

EM Local Government Bonds

From de-dollarization to diversification

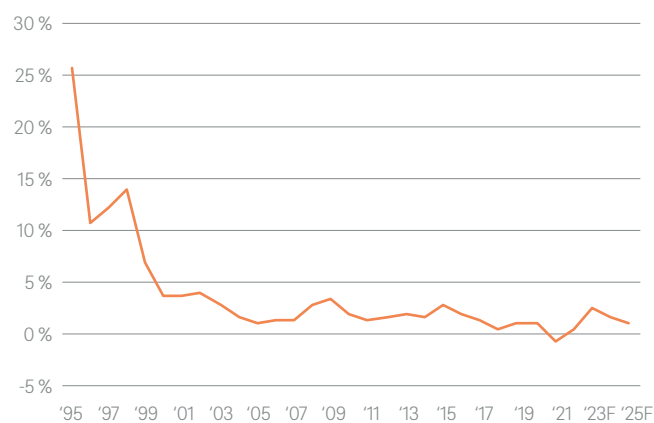
Executive Summary

- EM local bonds remain an “under-owned” and “under-appreciated” asset class at a time when access to diversified fixed income is more important than ever.
- Against a backdrop of slowing inflation and a weakening US dollar, foreign investors may want to reassess the asset class, which has undergone a significant transformation as underlying economies have matured, reduced their dependence on developed markets and raw materials exports.
- Contrary to popular perception, default and interest rate risks are less pronounced whereas currency risks are diversified, while the real yield potential is significant in EM local.
- EM local remains an asset class which offers natural diversification to investors opting for a broad asset allocation.
- Beyond traditional benchmark allocation, there are established market access routes to the largest growth poles, China and India, which allow investors to benefit from their growing integration into the global financial system.

EM local government bonds: Back on the radar

Emerging Market (EM) local currency bond markets have made a strong comeback this year, outperforming EM hard currency bonds by over 5% year-to-date. After a decade of underperformance, the latest market cycle cast a new light on this asset class. In the first half of 2023, investors globally allocated more than USD 1bn to the EM local asset class, making up the bulk of the overall global flows in Emerging Market fixed income¹.

Figure 1: Average CPI of local GBI-EM index members vs. US CPI YoY%.



Source: Bloomberg, JP Morgan, DWS International GmbH calculations. As of June 2023.

While this mildly positive investor sentiment may seem anecdotal, we observe three major trends underlying it:

- **Developed Market interest rate cycle is topping out:** As of mid of July market expectations point to a moderate policy rate path until year end, especially in the US. Therefore, one of the dominant headwinds the EM local assets class experienced might be fading. In the recent past the speed and intensity of DM central banks hikes (4% in Europe and Australia and 5% in the US in a 12–15-month period), undermined the attractiveness of emerging market local currency bonds.
- **Low EM-DM inflation differential:** Inflation in EM has recently been low relative to DM economies, even dipping below the US inflation rate in 2021. As a result, EM bonds have become more attractive on a real yield basis. Several large issuers, such as Brazil or Mexico, are now offering ample yield above the current and expected rate of inflation.
- **Stability and recovery in EM currencies:** The currencies of many emerging markets have been stable or even recovering in recent months. As “dollar-strength” fades, EM currencies may recover from their multi decades low reached in the fall of 2022².

For the discerning investor, however, these factors are merely the icing on the cake. The real benefit of an EM local allocation may lie in the structural inclusion of emerging market local debt in a fixed income portfolio to help unlock diversification benefits. This is a role that an allocation to developed market bonds may not adequately fulfill, as recent periods of highly correlated interest rates and credit spreads demonstrate³.

At first sight, the inclusion of EM local for such risk management may appear unconventional. Last year alone external events including Russia’s war in Ukraine, policy uncertainties in China, and one of the most pronounced tightening cycles in developed markets, had a notable impact on the performance and volatility of EM local bonds. However, on closer inspection this period also serves as a reminder that it is crucial for EM investors to differentiate between the standalone risk level and risk contribution in the portfolio context associated with an EM local allocation. The latter is a more relevant indicator when integrating EM local allocations into existing prevalently DM-centric fixed income portfolios. As we will explore in the following moderate inclusion of EM bonds, both in hard and local currency, to standard global Fixed Income benchmarks are a powerful means to reduce overall volatility.

