I. Introduction: piecing the puzzle together

The performance of the global economy over the last few years has been extraordinary, and this includes the period April 2006 to May 2007 under review in this Annual Report. First, and most importantly, real growth has been maintained around levels that are among the highest recorded in the postwar period. The fact that many of the world's poorest countries have shared in this growing prosperity has been another welcome feature. Second, notwithstanding this rapid growth and despite significant upward shocks to most commodity prices, underlying inflation levels have generally remained subdued. Third, real interest rates and risk premia of all sorts have remained uncharacteristically low. And finally, record global trade imbalances have thus far been easily financed and exchange rates have been generally quite stable. In isolation, each of these outcomes might be welcomed without further reflection. However, the combination of developments is so extraordinary that it must raise questions about the source and, closely related, the sustainability of all this good fortune.

A variety of hypotheses have been suggested to explain subsets of these phenomena, but each falls short of explaining them all. For example, the idea of a global "investment strike" has merit when attempting to explain worldwide low inflation and low interest rates. However, it is more difficult to reconcile this hypothesis with the recent record rates of real growth. The idea that "globalisation" is a positive supply side shock driving down inflation also appeals, but what have been the forces simultaneously driving up demand and global growth? Simply asserting that supply creates its own demand, certainly arguable as a short-run proposition, also ignores an important fact. While emerging market economies have been the source of a large part of the supply side shock, it is the advanced industrial countries, above all the United States, that have accounted for most of the increase in demand. What influences could have led to this asymmetric outcome, and the associated imbalances in global trade? Finally, the "credibility" of vigilant central banks might well have helped explain both low inflation and high real growth for an extended period of time. But surely this cannot be the whole explanation, given that real interest rates have remained so low, and the rate of credit creation so high, for almost all of this decade.

Yet, if individually each of these hypotheses has its shortcomings, together they might well provide a coherent explanation of the favourable global performance seen over the last few years. Begin with the investment strike hypothesis, that is, a deficiency of ex ante fixed investment relative to a high level of ex ante saving. Arguably, the chief factor behind this shortfall in recent years has been subdued investment rates in many countries following earlier boom-bust cycles. Corporate investment has only begun to pick up in Japan and Germany over the last year or so, and is still showing scant sign of doing so in Southeast Asia. Moreover, as a proportion of GDP, corporate investment has remained very weak in the United States in the aftermath of the "new era" bubble of the late 1990s. Against this backdrop of generally weak investment demand, the global economy was simultaneously affected by a significant increase in supply. Globalisation and the re-entry of previously centrally planned economies into the liberalised trading system were key factors. But, in addition, increases in productivity associated with technological advances also played a role, particularly in the IT and distribution sectors. And the interaction of these phenomena with the credibility gained by central banks in fighting inflation in the 1980s added still further disinflationary momentum to the global economy.

In view of the very low levels of inflation arising from these joint developments, and indeed concerns about deflation in some countries, monetary policy in the advanced industrial countries has been unusually easy for a number of years. This tendency was reinforced by the perceived need to react to financial disruptions in 1997 (the East Asian crisis) and 1998 (the LTCM crisis), and to the sharp fall in global stock markets in 2001. Such monetary ease in the industrial countries might have been expected to lead to lower exchange rates, complemented by a rise in the exchange rates of emerging market economies. However, with emerging market economies also facing an environment of low inflation, and with many countries wishing to build up reserves to "self-insure" against future crises, there was a shared unwillingness to allow this adjustment to occur. Massive sterilised intervention was carried out, particularly in Asia, and domestic monetary conditions were also kept very loose. And, as the accumulated reserves were reinvested, they supported the US dollar and added to the already ample liquidity in the financial markets of the industrial countries.

Nor have these been the only forces acting to stimulate global monetary and credit expansion over the last few years. Analogous to the profound structural changes affecting the real economy, the financial sector has also been undergoing a massive transformation. New technologies for managing risk, new instruments and new players have been increasingly in evidence, with competition demanding that every possible financial opportunity be exploited to the full in the search for yield.

These monetary and financial developments have stimulated aggregate demand to match the increases in global supply. This Introduction will describe how these individual pressures, the pieces of the puzzle, have contributed to this success over the last year or so. Yet this success must be qualified by at least two observations that will be returned to in the Conclusion of this Annual Report.

First, there is at least a possibility that the massive financial stimulus provided to spending might have inadvertently tipped the global economy, or significant parts of it, into a situation where inflationary pressures might again be resurgent. Second, in part as a by-product of all this monetary and financial stimulus, an ever increasing number of economic and financial variables have been observed to deviate significantly from what might be deemed traditional "norms". In particular, easy financial conditions have led to an unprecedented drop in the household saving rate in the United States and an equally unprecedented rise in the investment rate in China. Whether these will eventually prove sustainable, with new "norms" being generated consistent with underlying structural changes, or whether they will rather prove subject to a more traditional form of mean-reversion, remains to be seen.

