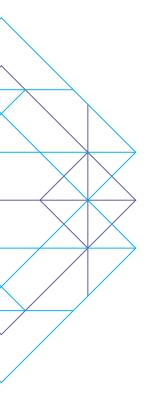
(AQR)

March 2023

Re-Emerging Equities



Executive Summary

- The expected premium for investing in emerging versus developed equity markets is on the upper end of its past 25-year range.
- At the same time, many of the risks historically associated with emerging markets have secularly declined.
- We believe there is a strong case for investors to "re-up" their emerging allocations to either a neutral or bullish positioning.

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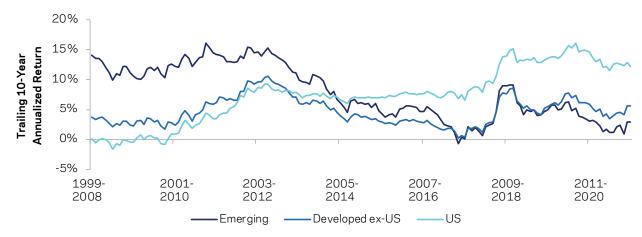
Introduction

Investors *should* expect to receive a premium for investing in emerging versus developed markets. And indeed, there was one in the first decade of the 2000s, as emerging markets delivered meaningfully higher returns than

their developed counterparts (see **Exhibit 1**). However, more recently the story has flipped, as developed markets have outperformed, with the US leading the pack.¹

Exhibit 1: The US Hasn't Always Been the Outperformer

January 31, 1999 - December 31, 2022



Source: MSCI, AQR. "Emerging" is the MSCI Emerging Net Total Return USD Index, "Developed ex-US" is the MSCI Daily TR Net World Ex USA USD, and "US" is the MSCI USA Net Total Return USD Index.

This has led to at least two outcomes for investor portfolios. The first is mechanical: as US markets have grown faster, they have also become a larger component of the global stock market, making global equity portfolios less diversified than they previously were. The second outcome is more discretionary: many investors, due to years of relative disappointment in emerging equities, have actively chosen to shift their equity allocations

away from emerging markets and toward developed ones.

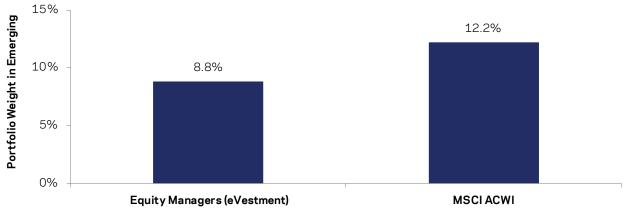
This second effect can be seen among active managers. For example, of all equity funds listed in the eVestment database, the aggregate allocation to emerging markets is 8.8% of total holdings—meaningfully lower than the market cap weight of 12.2% (Exhibit 2).²

¹ Though for reasons that aren't as "fundamental" as commonly believed. Rather, US outperformance has largely been a repricing phenomenon (i.e., changes in valuations), and thus unlikely to be much of a guide for expected returns (if anything, we believe it suggests US returns are likely to be lower than Emerging over the next 5-10 years).

² Asset allocators may also have de-allocated to emerging markets over the past decade indirectly via their shift from public equities to privates. Given many private investments tend to be US- or developed-focused, even investors who have shifted 1-1 from their global public equity allocation toward privates would likely have decreased their underlying emerging equities exposure.

Exhibit 2: Many Active Managers Are Underweight Emerging Markets

As of December 31, 2022



Source: MSCI, eVestment. As of September 30, 2022 due to data availability (though estimates as of December 31, 2022 are very similar). "Equity Managers (eVestment)" is the AUM-weighted average weight in emerging market securities of all equity managers in eVestment. "MSCI ACWI" is the MSCI All Country World Index. For illustrative purposes only.

In this paper, we argue that investors who are underweight emerging markets should get back to a more neutral weight—and that investors

who are already near market-cap weights might well consider a modest increase to emerging markets.