¹ Source: Bloomberg LP, as of 12/07/2023. Comparing USD performance of JPM GBI-EM Global Div index (JGENVUUG) vs JPM EMBI Global Div index (JPEIDIVR)

² As measured by Deutsche Bank Emerging Market Currencies Basket Index (DBFXEMC)

³ A topic we have also discussed in our Investment Insight publication on inflation Three tales of inflation: The Good, the Bad and the Ugly

EM local government bonds: A primer

Over the past decades, EM local debt has experienced a renaissance. After the emerging market financial crisis of the 90s, countries that were able to refinance in local currency did so to manage external vulnerabilities resulting from hard currency financing. At the same time, EM economies have demonstrated rapid economic development, which has attracted investors to these local debt markets. Today, investable EM local currency debt markets are about ten times the size of their hard currency equivalents. Recent initiatives aimed at enhancing market access, most notably in China and India, have further improved representativeness of EM local markets and have even given rise to investable single country exposures.

A closer look at EM hard currency and EM local currency indices reveals that the overall country exposure differs significantly (see figure 3). For example, the JPMorgan EMBI Global Diversified index, the most widely used hard currency proxy, covers a group of up to 70 countries, while the JPMorgan GBI-EM Global Diversified index, the most widely used local currency proxy, includes only 20 countries. Looking deeper, two things stand out: (i) the EM local currency indices and their underlying countries are more closely aligned to EM equity indices, a fact that many global multi-asset allocators will appreciate when aligning country risks, and (ii) although local currency debt is commonly perceived as riskier, the underlying selection of countries shows a higher degree of development, as frontier markets do not have the privilege to attract sufficient interest in local currency debt and are tied to issuing hard currency debt. This is also reflected in the two-notch better rating of local currency debt indices over hard currency.

Figure 2: EM local vs. EM hard – Key features

	EM Hard Currency Sovereign	EM Local Currency Sovereign
Market size	Approx. \$1.5trn	Approx. \$12trn
Return drivers	US Duration and Credit Spreads of EM Country	FX and Local Duration
Key risks	Downgrades / defaults Long Duration Profile	Currency Volatility
Liquidity	High & easy to access	High & difficult to access
Benchmark Index	JP Morgan EMBI (Global Diversified)	JP Morgan GBI-EM (Global Diversified)
Countries	70	20
Local Yield	7.5%	7.25%
Duration	6.6	4.8
Average rating ⁴	BB+	BBB

Source: DWS International GmbH, JP Morgan indices, as of June 2023

Figure 3: EM local vs. EM hard – Differences in country exposure

Country	Region	EM Hard Currency Sovereign	EM Local Currency Sovereign
Brazil	Latin America	3.3%	10.5%
Mexico	Latin America	5.2%	10.2%
Indonesia	Asia Pacific	4.9%	9.8%
China	Asia Pacific	4.4%	9.5%
Malaysia	Asia Pacific	2.4%	9.5%
Thailand	Asia Pacific	0.0%	9.5%
South Africa	Middle East/Africa	2.8%	9.0%
Poland	Europe	2.1%	7.7%
Czech Republic	Europe	0.0%	5.6%
Colombia	Latin America	2.8%	4.8%

Source: DWS International GmbH, as of June 2023, EM Hard Currency Sovereign reflects JPMorgan EMBI (Global Diversified) and EM Local Currency reflects JPMorgan GBI-EM (Global Diversified)

To understand the diversifying nature of EM local bonds, a further decomposition of risk is required. First, investors need to understand that although both EM hard currency debt and local currency debt are government bonds, only local debt is effectively priced the way that DM government bonds are priced. For example, USD denominated EM hard currency debt, is not only priced in USD but would also be priced on the USD curve - making it effectively a spread asset like any USD corporate or high yield bond. The credit spread here reflects the sovereign risk. Bearing in mind that EM sovereign defaults on hard currency debt have been double the long-term average over the past 5 years, and almost triple the long-term average in 2022 alone⁵, EM hard currency investors experience an additional headwind. At the same time outright defaults are rather infrequent on EM local debt, although debt deflation via inflation and currency depreciation remains a risk.

