responses during COVID? Will geopolitical frictions among major nations temper, and if not, what are the potential impacts of a less globalized world? In light of such questions we see a distribution of possible outcomes for global equities that have fatter tail risks on both sides. While we expect elevated levels of volatility to persist for the foreseeable future, we also see opportunities for investors amid the fog.

Reasonable Valuations and Weak Currencies Create an Improving Landscape for Non-U.S. Equities

Supported by reasonable valuations, cheap currencies and an anticipated backdrop of broad-based global growth, the setup for international equities looked promising entering 2022. Instead, war in Ukraine stoked inflation and fears of an energy shortage across Europe, lockdowns drove social unrest and stalling growth in China, and the dollar rapidly strengthened as investors sought a haven amongst the uncertainty. As a result, valuations across international equities contracted rather than expanded, cheap currencies got even cheaper and the likely backdrop entering 2023 looks to be a broad-based global recession.

While growth may decline before it gets better across many regions next year, equity prices generally respond sooner to anticipated conditions than the economy itself and a higher degree of bearishness appears priced into many international markets. Looking past the near-term challenges, we see a lot of relative value opportunities outside of the U.S. and expect investors to begin paying attention as fears abate. On a 12-month forward looking basis, international markets are currently trading at a 29% valuation discount to their U.S. counterpart—the widest level in more than 15 years. This is due in large part to relative outperformance of U.S. stocks versus many international markets in a market driven by a higher concentration of technology and mega cap stocks. For long-term investors, we recommend taking advantage of currently cheap valuations and diversifying portfolios outside of the U.S.

Non-U.S. Markets Are Currently Trading at a 29% Discount to Their U.S. Counterparts



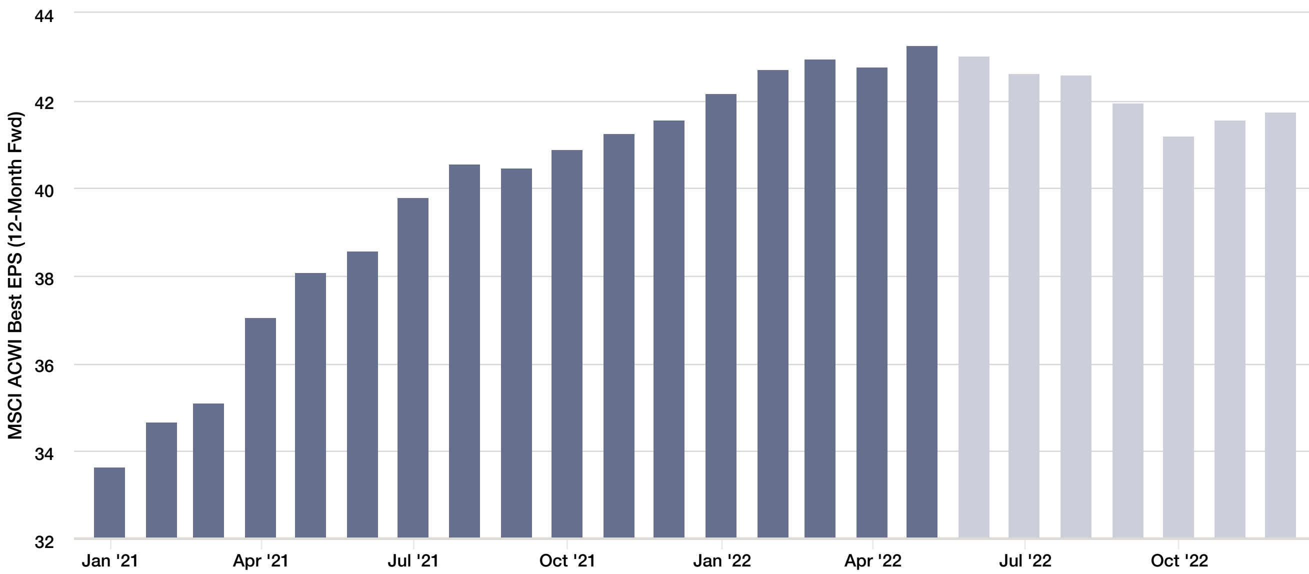
Source: Bloomberg. Data as of November 30, 2022. P/E Discount: MSCI ACWI ex-U.S. Index vs S&P 500 Index: Next 12 months' Forward

Companies with Earnings Resilience to Navigate through Uncertainty Should Outperform

A rising reopening tide lifted most boats over the past two years, but we expect decelerating growth and tightening financial conditions to increasingly pressure earnings in 2023. We are watching carefully what companies are forecasting in terms of real-time demand for their products and services and how extensively they are shifting expectations. As we end 2022, consensus earnings growth forecasts are still modestly positive across many global markets for 2023, but we see that as a best-case scenario rather than the base case.

Across geographies and sectors, we expect to see an increasing bifurcation in company-level results as economic activity likely slows and are broadly favoring firms that we believe can navigate a lower growth environment. Consequently, we see 2023 as a stock selector's market, best approached from the bottom-up, focusing on durable businesses and earnings resilience. Against the backdrop of potentially slowing macroeconomic growth, earnings resilience will be key for U.S. stocks. Market participants will be evaluating the ability of U.S. companies to meet earnings expectations and maintain margins given relatively higher valuation multiples.

Earnings Momentum Is Fading as Growth Slows

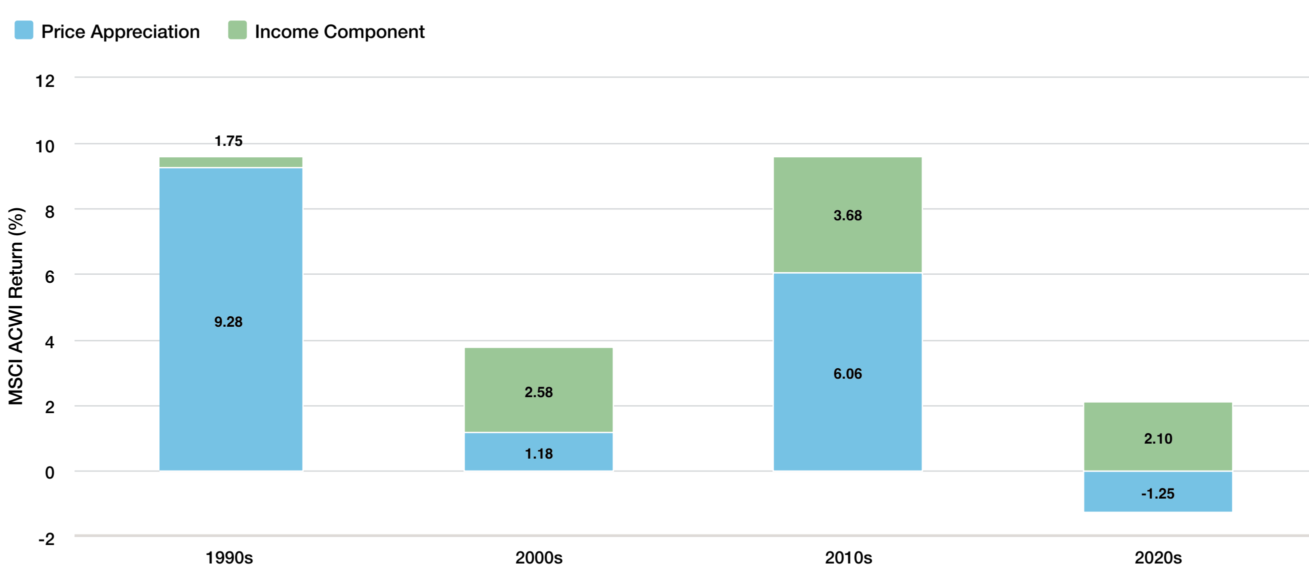


Source: Bloomberg MSCI ACWI

Don't Overlook the Growing Income Component of Total Return

Following a decade of stimulus-driven capital appreciation, it's easy to forget that over the long-term dividends have contributed roughly half of an investor's total return from equities. As highlighted over the decades below, the break-down between price appreciation and income can be highly variable depending on the environment, and leadership changes are difficult to predict.

