

## Box 1

## SAVING BEHAVIOUR AND GLOBAL IMBALANCES: THE ROLE OF EMERGING ECONOMIES

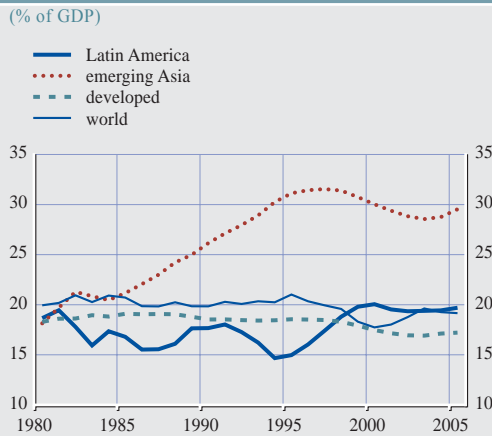
Although global private savings have, at an aggregate level, represented a relatively stable share of world GDP at around 20% over the past quarter of a century or so, there has been considerable variation in savings patterns across countries and regions (see Chart B1.1). In particular, the private savings of developed economies, as a proportion of GDP, have trended slightly downwards from the early 1980s onwards. By contrast, private savings have risen more or less continuously in emerging Asia, with the exception of the years in the immediate aftermath of the financial crisis of 1997-98, while they have been relatively volatile in Latin America. Understanding the drivers of these regional divergences is important in order to ascertain whether the so-called global savings glut could possibly explain the significant widening of global current account imbalances over the past five years.<sup>1</sup> It is also relevant in terms of assessing the extent to which ample savings in emerging economies have possibly contributed to a significant lowering of global long-term real interest rates in recent years. In view of these considerations, this Box examines the empirical drivers of private savings within a large panel of emerging and developed economies over the past quarter of a century.

To evaluate the determinants of savings, a reduced-form model is used which relates private savings to a set of economic fundamentals identified in the literature, while controlling for structural factors and institutional differences among countries.<sup>2</sup> The analysis allows for a

1 See B. Bernanke (2005), "The Global Saving Glut and the US Current Account Deficit", remarks at the Homer Jones Lecture, April. Clearly, a full understanding of a country's current account position requires a joint analysis of developments in both domestic savings and investment. In particular, together with high savings, an "investment drought" is often mentioned to explain the high current account surpluses in emerging Asia. However, gross national savings (and within this, private savings) seem to have played a prominent role in explaining the widening external imbalances recently. In this regard, it has been argued that regional divergences in saving behaviours have closely matched the diverging patterns of current account balances globally. Across world regions, increases in saving rates have typically been associated with higher current account surpluses, and vice versa.

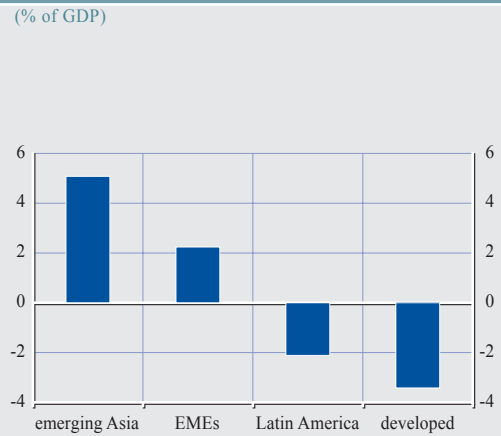
2 See G. Ferrucci and C. Miralles Cabrera (2007), "Saving Behaviour and Global Imbalances: The Role of Emerging Economies", mimeo.

**Chart B1.1 Global private savings**



Source: ECB calculations.  
 Note: Private world savings are calculated as a weighted average of the private saving ratios in countries representing around 85% of global GDP.

**Chart B1.2 Deviation from long-run equilibrium of global private savings**



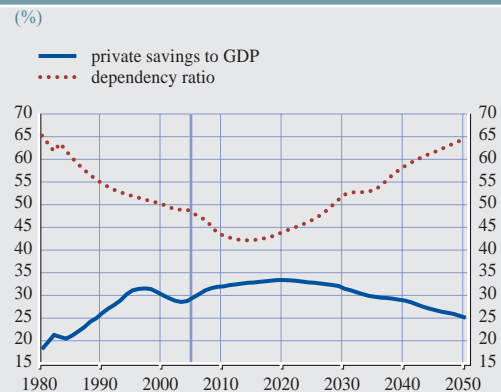
Source: ECB calculations.  
 Note: The bars represent the deviation (in percentage points of GDP) between the group's actual and predicted value of the saving rate. Both statistics are calculated as averages through 2000 to 2005.

separation between short-run adjustment and the long-run equilibrium. The model includes explanatory factors grouped into the following categories: demographics; fiscal policy; the macro environment, and institutional factors. The age structure of the population may affect private savings through Modigliani's lifecycle hypothesis, which suggests that individuals save for retirement when they are of working age, and dis-save when they are old. Fiscal policy affects private savings in several ways: Ricardian equivalence suggests a trade-off between private and public saving; furthermore, under-provision of public services (e.g. pensions, education and healthcare) may also foster precautionary savings. The country's macro environment, as summarised by GDP growth, terms of trade shocks and inflation, is also likely to have an impact on private saving. Finally, the development of the financial system (private credit to GDP) also affects precautionary savings as it removes borrowing constraints.

The analysis suggests that, on average, aggregate saving rates across all emerging economies are higher than their estimated fundamental value, significantly so in emerging Asia, and slightly lower in Latin America and developed economies than the model predicts (see Chart B1.2). In addition, the model suggests that the abundance of savings in emerging Asia stems mainly from demographic changes and, to a lesser extent, from the small decline in fiscal spending over the sample period.<sup>3</sup> At the same

<sup>3</sup> Favourable demographics, in particular the fall in the dependency ratio from 67% to 49% of the total workforce during the past 25 years, alone account for around 60% of the rise. Another 5% of the rise can be attributed to the reduction in government spending by 2 percentage points of GDP.

**Chart B1.3 Projected savings and dependency ratios in emerging Asia**



Source: ECB calculations.

time, the development of the financial system has contributed to putting significant downward pressure on savings in emerging Asia.

These findings have important implications for global financial stability. In particular, further financial sector reform and population ageing could lead to some decline in saving rates in emerging economies, contributing to a gradual unwinding of global imbalances in the long run. As a simple simulation exercise using the estimated model, projecting a 14 percentage point rise in the elderly dependency ratio in emerging Asia over the next half of a century (as suggested by United Nations' projections) produces a fall in the saving ratio of 5 percentage points of GDP (see Chart B1.3).<sup>4</sup> Governments can also play a role in lowering savings over the medium term, especially through structural reforms, which include increasing the depth of domestic financial markets through financial sector reform, and thus fostering a better intertemporal smoothing of consumption.

<sup>4</sup> An important caveat is that this estimate only captures the first-round effects of an increase in the dependency ratio on savings, i.e. it fails to capture the second-round effects of ageing on potential growth, fiscal spending, etc.