Yılmaz Akyüz

Financial Crisis and Global Imbalances

A Development Perspective

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INTRODUCTION

This book is a collection of papers written for the South Centre during 2009-2011 on the global crisis triggered by speculative lending and investment in the United States and Europe – its actual and potential effects on developing and emerging economies (DEEs), the immediate international policy response needed in order to contain the damage and to restore stability and growth, and global systemic reforms that need to be introduced with a view to reducing the likelihood of such crises and managing them better if and when they occur.

Chapter 1, originally published in May 2009, provides an overview of the key issues regarding the policy response to the crisis from the point of view of DEEs. It discusses both the immediate countercyclical measures that need to be undertaken at the national and international levels and the reform of the international financial architecture. While recognizing that many DEEs had considerable policy space to counter destabilizing and deflationary impulses from the crisis, it is argued that several poorer countries faced resource constraints. Even though they could use trade and financial policies to ease the tightened payments constraint resulting from reduced private capital flows and exports, in most cases effective policy response depended crucially on the provision of adequate international liquidity on appropriate terms and conditions through multilateral financial institutions. The paper then goes on

to make an assessment of the international liquidity support agreed on or already provided and makes proposals for alternative and additional mechanisms that could be used in the event of such crises.

Regarding the reform of the international financial architecture, on crisis prevention the chapter emphasizes the need to significantly improve the effectiveness, evenhandedness and the quality of International Monetary Fund (IMF) surveillance over macroeconomic, financial and exchange rate policies of systemically important countries; the reform of the existing international reserves system centred on the dollar, advocating a much greater role for the Special Drawing Right; and the regulation of international financial markets and systemically important financial institutions, without, however, imposing a one-size-fits-all model on DEEs and narrowing their policy space in regulating their domestic financial system and international capital flows and determining access to their markets in financial services.

On crisis intervention and resolution, the chapter argues against structural and deflationary macroeconomic conditionality in the provision of international liquidity to countries facing contagion. It also argues against bailouts of international lenders and investors in countries facing rapid exit of capital and proposes that ways and means should be found to involve international private creditors and investors in the resolution of balance-of-payments and debt crises in emerging economies, drawing on the principles of national insolvency laws. Several of the above measures needed for reducing the likelihood of financial crises with global repercussions and ensuring better crisis intervention and management call for fundamental changes in the IMF – an issue taken up in much greater detail in the last chapter on the reform of the international monetary system, written 18 months later, in November 2010, taking into account various initiatives and proposals in the UN, G20 and IMF in the interim.

Chapter 2, written at a time when recovery was under way in the major advanced economies, moves beyond the crisis and looks to medium-term prospects for the world economy. It is argued that the global economy suffers from a demand gap in large part because of sustained declines in the share of labour income in most major economies, including the US, Europe, Japan and China. Until the outbreak of the subprime debacle, the deflationary threat posed by underconsumption was averted and the global economy enjoyed a rapid growth thanks to debt-driven consumption and property bubbles in the US and several European economies. This, however, resulted in growing global

trade imbalances and financial fragility which eventually culminated in a global crisis.

A return to the pre-crisis pattern of growth can prove to be more damaging. A global rebalancing between major surplus and deficit countries would be necessary. This cannot be done through nominal currency adjustments. These cannot address the problem of underconsumption associated with sluggish wages and create additional demand for the world economy as a whole, but simply serve to redistribute demand impulses across countries. A nominal appreciation of the Chinese yuan against the dollar will not solve Chinese underconsumption or US overspending. China should move to consumption-led growth through faster growth of wages. This would appreciate the real exchange rate of the yuan and reduce net exports, but it would at the same time provide a domestic offset by expanding domestic consumption, and hence allow it to maintain strong growth. The US should move to export-led growth not through wage cuts but through increased productivity through investment in infrastructure and education.

However, a US-China rebalancing would not be sufficient to restore an acceptable pace of growth in the world economy. The two major mature surplus economies, Japan and Germany, which have been siphoning global demand without adding to global growth, would also need to reduce their reliance on exports and add to global demand. Germany has been relying on exports for growth even more than China, primarily by wage suppression and competitive disinflation, which gave it a competitive advantage (that is, a real depreciation of the euro for Germany) vis-à-vis other eurozone countries, notably in the periphery where wages have been keeping apace with and even ahead of productivity growth. Until the outbreak of the subprime crisis, the resulting trade deficits in the periphery were financed with large capital inflows from the core eurozone countries, notably from German and French banks, encouraged by the changed risk perceptions and convergence of interest rates after the move to the Economic and Monetary Union. These unsustainable intra-eurozone imbalances and debt accumulation were laid bare with the global crisis. The crisis in the eurozone now constitutes the single most important threat to stability and growth in the world economy, in particular in DEEs.

German adjustment cannot be based on a nominal appreciation of the euro. This would not generate higher wages and faster growth of private consumption in Germany, but would hurt other eurozone countries. Indeed, it could simply give rise to further wage restraint through competitive disinflation.

By contrast, higher wage settlements in Germany would increase domestic consumption while producing a real appreciation of the euro for Germany, without leading to a corresponding appreciation for the periphery. In other words, higher German inflation holds a key not only to global rebalancing, but also to rebalancing within the eurozone.

Chapter 3 takes a closer look at China, now the number two economy in the world, whose policies are widely seen as the main source of global trade imbalances and currency instability. It is estimated that, despite a high import content ranging between 40 and 50 per cent, about one-third of Chinese growth before the global crisis was due to exports because of their phenomenal growth of some 25 per cent per annum. This figure goes up to 50 per cent if spillovers to consumption and investment are accounted for. The main reason for excessive dependence on foreign markets is underconsumption. This is due not so much to a high share of household savings in GDP as to a low share of household incomes and a high share of profits. It is argued that China can no longer maintain such high growth rates for its exports given the need for global rebalancing and prospects of slow and erratic growth in major advanced economies. It thus needs to turn to consumption-led growth by expanding the share of wages and household income in GDP and accelerating public spending in social infrastructure.

However, during 2008-09 China responded to the slowdown in exports with a massive investment programme, creating considerable excess capacity not only in property and infrastructure but also in some industries such as steel, financed by rapid credit expansion and debt accumulation by local governments. While investment filled the demand gap, consumption lagged behind income. As the effects of this package started to fade out in the course of 2011, another investment boom appears to have got under way, with fixed investment growing by almost 26 per cent and property investment by 33 per cent year-on-year in the first half of the year. Unless accompanied by rapid export and/or consumption growth, such debt-driven investment booms can eventually threaten stability and growth no less than did the debt-driven consumption and property bubbles in the US. Efforts to keep filling the demand gap with investment may postpone the underconsumption crisis, but only for it to come back with greater force.

In the coming years – possibly by the middle of the decade – Chinese growth can be expected to come down considerably compared to pre-crisis levels, particularly if the EU and/or the US experience a second dip. Given

the problems of inflation, overinvestment and fragility of many of its lending institutions, China has limited policy space in responding to the demand gap in the same way as it did in the last three years. A sharp drop in Chinese growth could mark the end of not only the asset and credit bubbles there, but also the boom in commodity markets and capital inflows to DEEs.

If strong growth in China sustained through rapid credit expansion and investment is one factor making a major contribution to growth in several DEEs, notably commodity-rich ones, another factor is the surge in capital inflows from advanced economies. This issue is taken up in Chapter 4, which examines the capital flows to DEEs during the subprime boom-bust cycle in a historical context. It is noted that while advanced economies continue to encounter debt deflation, financial stringency and insolvency, many DEEs have been facing rapid credit expansion and asset inflation and the risk of overheating and hard landing. Except for a brief interruption in 2008 after the collapse of Lehman Brothers, they have been getting large capital inflows as major advanced economies have responded to the crisis caused by excessive liquidity and debt by creating still larger amounts of liquidity to bail out troubled banks, lift asset prices and lower interest rates. Quantitative easing and close-to-zero interest rates have been generating a surge in capital flows into countries with higher interest rates and better growth prospects.

This is the fourth post-war boom in capital flows to DEEs. The previous booms were also associated with a rapid expansion of global liquidity and exceptionally low interest rates in the US, and all ended with busts under tightened global financial conditions, including higher US interest rates and a stronger dollar. The first one ended with a debt crisis in the 1980s when US monetary policy was tightened, and the second one with a sudden shift in the willingness of lenders to maintain exposure in East Asia. The third boom developed alongside the subprime bubble and ended with the collapse of Lehman Brothers and flight to safety in late 2008. Unlike previous episodes, the Lehman reversal did not cause serious dislocations in DEEs because of generally strong payments and reserve positions, reduced mismatches in balance sheets and, above all, the short duration of the downturn and rapid recovery of capital inflows in 2009.

The renewed surge in capital inflows has created different imbalances and fragilities in different DEEs according to their degree of openness to various forms of capital and policy response. Major economies such as Brazil, India, South Africa and Turkey have been relying increasingly on foreign

capital to meet their growing external shortfalls and many of them have been experiencing currency appreciations faster than surplus DEEs in East Asia. By contrast, most East Asian countries have been successful in maintaining strong payments positions, but they have also been facing credit and asset bubbles. In other words, all major recipients are now exposed to the risk of a sudden stop and reversal, though in different ways, even to a greater extent than that experienced after the Lehman collapse.

