



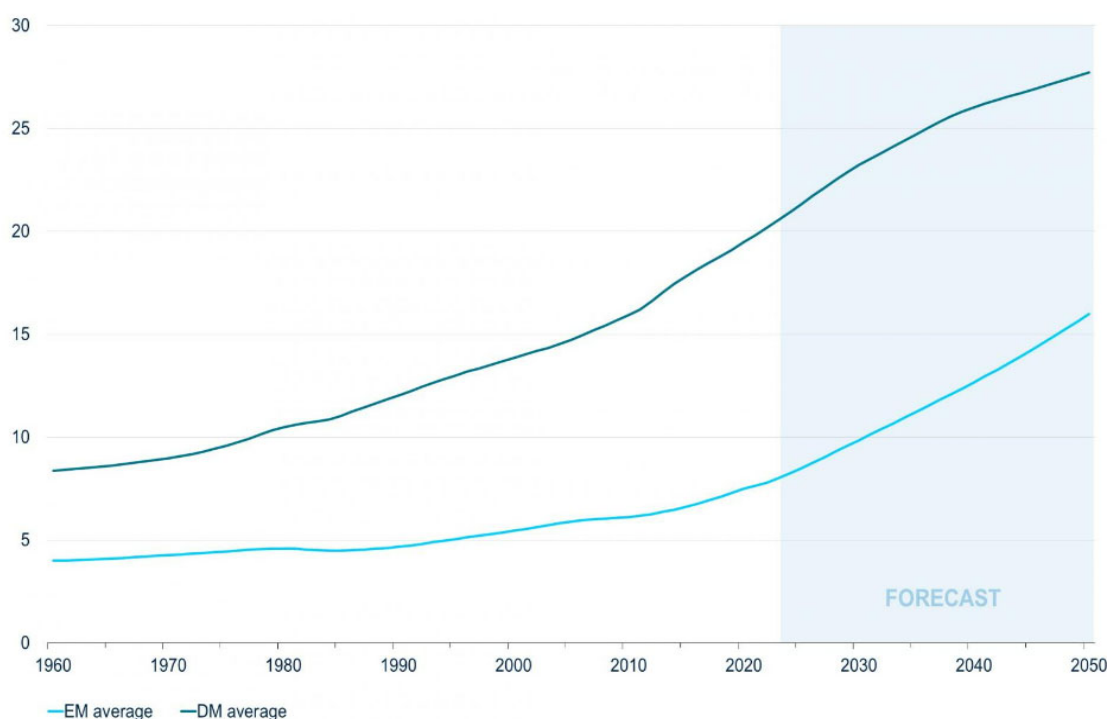
## Greying and Greening Across Emerging Markets

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The demographic story of the past few decades has been one of “greying” across developed market (DM) countries as increasing longevity and declining fertility lead to societal aging. However, far less attention has been paid to the looming demographic transition across emerging market (EM) countries, where populations are also set to begin aging rapidly. While “greying” reflects positive developments in human progress (i.e., people living longer and healthier lives), it also presents new policy challenges as smaller labor forces will be forced to support larger dependent populations. With the share of the EM population aged 65 and over expected to soar over the next two decades, we examine which EMs face the strongest demographic pressure as part of our ongoing research into the global shift in labor dynamics.

While China captured headlines last year as deaths outnumbered births there for the first time in six decades, far less attention was paid to the “greying” of other EM countries where the share of the population aged 65 and over is projected to nearly double over the next two decades (Figure 1).

**FIGURE 1: DMs have Been Greying More Quickly, but the EM Transition Has Arrived (%)**



Source: World Bank as of May 2023. Note: DM average is calculated as the mean of U.S., Europe, Japan, Australia, and New Zealand. EM average is calculated as the mean of the 70 countries in JP Morgan's Emerging Markets Global Diversified Index.

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## Demographic Pressures, Fiscal Trade Offs