The implication is that local currency investors face country-specific interest rate risk, meaning that changes in domestic interest rates can have a direct impact on the performance of EM local bonds. In contrast, EM hard currency bonds are exposed to US (or any other hard currency) interest rate movements - a risk that many hard currency investors have faced in recent months as US rates rose rapidly. Historically, investors have been willing to bear these risks, as it also means that their currency exposure is denominated in hard currency. However, recent episodes of significant volatility in developed market currencies have shown that EUR or GBP-based investors also face non-negligible currency risks when buying USD assets.

⁴ Average rating based on Bloomberg Composite Credit Ratings

⁵ Source: S&P Global Ratings. Default, Transition, and Recovery: 2022 Annual Global Sovereign Default & Rating Transition Study

Figure 4 illustrates the relative importance of these different factors in the context of an ex-ante risk assessment from the perspective of a USD-investor. Our main conclusions are:

- FX is by far the largest risk driver of the EM Local asset class.
- Diversification is important in managing interest rate (duration) risk: The fact that EM local-currency debt is exposed to domestic EM yield curves, which will have both different paths between them as well as lower duration on average, helps to manage interest rate risk concerns significantly. EM local interest rate risk is therefore not only lower but also less correlated with traditional fixed income allocations.
- EM hard currency is not without its currency risks: They are not visible from the perspective of a USD investor. However, they are relevant for most European investors and have the potential to distort the overall risk picture. EUR or GBP denominated investors should separately account for the USD currency risks when making their allocation.
- Overall, EM local and EM hard currency solutions have similar levels of absolute risk. However, as noted above, the various drivers will show little correlation between EM and DM, so we will explore relative risk in a portfolio context at a later stage.

Despite the attractive and inherently diversifying characteristics of EM local bonds, they remain significantly under-represented in the portfolios of many global investors. This under-representation is straightforward to observe in both global equity and fixed income portfolios: only 14% of the MSCI All Country World Index is made up of EM assets. On the fixed income side, the disparity is even more pronounced, with only 12% of the Bloomberg Global Aggregate exposed

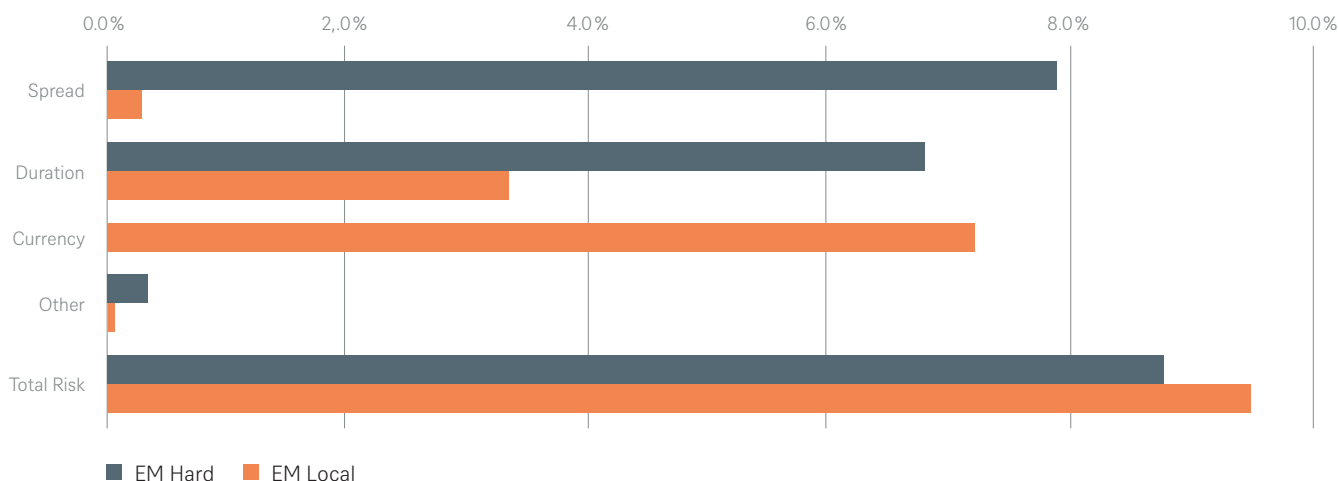
to EM, and most of this exposure in hard currency debt. As a result, foreign ownership of local currency debt is estimated at only 15%, with significant differences across countries. These statistics highlight a remarkable disconnect between portfolio representation and economic reality, with emerging markets accounting for 30% of global GDP and contribute more than half of global economic growth.