The risk-return profile and growth differentials that now favour DEEs in the eyes of international lenders and investors cannot be expected to last indefinitely. Still, experience shows that it is almost impossible to predict the timing of stops and reversals and the events that can trigger them even when the conditions that drive the surge in capital flows can be diagnosed to be unsustainable with a reasonable degree of confidence. Various scenarios are explored in Chapter 4 regarding possible events that could end the boom with a sudden stop and even reversal, including a sharp increase in interest rates in the US resulting from increased inflationary pressures associated with the commodity boom or pressures from bond markets, a sharp slowdown in China, a payments crisis in a major emerging economy with growing current account deficits and international contagion thereof, and widening and deepening of the debt crisis in the eurozone and a consequent double dip in the US and EU. Indeed, growing risks in many of these areas are now making international investors highly nervous, creating a tendency to flight to safety and sizeable capital outflows from some emerging economies and sharp drops in asset and currency markets.

For the DEEs, the greatest threat comes from the European periphery – now the Achilles' heel of global finance. As long as the European Commission and the European Central Bank fail to diagnose the origin of the problems correctly and to put in place viable solutions, the region will remain susceptible to extreme instability and messy defaults, with attendant consequences for growth and stability in DEEs.

In all likelihood, the end of the current boom in capital flows can be expected to be disorderly and to coincide with a reversal of the upswing in commodity prices. The countries which have been enjoying the twin benefits of global liquidity expansion – that is, the boom in commodity prices and capital flows – as well as those running growing deficits are particularly vulnerable. Asian economies with strong current account and reserves positions are unlikely to face serious payments and currency instability even in the event

of sharp and sustained declines in capital inflows. However, their financial markets are highly exposed to destabilizing impulses from abroad because of increased foreign presence and their closer integration into the international financial system. The consequent damage could be more severe and longer-lasting than that experienced during the Lehman collapse, given the significantly reduced policy space in responding to renewed instability, at both the global and national levels.

The world economy is now facing renewed risks of instability and downturn before fully recovering from the so-called Great Recession, and the chances of averting such an outcome are becoming quite slim. This is in part because the imbalances and fragilities built up over several years in the past as a result of misguided policies in the US and Europe cannot be easily undone, regardless of the policy pursued today. However, there have also been serious shortcomings in the policy response to the crisis in major mature and emerging economies in both countering the deflationary and destabilizing impulses and addressing the underlying structural and systemic problems.

After a good start in London in early 2009 with a coordinated policy response, disagreements emerged both within and across major members of the G20 group of leading economies regarding how to proceed. Fiscal response in the US has fallen too short to meet the challenge and focused on private consumption rather than investment as called for by a shift to export-led growth. The EU has been too quick in tightening monetary policy to fight a non-existent inflation and in getting into fiscal consolidation which could well prove to be self-defeating. Governments in advanced economies have been unwilling to devise mechanisms to write off unpayable private debt, in some cases making such debt even less payable by imposing austerity on debtors. The US has been engaged in a beggar-my-neighbour monetary expansion, exploiting its "exorbitant privilege" and flooding the world with dollars, effectively seeking competitive devaluation vis-à-vis its trading partners. No matter of importance has been resolved regarding the reform of the international financial architecture, to address shortcomings in crisis prevention, management and resolution; to secure symmetrical adjustment between deficit and surplus countries; to move away from an inherently unstable international reserve system centred on the dollar; and to establish orderly and equitable sovereign debt workout mechanisms – areas that are particularly important for DEEs.

The latter economies have no doubt incurred a relatively heavy burden due to fallouts from a crisis they could not be held responsible for. But it

is also true that they benefited from the global locomotive role played by the US based on debt-driven property and consumption bubbles, through capital inflows, the boom in commodity prices and rapid expansion of exports. But their growing dependence on foreign markets and/or capital inflows has made them particularly vulnerable to shocks from mature economies. They have been generally unwilling to impose effective restrictions on capital inflows, even when they were not needed (that is, in countries with strong payments and reserve positions), allowing them to create credit and asset bubbles and link their economies more closely to mature markets, hence increasing their exposure to external financial shocks.

While many major emerging economies responded vigorously to trade and financial fallouts from the subprime crisis, policy response has not always been designed to address their structural problems. China's stimulus package focused on investment rather than underconsumption, while several countries running current account deficits started to appreciate their currencies even faster once capital inflows recovered in 2009, allowing their deficits and hence dependence on foreign capital to grow even more rapidly. Given the sluggish growth and even the risk of a double dip in the US and Europe and the growing risk of renewed financial stress, extreme risk aversion and reversal of capital flows, the developing world is unlikely to sustain the strong growth seen since mid-2009. And they would be in a much weaker position to respond to another crisis with their own means.

DEEs need to take measures in order to sustain growth and reduce their vulnerability to external shocks. The main challenge facing East Asia is to reduce their dependence on exports to advanced economies and expand national and regional markets. This calls for a redistribution of income to secure higher shares of wages and the household sector in national income and to establish a welfare state to provide basic needs in housing, health and education to the poor.

For most emerging economies in other regions, there is a need to reduce dependence on capital inflows. Collectively DEEs have been running a current account surplus and they do not need capital from advanced economies for external financing. In fact they have been recycling their twin surpluses to the advanced economies in the form of investment in reserve currencies. However, a number of DEEs have been running structural deficits and are dependent on capital inflows to finance imports, investment and growth. There is thus a need to establish, at both the regional and global levels, reliable and stable

mechanisms for South-South recycling from surplus to deficit countries without going through Wall Street or the City.

Finally, many major emerging economies outside Asia need to move away from dependence on commodities, towards high-value manufacturing. This calls for fresh thinking on industrial policy, adapting the traditional instruments and mechanisms to the changed new global environment and innovating new and effective ones.

Yılmaz Akyüz
Geneva,
October 2011

Chapter 1

POLICY RESPONSE TO THE GLOBAL FINANCIAL CRISIS: KEY ISSUES FOR DEVELOPING COUNTRIES[1]

A. INTRODUCTION

The global financial crisis triggered by widespread speculative lending and investment in major international financial centres poses two sets of policy challenges. First, it calls for an immediate policy response in order to stabilize financial markets and international capital flows, halt economic decline and initiate recovery. So far major industrial countries have taken a range of measures for these purposes, including bailout operations through infusion of capital into weakened financial institutions and industrial firms and government guarantees for impaired financial assets and bank deposits; significant easing of monetary conditions and speedy and sharp reductions in interest rates; and large fiscal stimulus packages. Developing and emerging economies (DEEs) have also adopted measures to ease credit conditions and stimulate private spending to counter destabilizing and deflationary impulses from the crisis. However, several of them face resource constraints in responding to the crisis with countercyclical policies. There is a strong rationale and some scope for using trade and financial policies to ease the resource constraint. But, in many cases effective policy response depends crucially on the provision of adequate

[1] First published as a South Centre research paper in May 2009.

international liquidity on appropriate terms and conditions through multilateral financial institutions.

Secondly, this crisis has indicated once again the need for a fundamental reform of the international financial system in order to secure greater stability and prevent virulent crises with global ramifications. A consensus appears to have emerged among the major players in the world economy on the need for reform and a number of ad hoc initiatives have been launched and proposals put forward in various fora including the United Nations, the Group of 20 and the Bretton Woods Institutions. But to what extent these will result in the kind of changes needed is highly uncertain. The past record in this respect is not very encouraging. Despite wide agreement on a systemic reform to bring about more effective governance to international finance after a series of crises in emerging economies in the 1990s and proliferation of proposals for reform, the Financing for Development initiative launched has yielded no significant outcome in this respect in the past seven years.[2] DEEs have a considerably greater stake in such a reform in view of the disproportionately large damage that international financial instability inflicts on them. It is therefore important that they lead the process and form a coherent view for real change in a broad range of areas of crucial interest to them, including the mandate, resources, operational modalities and governance of the IMF, so as to reduce their vulnerability to financial instability and crises while preserving adequate policy autonomy in managing their integration into the international financial system, and capital flows and exchange rates.

These two sets of issues overlap in certain respects. In particular many of the shortcomings in the immediate policy response to the crisis by the international community have their roots in the deficiencies in global institutional arrangements for crisis management and resolution. The next section will discuss the constraints DEEs are facing in responding to deflationary and destabilizing impulses from the crisis, making an assessment of the international initiatives undertaken so far to provide support. This is followed by a discussion of the reform of the international financial architecture under two headings: crisis prevention and crisis intervention and resolution. Discussions will focus on issues that are viewed as of particular importance for stability and growth in DEEs, rather than on every issue raised by the current

[2] See Akyüz (2002 ed.) for the issues raised and proposals made after the Asian financial crisis.

crisis. The final section will give a summary of the policy proposals advanced in the chapter.

B. POLICY RESPONSE IN DEEs: PAYMENTS CONSTRAINT AND INTERNATIONAL SUPPORT

1. Crisis impact and domestic policy options

The fallouts from the global financial crisis are wreaking havoc in DEEs. The combination of sharply declining commodity and manufactured export earnings, collapse of remittances, reversal of private capital flows, rising risk spreads, an extreme degree of credit squeeze affecting even trade finance and losses of asset values is giving rise to a sharp economic slowdown and even contraction in many parts of the developing world. According to the most recent projections by the IMF, average growth in DEEs is expected to be as low as 1.6 per cent in 2009, down from 8.7 per cent in 2007. At more than 7 percentage points, the expected loss of growth in these economies exceeds that in the centre of the crisis, the United States economy, where output is projected to contract by 2.8 per cent in 2009 after growing by 2 per cent in 2007. This deceleration will result in sizeable drops in per capita incomes in most developing regions and countries. Consequently, there is a risk of reversal of many of the benefits achieved in poverty alleviation and development as a result of intense policy efforts and reforms carried out in recent years.

There is now broad agreement on the need for expansionary, countercyclical macroeconomic policy response to deflationary impulses emanating from the crisis. It is also agreed that under current conditions of extreme liquidity preference and risk aversion, monetary policy would have very little impact on credit expansion and private spending. Consequently, the burden falls primarily on expansionary fiscal policies, particularly increased public spending.