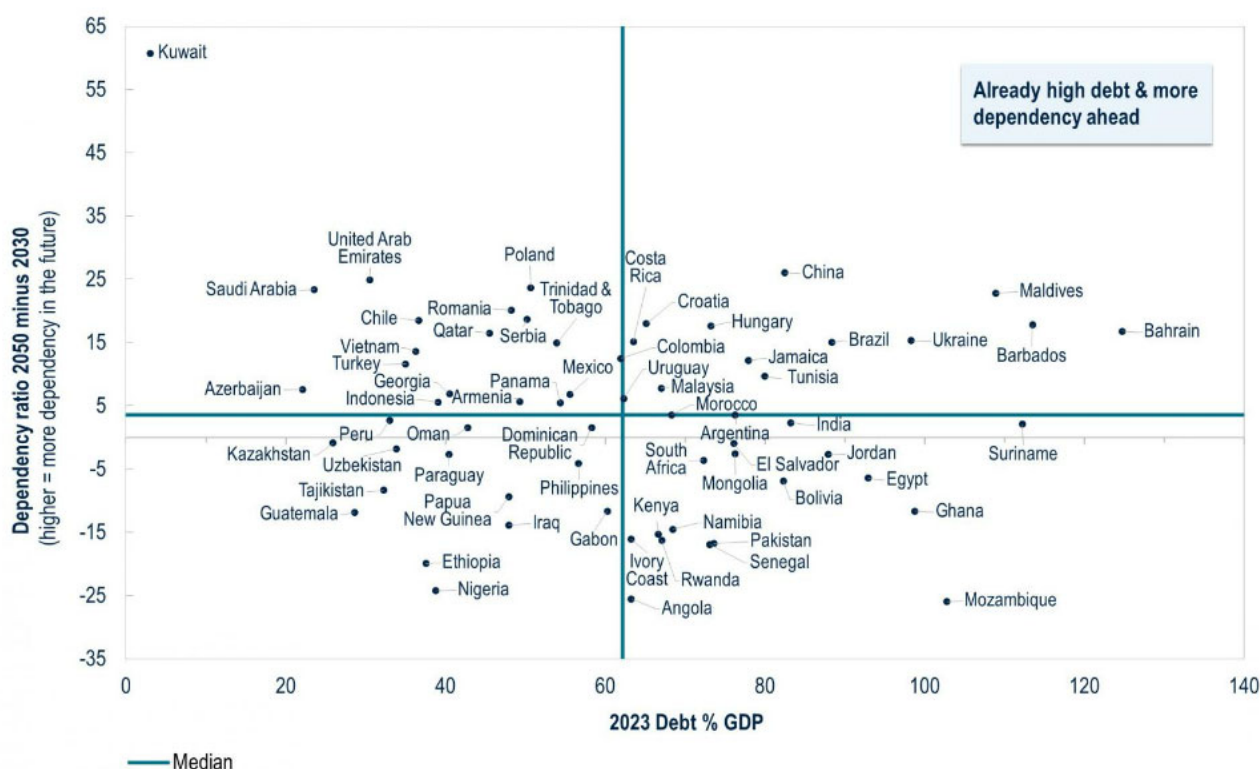
The “traditional” DM trajectory has been one of rising incomes accompanied by falling fertility and increased longevity. If fertility rates dip below the replacement level required for population growth, both the size of the population and of supply of workers will shrink (absent migration). Working age citizens are much more likely to participate in the labor force and pay taxes that fund social services. A smaller labor force implies lower tax revenue and stronger pressures on pension systems, healthcare spending, and ultimately government budgets. Without an increase in productivity, a smaller labor force cannot sustain the same level of economic growth. At the same time, this smaller labor force will be responsible for supporting a larger dependent population (children and elderly). All these dynamics add up to stronger fiscal pressure as social spending must increase amidst falling government revenue.

Although EMs will remain “younger” in relative terms than DMs, they are set to experience rapid societal aging from much lower levels of wealth and financial resources. To investigate where these risks are most pronounced, we analyze EM countries’ dependency ratios.<sup>1</sup>

We conduct our analysis on the credits included in the JP Morgan Emerging Markets Global Diversified Index, calculating the change in dependency ratios from 2023 to 2050 to understand how these metrics are projected to shift over the next two decades. A positive change means that the number of dependents in a country should increase relative to the size of the working age population.

Next, we plot these changes in dependency ratios against debt as a share of GDP in 2023 (Figure 2).

**FIGURE 2: Demographics and Debt across EMs**



Source: PGIM Fixed Income, Macrobond, IMF, UN as of May 2023.

Countries in the top right quadrant have already high debt burdens and are projected to have growth in dependency ahead, setting them up for an increasingly precarious fiscal situation. China is in this quadrant. Countries in the top left quadrant face similar demographic pressures, but they are starting from much more favorable debt profiles, thus they have larger buffers to fund social spending.

Kuwait stands out as a significant outlier but is not expected to face major financing difficulties in the future due to its small population and forward-looking fiscal stance that allows for an accumulation of assets in the country's sovereign wealth fund. Furthermore, more immigration could lower the dependency ratio.