Income Has Become a Major Contributor to Returns



Source: Bloomberg

While we don't have a crystal ball for what the next decade holds for equity investors, following a year of aggressive rate hikes, businesses will once again have to earn their cost of capital in the nearer term. We see the setup as promising for companies with consistent profits and dependable cash flows in excess of their capital investments. We recommend investors consider high quality assets with reliable dividends that can compensate shareholders through the potential volatility of 2023.

Outlook

Macro

Central banks have increased policy rates and signaled upcoming sales of their bond portfolios to arrest inflationary forces, with softer inflation data helping solidify the view that the interest rate peak is near. Geopolitical uncertainty remains elevated.

U.S. Equities

US recession risks remains a key focus. Core inflation is likely to remain elevated resulting in mixed moves in US equities. Earnings will be mixed as we move from (potential) recession to recovery. A widening geopolitical gap between west and non-west seems to be codifying, bringing various market risks.

International Equities

Recession in Europe is believed to be a certainty based on high energy costs. However, consumers and businesses are being subsidized by various government sponsored relief packages. Asia is slowing but China could provide a growth boost.`

Emerging Markets Equities

Despite a lag in recovery versus developed markets and equal exposure to inflation and macroeconomic uncertainty, many long-term structural drivers remain intact.

Positioning

Macro

Although we expect inflationary pressures to ease, expect volatility in equities to continue. focus on idiosyncratic opportunities/ durable companies across sector/geography where the upside outweighs the downside materially. Companies with pricing power, offering essential services and inflation beneficiaries remain interesting.

U.S. Equities

Balance style risks with durable cyclical & defensive sectors. Equity Income names are likely still beneficiaries. Take advantage of sell offs to find high quality names.

International Equities

Look for idiosyncratic opportunities, contagion from Russia-Ukraine conflict should be limited. Equity income and value-oriented companies show substantial promise in this context.

Emerging Markets Equities

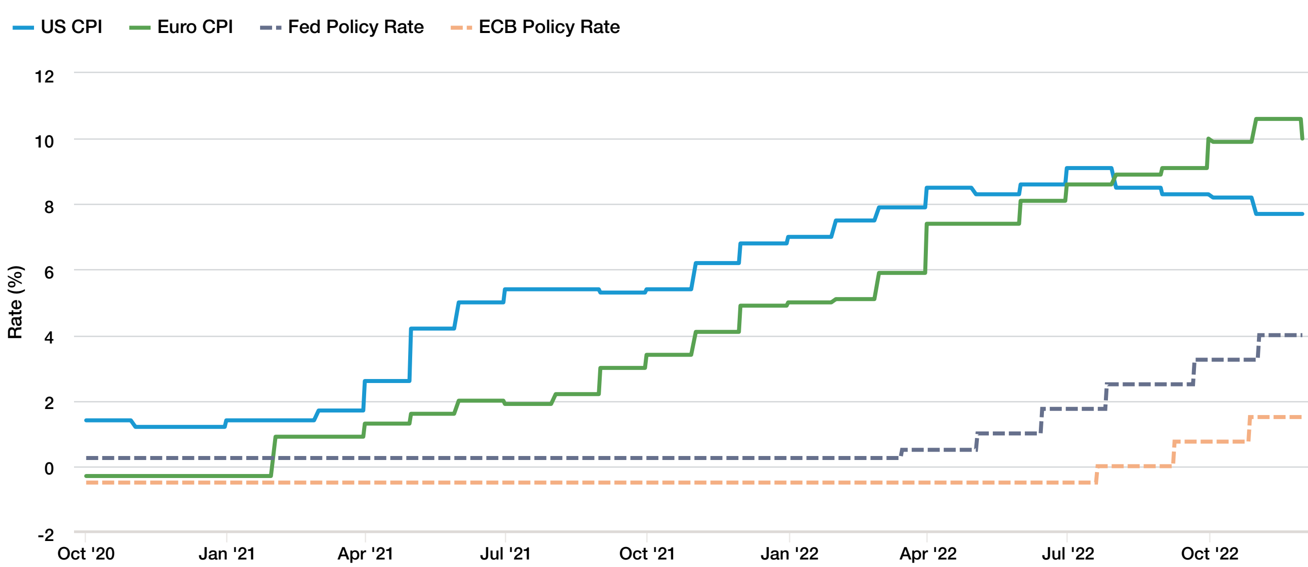
Although concerns around index concentration and geopolitical risks may keep EM volatility elevated near term, select emerging markets provide pockets of opportunity not currently reflected in valuations.

Fed Policy Won’t Pivot Until Inflation Is on a Clear Downward Path

Jeff Klingelhofer, CFA
Co-head of Investments and Managing Director

The top story of 2022 was central bank policy actions to combat inflation, led by the Federal Reserve, and the subsequent removal of accommodative monetary policy in response to surging price pressures. The seeds of global inflation were planted during the response to COVID, which saw unprecedented levels of government spending, especially in the United States. It’s hard to believe that as recently as March, the Federal Funds rate was at zero and the Fed was still pursuing its quantitative easing program. As a result, the Fed and other global central banks quickly fell behind the curve, putting their very credibility at risk and forcing a pivot to a hawkish policy regime.

Central Bank Credibility is Precious — And on the Line



Source: Bloomberg

Central Bank Policy Rates Will Climb Until Inflation Is on a Solid Downward Trend

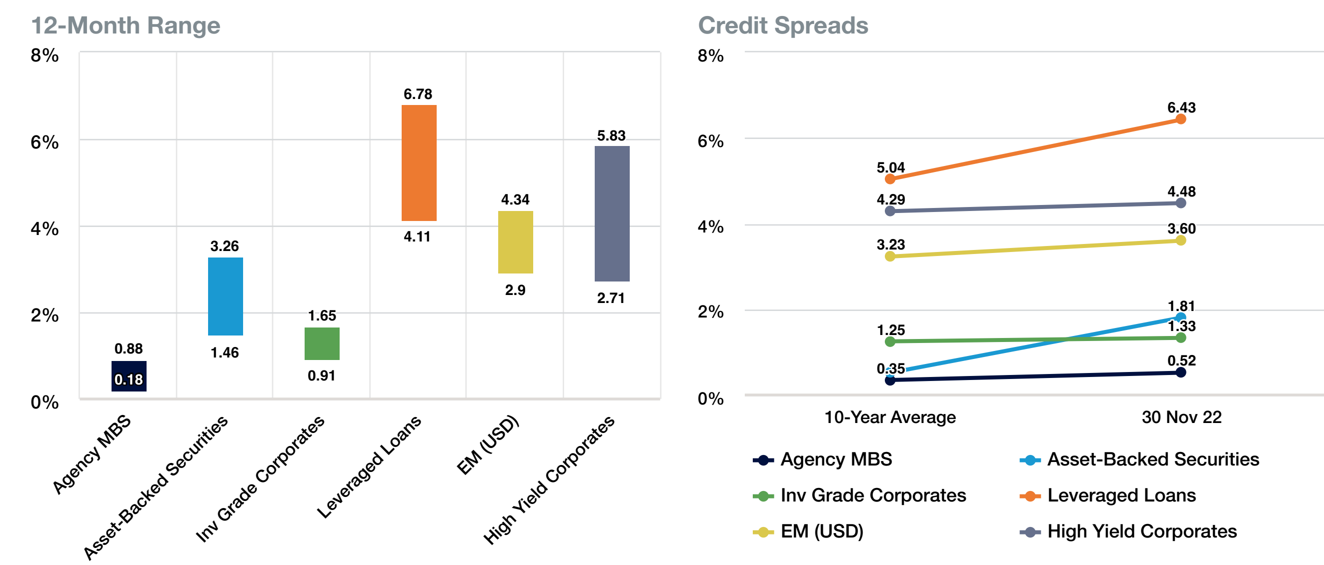
Global central bank policy remains fully tethered to the broader fight to reclaim price stability. On one hand, the Fed has been aggressively raising rates and continuing the paradigm shift from a free cost of money at the start of 2022 to a very significant, real cost of money as we move into 2023. We have also witnessed scores of interest rate increases around the globe, with central banks other than the Fed having raised rates well over 100 times. This transition from the great monetary experiment of the 2010s is being felt across a wide range of markets. The impact of this fundamental change ranged from pain in emerging markets to significant selloffs in stocks across most regions. Additionally, rising U.S. policy rates led to potentially destabilizing effects of extreme dollar strength, which caused the Bank of England and the Ministry of Finance in Japan to intervene directly in currency markets.