Demand and supply side considerations

Over the last 12 months or so, the global economy has continued to expand rapidly, with virtually no region failing to feel the benefit. China and India continued to grow at breakneck speed, drawing much of Asia along with them, while oil producers generally set records in terms of national income growth. With a few exceptions, countries in Latin America and central and eastern Europe also prospered. Based partly on better macroeconomic management, but also on higher commodity prices, growth in large parts of Africa was also maintained at atypically high rates.

The major industrial countries also fared very well, indeed giving further evidence of a welcome rebalancing as growth in Japan and the euro area accelerated further and domestic demand growth in the United States began to moderate. Germany in particular emerged from its long period of torpor with unexpected vigour. However, as the period under review wore on, concerns began to mount that the US economy might slow excessively, with potential implications for growth elsewhere. In the United States, consumption spending began to falter only after very rapid gains. While some deceleration was then to be expected, the fact that income and employment growth had not kept up, and that much consumption was financed through debt and lower saving, probably also played a role. A particular concern was a possible link with the US housing cycle, which began to turn down sharply in early 2006.

Throughout this last year, US housing starts fell precipitously as the ratio of inventories of unsold houses to sales rose to levels not seen since the early 1970s. While the full impact on employment in the construction sector has not yet been felt, the simultaneous sharp deceleration in house prices has begun to have some implications. The capacity of consumers to use higher house values as collateral to support borrowing and spending has clearly diminished. Closely related, some borrowers with less than prime credit status were only able to service their mortgages through similar refinancing. With this avenue closed to them, many may lose their homes and the inventory of unsold houses could then rise further. Fortunately, there is no firm evidence to date that these developments have undermined general consumer confidence in the United States, even if some greater constraints on the availability of consumer credit are beginning to be put in place.

Although it had been hoped that corporate investment in the United States might offset the drag from the housing market, investment fell back near the end of 2006. To many, this was surprising since capacity utilisation was rising, US corporate profits were very high and financing conditions were still supportive. Moreover, there was evidence of resurgent investment and business confidence, if not yet consumer confidence and spending, in other advanced industrial countries such as Germany and Japan. Yet investment must be based on expectations of rates of return, and here perhaps the omens were less positive. US productivity gains slowed in 2006, the pace of wage increases picked up and the rate of profit growth in the non-financial sector decelerated rapidly. Looking forward, a concern that US domestic consumer demand might falter, just as many of China's recent massive investment projects come on line, might also have had a restraining influence on profit expectations. And, perhaps, not only in the United States.

Certainly, the rising global influence of China and India is becoming increasingly hard to ignore. Investment spending in China, much of it export-oriented, amounted to almost 45% of GDP last year. Moreover, Chinese firms continued to move rapidly up the value chain, and are now extending into service areas which had previously been thought non-tradable. India too continued to expand its export sector last year. Indeed, evidence emerged that it was moving more aggressively into manufacturing to complement the IT services for which it has become well known. Chinese and Indian companies have both begun to make substantial direct investments in companies abroad, with the former reportedly particularly intent on ensuring the sustainability of future commodity supplies.

Rapid productivity growth in China allowed both wages and profits to increase strongly in aggregate, while maintaining competitiveness, but concerns were again expressed that wages were not being adequately transformed into domestic consumer spending. The fact that profits seemed to be increasingly concentrated, while investment growth was widespread, also raised fears of excess capacity and further reliance on exports should domestic investment falter. The Chinese government took administrative and monetary measures in the course of the year to slow the economy, but growth expectations nevertheless continued to be revised up during the period under review. In India, monetary policy was also tightened, but the economy continued to grow very rapidly.

Against this backdrop, global headline inflation moderated further in the past year, but with a partial reversal of the earlier spike in energy prices playing a key role. Core inflation in China, Japan and some continental European countries was relatively low and stable, although a number of emerging market economies in Asia and Latin America experienced either high or rising inflation. In the United States as well, some saw an unwelcome, if slight, upward drift. Yet in countries, including the United States, where surveys or financial markets provided information about longer-term inflation expectations, these expectations remained quite stable. Nor, during the period under review, did any firm evidence emerge that the recorded decline in inflation volatility in recent years, as well as in the pass-through to inflation of cost-push shocks, was beginning to reverse.