Will this time be different?

Nevertheless, with underinvestment being a reality for decades, and no structural catching-up, investors may legitimately ask why this time is any different. The answer may lie in the more recent history of emerging markets. Not only have emerging markets outperformed developed markets in terms of growth over the past few years, but they have also undergone significant changes that will affect the behaviour of the asset class going forward. Historically, a recurring concern among investors has been the link between commodity price dynamics and emerging market performance. This link became particularly pronounced in the aftermath of the 2007-2011 global financial crisis, when emerging market equities and hard and local currency fixed income markets were heavily influenced by commodity prices.

A closer look at the recent history of emerging market performance reveals a reality that starkly contradicts this prevailing view. The MSCI EM index, for example, has undergone a significant shift over the past two decades, with consumer discretionary doubling in weight, while energy and materials have halved in relative importance - a reflection of the underlying structural change that has reduced the external vulnerability of many emerging markets (see figure 6).

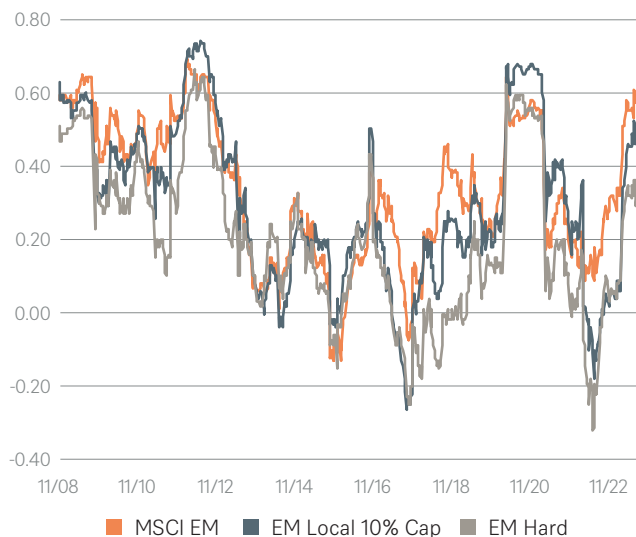
Figure 4: Ex-ante risk factor breakdown



Source: Bloomberg PORT, EM Hard Currency Sovereign reflects JPMorgan EMBI (Global Diversified) and EM Local Currency reflects JPMorgan GBI-EM (Global Diversified), as of June 2023

Figure 5 & 6: The changing face of EM

EM Performance ≠ commodity performance
Rolling correlation weekly returns vs. CRB US Spot All Commodities

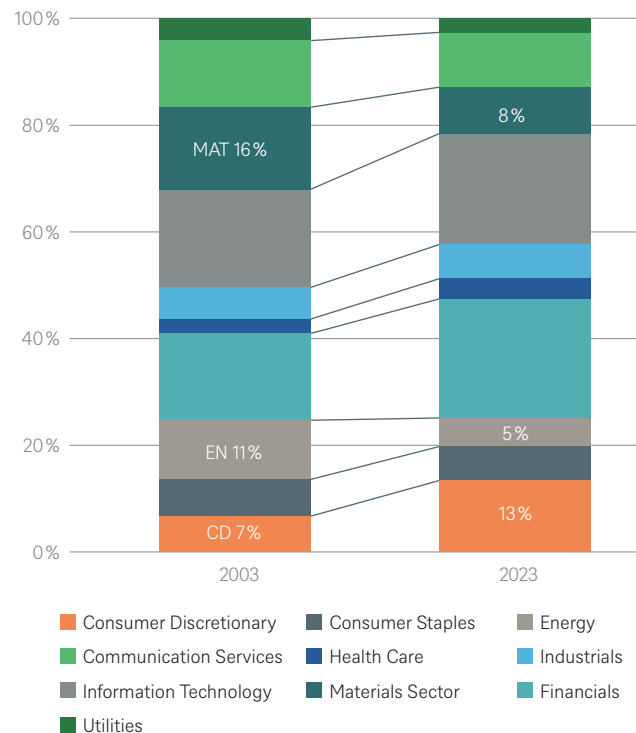


Commodity correlation	MSCI EM	EM Local	EM Hard
Until 2012	0.54	0.51	0.41
Post 2012	0.20	0.17	0.10