### More Older Adults than Children

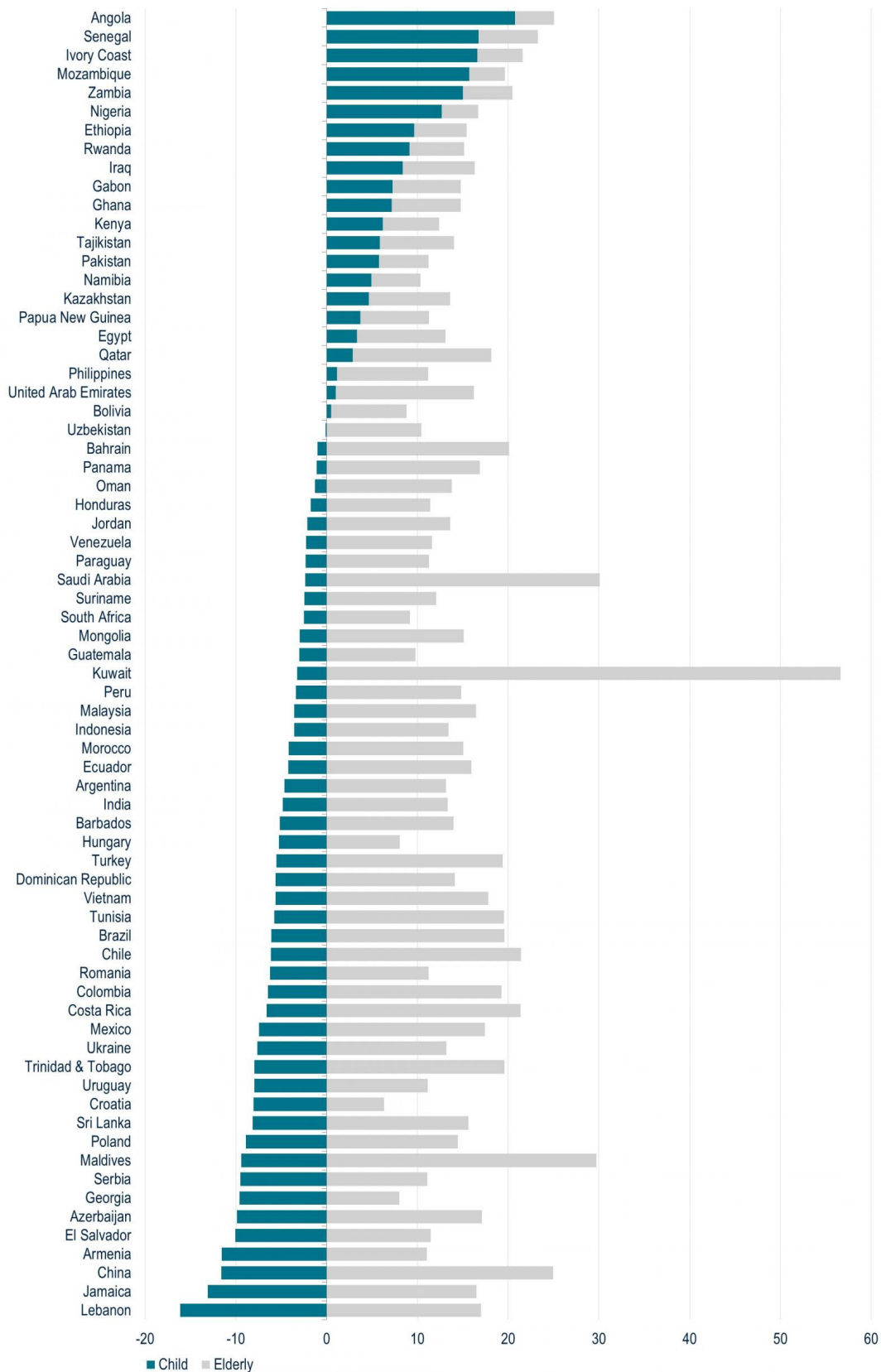
While informative, Figure 2 does not distinguish if an increase in the dependency ratio is because more children are being born ("greening") or more adults are aging ("greying"). So, next we decompose the change in dependency ratios to understand if the young or old are driving the shift.

In Figure 3 the green bars represent the projected change in the child population from 2023 to 2050 as a percentage of the 2050 working age population. The grey bars represent the same for the 65+ population. All EMs will be "greying" over the next two decades, as all have positive grey bars. However, only some EMs will still be "greening." Uzbekistan and all the countries that fall below it are projected to see contractions in their child populations.

From the chart we can see that a massive "greying" rather than "greening" is driving the growth in Kuwait's dependency ratio. In fact, Kuwait's child population is set to shrink over the next two decades, further pressuring its demographic profile.

There are few countries in our sample where the child population is projected to grow. These "greening" EMs are heavily concentrated in Sub-Saharan Africa, with a few Central and South Asian additions. However, even within this small subset of "greening" countries, only about half have projected child population growth large enough to outweigh their "greying" population (i.e., Angola through Iraq).

**FIGURE 3: Greying versus Greening (% 2050 Working Age Population)**



Source: PGIM Fixed Income, UN as of May 2023.

## The Path Forward

Demographic dynamics pose significant fiscal challenges for both “greying” and “greening” countries and this backdrop influences investment positioning and the types of risk assumed across portfolios. For the “greying” countries, especially for those countries with both high debt and high dependency rates, fiscal prudence, together with reforms, is warranted to ensure the sustainability of pension and health systems and to reassure long-term investors. For the “greening” countries, challenges are different: taking advantage of a rapidly growing young population requires investment in education and training in order to ensure the economic inclusion of young people, boost productivity, and achieve balanced growth. For countries with an already high debt-to-GDP ratio, though, fiscal space is limited and, unfortunately, fiscal allocations for education are often the first to be cut in pursuit of fiscal adjustment. For these credits, we believe that the engagement of official creditors and International Financial Institutions is crucial for both adopting the right policies and inducing investment to finance their growth.

1. Defined by the United Nations as  $= \{[\text{The number of children (0–14 years old)} + \text{older persons (65 years +)}] / \text{The number of persons of working age (15–64 years old)}\} * 100$ . Population data are those of medium variant.

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Source(s) of data (unless otherwise noted): PGIM Fixed Income, as of 6/21/2023.

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2023-4467

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