It was nonetheless rather surprising that the stable inflation picture in industrial countries was maintained last year given evidence of shrinking global capacity gaps. By the end of 2006, many Japanese officials considered that the economy was operating above full capacity, the US authorities estimated that the country was at full capacity, and the euro area in aggregate was thought to be approaching full capacity as the result of an earlier sharp fall in the unemployment rate. While rising and stable unit labour costs in the United States and many European countries, respectively, might be seen as consistent with these developments, the continuing weakness of German and Japanese wages has been remarkable. Finally, it became increasingly doubtful, over the year, whether the previous impetus for global disinflation coming from the emerging market economies was being maintained. During the year, both the Chinese and Indian authorities made reference to overheating at home and, as noted above, took concrete steps to offset it.

Commodity prices both helped and hindered the continued moderation of inflationary pressures over the last year. It was certainly helpful that energy prices fell back, after a sharp run-up in the first half of 2006. Less helpful was the persistently high level of many other commodity prices, in part reflecting rapidly rising costs of exploration, extraction and processing. Perhaps least helpful was the increase in the prices of a number of staple foods, as a result partly of drought, but also of moves to diversify crops away from food towards fuel production.

Monetary and financial conditions

Against this backdrop of strong growth but still low inflation and stable inflation expectations, monetary policy in the industrial countries tightened moderately. Policy rates in the United States, which had been raised at a measured pace from early 2004, remained unchanged from June 2006. Policy rates were increased more substantially by the ECB, in the period under review, albeit from a low level. In Japan there was an end to the zero interest rate policy, but the policy rate rose to only 0.5% in February. Real policy rates (ex post) also rose and are now around the level of estimated potential growth in the United States and the euro area, but still well below it in Japan.

By some measures, however, overall monetary and financial conditions remained highly accommodative in the industrial countries. Credit growth in the G3 peaked at around 10% in mid-2006, and then decelerated only very slightly. Real long-term rates also rose, but much less than policy rates. Indeed, at the end of the period under review, they were no higher than they had been in mid-2004 when the tightening phase began. Some commentators noted that an inverted yield curve had been a reliable indicator of imminent recession in the past. However, others preferred a different interpretation: the latest decline in long rates seemed to an unusual degree to indicate a decline in term (risk) premia, rather than the expectation of lower future short rates.

This "conundrum" concerning the term premia on long bond rates could partly reflect the stimulative influence of monetary authorities worldwide, together with a marked willingness on the part of both the private and public sectors to accept exchange rate risks. Relatively low policy rates in many parts of the industrial world, but particularly in Switzerland and Japan, contributed to a continuing high level of capital inflows into a number of emerging market economies and also into other industrial countries with higher yields. Outright "carry trades" involved borrowing in low-yielding currencies to invest in high-yielding currencies, but also in countries where asset prices or currency values were expected to increase. And a variety of other flows played similar roles, notably large-scale Japanese retail outflows, and household borrowing in foreign currency to finance mortgages in central and eastern Europe. While improved macroeconomic fundamentals, in particular trade surpluses, in many recipient countries were also cited as a factor, others had sharply deteriorating current accounts and sometimes other negative indicators.

These capital inflows took various forms, adding to the upward pressure on equity and property prices already being exerted by relatively loose domestic monetary conditions. For countries that had experienced earlier crises associated with capital flows, especially in Asia, these developments began to raise concerns in spite of high reserve levels and current accounts generally being in surplus. Perhaps reflecting lessons from earlier periods, there was a significantly greater readiness to allow currencies affected by upward pressures to appreciate. In this regard, Korea, Thailand and Brazil stand out. Nevertheless, there was still massive recourse by a few countries to sterilised intervention, with the global change in reserves in 2006 being twice that of 2005. In addition, many countries either eased monetary policy, or were loath to tighten it, for fear of attracting still more capital inflows. In extremis, a number of emerging market economies turned to administrative measures, either to reduce inflows and ease the problem of sterilisation, or to encourage capital outflows.

This combination of relatively accommodative monetary policy and a substantial appetite for portfolio investments – purchases by the private sector of emerging market securities, and even greater purchases by reserve managers of bonds issued by the major industrial economies – seems to have put downward pressure on term premia everywhere. And to this must be added the influence in the industrial countries of another force. Pension funds and insurance companies with longer-term liabilities have been purchasing larger proportions of long bonds to "immunise" themselves against potential interest rate movements and valuation swings. While it is impossible to estimate the relative importance of these influences on longer-term risk premia, they both point in the same downward direction.

Relatively low risk-free rates over the last year or so certainly contributed to the prevailing view that the world was awash with liquidity – that is, credit was both cheap and commonly available with weaker conditionality than had previously been the case. But institutional developments within the financial sector also contributed to both the perception and the reality of the greater availability of credit: changes in regulation and technology altered what could be done, and changes in attitude altered what people wanted to do.