Source: DWS International, Bloomberg, as of May 2023

Past performance does not predict future returns. Based on Commodity Research Bureau BLS/US Spot All Commodities, MSCI Emerging Markets Index, J.P. Morgan Government Bond Index Emerging Markets Global 10% Cap 1% Floor, J.P. Morgan EMBI Global Total Return Index.

Equity indices reflect changing economic realities
MSCI EM sector composition per MSCI EM sector composition May 2023 vs. May 2023



In addition to these structural reasons to reconsider the asset class, investors should also be mindful of another current driver: the present inflation landscape. Historically, inflation has been a key piece of the puzzle in explaining the (under-) performance of local EM debt. Elevated inflation levels over time tend to be reflected in exchange rates and a long-term analysis shows that EM local currencies experienced an average annual depreciation of around 2.1 percentage points since December 2002. As we enter the second half of 2023, however, inflation in emerging markets appears to be well under control. Today, there is little difference between emerging and developed markets, Brazil or Mexico for instance even have lower inflation than Germany or the UK. Moreover, looking at inflation forecasts, expectations appear to be on a similar trajectory. This may reduce downward pressure on foreign exchange rates that have hampered performance in recent years.

At the same time, controlled inflation may not only help to suppress devaluation risks, but also moderates interest rate risks. In recent months, EM central banks have become more reactive, following the lead of their DM counterparts but

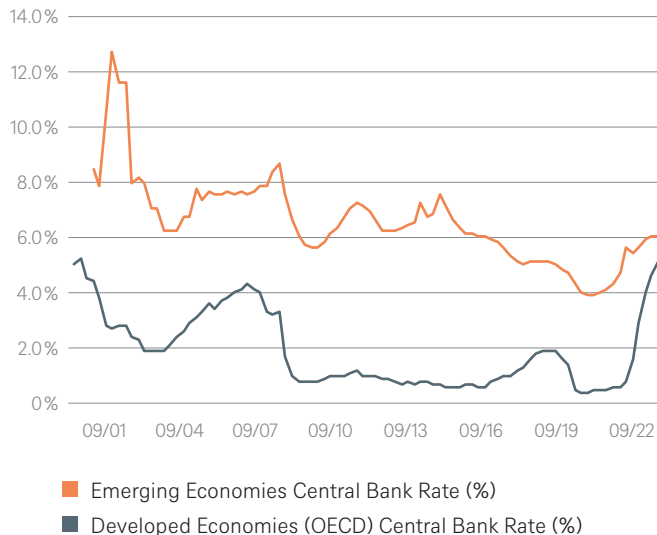
without the sense of urgency to fight inflation that many DM central banks felt. A “peaking” of DM inflation rates may also be followed by less EM central bank action.

The upshot of this is that as we enter a potentially more stable period for EM currencies, inflation and interest rates, the environment is conducive for investors to focus on the real yield of countries, a comfort they have not always had in the past. Countries such as Brazil and South Africa look attractive on a real basis, with yields of 6% or more, while Eastern European countries currently offer real yields that look less striking, even when compared to moderately negative real yields offered by many DM countries. To embed an additional quality lens, we like to use an indicator of fundamental strength, a blended sovereign quality indicator that we have been using in EM index construction since 2016⁶ (see figure 9). In particular, the largest index weights (including Brazil, Thailand, and Mexico) perform well on both dimensions. However, the significant dispersion within this group of countries also argues for a balanced and diversified local investment approach that lends itself to passive implementation.