A 5-10 Year Tailwind for Emerging Markets

Forecasting returns is a notoriously fraught exercise, but it's not futile. We find that yield-based methods have some ability to predict 5-10 year returns,³ and such methods are currently pricing in an advantage for emerging markets on the upper end of the last 25 years' range.

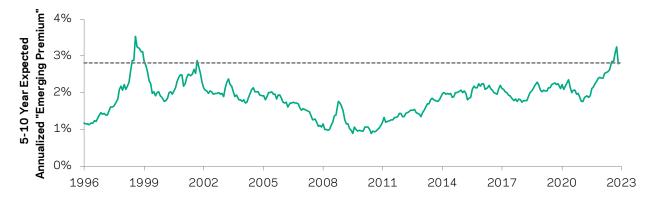
Exhibit 3 shows this expected annualized "emerging premium" from the point of view of a currency-hedged investor, but we note this advantage is similar for unhedged, USD-denominated investors (which we expect many readers to be⁴).

³ See, for example, Ilmanen (2022).

⁴ These numbers from the perspective of unhedged investors with different base currencies are available upon request.

Exhibit 3: The Expected Premium for Emerging over Developed Is Generationally Wide

January 31, 1996 - December 31, 2022, latest observation is dashed



Source: AQR. See AQR's Capital Market Assumptions for full details. The chart above is from the perspective of a currency-hedged investor; the results are similar (in fact, slightly more attractive compared to history) for an unhedged USD investor (chart available upon request). "Expected" or "Target" returns or characteristics refer to expectations based on the application of mathematical principles to portfolio attributes and/or historical data, and do not represent a guarantee. These statements are based on certain assumptions and analyses made by AQR in light of its experience and perception of historical trends, current conditions, expected future developments and other factors it believes are appropriate in the circumstances, many of which are detailed herein. Changes in the assumptions may have a material impact on the information presented.

Of course, one reason investors would demand a premium for one investment over another is risk. Emerging markets historically have been riskier than developed markets, but that difference has come down over the past decade—both in terms of standalone index volatility (Exhibit 4, left side) and in terms of correlations (right side). This evolution suggests that from the standpoint of portfolio risk, the case for emerging markets potentially has even increased over the past decade compared to history.

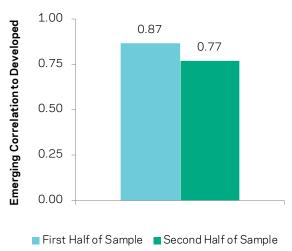
Exhibit 4: Emerging Risks Aren't What They Used to Be

January 1, 1999 - December 12, 2022

Volatility has come in line with Developed...



...And returns have become more diversifying



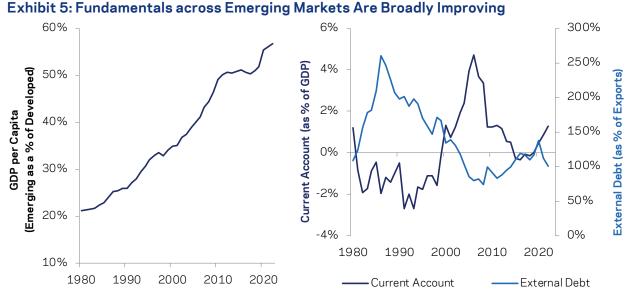
Source: MSCI, AQR. "Emerging" is the MSCI Emerging Net Total Return USD Index, "Developed" is the MSCI World USD Index. "First half of sample" is January 1, 1999 – January 31, 2011; "Second half of sample" is February 1, 2011 – December 31, 2022 (results are robust to other dates near the ones shown above.

China goes a long way in explaining both the drop in volatility and correlation, having become the single-largest component of emerging indices—it is now at roughly a 30% weight of the MSCI Emerging Index, up from under a 7% weight 20 years ago. Volatility of the Chinese market has fallen by nearly 50% since the Global Financial Crisis (GFC), and China has historically been more diversifying of developed markets than other major emerging markets (e.g., Korea, Taiwan, India), for a variety of reasons including government intervention.