The main impediment to countercyclical macroeconomic policy in many DEEs is the balance-of-payments constraint. Although several middle-income countries have succeeded in building up relatively strong payments positions and large stocks of international reserves during the preceding expansion, the balance-of-payments constraint has generally become tighter with declines

in export earnings and the reversal of private capital flows. Indeed reserves have been falling almost everywhere in the developing world and even strong surplus economies such as China have been experiencing capital outflows. An acceleration of growth based on the expansion of domestic demand would certainly drain reserves further as imports pick up, exerting pressure on the currency and threatening external and financial stability. This means that for resource-constrained DEEs expansionary macroeconomic policies would depend crucially on the provision of adequate external financing. For poorer countries where official flows are directly linked to the budget, injection of additional external financing would also help ease the fiscal constraint which has generally become tighter as a result of adverse effects of declines in export earnings and incomes on government revenues and of currency depreciations on public external debt servicing.

According to the World Bank (2009a: p. 6), external financing needs in 2009 are expected to exceed private sources of financing in 98 of the 102 DEEs. In the absence of adequate official financing to fill the gap, these countries would have to use whatever domestic policy instruments they have under their control in order to weather the crisis with minimum damage. But options are quite limited. Currency adjustments would not be very effective in promoting exports when markets abroad are shrinking. Sharp devaluations in countries with extensive liability dollarization could also create deleterious effects on private balance sheets with large currency and maturity mismatches.

By contrast, selective restriction of non-essential, luxury imports, as well as of imports of goods and services for which domestic substitutes are available, could be more effective in easing the payments constraints and facilitating expansionary macroeconomic policies by allowing increased imports of intermediate and capital goods needed for the expansion of domestic production and income. For some DEEs the space between applied and WTO-bound tariffs can provide adequate room for such an action, but the margins are generally quite narrow and even non-existent for a large number of DEEs. By contrast, under current conditions prevailing in many countries, there is a strong rationale, as a last resort, for invoking GATT (and GATS) balance-of-payments safeguard provisions, notably those of Article XVIIIB which are directed particularly at payments difficulties arising from a country's efforts to expand its internal market or from instability in its terms of trade.

Ideally, when global deflationary forces are at work, it would be highly desirable to avoid restrictive trade measures, particularly those of a discriminatory nature. Indeed the interwar experience shows that ad hoc, discriminatory trade restrictions, together with beggar-my-neighbour exchange rate policies, can aggravate rather than ease economic difficulties and lead to conflicts. The recent G20 summit pledged not to "repeat the historic mistakes of protectionism of previous eras" and to "refrain from raising new barriers to investment or to trade in goods and services, imposing new export restrictions, or implementing World Trade Organisation (WTO) inconsistent measures to stimulate exports" (G20 2009c: para 22). However, there was no indication of what kind of actions would be considered as protectionist and what kind as WTO-consistent, nor was there any specific commitment.

Whether or not a particular trade measure can be considered as protectionism depends on the conditions under which it is adopted. In this respect a distinction should be made between restrictions applied by reserve-currency and reserve-rich countries, and those applied by DEEs facing balance-of-payments constraints. Import restrictions in the former cases would effectively imply exporting unemployment abroad, since by raising net exports such an action would substitute foreign for domestic demand. But this would not be so for restrictions applied by DEEs facing shortages of international liquidity. In this latter case, the alternative would be to face stagnation or contraction, and hence reduced demand for foreign goods and services. Selective restrictions over imports would allow allocation of scarce foreign exchange to facilitate domestic expansion without reducing the overall demand for foreign goods. This cannot be considered as a protectionist action.

Thus, resource-constrained DEEs should not be denied their rights embodied in multilateral trade agreements to use legitimate measures so as to avoid contraction in economic activity. Such trade measures should be distinguished from beggar-my-neighbour import restrictions and subsidies, including those used by some major industrial economies – such as the "Buy American" provisions and industrial subsidies in United States stimulus and bailout packages – which serve to protect jobs at home rather than facilitate expansionary policy actions, and beg the question of conformity to the WTO rules.

A second set of measures that could be employed by countries facing shortage of international liquidity to support domestic expansion relates to the capital account. DEEs are now experiencing net outflows on portfolio

investment and international bank lending. Furthermore, residents in several of these countries have joined international lenders and investors in capital flight. This is in large part the outcome of widespread liberalization of resident investment abroad in recent years, often in an effort to relieve the upward pressure of the surge in capital inflows on currencies. Clearly, to the extent that reserves, export earnings and official lending are used to finance capital flight, international liquidity available for current account financing would be reduced. Furthermore, under present conditions capital flight would also compromise the ability to use monetary policy for expansion. Thus, there is a strong case for restricting capital outflows in countries facing rapid loss of reserves. Restrictions would also widen the space for countercyclical monetary and fiscal policy response to the crisis in order to stabilize economic activity and restrain declines in currencies and the consequent dislocations in private balance sheets.

2. International liquidity support

The extent to which trade and financial restrictions would need to be applied by resource-constrained DEEs depends on the speed with which international trade, financial markets and capital flows are stabilized and on the availability of adequate financing from multilateral financial institutions. In the latter respect a number of initiatives have been taken in the G20 and the Bretton Woods Institutions in recent months, seeking improvement in three main areas: increased funding for multilateral financial institutions, widened access of DEEs to multilateral financing, and improvements in the terms and conditions of multilateral lending. Some of these initiatives have implications that go beyond matters of immediate policy response to the crisis and could, in fact, entail systemic and more permanent changes in the way the IMF intervenes in financial crises. These features will be discussed in the subsequent section in the context of the reform of the international financial architecture. Here a brief description will be given of the steps so far taken in the three areas, an assessment will be made of their adequacy in meeting immediate policy challenges for stabilizing economic conditions in DEEs and preparing the ground for recovery, and proposals will be made for further action.

Regarding new resources, according to the agreement reached in the April G20 summit, commitments have been secured for an additional $1.1 trillion for international support. This includes a decision to allocate $250 billion of

Special Drawing Rights (SDRs), approved in the subsequent meeting of the IMF; trebling of resources available to the IMF to $750 billion; an additional $100 billion for multilateral development banks, presumably to be raised through bond issues;[3] and $250 billion trade finance from various public and private institutions including export credit agencies. Of the additional $500 billion for the IMF, only $250 billion is readily available through bilateral lending by some of its major shareholders, to be subsequently incorporated into an "expanded and more flexible" New Arrangements to Borrow.[4] However, there does not seem to be an agreement on how the rest should be raised. While some major shareholders favour increasing the NAB by an additional $250 billion and encourage reserve-rich economies to make bilateral loans, major emerging economies, notably China, India, Russia and Brazil, appear to insist that these resources be raised by borrowing from the markets, and have expressed interest in buying short-term notes (bonds) that the Fund could issue for this purpose.[5] This matter is now under consideration in the Fund.

Regarding access of DEEs to multilateral financing, the major recent initiatives include, in addition to the agreement on the SDR allocation noted above, doubling the normal access limits in the IMF; doubling of borrowing limits for poorest countries eligible for the Poverty Reduction and Growth Facility (PRGF) and Exogenous Shock Facility (ESF); and a new Flexible Credit Line (FCL) established for crisis prevention in emerging economies facing contagion from the global crisis. The FCL is said to be available "for countries with strong fundamentals, policies and track records of policy implementation", to be assessed by the IMF according to several pre-determined criteria. It can be drawn or used as a precautionary instrument. Unlike the Short-Term Liquidity

[3] The World Bank has also set up the Vulnerability Financing Facility for countries hardest hit by the food and financial crises, but its potential contribution to crisis response in DEEs is not very clear.

[4] The Fund has two agreements for bilateral borrowing from its shareholders; the General Arrangements to Borrow (GAB) and the New Arrangements to Borrow (NAB). The GAB was established in 1962 on the basis of the provisions of the Articles of Agreement (Article VII, Section 2) for replenishment of scarce currencies, which gave birth to G-10. It has been renewed ten times, raised from the original amount of SDR6 billion to SDR17 billion in 1983 in response to the debt crisis. The NAB was established in 1998 as a set of credit arrangements with 26 members, for a total of SDR17 billion and renewed twice since then. In both the GAB and NAB commitments by individual countries are based on their quotas. Between the two the total amount available to the Fund is around $50 billion.

[5] See *New York Times*, "IMF Planning to Sell Bonds to Finance New Loans", 26 April 2009.

Facility (SLF) it replaces, the FCL has no hard cap.[6] However, it is not clear if this implies that the Fund will act as a lender-of-last-resort to countries it deems eligible, lending in unlimited amounts and without conditions except for penalty rates. So far a $47 billion FCL arrangement has been approved for Mexico. Poland has requested some $20 billion as a precautionary FCL arrangement and Colombia has expressed interest in a similar arrangement for $10 billion.

Finally, certain steps have been taken for "modernizing IMF conditionality for all borrowers" as part of the overhaul of the IMF lending framework.[7] First, access to the FCL will be based on *ex ante* rather than *ex post* conditionality. Second, a decision has been taken to discontinue structural performance criteria in all Fund arrangements including those with low-income economies. This is expected to allow the Fund to focus on core objectives.