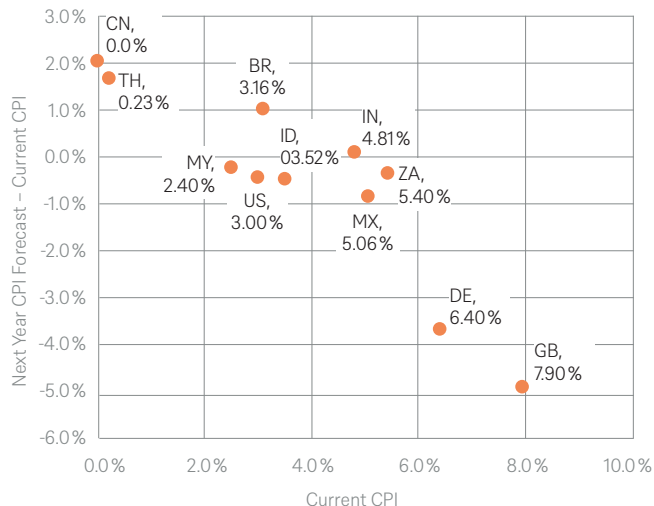
⁶ The fundamental strength is best understood as a blended indicator of the following single country datapoints: GDP per capita in USD, GDP growth, Inflation, National debt in % of GDP, National debt in % of exports, Reserves in % of GDP, History of default, and Global competitiveness indicator

Figure 7 & 8: EM inflation is well under control

EM central banks now mostly responsive to DM actions
Average central bank policy rates



Absence of inflationary pressure in EM
Current year on year CPI and forecast inflation for the next calendar year



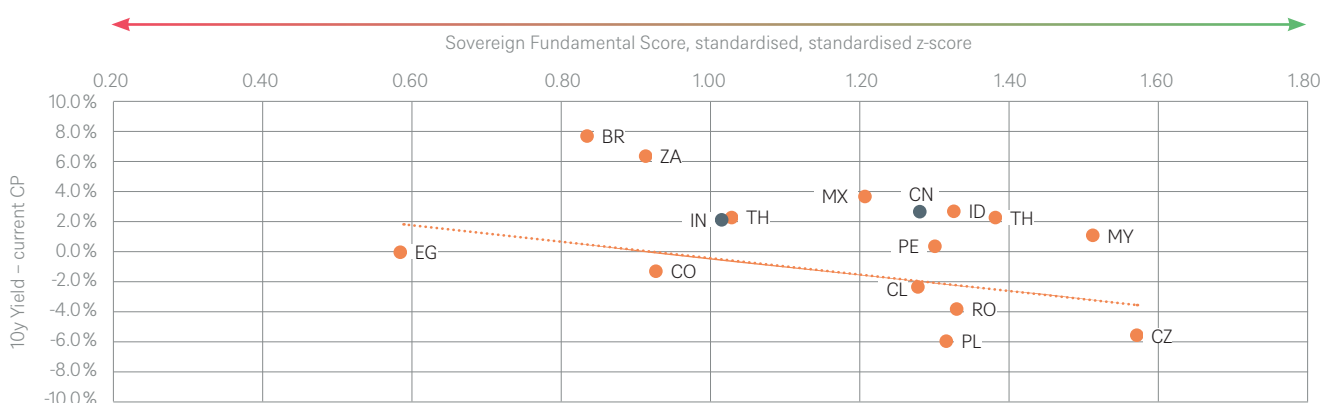
Forecasts are based on assumptions, estimates, views and hypothetical models or analyses, which might prove inaccurate or incorrect. Source: DWS International GmbH, as of May 2023

Investors should be aware that a snapshot analysis of emerging markets may not reflect the structural opportunities in core EM countries such as India and China, which have become global growth centers. When it comes to these two countries, investors may also want to include the role of currency drivers, which we have purposefully ignored for any medium-term assessment of the EM asset class above. A natural consequence of rapid development is that EM currencies, especially

those of countries that accumulate wealth, will become more important on the world stage. The inclusion of the renminbi in the IMF’s reserve basket in 2016 has already marked the beginning of this transition. With a similar rise in India’s global role, the rupee could attract more attention in the future. This is not only an important driver of de-dollarisation, but also an important potential return driver that investors with the appropriate investment horizon may want to consider.