Sovereign yield curves are currently either flat or inverted, signaling serious market concerns about the ability of central banks to steer economies away from recession. As we noted earlier, the Fed may start talk about pausing rate increases, or even cutting rates, but only after inflation is on the clear and directional path down. But how swiftly the Fed pivots depends on the contributors to inflation– that is, will they be deemed “good” (i.e., broad-based wage inflation change to focused on lower income consumer) or will they be considered “bad” (i.e., goods inflation). The Federal Reserve may be more tolerant to pivot away from their hawkish policy stance, or perhaps eventually cutting policy rates, if inflation is being more driven by (same as above) broad-based wage gains as opposed to rising goods inflation.

Valuations have become more attractive, but not overly cheap

With volatility and uncertainty comes better priced assets, and valuations certainly look improved across fixed income sectors. Spreads have risen to levels either near or modestly wider than their 10-year historic averages, and at or near the top of 12-month ranges. Given that the last 10 years has been one of broad central bank support, it doesn’t mean valuations are screamingly cheap – but they have become more compelling. We believe it makes sense to take some risk in this market, but to also have the ability to pivot into more risk should spreads resume widening and/or become dislocated. If inflation continues, yields will rise. But if recession comes, yields will fall as central banks cut rates, allowing us to build a better portfolio. From an active manager’s perspective, the curve is symmetric and creates opportunities.

Fixed Income Spreads Are above Their 10-Year Averages

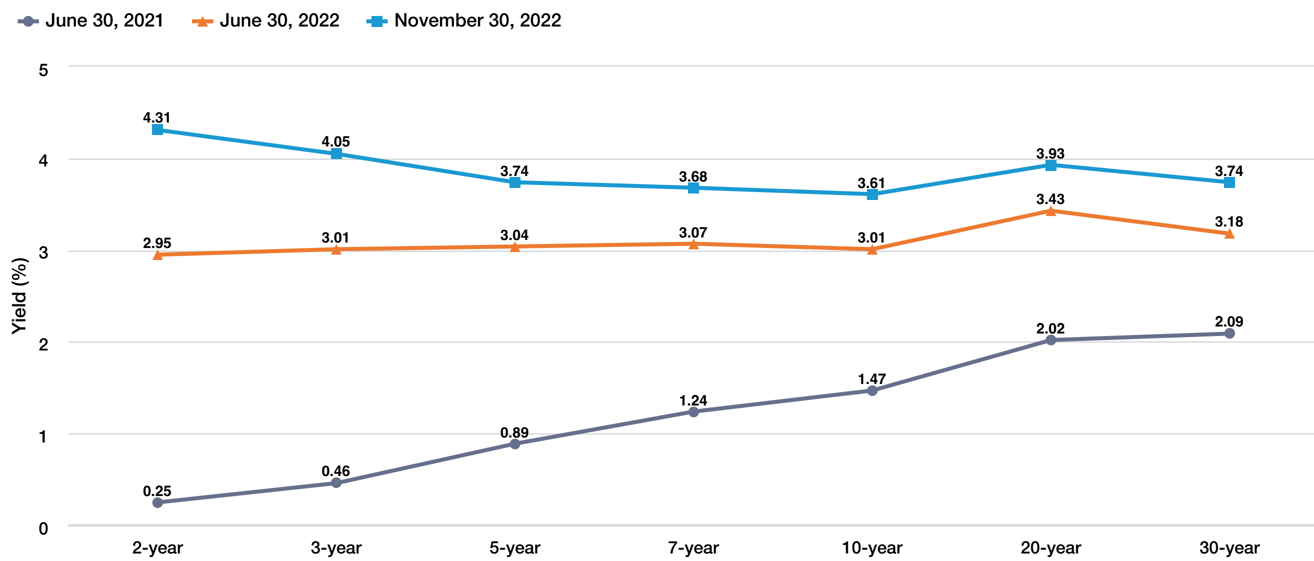


Source: Bloomberg and JPMorgan

Implications of 2022 Market Moves? Yield Is back!

Although the inverted yield curve raises worries about aggressive Fed tightening tipping the U.S. economy into recession, it also stands that investors are not getting paid to go significantly out the curve. Instead, investors are actually receiving more compensation at the two to three-year segment of the curve than they are in the 10-year maturity, which has more than three-times the duration. Should the yield curve eventually become steeper and more "normally" shaped, this dynamic will change.

There Is No Additional Yield Out on the Curve



Source: Bloomberg

The silver lining is that there is some yield in the market to compensate for market uncertainties. We think this presents good relative value for actively managed portfolios that can pull many levers – given that many places within fixed income have yield now – and therefore, presenting both compelling and competing opportunities to choose from.

The Prime Consumer Balance Sheet Remains Attractive

We continue to like the prime consumer (consumers viewed by lenders as more likely to pay back their loans and less likely to default), who has remained vigilant through financial market volatility and rising inflation. That said, excess savings are coming down and at some point, consumption will have to soften, perhaps notably. While the overall consumer is strong, we are avoiding the subprime or lower credit score bands because we realize that these consumers are under the most pressure in terms of their ability to service their debt. We'll be watching jobs numbers very closely as any decrease in employment tends to disproportionately hit lower quality borrowers. But we very much like the top of the stack prime consumers who are less vulnerable to default.

This carries over into our outlook for securitized credit. We favor prime consumer asset-backed securities and areas within non-agency mortgage credit. Within the former, we are seeing interesting opportunities in consumer lending (i.e. "Marketplace lending") as well as in the prime auto sector. Our non-agency mortgage exposure is focused on non-qualified (non-QM) loans, for which the underlying borrowers have robust credit profiles and put large down payments on the residential properties. Within Agency mortgage-backed securities, rising rates and a risk-off tone has made valuations on certain 30-year pass-throughs very attractive. In fact, our Agency mortgage exposure provides good diversification to our consumer credit exposure, as these positions should do well in a stressed environment. Overall, we continue to believe there will be plenty of opportunity in securitized credit. A unique aspect of the securitized market is that, unlike high yield corporates, issuance must still come to market despite volatility, which is advantageous because it allows us to provide liquidity into the market and buy bonds at very attractive yields.

In the corporate bond space, yields are starting to look interesting again, and in some pockets are beginning to compensate investors for the risks in the market. On a relative basis, the investment grade market looks more appealing than the high yield space. Although spreads are notably wider in high yield versus 12 months ago, the lack of supply has kept a lid on valuations becoming even cheaper. New issuance in high yield has been extremely muted, with even high-quality issuers avoiding coming to market as they anticipate that funding costs will be unfavorable. However, investment grade issuance broadly continues, and as a result, it has put more pressure on spread levels. In credit overall, we will continue to be selective both in investment grade and high yield, preferring to take more risk only when the risk/reward tradeoff is more apparent. But this is something we will continue to watch closely.

Within emerging markets, we continue to take a cautious tone in the face of continued global risks. In many ways, emerging market economies face the same inflation and growth headwinds as their developed market counterparts. The exception are countries that are commodity exporters, in particular ones that have benefited from the rise in oil prices. Given present macro risks, issuance has been relatively muted in the emerging market debt sector and we expect that to continue headed into 2023. As always, we focus on owning issuers with strong balance sheets and attractive relative value, but we are prepared to be more tactical in this environment. With uncertainty continuing, we expect mispricings to occur, both within competing emerging markets debt issuers but also in comparison to developed market corporates, which we will continue to exploit.

Long-Term Rising Trend in Volatility Continues, Which Will Favor Active Investors

Volatility is rising and, we believe, here to stay, especially as the Fed and other central banks are no longer in the business of supporting markets the way they have since the Global Financial Crisis. Higher volatility generally favors strategies with 1) more investment flexibility, 2) a focus on downside protection, and 3) a team and process that puts a premium on quick decision-making and execution.