It is difficult to make a precise judgment on whether these initiatives would meet the external financing needs of DEEs since this crucially depends on the effectiveness of the measures adopted by the advanced economies responsible for the crisis in restoring stability and growth. According to the World Bank (2009a: p. 6), the total external official financing needs of the 98 DEEs with shortfalls are expected to be at least $270 billion, and this figure could go up significantly, reaching $700 billion. According to UNCTAD (2009), the gap could turn out to be $2,000 billion. While the G20 summit is claimed to have come up with a commitment for an extra $1.1 trillion, the real additional amount readily available appears to be lower, certainly much less than the latter figures.[8] It is notable that despite these highly-publicized initiatives for additional financing for DEEs, the April 2009 growth projections by the IMF for these economies show downward revisions by 1.7 percentage points for 2009 and 1 percentage point for 2010 from those given in January

[6] The SLF was introduced in October 2008 with the deepening and global spread of the crisis for members with "solid policy track records and strong fundamentals" and access was based on *ex ante* qualification. Unlike the FCL it had a cap of 500 per cent of the quota and it could not be used as a precautionary credit line. It remained unused until replaced by the FCL. Members who do not qualify for the FCL can use the so-called High-Access Precautionary Stand-by Arrangements (HAPAs) on a precautionary basis, with a cap and frontloading subject to *ex post* review; see IMF (2009a).

[7] See IMF Press Release 09/85, March 24, 2009.

[8] In particular the additional $250 billion for the Fund is not yet in sight, the source of the additional $100 billion for the World Bank is not clear, and the so-called $250 billion in additional money for trade financing seems to be fictitious; see Giles (2009) and Khor (2009).

2009 – more or less by the same amounts as for advanced economies (IMF WEO, April 2009: table 1.1).

The volume, terms and conditions of additional financing to be made available by the multilateral financial institutions can be expected to show considerable variations among DEEs according to their access limits and eligibility to different categories of financing. Of the $250 billion SDR allocation, DEEs would receive some $80 billion of which less than a quarter should be available to low-income countries. These amounts are small fractions of estimated external financing needs of the developing world. Any additional IBRD lending funded by bond issues would not be available to a large number of poor countries, including those in low-income and lower-middle-income categories. On current rules additional IMF lending financed by bilateral and/or market borrowing should in principle be non-concessional. Judging on the basis of the established pre-qualification criteria, a very large number of DEEs, including several emerging market countries with large current account deficits, high levels of public debt, high and unstable inflation etc., should not be eligible to the FCL.

It is generally agreed that when the balance-of-payments difficulties of a member of the Fund result from external shocks of a permanent nature, or from excessive expansion of domestic absorption, IMF financing should be accompanied by domestic policy adjustments to reduce the deficits. However, when payments difficulties are due to temporary external shocks, they need to be financed rather than reduced through policy adjustment. The current financial crisis appears to contain both permanent and temporary elements of change. It can be expected that the crisis will bring a durable adjustment to the external deficits of the United States resulting from the long-awaited consumer retrenchment. This certainly calls for an adjustment in surplus countries, including the Asian developing countries, notably China, but not resource-constrained DEEs.[9] This means that deficit DEEs should not be subjected to procyclical macroeconomic policy conditionality for any additional borrowing needed to meet their balance-of-payments shortfalls resulting from trade and financial shocks from the crisis. However, despite the "recent modernization of conditionality", the Fund has continued to impose procyclical macroeconomic tightening in almost all recent standby programmes – fiscal tightening in Pakistan, Hungary and Ukraine, and interest rate hikes in Latvia and Pakistan

[9] For implications of the current crisis for external adjustment in the United States and China, see Akyüz (2008a).

(TWN 2009). Even though some of these countries may have had large budget deficits when they approached the Fund for loans, recessions are not the best times to undertake fiscal adjustment.

Nor should multilateral financing made available to DEEs to meet their balance-of-payments difficulties due to a global crisis for which they have no responsibility place a heavy burden on them. This means that a high degree of concessionality would be needed. Indeed the IMF had established two highly concessional oil facilities in the 1970s as deliberate countercyclical devices to prevent oil price hikes from triggering a global recession, with countries enjoying almost automatic access without countercyclical macroeconomic conditions.

Low-income countries should be compensated, not burdened with additional debt and debt servicing because of financing they receive to meet the shocks from the crisis. For political reasons as well as effectiveness ODA grants are not the best way to achieve this. An option would be to make a one-off permanent SDR allocation to these countries, based on some criteria of need.[10] The cost of drawing on such allocations could be financed collectively from the IMF resources, including gold sales. This should be combined with a moratorium on servicing debt owed by these countries to official creditors, without any additional interest charges.[11]

A no-cost SDR allocation to low-income countries can be combined with a large reversible SDR allocation to other DEEs, to be repurchased when the crisis is over, to provide them with low-cost, no-conditionality resources. Proposals for reversible SDR allocations were made in the 1990s in order to allow the IMF to act as a lender-of-last-resort for financial bailout operations in emerging economies hit by financial crises. The rationale for such an allocation is no doubt much stronger now given the sharp contraction in global output and trade.

A large and reversible SDR allocation would extend to the global level the policy of "quantitative easing" widely used by some major economies in stabilizing conditions in domestic credit and financial markets and stimulating spending. Reversibility would also provide automatic exit, thereby preventing inflationary pressures once recovery is under way. Furthermore, relying mainly

[10] For a discussion of SDR allocation to poor countries as a way of reducing costs of holding reserves, see Polak and Clark (2006).

[11] UNCTAD has also called for a temporary moratorium on official debt servicing by DEEs; see UNCTAD (2009).

on SDR allocation to meet external financing needs would also help avoid several undesirable consequences of funding IMF lending with bilateral loans from its shareholders, discussed in the subsequent section. Finally, a large SDR allocation could allow surplus emerging economies such as China to diversify their reserve holdings and reduce their vulnerability to dollar instability.

The exact purpose and use of IMF lending under current conditions also need to be scrutinized. As in the past, the existing standby programmes of the Fund appear to be premised on maintaining open capital accounts and ensuring that developing-country debtors stay current on their payments to private creditors. Of all the countries with IMF standby programmes, only Iceland has widespread capital controls over resident and non-resident outflows, introduced in the early days of the crisis. None of the emerging markets with IMF programmes has introduced similar measures despite continued capital outflows. Even though the Fund may no longer be actively promoting capital account liberalization, its aversion to restrictions seems to continue unabated.

There can be little doubt that the rationale for capital controls over outflows in countries facing severe balance-of-payments difficulties is much stronger than that for trade restrictions. However, the latter have proliferated both in DEEs and advanced economies after the outbreak of the credit crunch while capital accounts have remained largely open even in countries facing large and continued outflows.[12]

In such cases the Fund should not only support but also recommend use of temporary exchange restrictions, preventing the burden of adjustment falling disproportionately on trade. These restrictions should also include temporary debt standstills. It is true that the international community has not been able to establish an orderly mechanism for the protection of debtors against litigation in such cases – an issue to be taken up in section C. But the IMF can express its support by "lending into arrears", thereby deterring potential hostile action by private creditors.

Such restrictions should also be applied in FCL-eligible countries if the precautionary access provided by the FCL fails to stem speculative attacks and there are large and persistent outflows. Outflows can indeed accelerate if emerging economies lag in recovery behind advanced economies. Borrowing from the IMF to finance such outflows could lead to considerable increases in government debt burden, particularly where an important part of foreign claims

[12] On trade restrictions, see Gamberoni and Newfarmer (2009) and World Bank (2009a).

are on the private sector, as seen in Asia during the 1997 crisis. Besides, there are serious risks in the Fund acting as a lender-of-last-resort to any country – an issue discussed in section C. It would thus be prudent to take up this matter at some length in the context of broader systemic reform of the international financial architecture.

C. REFORM OF THE INTERNATIONAL FINANCIAL ARCHITECTURE

For DEEs there are two key issues in the reform of the international financial architecture. The first relates to crisis prevention: how best to reduce their vulnerability to international financial instability and crises while retaining adequate policy autonomy in determining the pattern and degree of their integration into world financial markets and managing capital flows and exchange rates. Prevention of crises with global repercussions requires addressing three major sources of instability: policies, markets and the current international reserves system centred on the dollar. More specifically it calls for:

- Effective multilateral discipline over financial, macroeconomic and exchange rate policies in systemically important countries;
- Establishment of an international reserves system not based on a national currency or currencies; and
- Effective regulation and supervision of financial markets and capital flows.

It should, however, be kept in mind that while effective multilateral arrangements are important for reducing the likelihood of crises with global spillovers, they cannot fully protect DEEs against instability and crises. They are not substitutes for national policies and institutions for crisis prevention. This makes it all the more important to retain adequate national policy space while setting up a new multilateral framework for the governance of international finance.

The second area of reform relates to crisis response. It is generally agreed that regardless of the measures that may be adopted to secure greater stability, crises with global ramifications will continue to occur. The damage they inflict on the world economy and its incidence will depend on policy responses at national and international levels. The current crisis shows that closer multilateral cooperation and tighter discipline are needed to ensure that

national policy responses take into account their impact on other countries and to avoid negative international spillovers and beggar-my-neighbour policies. Even more importantly, there is a need to improve international interventions in the balance-of-payments, currency and debt crises in DEEs. This calls for, *inter alia*, a fundamental reform of the mandate, operations and funding of the IMF.

1. Areas of reform for crisis prevention

a. Multilateral policy discipline in money and finance

National policies almost always play a central role in financial instability and crises. Misguided deregulation of domestic financial markets, premature liberalization of the capital account, and unsustainable macroeconomic and exchange rate policies are often the proximate causes of currency and balance-of-payments instability and financial crises. This is true both for DEEs and advanced economies. However, global repercussions of financial crises and currency instability in systemically important countries are much more serious than those in DEEs even though there is often regional contagion from crises in emerging economies, as witnessed in East Asia during 1997.