Figure 9: Assessing opportunities in EM through a quality lens

Real yields vs country fundamental scores



Real yield comparison versus DM peers

	India	China	US	UK	Japan	France
10Y Yield	7.08	2.62	3.82	4.23	0.46	2.99
Real Yield	2.27	2.62	0.82	-3.67	-2.74	-1.51
Rating	BBB-/BBB-/Baa3	A+/A+/A1	AAA/AA+/Aaa	AA-/AA/Aa3	A/A+/Aa3	AA-/AA/A2

Source: DWS International GmbH, Bloomberg, as of May 2023. Aggregate Z-score is based on government debt/GDP, GDP growth, inflation, GDP per capita, foreign exchange reserves. Real yields are determined by subtracting most recent YoY CPI from 10Y government bond yield.

Accessing the benefits of EM local – broad markets and beyond

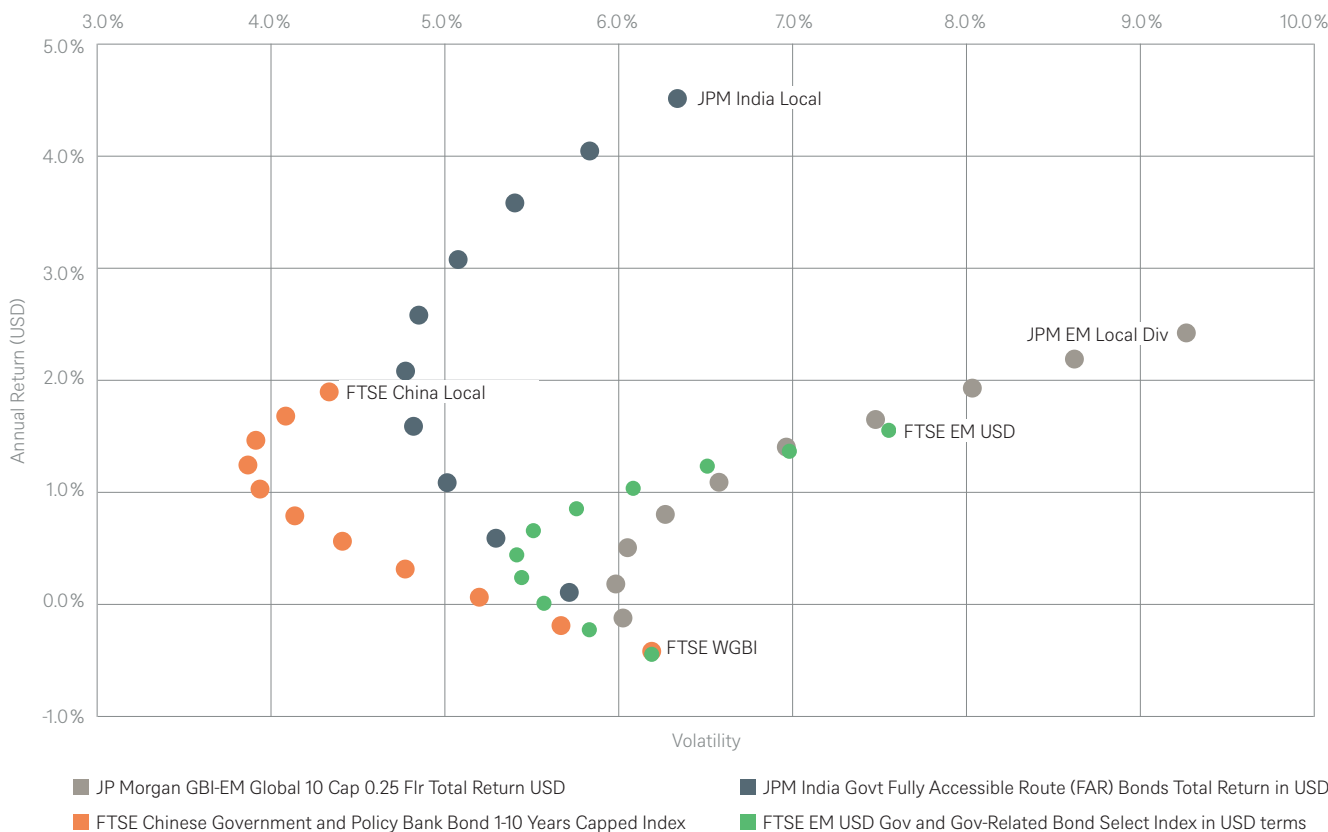
Recent developments have not only changed the face of emerging market economies but also transformed the investability and accessibility of the local debt market. The traditional perception of emerging market local debt as a predominantly active investment area is shifting as passive adoption rates increase. This shift is particularly notable in the context of China. Assets in passive vehicles in Europe alone peak at over US\$14 billion⁷, as investors shifted exposure to China following its inclusion into major EM indices of Bloomberg and J.P. Morgan as well as the addition to the FTSE's World Government Bond Index. The appeal lies in the desire for true benchmark "building block" exposure to local debt markets, while benefiting from rule-based diversification limits that mitigate concentration risk in a market prone to idiosyncratic risk. As such, passive EM local debt is best viewed as an add-on to a portfolio rather than a core component.