Outlook

Rates

Central banks are laser focused on price stability and believe their aggressive policy will bring inflation directionally downward. However, the market believes this will also require weaker growth and some suppression of a so far resilient labor market.

U.S. Corporates

Overall yield levels now look reasonable, though high yield valuations are on the tighter side versus underlying risks and we are therefore cautious to add. Continue to surveil secondary market as the primary in high yield remains essentially shut down.

Securitized (ABS/RMBS)

Consumer balance sheet remains vigilant through financial market volatility and rising costs. Continue to remain cautious on subprime given this cohort is under the most pressure in the current environment.

Emerging Markets

Remain cautious given still uncertain macro picture. We believe this environment will create security-level mispricing for which we will look to exploit. Timing will be based on domestic and global trends.

Positioning

Rates

Rates appear near fair value given the balance of growth and inflation risks. We continue to incrementally add or subtract duration opportunistically and in response to near-term rallies and back-ups.

U.S. Corporates

Focus on names with less cyclicality, such as utilities, select technology issuers, high-quality financials, as well as bonds that can exhibit lower spread volatility in a risk-off environment.

Securitized (ABS/RMBS)

Favor prime consumer ABS and non-agency mortgage credit. Modest exposure to specified pools within Agency MBS provides fundamental hedge to our consumer credit position should downside growth be realized.

Emerging Markets

Continued focus in areas with high real rates, advanced policy cycles, and improving domestic demand. Prepared to be a bit more tactical should valuations temporarily under or overshoot.

Emerging Markets May Be Well-Positioned for 2023

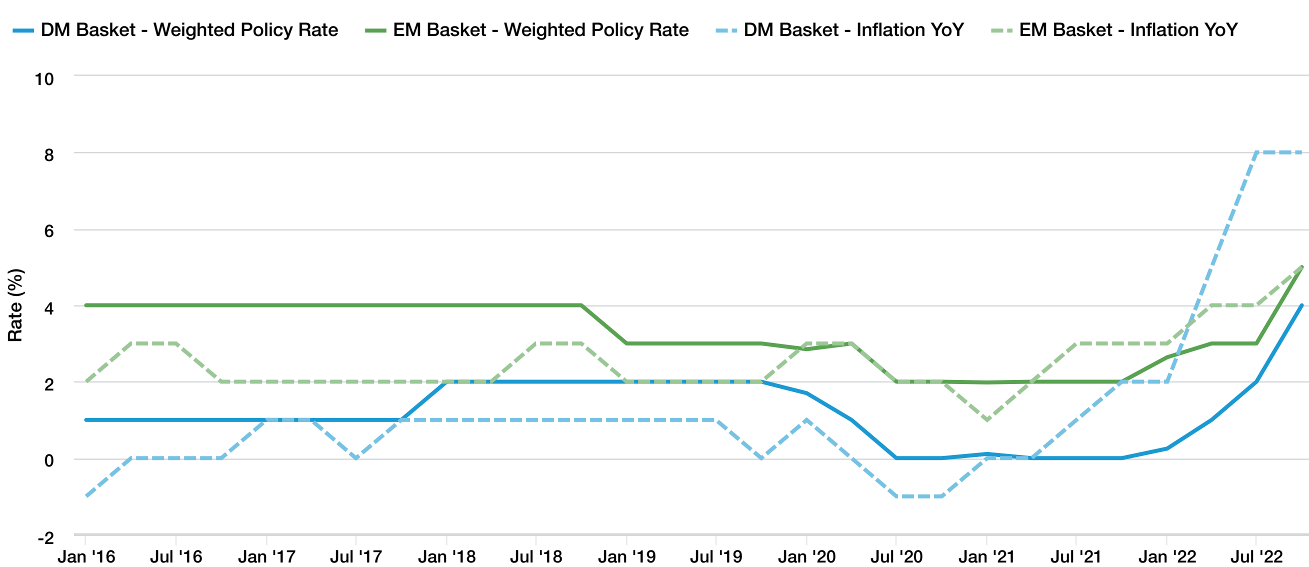
Josh Rubin, CFA
Portfolio Manager & Managing Director

After a highly volatile year, we expect a relatively calmer 2023. We expect many of the major headwinds that faced emerging markets in 2022 will likely moderate going forward, although we are mindful that other challenges may arise. Over the past year, valuations across emerging markets (EM) have fallen significantly from their 2021 highs and look attractive relative to historical levels and when compared to developed markets. Even as global growth slows, we believe EM equity valuations have room to improve in 2023, driven by lower inflation, a peaking U.S. dollar, greater clarity around key political events, and structural shifts within the region.

Evolving Supply Chains and Proactive Monetary Policies Should Dampen Price Pressures

We do not expect the same inflationary shocks that occurred in 2022 to repeat in 2023. Stabilizing oil prices, improving global food supply, and recovery in supply chains should help lower inflation, as well as overall slower growth, weaker demand, and normalized labor markets.

Central Banks Are Not Behind the Curve on Inflation



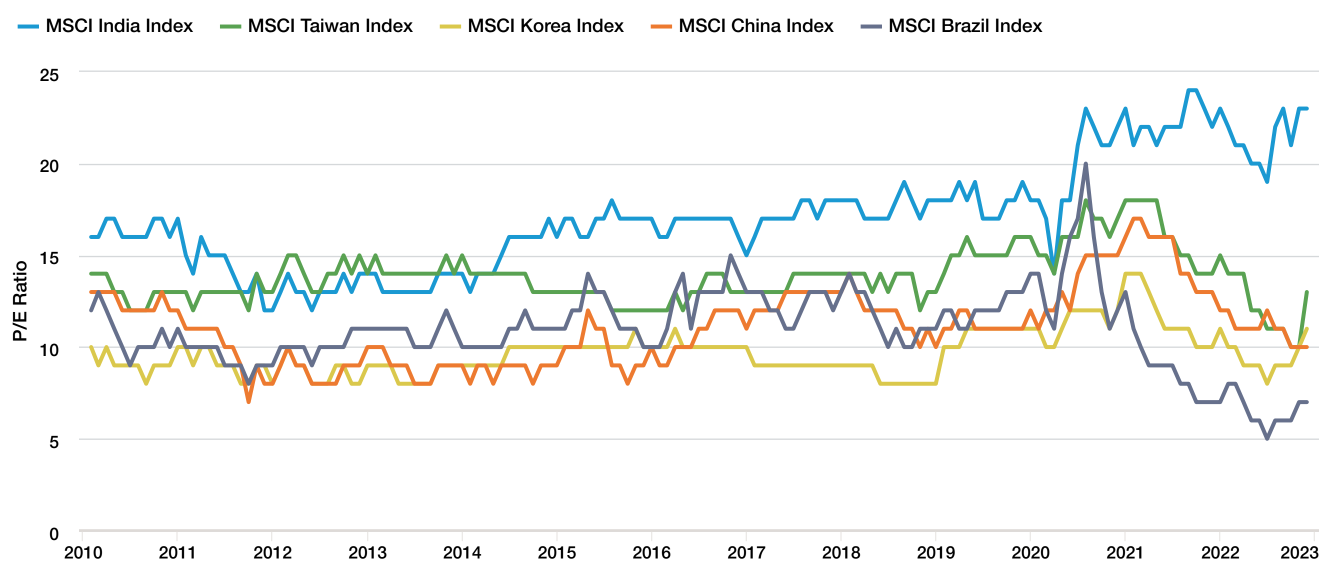
Source: Bloomberg
Baskets are proxies for countries' policy rates and inflation indexes.

Since EM central banks were ahead of the curve in pushing orthodox monetary policies throughout COVID, inflation is only modestly elevated versus historical trends, and real rates remain in positive territory across many major EM economies. As a result, emerging markets seem poised to enter easing cycles earlier than developed markets because of their central banks' monetary discipline.