Boom-bust cycles in capital flows to developing countries and major international financial crises are typically connected to large shifts in macroeconomic and financial conditions in the major industrial countries. The sharp rise in the United States interest rates and the appreciation of the dollar was a main factor in the debt crisis of the 1980s. Likewise, the boom-bust cycle of capital flows in the 1990s which devastated many countries in Latin America and East Asia was strongly influenced by shifts in monetary conditions in the United States and the exchange rates among the major reserve currencies (UNCTAD TDR 1998, Part II, Chap. IV; and 2003, Chap. II). This is even more visible in current conditions where the boom-bust cycle in the United States financial markets has produced the most serious post-war global financial and economic crisis.

It must now be evident that adverse international spillovers from macroeconomic, exchange rate and financial policies in advanced economies are much more damaging to DEEs than shocks from their trade policies. But unlike in trade, there is no effective multilateral discipline in money and finance. The IMF members have the same *de jure* obligations to maintain

orderly macroeconomic and balance-of-payments conditions and stable exchange rates. But the Fund's policy oversight is confined primarily to its poorest members who need to draw on its resources because of their lack of access to private finance and, occasionally, to emerging economies experiencing interruptions in their access to private financial markets. By contrast the Fund is totally unable to impose meaningful disciplines over the policies of its major shareholders who exert a disproportionately large influence on global monetary and financial stability.

There are problems regarding not only effectiveness and evenhandedness but also the quality of surveillance. After a series of crises in emerging economies the Fund's Interim Committee (now the International Monetary and Financial Committee, IMFC) agreed in April 1998 that the Fund should intensify its surveillance of financial sector issues and capital flows, giving particular attention to policy interdependence and risks of contagion (IMF 1998). However, the Fund's intensified surveillance over emerging economies was not able to prevent further crises in Argentina, Russia and Turkey, all operating at the time under Fund programmes, in large part because it failed to diagnose and act on the root causes of the problem. Indeed, according to an independent assessment of Fund surveillance, policy makers interviewed had important reservations regarding the quality of the Fund's analysis of capital account issues (IMF/GIE 1999: p. 13).

Similarly, in the run-up to the present crisis the Fund failed to identify the nature and extent of potentially destabilizing speculative build-up and to provide adequate early warning. In its Article IV consultations with the United States throughout 2005-06 the Fund staff was preoccupied with reducing fiscal and external deficits and maintaining control over inflation as the main policy challenges facing the United States economy, while reassuring that the "U.S. financial sector has proven exceptionally resilient in recent years" (IMF 2005: p. 31; and 2006: p. 23). Even a month before the beginning of the credit crunch, the IMF staff argued that "the most likely scenario is a soft landing as growth recovers and inflation falls, although both are subject to risks" (IMF 2007a: p. 26). In the same month, July 2007, the IMF staff assessment of economic conditions in Iceland was also highly upbeat, maintaining that "Iceland's medium-term prospects remain enviable" while adding some caveats about downside risks associated with large current account deficits, increasing indebtedness and high inflation (IMF 2007b: p. 17).

This failure in adequately assessing the risks of instability and providing early warning appears to be deep-seated in the belief of the Fund secretariat, encouraged by some of its major shareholders, that disequilibria and imbalances generated by freely functioning financial and currency markets are self-correcting, without entailing severe social and economic costs of adjustment. It has an obsession with budget deficits and inflation as the main threats to macroeconomic stability and growth, ignoring that inflation in asset markets driven by speculative lending and investment, both nationally and internationally, tends to pose even greater threats, despite mounting evidence from recurrent crises in emerging and mature markets alike.

A key question is, therefore, how to overcome the problems regarding quality, effectiveness and evenhandedness of IMF surveillance. The G20 (2009c: para 12) expressed its support for "candid, even-handed, and independent IMF surveillance" without making specific recommendations as to how this could be achieved. Subsequently the IMFC reaffirmed the emphasis on "candor, even-handedness, and independence" and the need "to enhance the effectiveness of surveillance" (IMF 2009d: para 11). However this has little credibility since the IMFC is known to have come up with similar pronouncements in almost every other meeting, particularly those held after episodes of instability in international currency and financial markets.[13]

There can be little doubt that problems regarding the quality, effectiveness and evenhandedness of IMF surveillance cannot be resolved without addressing its governance-related shortcomings. There is no ready-made solution and further reflection is needed on the ways and means of achieving these objectives. Given that the existing mechanisms within the Fund have so far failed to do so despite repeated pronouncements of intention, such a process should best be conducted outside the Fund.

A notable suggestion for improving surveillance, made by a senior British Treasury official, is its formal separation from decisions about programme lending and the use of IMF resources so as to establish the Fund as independent from political influence in its surveillance of economies, as an independent

[13] For instance, in September 2000 the Committee emphasized "enhancing Fund surveillance, and promoting stability and transparency in the financial sector"; in April 2002 it encouraged the Fund "to press ahead with the range of recent initiatives designed to enhance the effectiveness of surveillance and crisis prevention, including the Financial Sector Assessment Program"; in October 2004 it allocated four paragraphs on "making surveillance more effective and strengthening crisis prevention"; and in April 2006 it proposed a "new framework for IMF surveillance" which included, *inter alia*, making the staff "accountable for the quality of surveillance".

central bank is in the operation of monetary policy (Balls 2003). It is rightly argued that the current structure of the IMF treats programme design as an extension of surveillance, but the lack of a clear distinction between lending and surveillance activities creates the wrong incentives and diminishes the effectiveness of surveillance. Moreover, there is currently no formal regular mechanism for assessing whether the Fund is providing objective, rigorous, and consistent standards of surveillance across all member countries – programme and non-programme countries. While responsible for ensuring the effectiveness of the Fund's activities, Executive Directors also have responsibilities to their authorities. This creates a conflict of interest where Executive Directors tend to collude in surveillance in defence of the countries they represent, turning peer pressure into peer protection. Surveillance should thus rest with authorities who are independent of their governments and who are not involved in lending decisions, making it impartial, legitimate, authoritative, transparent and accountable.

b. Stable international reserves system

A reserves system based on a national currency as a means of international settlement and a reserve asset suffers from a major dilemma. This was pointed out by Triffin (1960) almost half a century ago, questioning the viability of the Bretton Woods arrangements based on the United States dollar. In a dollar-based system net holding of dollar assets by the rest of the world depends on the United States running current account deficits. If the United States stopped running deficits, the shortage of international liquidity would stifle global trade, investment and growth. If, on the other hand, the United States runs growing deficits and supplies adequate liquidity to the world economy, the accumulation of liabilities could undermine the confidence in the dollar, depressing its value vis-à-vis other reserve assets – namely, gold under the Bretton Woods system. Restoring confidence and overcoming inflationary pressures would then call for United States interest rates to rise and deficits to fall, depressing economic activity and employment. Therefore, while issuing a reserve currency gives the country an advantage in financing its deficits, it can also become problematic. With the accumulation of liabilities abroad, the country can lose its monetary policy autonomy and be forced to adopt deflationary policies.

Indeed, the Bretton Woods system of exchange rates collapsed as the immediate post-war dollar shortage was translated into a dollar glut with the growing United States deficits, which made it impossible to maintain gold convertibility at a fixed rate, leading to a unilateral suspension in 1971 – the first and the most significant post-war default of international obligations by any country. The move to floating exchange rates, rapid growth of international financial markets and capital flows, and the rise of Germany and Japan as industrial powers did not challenge the dominance of the dollar. As explained by the IMF historian Boughton (2001: p. 937), Germany and Japan "were reluctant to see their currencies 'internationalized' and used as reserves … Moreover, the prospect of a system of multiple reserve currencies was widely viewed, both inside and outside the Fund, as a potentially destabilizing development that was to be avoided if possible. If central banks held several different currencies, then they would be likely to shift the composition of their portfolios to optimize expected returns. Such speculation could magnify the effects of market shifts in confidence or in expected relative returns." At the time of the suspension of gold convertibility, the estimated share of the dollar in all official reserves other than gold was 70 per cent, compared to around 65 per cent at present.

In the post-Bretton Woods era instability in the United States balance of payments has continued unabated, even aggravated by the absence of effective multilateral discipline over its macroeconomic policies – a discipline that the Bretton Woods system had sought to establish through gold convertibility. This resulted in recurrent gyrations of the dollar vis-à-vis other reserve currencies and played a major role in increased global financial instability.

After the collapse of the Bretton Woods system, the need for reserves was expected to lessen as countries gained access to international financial markets and became more willing to respond to balance-of-payments shocks by adjustments in exchange rates. However, capital account liberalization in DEEs and their greater access to international financial markets has produced exactly the opposite result. International capital flows have no doubt allowed running larger and more persistent current account deficits beyond the levels that could be attained by relying on international reserves. But this has also resulted in an accumulation of large stocks of external liabilities and growing presence of foreigners in domestic securities markets. The debtor countries have thus become increasingly vulnerable to sudden stops and reversals in capital flows, with grave consequences for stability, growth and development.

This became increasingly visible after the Asian crisis in 1997 when the only collective insurance available, namely the IMF lending, proved to be highly unreliable and even counterproductive.

Thus, the combination of increased capital account liberalization in DEEs, accumulation of external liabilities, procyclical behaviour of international financial markets, and the absence of effective multilateral arrangements for the provision of international liquidity and orderly debt workout procedures has forced DEEs to look for self-insurance by accumulating large stocks of international reserves, mostly held in dollars. While traditionally reserves covering three months of imports were considered adequate for addressing the liquidity problems arising from time lags between payments for imports and receipts from exports, it has become common wisdom that in order to avoid a liquidity crisis, international reserves in DEEs should at least meet their short-term external liabilities.[14]

At the end of 2008 total international reserves of DEEs reached some $5.5 trillion, or 7 months of imports. Even though DEEs taken together have been running current account surpluses in recent years, only about half of their total reserves are earned from current account surpluses, mainly by China and fuel exporters. The rest came from capital inflows – that is, they are borrowed reserves.[15] In a few countries such as China, current account surpluses and reserve accumulation have been associated with rapid growth. But in a large number of DEEs additional reserves came either from capital inflows or from trade surpluses achieved by cutting growth for fear that a possible downturn in commodity prices or reversal of capital flows would necessitate additional international liquidity.