Examples of new practices abound, not least in the area of credit to households. Mortgage credit has become available on easier terms to borrowers almost everywhere, thanks both to deregulation in many countries and to the global extension of the mortgage scoring techniques pioneered in the United States. Indeed, in the United States and a number of other countries, both mortgage and consumer credit became available to many who previously would not have had access at all. Until quite late in the period under review, this was generally considered to be a healthy development supporting owner-occupied housing. Only in recent months, as noted above, has the downside to these new practices become more apparent.

Responding to new developments in the financial sector over the course of the year, supervisory authorities repeatedly urged investment banks to tighten the credit terms made available to their clients, particularly hedge funds and private equity firms, and to monitor their counterparty exposures more vigorously. As the year proceeded, hedge funds themselves became increasingly involved in the financing of high-risk corporations through the purchase of collateralised debt obligations, leveraged loans and high-risk derivative products. And a record level of mergers and acquisitions last year, driven to an unprecedented degree by private equity firms, ensured a growing supply of the assets most in demand. One possible motivating force behind all this activity was a perception that the risks involved had in fact diminished, given a more benign macroeconomic environment. But a second factor appears to have been a growing willingness on the part of virtually all investors, including pension and mutual funds, to take on more risk as a way of raising returns.

Why this appetite for risk? A first and obvious reason is that relatively low risk-free rates encouraged such behaviour, particularly on the part of investors committed for institutional reasons to achieving high rates of return. A second reason was increased competition among providers of funding. For example, the rates of return on hedge funds declined last year, and a number of funds went out of business, compelling those surviving to behave more aggressively. Indeed, the same factor was even cited in the case of highly profitable banks, whose competitive behaviour stemmed from concerns that other banks would be seen to outperform them. Third, and perhaps most important, those providing credit increasingly follow a business model that involves originating credit and then transferring the exposure to others via securitisation or derivatives markets. Clearly, this raises a major principal-agent problem. What are the implications if originators no longer feel the need for due diligence, and the ultimate buyers do not have the skills or the information required to manage the risks inherent in the complex instruments they are buying?

The implications for asset prices last year were more or less the same as in previous years: that is, they generally moved further upwards, continuing a trend which had begun around mid-2003 when policy rates in the major industrial countries were at their lowest. House prices rose significantly in most countries; global stock markets reached record levels; the spreads on relatively high-risk instruments, including sovereign debt, stayed at record lows; and the markets for vintage wine, stamps and fine art rose to unprecedented levels. In contrast, the price of purchasing access to liquidity, in the form of options to buy and sell instruments of various sorts, stayed very low.

In spite of this overall positive performance, signs emerged in the course of the period that a change in the credit cycle might be on the way. The prices of most financial assets fell back sharply in April and May 2006 before quickly recovering. There was a further, if smaller, bout of turbulence at the end of February 2007. While recovery again followed, growing concerns about the prospects for the US housing market and the broader economy raised the possibility of future financial implications. Some reflections on what these and other indicators might portend for the global economy are offered in the Conclusion of this Annual Report.

Exchange rates, global imbalances and reserve management

Concerns about a disorderly market response to global current account balances were somewhat alleviated last year by a stabilisation of the US trade deficit as a percentage of GDP, some rebalancing of global demand growth, a resumption of the downward trend in the effective value of the US dollar, and continued low volatility in the major cross rates. Among the other principal currencies, the further movement in the value of the euro also seemed supportive of an external rebalancing, even if not wholly welcome for those directly affected.

Nevertheless, the persistently high level of the US current account deficit, the growing external debt, and the fact that the real effective value of the dollar finished the year only 5 percentage points below its 30-year average were less encouraging. Another counterproductive factor was the continuing effective depreciation of the yen, in spite of Japan's large current account surplus and foreign exchange reserves, which had earlier stabilised around $1 trillion. Other currencies which either hardly appreciated or even fell on an effective basis included those of some major oil producers and of China, although the renminbi did rise at a faster rate against the US dollar. Since these countries were also registering large and sometimes even growing trade surpluses, this too was not conducive to a reduction in global trade imbalances.

Another emerging source of concern with respect to the major cross rates last year was the possibility that major holders of foreign exchange reserves might change their management policies. As reserves rose still further beyond levels that might be needed for liquidity purposes, the authorities in a number of countries announced institutional changes to put more emphasis on increasing returns, even at the price of accepting more risk. While this could well affect the price of various asset classes looking forward, in effect extending the current exuberant phase of the credit cycle, the implications for currency values are less clear. The reasoning behind this is discussed in the Conclusion.

In the event, the establishment of so-called "wealth funds" by a number of countries last year was accompanied by reassuring statements that risks would continue to be carefully managed. Perhaps even more importantly, it was also suggested that the broader implications for the smooth functioning of the international financial system would continue to be given serious consideration by those managing the world's growing level of foreign exchange reserves. In the light of history, it is both important and welcome that creditors and debtors increasingly realise the extent to which their fortunes are now intertwined.