Emerging Markets Valuations Varied in 2022, but are Generally More Favorable Heading into 2023

Valuations across EM diverged throughout 2022 with India trading at a noticeable premium to other markets like China, Brazil, Taiwan and Korea. Taiwan and Korea faced headwinds this year due to the export-oriented nature of their economies. Political uncertainty was a significant overhang in both China and Brazil, which has led to Brazil trading at its lowest valuation in over 10 years. At current levels, the latter markets' valuations are relatively attractive versus local interest rates, historical levels, and developed markets. Looking ahead to 2023, we expect those markets to re-rate. Taiwan and Korea should be beneficiaries of a recovery in the semiconductor and hardware technology sectors. Brazil could be the first major EM outside of China to enter an easing cycle next year. Meanwhile, China's exit of its zero-COVID policies should be a huge boon to that country.

Emerging Markets P/E Ratios Varied in 2022, but Should Reset



Source: Bloomberg

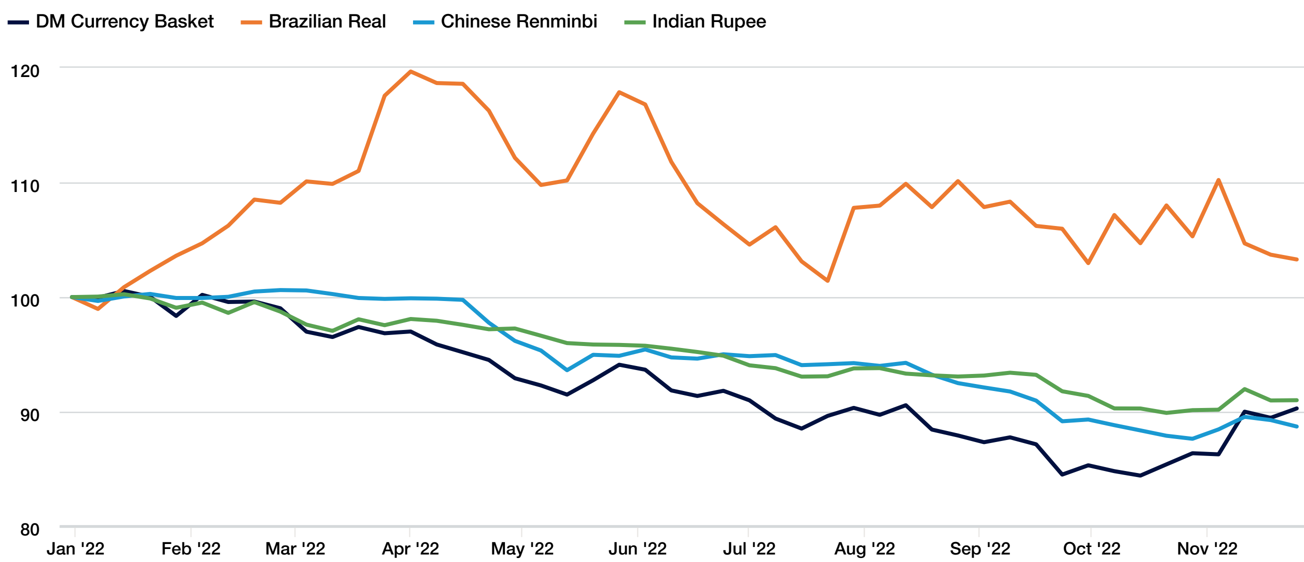
Emerging Markets' Currencies Resilience Should Support Economic Growth

Many EM currencies performed relatively well against a rapidly appreciating dollar this year compared to their developed markets counterparts. Several factors have contributed to their currency resilience. First, emerging market countries navigated COVID with much less stimulus than the developed world, which protected their sovereign balance sheets. Second, EM countries have become less reliant on trade with developed economies over the last decade, so their economies can continue to grow even as demand softens in Europe and the U.S.

These healthy fiscal and trade dynamics, combined with EMs' proactive monetary policies, have mitigated the impact of the strengthening U.S. dollar, particularly compared to international developed markets. The Chinese and Indian currencies have weakened notably less than the euro, yen and other major developed market currencies, and the Brazilian real actually strengthened against the U.S. dollar in 2022.

More stable currencies also help buttress economic growth, which is another reason we have confidence of a recovery in EM economic growth before developed markets in 2023.

Emerging Markets Currencies Are Holding Up Relatively Well against the Dollar



Source: Bloomberg

EM Politics Remain a Priority for Investors, but a Little Less Muddied

Politics will continue to remain top of mind next year as we continue to closely watch events unfold, particularly in China, Brazil, Chile and Russia-Ukraine.

In China, President Xi Jinping was elected to an unprecedented third term in October 2022, thus strengthening his influence over the government. Now that we have visibility into who will lead the country for the next five years, we await further clarity on Beijing's economic and regulatory objectives, particularly around the country's zero-COVID policy and property market. China has announced a series of easing measures towards both issues throughout November and December 2022. Concerning the former, China is preparing its citizens to learn how to live alongside COVID – by applying more targeted virus containment, increasing the number of beds in COVID-designated hospitals, and speeding up its vaccine campaign. In addition, Chinese regulators issued comprehensive guidance on easing financing for the property sector, which should help stabilize property sales and starts in the coming months. We expect more widespread and concrete announcements will be made in March at the 10th National People's Congress.

Meanwhile, voters in Latin America have shown their preferences for more centrist policies. In September, Chileans voted to reject a left-leaning constitution, and we anticipate that next year will bring a more centrist draft and possibly another vote. Brazil elected a left-leaning President in October who will have to govern with a center-right Congress. Corporations and capital market investors will closely monitor Chile's constitutional debate and Brazil's centrist stance next year, amid hopes that more middle-of-the-road outcomes may establish concrete expectations for future investment opportunities.

While we do not have greater insight than others on the conflict between Russia and Ukraine, any resolution will be positive for investor sentiment. Not only will energy prices and food supplies normalize, falling geopolitical tensions would drive risk aversion levels lower.

Emerging Markets Are Themselves a Source of Diversification

While we often talk about "emerging markets" as a singular asset class, EM is actually comprised of more than 20 diverse countries. Even the composition of MSCI EM constantly shifts around, especially after two years of dislocation created by a global pandemic. At the end of October 2022, China's index representation in MSCI EM Index fell to just below 27%, the lowest since early 2017, while the combined weight of Korea, India and Taiwan reached a 20-year high.

This diversification means upside opportunities abound throughout the region. Different countries will benefit from different trends, such as structurally higher commodity prices and multipolar world investing. Meanwhile, it is important to be mindful of idiosyncratic drivers for specific markets, such as India's social and economic infrastructure buildout, the Middle East's reform agenda, and China's shifting growth model under Common Prosperity. Attractive opportunities within emerging markets can be identified through active investing, and we continue to expect strong businesses with high quality growth prospects to perform well in 2023.

Outlook

China

COVID lockdowns continue to take a toll on growth and fuel investor uncertainty. China concluded the 20th Party Congress in October with President Xi Jinpeng elected to a third term. While short-term uncertainty remains elevated, the potential for a robust economic reopening in 2023 represents a unique catalyst.

India

Indian equities continue to be resilient amid global uncertainty, but equity valuations remain expensive relative to both EM peers and their longer-term historical average.

North Asia

Export-driven markets in North Asia, such as Taiwan and South Korea, face challenges as softening expectations for global growth pressure global trade.

Latin America

Inflation, domestic interest rates and political uncertainty appear to have peaked across much of the region, yet valuations still remain below historical averages.

EEMEA

Tailwinds from rising energy and commodities prices are abating but select opportunities across the region remain attractive.

Positioning

China

Amid zero-COVID, we favor laggard reopening stories and compounders, who may benefit from a reopening in 2023. We remain cautious on Internet names and companies with elevated levels of regulatory/policy uncertainty.

India

Elevated valuation levels limit the number of attractive opportunities relative to other EM markets. We continue to target Indian companies that fit our characteristics of a strong business and trade at reasonable valuations.

North Asia

Underweight the region, especially companies more exposed to external growth and the broader semiconductor cycle.

Latin America

Improving economic dynamics, increased political clarity, and attractive valuations are providing opportunities to establish positions in a variety of strong businesses where prices have dislocated from fundamentals.

EEMEA

Underweight the region, but finding select opportunities as the economic landscape stabilizes.