These reserves are invested in low-yielding assets, mainly the United States Treasury bills and bonds. On the basis of average historical spreads between the borrowing rate and return earned on reserves, the annual carry cost of borrowed reserves alone to DEEs can be estimated to be in the order of some $130 billion. This constitutes a net transfer of resources to reserve-currency countries, notably the United States, and exceeds total official development

[14] This is known as the Guidotti-Greenspan rule formulated after the Asian crisis. For a discussion of adequate level of reserves see UNCTAD TDR (1999: Chap. V).

[15] "Borrowed" in the sense that they accompany increased claims by non-residents in one form or another, including direct and portfolio equity investment, which entail outward income transfers.

assistance to developing countries.[16] The cost borne by DEEs would be greater if allowance is made for foregone growth by putting export surpluses into United States treasuries rather than investment and imports. Furthermore, DEEs could incur losses on their dollar holdings if the large build-up of United States government liabilities resulting from bailout and fiscal stimulus packages were to produce inflation and dollar depreciation.

Both the G20 summit and the IMFC remained silent on reform in this key area. There are various options in establishing an international reserves system not based on national currencies so as to avoid these difficulties. One proposal is to go back to the gold standard. Another is to revisit Keynes's proposal, made at the Bretton Woods Conference, of introducing a global currency, the bancor, exchangeable with national currencies at fixed rates, issued by a global central bank – the International Clearing Union – to provide countries liquidity for international payments clearance as well as overdraft facilities by amounts based on the value of their trade.[17] However, building on existing mechanisms and institutions and a gradual move away from the dollar towards the SDR (or expanded SDR) appears to be a more practical solution.

An important advantage of SDRs, particularly for DEEs, is that unlike dollar reserves, holding SDRs does not entail costs; cost is incurred only when they are used. Under present arrangements the IMF may allocate SDRs to members in proportion to their quotas. Members obtain or use SDRs through voluntary exchanges or by the Fund designating members with strong external positions to purchase SDRs from those with weak external positions. When members' holdings rise above or fall below their allocation, they earn or pay interest respectively, with the interest rate being determined as the weighted average of interest rates on short-term debt in money markets of the SDR basket currencies.

[16] The method used here to estimate reserve costs differs from that in the literature in that a distinction is made here between borrowed and earned reserves. Polak and Clark (2006) also refer to borrowed reserves in their estimation of the cost to the poorest developing countries.

[17] For a recent discussion of this proposal in relation to the current crisis, see Monbiot (2008). Ironically this proposal is now revisited for addressing the problems associated with the dollar-based reserve system and the United States indebtedness while at Bretton Woods it was opposed by the very same country because it was the biggest creditor at the time and Keynes was proposing taxing current account surpluses. By contrast, in a recent speech on reform of the international monetary system, proposing adoption of the SDR as a global reserve currency, the central bank governor of China, the country with the biggest surplus, referred to Keynes's bancor proposal as "farsighted"; see Zhou (2009).

The cost advantage of SDRs has given rise to calls for regular distribution to alleviate the burden of holding reserves on low-income countries. Indeed, a former Director of Research of the IMF, Jacques Polak, argued in a joint paper that the only principle that should now guide the allocation of SDRs should be "the benefits of permitting low-income countries to acquire and hold reserves at a much lower interest rate than they would have to pay in the market and a reduced dependence of the system on borrowed reserves that are liable to be recalled when they are most needed."[18]

Regular allocations of SDRs on the basis of existing rules cannot promote the SDR to be a major reserve asset and address the inequities and instability resulting from the current system based on national currencies, even if such allocations are done more often than has been the case. A way forward is to make the IMF an SDR-based organization, and to allow SDRs to replace quotas and the GAB and NAB as the single source of funding for the IMF. The Fund could be permitted to issue SDRs to itself up to a certain limit which should increase over time with growth in world trade. Under such a scheme the present practice of allocations to countries according to their quotas would be discontinued. Unconditional access limits (the so-called reserve tranche or gold tranche) would need to be redefined and widened considerably based, *inter alia*, on some criteria of need.

In such an arrangement the demand for SDRs (or drawings from the IMF in SDRs) can be expected to be inversely related to buoyancy in world trade and income and the availability of private financing for external payments. Thus, allocations could be altered in a countercyclical way, accelerated at times of global slowdown. This would help counter deflationary forces in the world economy and provide an offset to fluctuations in private balance-of-payments financing.

Several issues of detail would still need to be worked out, but once an agreement is reached to replace traditional sources of funding with the SDR, the IMF could in fact be translated into a technocratic institution of the kind advocated by Keynes during the Bretton Woods negotiations. Its funding would no longer be subjected to arduous and politically charged negotiations dominated by major industrial countries. Nor would it need to borrow from some of its members in order to lend to others. Such an arrangement could thus bring a considerable improvement to the governance of the IMF, allowing it to

[18] See Polak and Clark (2006) which also addresses whether SDRs should be issued to all members or to low-income countries alone.

stay at equal distance to all its members and help to perform policy surveillance evenhandedly and effectively.

Making the Fund an SDR-based institution would no doubt result in a considerable increase in the supply of SDRs compared to the existing stock or the growth that could be expected under current practices. It would allow major surplus countries to invest their reserves in SDRs instead of reserve currencies. It is also possible to supplement this with a mechanism to remove the dollar overhang by allowing countries to rapidly replace their existing stocks of dollar reserves with SDRs without causing disruption in currency markets. Such a proposal was made by the Governor of the People's Bank of China. According to this proposal the IMF would "set up an open-ended SDR-denominated fund based on the market practice, allowing subscription and redemption in the existing reserve currencies by various investors as desired" (Zhou 2009).

This proposal corresponds to what came to be known as the substitution account, extensively discussed in the IMF in two previous episodes of considerable dollar weaknesses, but abandoned for several reasons; first, in the early 1970s in the Committee of 20 in an effort to replace the Bretton Woods system by something more viable, and then in the late 1970s and early 1980s as the dollar weakened considerably.[19] The idea is a simple one: the IMF would issue interest-bearing certificates denominated in the SDR against dollar reserves handed over by central banks at the market exchange rate, and invest these reserves in interest-bearing United States Treasury bills and bonds. The operation would not affect the total volume of international reserves but its composition – thus no "inflation" fears. Countries can use these certificates to settle international payments or to acquire reserve currencies. The substitution would result in a withdrawal of a large stock of dollar reserves from the market and put them into IMF coffers. It would eliminate the risk of monetary turmoil that could result from a potential widespread unloading of dollar reserves by central banks.[20]

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[19] For an account of these deliberations, see Boughton (2001: pp. 936-43). See also Bergsten (2009).

[20] Kenen (2005) suggests that a widespread unloading of dollar reserves into euro could be absorbed by establishing a similar substitution account at the European Central Bank so as to avoid undesirable effects of a flight from the dollar on interest rates and exchange rates.

Several issues of importance to DEEs would need to be sorted out.[21] First and foremost, there is the question of who will bear the exchange rate risk. A change in the dollar/SDR exchange rate would create losses and gains for the IMF since, by definition, a substitution account would mean a currency mismatch between assets and liabilities. A sustained decline in the dollar against other currencies that make up the SDR will imply losses. The exposure of the Fund can be considerable if the account is open-ended, rather than restricted in size. There is no guarantee that interest differentials between the dollar and SDR would provide cover for such losses.[22] This is true whether the interest on SDRs is calculated as at present, or set in the market established for the SDR.

In the previous discussions of this proposal, the IMF gold was proposed to be used for cover. But this would mean pushing the losses onto all members of the Fund, rich and poor alike. If, on the other hand, the exchange rate risk were to be borne by holders of the SDRs, the operation would be meaningless – there would be no incentive for holders of dollar reserves to subscribe to the account. An alternative would be for the United States to bear the risk – that is, to supply more interest-bearing dollar assets to cover exchange losses if the dollar falls against the other currencies. A more equitable solution would be to share the risk between the United States and the central banks subscribing to the substitution account, rather than pass it onto the Fund, including its poorer members.

A second issue relates to the privatization of the SDR. Establishing a private market for SDRs by allowing banks to hold them, and using them in currency interventions would certainly improve its liquidity and status as a reserve asset. This is also seen as necessary for the substitution account to be attractive to central banks, not only in replacing dollar reserves but also reserves held in other currencies, including potential ones such as the Chinese yuan. However, this could also make the SDR a new instrument of speculation and a source of instability. In other words, it might be difficult to reconcile a high degree of liquidity with stability of its exchange value. It is therefore important to strike the right balance between the two and to ensure that SDRs are used mainly for settlements of payments linked to international trade and investment.

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[21] These are discussed in Boughton (2001, 2007) and Bergsten (2007a, 2007b).

[22] An alternative would be for the IMF to invest dollar reserves into long-term Treasury bonds which normally carry higher interest rates. But this would not necessarily cover the exchange rate losses.

c. Regulation of international financial markets and capital flows

Past experience shows that even when monetary and fiscal discipline is secured and a relatively high degree of price stability is attained, unbridled financial markets are capable of generating instability and crises with serious consequences for the real economy, notably jobs and incomes. The global financial turmoil triggered by the subprime debacle has shown once again that the Anglo-American view that financial markets regulate themselves is not only wrong but also highly damaging.