However, lower risk in emerging markets isn't just a China story. Fundamentals have also improved more broadly. Over the past 20 years, per capita GDP in emerging markets has roughly doubled as a share of developed

markets (Exhibit 5, left side). Measures of external vulnerabilities have also improved from their periods of peak fragility in the 1980s and 1990s. Current account balances in emerging markets are now positive in aggregate, and measures of external debt sustainability (e.g., external debt as a percentage of exports) look much healthier (Exhibit 5, right side).

Bottom line: there are many reasons to believe that the relatively attractive valuations found in emerging markets represent a 5-10 year opportunity. In other words, the current expected premium is likely due to these markets being relatively underpriced, as opposed to representing compensation for assuming meaningfully greater portfolio risk.



Sources: IMF, AQR, Bloomberg. Left chart is gross domestic product based on purchasing power parity. Emerging markets are represented as the average of China, Brazil, India, South Korea and Taiwan. Developed markets are the average of the US, Japan, France, Germany, and the UK. In the chart on the right, Current Account is shown as a percentage of GDP, and External Debt is shown as a percentage of exports.

Questions about China

China is the single largest market in the MSCI Emerging Index (by a factor of two), and as such has an outsized effect on performance, although far less than the United States' weight and effect on developed markets indices. Two of the biggest narratives surrounding the competitiveness of the Chinese market are fundamentals and market access.

- 1. Fundamentals: Chinese equities have been plagued by multiple fundamental concerns through 2022. The government's push to more heavily regulate certain Chinese companies that challenge Communist Party ideals and the government's attempt to dampen speculation and leverage in the real estate market have weighed on key segments of the Chinese equity market. However, these negative fundamental trends may already be priced in, with MSCI China close to 50% lower as of year-end 2022 than the highs of early 2021. In addition, China's move away from "Covid Zero" may help ease some growth concerns that propelled Chinese stocks lower in 2022.
- 2. Market access: Both Chinese and US governments have taken action hindering access to some segments of the Chinese equity market. China has discouraged offshore listings by Chinese technology firms. The US has moved to tighten auditing standards for Chinese firms and has also restricted US investors from buying stocks with ties to the Chinese military. This action and rhetoric has softened somewhat since mid-2022.

Geopolitically, the potential for conflict with Taiwan is an issue, but one that we believe shouldn't discourage investors from allocating to emerging markets. The extreme scenario of an outright invasion of Taiwan (which we believe is quite unlikely) would be disruptive not just for the countries involved and their neighbors, but also for the broader global economy. Market pain would likely be fairly widespread, hurting the global semiconductor supply chain as well as prominent US companies with significant manufacturing in China. Additionally, from a risk management perspective, as was the case in Russia's invasion of Ukraine, there would likely be a noteworthy military buildup prior to any invasion, giving investors a chance to adapt to the increased risks. Absent an outright conflict, rising tensions could still catalyze trade restrictions. However, whether such developments prove real or rhetorical will determine the impact on markets.

Active or Passive?

Beyond the 5-10-year case for greater exposure to emerging equities, today presents a tactical opportunity for active management: the global growth bubble. Over the past five years, the growing dislocation between valuations of cheap and expensive stocks has been featured in many headlines, notably through FAANG stocks. Absent from headlines is the fact that this phenomenon isn't unique to a handful of large US-based technology companies. The gap between cheap and expensive companies has widened within myriad sectors and regions,

and notably among companies in emerging markets.

Exhibit 6 quantifies this via the "value spread," which compares the valuations of expensive stocks versus cheap stocks (i.e., growth versus value stocks). When the line rises, growth stocks become more expensive compared to value stocks. Today this spread is near the largest reading ever seen, and one that we believe cannot be justified via fundamentals.⁶ We believe this indicates a broad speculative

⁵ The high occurred February 2021. As a point of comparison, the MSCI Emerging Ex China Index has fallen close to 17% over the same period.

Two examples: 1) Implied growth rates cannot account for the differences (neither can analyst expectations). In fact, even taking the highest-ever realized growth rate for cheap versus expensive stocks (i.e., including the Tech Bubble) can't come close to justifying current spreads. 2) Interest rate sensitivities—which at least pointed in the right direction—also can't come close to explaining the magnitude of the differences either. For more, see 1Q2023 AQR Whitepaper "Value: Why Now? Capturing the Comeback in Its Early Innings".

bubble that is likely to burst, which is likely to reward value-oriented active management over the next few years.