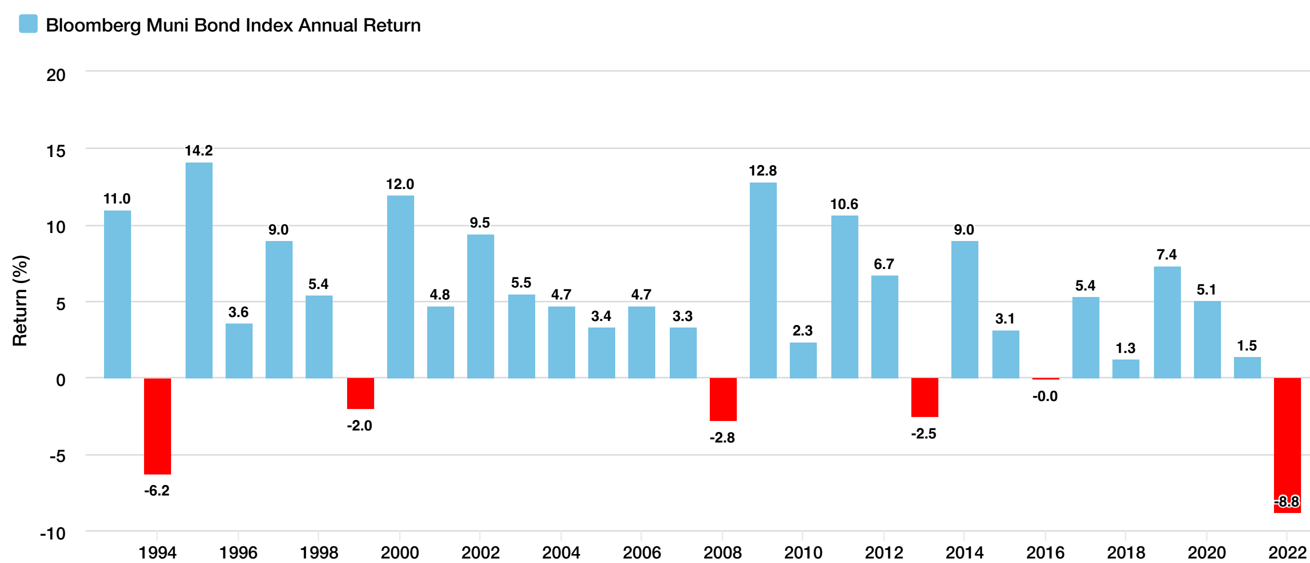
Income Will Once Again be the Primary Driver of Municipal Bond Total Returns



David Ashley, CFA, Eve Lando
and John Bonnell, CFA
Portfolio Managers and
Managing Directors

The streak of eight consecutive years of positive total returns for the broad municipal market came to an end in 2022 as the Bloomberg Municipal Bond Index posted its worst return in more than 30 years. The year was dominated by aggressive Fed tightening, persistently high inflation and growing concerns over a central bank induced recession, which led to a spike in yields and a decline in bond prices.

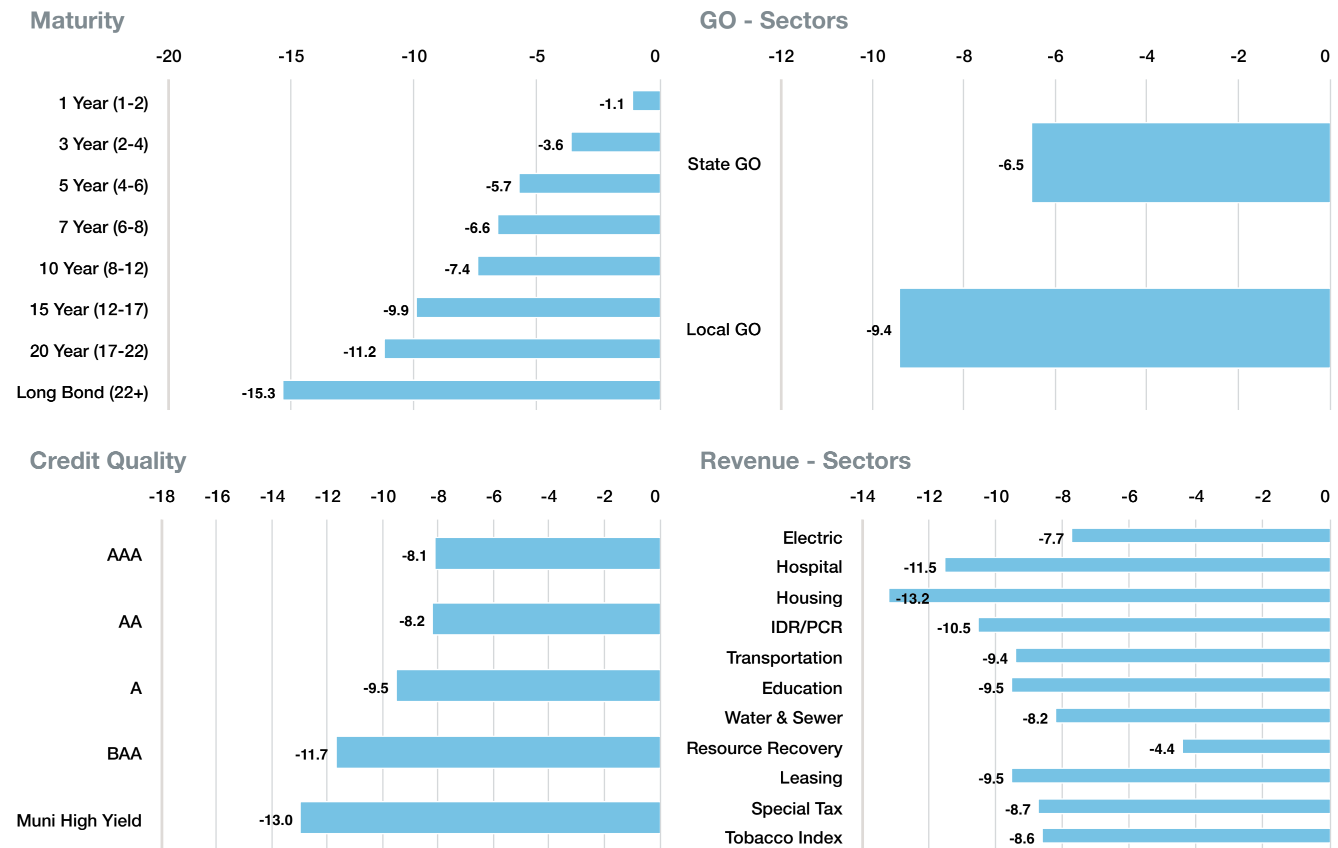
History Suggests that the Muni Bond Market Will Rebound in 2023



Source: Bloomberg. Returns as of November 30, 2022.

Municipal yields finished higher across maturities while spreads widened across both credit quality, sectors, and states as investors became more discerning about the bonds owned heading into an economic slowdown. The spike in yields led short maturity bonds to outperform long maturity bonds while the widening of credit spreads led higher rated bonds to outperform lower quality bonds for the year.