There is now broad agreement on the need for tighter regulation than has been the case, but views differ about how best to regulate and the degree of regulation. Moreover, regulation of international capital flows is highly contentious. The dominant view still entertained in the mainstream is that once financial markets and institutions are properly regulated there is no need to restrict international capital flows. However, this does not stand against ample evidence that prudential rules do not necessarily bring greater stability to international capital flows, nor can they prevent such flows from inflicting serious damage on an economy (Akyüz 2008b).

Several reasons are usually given why financial regulation should be international. First, since financial instability often has adverse global spillovers, national regulatory practices should be subject to multilateral disciplines. Second, multilateral rules would provide a level playing field and prevent regulatory arbitrage – that is, business running away from tightly to lightly regulated jurisdictions. Finally, they would reduce the influence of politicians over regulators and give them a certain degree of independence – a concern that is now widely shared after the hands-off approach that the previous United States administration had adopted vis-à-vis financial markets.

While these considerations are basically valid, there are both political and technical difficulties in establishing multilateral discipline in financial regulation and supervision. A supreme international body with fully-fledged regulatory and supervisory powers over all financial institutions is not on the agenda. However, it is increasingly held that global and systemically important institutions should be regulated and supervised internationally rather than nationally. Several proposals have been made for establishing international bodies for credit rating agencies and transnational banks over a certain size.[23]

[23] Several authors in Eichengreen and Baldwin (2008) propose a single global regulator for large highly leveraged institutions and banks with significant border-crossing activities.

An option would be to leave the conduct of regulation and supervision to national authorities within a framework established according to the same principles as the WTO.[24] This would involve binding multilateral agreements on a set of rules and regulations for financial institutions including banks, institutional investors, rating agencies, and bond and credit insurance companies. There would be a commitment by governments to implement such rules and regulations through national regulators. Finally, there could be a multilateral body to oversee implementation and impose sanctions for non-compliance, such as denying access of financial firms from non-complying countries to markets of other members.

However, it is still quite unrealistic to expect systemically important countries, including some emerging economies, to give up national policy autonomy to the extent required. It is notable that even the EU has not managed to establish a unified regulatory system. Furthermore, serious difficulties could be faced in reconciling and integrating different legal systems and conceptual frameworks in arriving at a uniform set of rules for economies at different levels of financial development and with different financial institutions and culture.

More importantly, such an arrangement would carry risks and drawbacks for DEEs. It is not realistic to envisage that a global institution with genuine clout over major advanced economies could be established on the basis of a distribution of power markedly different from that of existing multilateral financial institutions. Thus, it may not be wise to create another multilateral body before solving satisfactorily the governance-related problems that pervade the existing institutions such as the IMF, World Bank and WTO.

Second, there is the familiar one-size-fits-all problem. In all likelihood, rules and regulations to be agreed in such a setting would be shaped by the exigencies of financial markets and institutions of more advanced economies. These would not always be suitable to DEEs. On the other hand, as the experience

[24] A proposal made after the Asian crisis was to establish a World Financial Authority (WFA) or to turn the Bank for International Settlements (BIS) into such a mega-agency "with major powers to establish best practice financial regulation and risk management throughout international financial markets… to enforce regulatory standards, backed by high-profile surveillance … [and] monitor and mediate the imposition of capital controls by national governments"; see Eatwell and Taylor (1998). For a more detailed discussion, see Eatwell and Taylor (2000) and for an assessment, see Akyüz and Cornford (2002).

in the WTO shows, special and differential treatment that may be granted to DEEs may not mean much in practice.[25]

Furthermore, entering into comprehensive multilateral negotiations could open the Pandora's Box of market access in financial services, liberalization of capital flows and multilateral agreement on foreign direct investment, resulting in further restrictions over policy space in DEEs. The real danger for DEEs is that a process designed to broaden the scope of global governance over finance may end up extending the global reach of financial markets. It is notable that one of the recommendations of a G20 working group on international cooperation was for Financial Stability Forum (FSF) member countries to "maintain the openness of the financial sector" (G20 2009a: p. 7). It is not clear if this is meant to be liberalization of market access in financial services or if it would apply to new developing-country members of the expanded FSF. But it is a clear sign that global arrangements for financial regulations may entail new obligations for DEEs for opening up their financial sectors to foreign firms.

A less ambitious approach would be to extend the mandate and improve the governance of existing bodies such as the FSF, the Bank for International Settlements (BIS), the Basle Committee on Banking Supervision, the International Association of Insurance Supervisors and the International Organization of Securities Commissions. Most existing proposals for improving global governance of finance indeed envisage a voluntary process of closer coordination among national regulators, based on an agreed framework within such institutions, rather than a rules-based system with sanctions.[26]

The G20 also appears to be moving in that direction, emphasizing the need for "internationally agreed high standards", "common and coherent international framework, which national financial authorities should apply in their countries consistent with national circumstances" and "systematic

[25] Eichengreen (2008) proposes the creation of a World Financial Organization where members would undertake obligations for regulation and supervision set out in its charter and agreements, but would be free in how to meet them. This would permit regulations to be tailored to the structure of individual financial markets. An independent body of experts would then decide whether the members have met their obligations, imposing sanctions such as denying access of banks from non-complying countries to the markets of other members. However, such a loose arrangement without clearly defined rules and obligations may not provide adequate safeguards for DEEs, or prevent regulatory arbitrage.

[26] See, e.g., G30 (2008) and proposals made in several papers in Eichengreen and Baldwin (2008).

cooperation between countries".[27] It proposes "to establish supervisory colleges for all major cross-border financial institutions" (G20 2009a: p. 5). The Group has also agreed to transform the FSF into a Financial Stability Board by extending its membership to include all G20 countries and its mandate to the regulation and oversight of all systemically important financial institutions, instruments and markets, including the hedge funds and credit rating agencies.

There are also proposals to give a greater role to the IMF in financial surveillance. However, this role should not be extended to setting regulatory standards or overseeing financial markets and institutions. In this area the task of the Fund is to monitor macroeconomic and financial developments and provide early warning of risks of instability and crises. Its ROSC (Report on the Observance of Standards and Codes) exercises, introduced after the Asian crisis and undertaken as part of Article IVC consultations and in conjunction with the joint FSAP (Financial Sector Assessment Programme) activities with the World Bank, are meant to help promote global financial stability. However, these activities have been highly ineffective because of several shortcomings in the design and application of codes and standards.[28] Therefore, before the IMF may be given new roles in the financial architecture, it is important to have a reasonably good understanding of the factors that have made existing instruments and mechanisms ineffectual and to remove them through appropriate reform.

A possible guiding principle for DEEs in the reform of the global financial architecture in the area of financial regulation and supervision could be to allow and retain considerable autonomy in setting standards for financial institutions without significant border-crossing activities. A multilateral framework for national regulatory systems or global regulators should be introduced only for transnational financial institutions. The nature and extent of regulation of different transnational financial activities and institutions needed is a highly complex issue that would require considerable deliberations. Even where developing countries do not have transnational financial institutions, they should have voice in setting global rules and standards since they often do business with those from advanced economies. For instance, supervisors from DEEs should always participate in supervisory colleges proposed by the G20,

[27] G20 (2009b: para 4; and 2009c: paras 13-15).

[28] For these shortcomings see Cornford (2002), Schneider and Silva (2002) and Schneider (2005).

rather than being invited to such bodies as host supervisors "where appropriate", as envisaged by a G20 working group (G20 2009a: para 4).

In the regulation of transnational financial institutions, the main objective of DEEs should be to ensure that the proposed mechanisms address their vulnerability to external financial instability and shocks. This calls for attention to at least the following areas:

First, international lenders to DEEs behave in a highly procyclical way and this increases their susceptibility to external shocks. At times of boom, they lower their standards in lending to financial and non-financial firms in developing countries, and governments are not always fully able to prevent such surges creating serious currency and maturity mismatches in private balance sheets. When the times change and risk assessment takes a downturn, lending is rapidly withdrawn, often leading to currency collapses and widespread bankruptcies, with the state often taking over private liabilities. Therefore, the main interest of DEEs in the much emphasized and fashionable countercyclical prudential measures for international banks is their potential impact on procyclical behaviour in international lending.

Second, governments and private firms in DEEs face similar difficulties when they borrow abroad through international security issues. Rating agencies are not only procyclical but are also biased against borrowers from DEEs. Before the outbreak of the subprime credit crunch, ratings of many Asian emerging economies with sound payments, reserve and fiscal positions were below those of some advanced economies with serious vulnerabilities on these fronts, e.g. Iceland. Therefore, removing the rating bias and procyclical behaviour should be the primary objective of DEEs in regulating international rating agencies.

Third, DEEs are not only borrowers from international markets. They are also investors in securities issued in advanced economies by both public or publicly sponsored institutions and private firms. Several central banks in DEEs are known to have invested large amounts in debt issued by the United States Government Sponsored Enterprises, including mortgage firms Fannie Mae and Freddie Mac. Again, the so-called toxic assets issued by private financial institutions have found their way into the portfolio of banks and institutional investors in DEEs. In fact, because of increased liberalization of capital outflows by residents, such exposure has been on the rise. Therefore, DEEs have a growing stake in greater transparency and objective assessment of the quality of such securities. This calls for an overhaul of accounting, regulatory and underwriting standards and a fundamental reform of rating agencies. A Global

Financial Products Safety Commission may also be established for this purpose with equal and full participation of DEEs.

Fourth, a growing source of instability of capital flows in developing countries is due to international portfolio investors, including institutional investors and highly-leveraged institutions, notably hedge funds. The task of delimiting the nature and extent of their operations within their borders naturally falls on national governments and regulators. However their task would be greatly facilitated by increased transparency of investors. The minimum requirement is registration with national financial authorities. Access to information on the degree and nature of leverage, the size and composition of portfolios and investment strategies of these investors would also be highly important for financial authorities in DEEs to make a reasonably sound assessment of the risks entailed by their entry into domestic asset markets.