Translating the value spread into an expected return is not simple, since implementation choices (e.g., which measures of value to use, whether to control for industry and country exposures, etc.) will lead to differences from

manager to manager. That said, given the size of the dislocation between cheap and expensive companies in emerging markets today, we expect an allocation to value-based stock selection to earn a meaningfully higher excess return than usual in the coming years—e.g., we expect a 2% tracking error allocation to value-based stock selection to earn a 3-6% excess return over the next 2-3 years.⁷

Exhibit 6: Historic Opportunity for Value Investing in Emerging Markets

Value Spreads in Large Cap Emerging Equities, December 31, 1994 - December 31, 2022



Source: AQR. Spreads are constructed using the Hypothetical Value portfolio as described below, and are adjusted to be dollar-neutral, but not necessarily beta-neutral through time. Hypothetical value composite includes five value measures: book-to-price, earnings-to-price, forecast earnings-to-price, sales-to-enterprise value, and cash flow-to-enterprise value; spreads are measured based on ratios. To construct industry-neutrality, the value spreads are constructed by comparing the aforementioned value measures within each industry, which are then aggregated up to represent an entire portfolio. Hypothetical data has inherent limitations, some of which are disclosed in the Appendix. Please see the Hypothetical AQR Emerging Valuation Model Theme Description in the Appendix. For illustrative purposes only and not representative of an actual portfolio AQR currently manages. Please read the Appendix for important disclosures.

Closing Thoughts

Many investors are likely under-allocated to emerging markets—be it strategically, tactically or even via their investment managers. While these markets have generally underperformed developed ones since the GFC, valuations today suggest a premium to emerging that hasn't been seen in a long time, one that may

be especially useful in today's low expected return environment. For investors seeking even more opportunity within emerging markets, "value spreads" suggest a historically attractive opportunity for investors with value-oriented portfolios.

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MSCI World Ex USA Index is a market capitalization weighted index designed to provide a broad measure of stock performance throughout the world, with the exception of US- based companies.

MSCI USA Index is designed to measure the performance of the large and mid cap segments of the US market. With 625 constituents, the index covers approximately 85% of the free float-adjusted market capitalization in the US.

MSCI Emerging Markets Index is designed to measure the performance of the large and mid-cap representation across 24 EM countries including Brazil, Chile, China, Colombia, Czech Republic, Egypt, Greece, Hungary, India, Indonesia, Korea, Kuwait, Malaysia, Mexico, Peru, Philippines, Poland, Qatar, Saudi Arabia, South Africa, Taiwan, Thailand, Turkey and United Arab Emirates, covering about 85% of the free float-adjusted market capitalization in EM.

MSCI Emerging ex China Index is an index that captures large and mid cap representation across 23 of the 24 Emerging Markets (EM) countries excluding China.

MSCI China Index is an index that captures large and mid cap representation across China A shares, H shares, B shares, Red chips, P chips and foreign listings (e.g. ADRs). With 717 constituents, the index covers about 85% of this China equity universe. Currently, the index includes Large Cap A and Mid Cap A shares represented at 20% of their free float adjusted market capitalization.

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The Hypothetical AQR Emerging Value Factor is the factor return of a hypothetical Value portfolio built upon 5 multiples: book-to-price (B/P), trailing-earnings-to-price (E/P), forward-earnings-to-price (FE/P), sales-to-enterprise-value (S/EV) and cash flow-to-enterprise value (CF/EV). Each factor is built to be industry neutral and dollar-neutral by using within-industry value scores. Factor returns are gross of advisory fees and transaction costs. The Valuation Theme is designed to capture the tendency for relatively cheap assets to outperform relatively expensive ones. Emerging data begins October 1994. The investment universe includes a broad subset of liquid tradeable large cap stocks within the emerging market universe (roughly MSCI Emerging Markets). The risk model used is the Barra Global Equity Risk Model (GEM3L noCurr).

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