In this respect, also China and India demonstrated a robust track record. This is due to the increasing decoupling of major

EM growth centers, especially India and China, from their developed market counterparts. Here, investors can benefit from country-specific opportunities, such as China's still pending stimulus and recovery after its policy shift in late 2022. Similarly, India is poised for future growth as the world's most populous country, whose GDP already surpasses that of the UK in 2022, enjoys tailwinds from robust exports and digitalisation⁸.

For investors this means that the effective utilization of these non-core fixed income portfolio building blocks could potentially reduce the volatility of global government bond portfolios significantly by incorporating exposure to at least one of those countries. A modest 10% allocation to either market would have resulted in a significant reduction in portfolio volatility of around 50 basis points (see figure 10). While the diversification effects of these two countries were particularly pronounced, broad benchmark investors in EM local and hard currency debt would also have benefited from this effect of moderate portfolio inclusion.

Figure 10: The role of EM single countries: Unlocking diversification benefits
 Simulated 10% stepwise allocation to a global government bond portfolio. Period from 31.12.2015 to 30.06.2023



Source: DWS International GmbH, Bloomberg, analysis based on JP Morgan GBI-EM Global 10 Cap 0.25 Flr Total Return USD, JPM India Govt Fully Accessible Route (FAR) Bonds Total Return in USD, FTSE Chinese Government and Policy Bank Bond 1-10 Years Capped Index in USD, FTSE EM USD Gov and Gov-Related Bond Select Index in USD terms. As of June 2023

⁷ Source Bloomberg, as of July 2023

⁸ Based on UN and OECD estimates, respectively, as of July 2023

Finally, in the context of portfolio applications, there is a unique feature of EM local government bond markets that is particularly relevant for fixed-income-constrained investors. EM local bonds are typically the closest instrument to equities, as shown in Figure 11 below. Considering a slightly higher level of volatility compared to other fixed income indices, EM local bonds have offered the highest correlation and beta to the MSCI EM index over the past 5 years. Combined with the right timing, this instrument deserves more attention from active asset allocators.

Conclusion

As we enter the second half of 2023, a solid understanding of the EM local asset class is more important than ever, as limited accessibility and structural performance headwinds of the past may give way to simplified access that can help investors close the gaps of decades of underinvestment. At the same time, continued high interest rates and persistent inflation in developed markets have contributed to the relative attractiveness of the EM local asset class. Given its diversified risk profile, EM local can be a powerful portfolio building block, both as a single country allocation, such as India or China, and as a diversified exposure. After all, maintaining tight control over fixed income diversification will remain a key challenge for investors as higher yields have drawn them into much less differentiated exposure to core developed markets.

Figure 11: EM local bonds, a proxy for equity benchmark

Index	Correlation vs MSCI EM (daily returns)	Beta vs MSCI EM (daily returns)	Annualized volatility (daily returns)	5Y Max drawdowns	5Y performance
MSCI Emerging Markets	1.00	1.00	18.0%	-39.0%	7.0%
JPM GBI-EM Global Diversified	0.61	0.32	9.4%	-27.4%	2.0%
JPM EMBI Global Diversified	0.57	0.24	7.7%	-28.1%	2.9%

Source: DWS International GmbH calculations, Correlations, betas, risk and performance measures over the past 5 years, timeframe: 28/06/2018 – 30/06-2023

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