Returns Were Decidedly Negative Across All Maturities, Credit Ratings, and Sectors in 2022



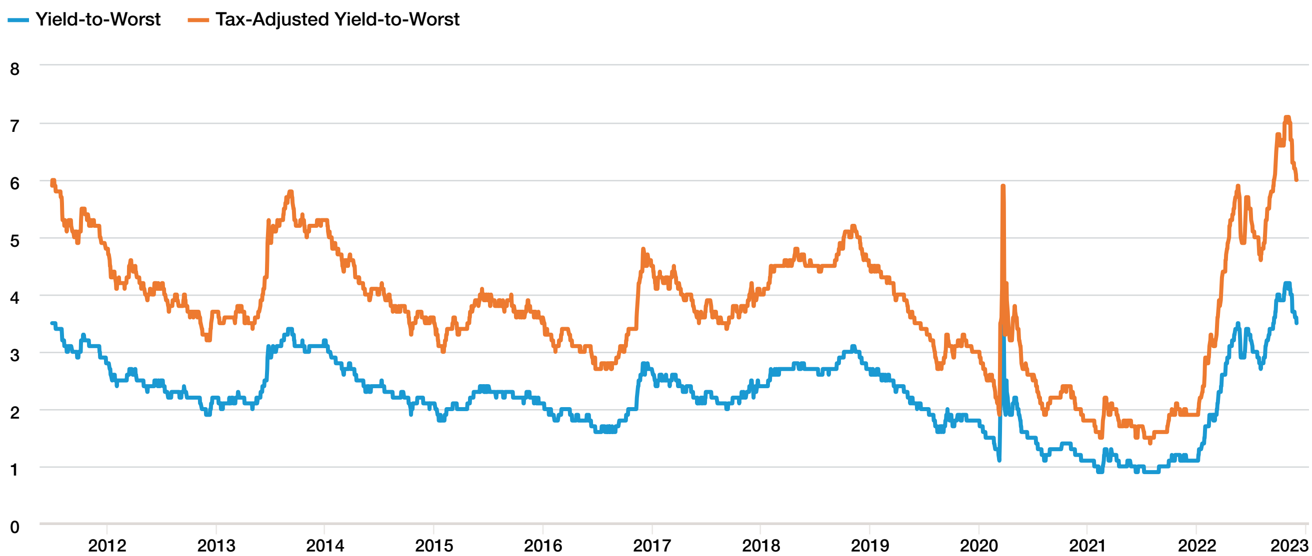
Source: Bloomberg. Returns as of November 30, 2022.

Yields Will Once Again Drive Total Return

Yields were up significantly in 2022 as the fixed income market focused nearly exclusively on inflation and the Fed's late but aggressive reaction to swiftly rising price pressures. While negative price returns should be expected in periods of rising rates, the low starting point for yields exacerbated the negative performance for the year. Bonds purchased as recently as summer of 2021, when the broad market index was yielding less than 1%, lacked the income cushion that existed in prior periods of Fed rate hikes that helped offset the impact of price declines on total returns.

Investors who purchased bonds in 2019, 2020 and 2021 did so in a period of falling yields and rising prices which led to total returns driven by price returns, not income, which is uncharacteristic in the muni market. Over the last 30 years, 90% of the total return of the broad market index has been attributable to income and only 10% to price returns. The broad market index yielded over 3.5% in early December after briefly eclipsing 4% for the first time in a decade. Considering income is the only component of total return that is tax-exempt for municipal investors, it becomes even more attractive when adjusted for federal tax rates as seen in the chart below.

Municipal Bond Yields Surged in 2022, amid Aggressive Fed Tightening



Source: Bloomberg

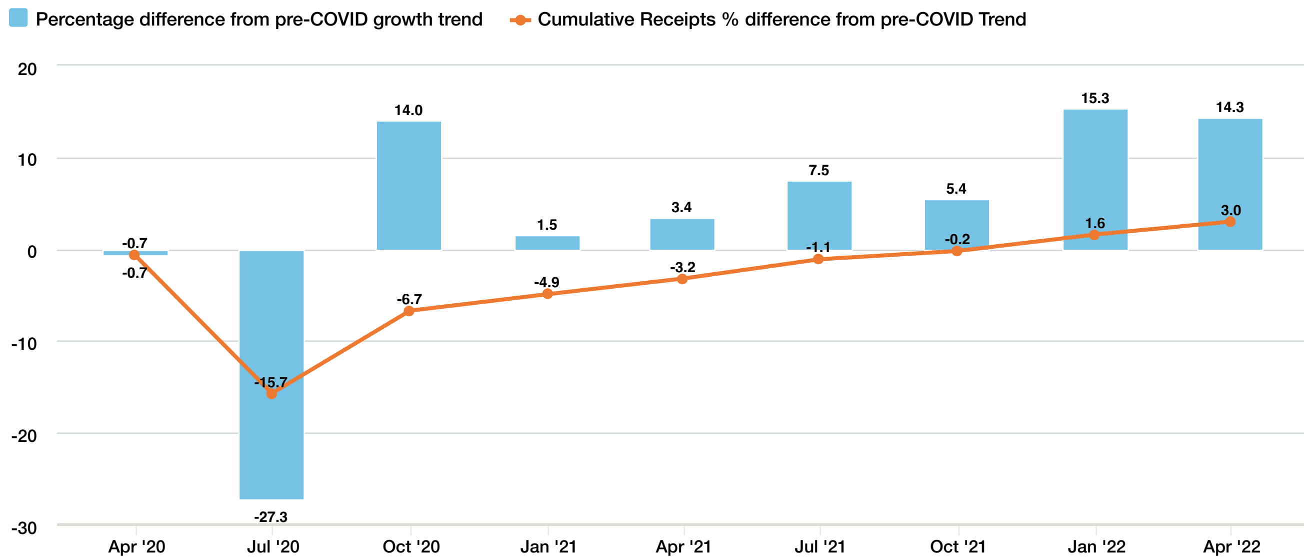
Regardless of which direction interest rates move in 2023, investors who may have extended the duration of their portfolio by purchasing longer maturity bonds or who reduced the credit quality of their portfolio by purchasing lower quality in reaction to the Fed's Zero Interest Rate Policy (ZIRP) now have an opportunity to reduce those risk exposures while maintaining the yield level of their portfolio. Before the strong market rally in November 2022, the yield on a 1-year AAA was higher than the yield was on both the 30-year AAA muni and the High Yield Muni Index at the end of 2021.

Municipal Credit Quality Will Likely Peak while Defaults Should Remain Low

Municipalities weathered the COVID-induced economic shutdown, proving their resiliency by emerging from the pandemic in very strong financial positions. Municipalities came into the pandemic in strong positions as revenue growth outpaced expense growth during the 10-year economic expansion, which allowed many to build record reserve balances. Even during the pandemic, personal income, property and sales tax revenue all performed well, exceeding expectations in some cities, counties and states, while federal stimulus money and internet sales tax revenues added billions to municipal coffers.

State revenues eclipsed the previous peak and many states once again amassed reserve balances that eclipsed the record levels set in 2019. However, with an economic slowdown looming and the federal stimulus spigot about to turn off, municipal revenues and overall credit quality have likely reached a peak for the current cycle. Still, we don't believe investors should be alarmed or fear that this will lead to a large uptick in defaults. In fact, the case for 2023 may be quite the contrary.

State Revenues Topped Pre-Pandemic Levels of 2019



Source: Pew Institute

Defaults in the municipal market are rare for general government and municipal utility bond issues. Defaults that have occurred were often the result of years of financial mismanagement, poor governance and a lack of political will to make the hard decisions. Defaults have not been the result of rapidly deteriorating revenues or an economic slowdown. We anticipate that municipal defaults will remain low in 2023 but investors can expect pockets of stress to emerge. Areas that were hardest hit by COVID, such as continuing care retirement centers (CCRCs) who have been unable to attract new residents or rural, single site hospitals that suffered from the suspension of elective surgeries at the onset of COVID or from the reduction and delay of federal reimbursement payments are likely to come under pressure. Also, project finance deals that relied upon growth projections and revenue targets based on assumptions that the economic expansion would continue will also face challenges.

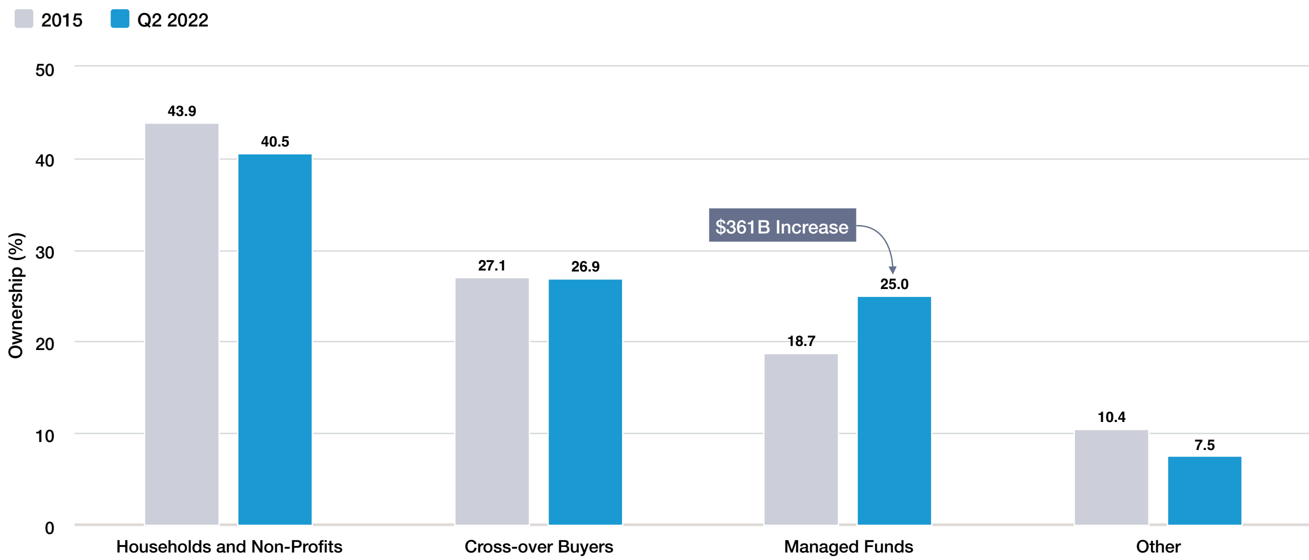
Investors may be wise to reduce credit risk in their portfolios to prepare for the challenges that may arise in 2023 or look to active managers with the credit research and expertise necessary to understand the covenants and avenues of recourse available for every bond they purchase.

Fund Flows, Not Supply, Will Continue to Drive the Market

The municipal market has historically been driven by technicalities and timing. Nearly half of the outstanding debt owned by households consisted of individual investors that held bonds until maturity while reinvesting a large portion of the coupon and principal payments they received back into the market. Investor behavior, coupled with market nuances such as a large portion of bond issuers making coupon payments in the months of January and July, created seasonal demand for bonds.

But that has changed. Assets have shifted from buy-and-hold investors and into professionally managed mutual funds. As a result, municipal mutual fund assets have increased from $500B to almost $1T as their ownership share of municipal debt has grown from 12% to 25%. The buyer base will continue to evolve as investors move from “do-it-yourself” portfolios to managed funds and separately managed accounts. Issuers find themselves swimming in federal COVID aid and increased tax revenue, and not needing to borrow in the municipal market. As a result decreased new issue supply has been met by increased retail demand through mutual fund flows, which has emerged as the dominate technical driver over the last several years. But this new driver (and the resulting imbalance between supply and demand), coupled with rising interest rates, has created plenty of volatility, and we expect both retail flows and accompanying volatility to continue in 2023.

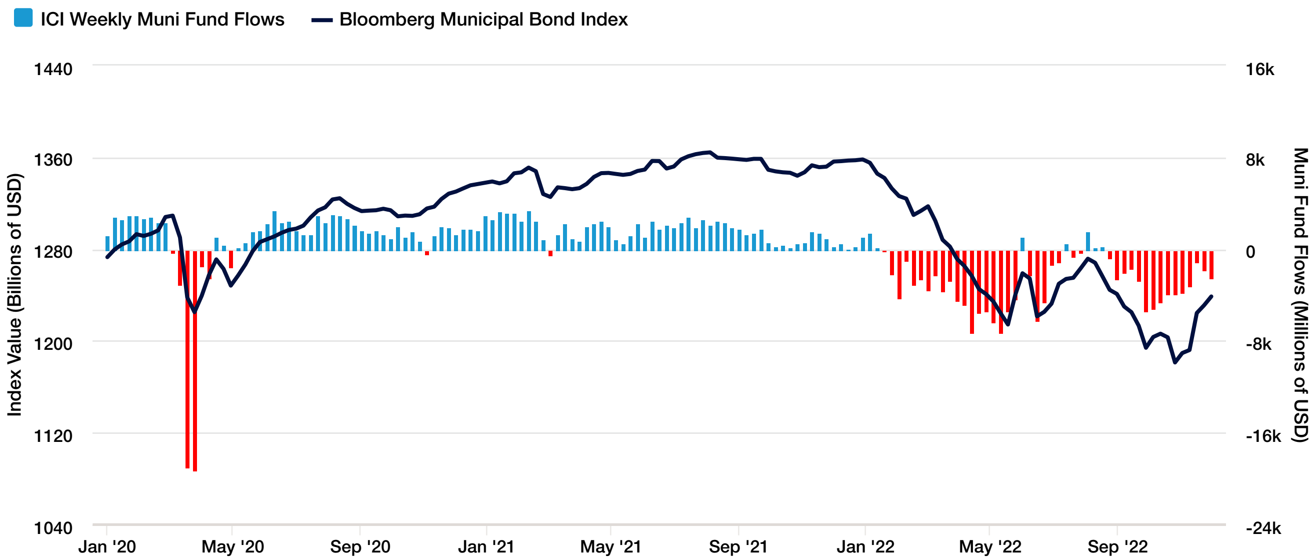
Managed Funds Are Absorbing a Larger Share of Outstanding Municipal Bonds



Managed funds are mutual funds, ETFs and closed end funds. Crossover Buyers are banks, property and casualty insurance companies and credit unions.
Source: Federal Reserve

The negative index performance in 2022 was primarily caused by rising rates but was exacerbated by retail investors pulling $125 billion out of municipal bond mutual funds. Exchange Traded Funds, in contrast, gained market share as investors took advantage of tax loss selling and moved the assets into municipal bond ETFs. As a result, municipal bond ETF assets under management grew to over $90B at the end of Q2 2022, eclipsing closed-end fund assets for the first time ever. ETFs offer advantages for investors interested in broad market exposure or a temporary parking spot, but their structure also includes risks that are unique to fixed income and municipal bonds. Primary among those risks are liquidity squeezes, which may leave ETFs trading at a discount to their net asset value.

Outflows from Mutual Funds Persisted in 2022



Source: ICI

Looking forward to 2023, we expect a return to normalcy in the sense that income will be the primary driver of total return going forward for the asset class, yields will remain in more normal ranges driven by the end of the Fed's zero interest rate policy and municipal issuers will be resilient in an economic slowdown while defaults remain rare. However, we also expect the municipal market will continue to undergo structural changes. These trends, combined with increased volatility, underscores the need for professional management in the sea of change that is the once-staid municipal bond market.

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Outlook

Rates

The spike in rates, while painful for bond prices, allows investors to once again earn an attractive level of tax-exempt income. The Fed remains committed to more rate hikes in 2023, however, and the inversion in the Treasury curve signals that the market believes the Fed will overshoot, tip the economy into recession and be forced to cut rates sooner than expected.

Spreads

Differentiation across states, sectors and credit quality should re-emerge as investors become more discerning about the bonds they own. A central bank induced recession, along with an end to Federal stimulus dollars, could spark additional spread widening.

Sectors

The municipal market is not immune to inflationary pressures but there are areas that offer some protection. Sectors that finance long-run, hard assets such as education and healthcare, or municipal utilities that operate government monopolies with inelastic demand offer desirable anti-inflationary traits.

Defaults

Municipal defaults will likely remain low but may increase from 2022. Economically sensitive areas will come under pressure if the U.S. enters a recession. Areas such as healthcare, senior living facilities and project finance deals are already feeling inflationary pressures.

Positioning

Rates

The municipal curve has remained very flat inside of 10-years and beyond 20-years with most of the yield pick-up between 10 and 20-years. Despite the flatness of the long-end of the curve, long maturity municipal yields look attractive on a relative basis to Treasuries.

Spreads

Areas that historically offered attractive spread opportunities in the revenue space are areas of focus. However, should heightened price volatility continue, the price paid for a bond will be as important for returns as our credit research to identify specific opportunities.

Sectors

City, state and county G.O. debt is attractive based on the issuer's financial flexibility at this part of the cycle. As are essential service revenue bonds for large metropolitan areas. Pockets of opportunity exist in other sectors that offer attractive relative value and incremental income opportunities.

Defaults

Absolute yield levels no longer require adding credit risk to earn an acceptable level of income. We will look to add credit on market weakness, but selectivity is paramount as is the financial flexibility of an issuer and their ability to control revenue and expenses.

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