2. Crisis intervention and resolution

Regardless of measures that may be taken to discipline policies in systemically important countries and to regulate systemically important financial institutions, instruments and markets, it is almost a certainty that crises will continue to occur. For countries which do not enjoy reserve currency status, notably the DEEs, balance-of-payments and debt crises will also continue to necessitate international interventions, except where there are effective regional alternatives. Under current arrangements this task falls on the IMF.

However, there are several contentious and unresolved issues regarding IMF interventions in crises in emerging economies, including their objectives, funding and policy conditionality. Considerable dissatisfaction was expressed by several developed and developing countries in the way interventions were designed and implemented in the late 1990s, and several proposals were made, both within and outside the Fund, for improvement (Akyüz 2005). But these were put aside as a result of opposition from its major shareholders and the complacency created by quick resumption of growth in most countries hit by financial crises and a strong recovery of capital flows in the early years of this decade.

The Fund's crisis intervention in the past typically involved injection of liquidity designed to keep countries current on their debt payments to private creditors, to maintain capital account convertibility and to prevent default, accompanied by monetary and fiscal tightening to restore confidence. Rescue

packages amounted to several times the accepted quota limits and were often combined with bilateral contributions from major industrial countries. As noted, recent interventions do not diverge in a significant way from this pattern: capital accounts are kept open despite rapid outflows and depletion of reserves, policy conditionality continues to be procyclical and the IMF is increasingly relying on funds borrowed from its main shareholders.

This approach is troublesome for several reasons. Procyclical policies add to contractions in economic activity brought about by external trade and financial shocks, leading to increased unemployment and poverty. Relying on major shareholders for funding increases their influence in the design of IMF programmes and even allows them to pursue their national interests, as observed in Korea during the 1997 crisis. More importantly, bailouts undermine market discipline, create moral hazard and encourage imprudent lending since creditors and investors are not made to bear the consequences of the risks they take. They shift the burden of the crises almost entirely onto debtors, particularly governments in DEEs which are often compelled to assume external liabilities of private debtors which can no longer service their debt. Moreover, the financial integrity of the Fund is jeopardized, particularly as the scale of operations increases with rapid growth in cross-border lending and investment.

As these problems became increasingly visible in IMF interventions in recurrent crises in the 1990s and early 2000s, a proposed solution was to bail in or involve international creditors and investors in the resolution of financial crises and to restrict IMF lending in order to encourage it. This received support from some G7 countries such as Canada, the UK and Germany. Various voluntary and involuntary schemes were proposed to achieve this, including temporary debt standstills and exchange controls. The IMF Board recognized that "in extreme circumstances, if it is not possible to reach agreement on a voluntary standstill, members may find it necessary, as a last resort, to impose one unilaterally", and that since "there could be a risk that this action would trigger capital outflows … it might be necessary to resort to the introduction of more comprehensive exchange or capital controls", with the Fund signalling its "acceptance of a standstill imposed by a member … through a decision … to lend into arrears to private creditors."[29]

[29] For the discussion of this issue in the IMF, see Akyüz (2005: pp. 9-15).

The Fund secretariat was also moving towards establishing a formal mechanism for involving private creditors in the resolution of sovereign debt crises through a Sovereign Debt Restructuring Mechanism (SDRM). A country facing severe balance-of-payments and sovereign debt difficulties was envisaged "to come to the Fund and request a temporary standstill on the repayment of its debts, during which time it would negotiate a rescheduling with its creditors, given the Fund's consent to that line of attack. During this limited period … the country would have to provide assurances to its creditors that money was not fleeing the country, which would presumably mean the imposition of exchange controls for a temporary period of time" (Krueger 2001: p. 7). However, because of opposition from its major shareholders and financial markets and lack of strong support from some developing countries, this proposal was first diluted – considerable leverage was granted to creditors and provisions for standstills were dropped – and subsequently abandoned altogether.

In response to the adverse impact of the crisis on trade and capital flows in DEEs, the international community has now chosen to establish a new facility, the FCL, to allow the Fund to lend large amounts of liquidity to certain countries deemed eligible on the basis of some pre-determined criteria. However, this has not been accompanied by measures to meet the consequent risks of moral hazard, unequal burden sharing and potential threat to the financial integrity of the Fund. The latter is a particular cause for concern since the majority of Fund members are excluded from access to this facility. This makes it all the more important to establish parallel arrangements to involve private creditors and investors in the resolution of balance-of-payments and debt crises in emerging economies.

A central component of such arrangements is the recognition of the rights of countries facing large and sustained capital outflows to impose temporary debt standstills and exchange controls, and the provision of statutory protection to them in the form of a stay on litigation. The decision for a standstill should be taken unilaterally by the country concerned and sanctioned by an independent panel rather than by the IMF because the countries affected are among the shareholders of the Fund which is itself also a creditor. There can be little doubt that countries will resort to standstills with considerable prudence and discretion. As noted by a former Deputy Governor of the Bank of England, a "well-articulated framework for dealing with sovereign liquidity problems … would be no more likely to induce debtors to default than bankruptcy law is to induce corporate debtors to default" (Clementi 2000).

The Fund lending should focus on current account transactions, and there should be limits to lending to countries experiencing large and persistent capital outflows – notwithstanding that money is fungible and in practice it is not always possible to clearly identify the need catered for by a particular loan. Lending at progressively higher (penalty) rates, as the Fund now seems to be practising, may not dampen the demand for liquidity from the FCL-eligible countries. Instead, the Fund should encourage involvement of private creditors by recommending and even requiring use of temporary standstills and exchange controls where needed.

Such restrictions should be introduced whether payments difficulties have their origin in private or sovereign debt or rapid exit of foreign investors, and whether they are due to liquidity or solvency problems – a distinction which is not always clear-cut. In cases of strong signs of insolvency, limits on IMF lending should be tighter – that is, countries should not borrow from multilateral sources to finance unpayable debt to private creditors, as happened extensively during the debt crisis in the 1980s (Sachs 1998: p. 53).

Because of the absence of a multilaterally agreed legal system for debt workouts, the practice tends to be disorderly and ad hoc, and tends to favour creditors. Very often the IMF is involved in coordinating and resolving debt servicing difficulties, be it due to solvency or liquidity problems, based on an adjustment programme agreed with the debtor country. The Fund generally seeks a voluntary agreement with creditors, but its position is asymmetrical – while it has a significant leverage vis-à-vis sovereign debtors it cannot impose appropriate terms and conditions on creditors. Even in bond contracts with collective action clauses (CACs), bondholders can hold out and opt for litigation in search of a better deal. Such ad hoc restructuring has rarely secured sustainability where there were problems of solvency. In cases where debt servicing difficulties were due to liquidity shortages, it provided relief through maturity rollover at penalty rates, but this often came very late in the crisis and failed to prevent the damage.[30]

Multilateral arrangements for orderly workouts for sovereign debt should be efficient in that they should seek to contain the damage inflicted by debt servicing difficulties on the debtor and allow rapid recovery and growth, as in national bankruptcy procedures in many advanced economies, such as Chapter 11 of the United States Bankruptcy Code. They should also be fair in

[30] For a discussion of Fund-led debt restructuring in emerging market crises, see Akyüz (2002 ed.).

the distribution of the burden, making creditors bear the full consequences of the risks they have taken – risks which have already been compensated by handsome premiums. To the extent possible, debt restructuring including rollovers and write-offs should be based on negotiations between the debtor and creditors, and facilitated by the introduction of automatic rollover and CACs in debt contracts. However, impartial arbitration is needed to settle disputes in the case of failure to reach agreement over the terms of restructuring.

Existing procedures for official debt workouts also need a fundamental change. Decisions on restructuring such debt are currently left to a club of creditors – the Paris Club – and are tied to IMF structural adjustment programmes and sustainability assessments. Sustainability is often judged on the basis of how much debt and debt servicing a country can tolerate without adequate attention to its implications for development and poverty. Furthermore, political considerations often dominate debt-relief outcomes. It might be highly desirable to delink official debt restructuring from the IMF, and leave debt sustainability analysis to an independent body of experts, appointed with the consent of the debtors. The Fund, the Bank and United Nations agencies could provide inputs to this process in their respective areas of work. Debtor countries should also be allowed to submit their own analyses of sustainability. Consideration should also be given to establishing impartial arbitration for official debt disputes along the lines of Chapter 9 of the United States Bankruptcy Code which deals with public debtors and applies the same principles as Chapter 11.[31]

D. SUMMARY OF POLICY CONCLUSIONS AND PROPOSALS

1. Immediate policy response

a. DEEs should not incur a heavy burden in order to respond to fallouts from a crisis they cannot be held responsible for.

b. DEEs facing payments constraints should not be denied the right to use legitimate trade measures in order to mitigate the impact of the crisis on jobs, incomes and poverty. Such actions should not be put in the same pot as import restrictions and subsidies introduced in advanced economies not facing similar constraints.

[31] For the rationale of an international Chapter 9 insolvency, see Raffer (1993).

c. DEEs should be encouraged to use temporary capital account restrictions and debt standstills in order to stem large and sustained outflows of capital. These should be supported by the IMF, where necessary, through lending into arrears.

d. Any additional financing the DEEs may need in order to respond positively to shocks from the crisis should be unconditional, non-debt-creating and/or at low cost. This can best be achieved by SDR allocations rather than grants or IMF lending funded by bilateral borrowing from its shareholders:

- A one-off permanent SDR allocation to low-income countries based on their need, with the interest costs of withdrawals being financed internally by the IMF.
- A large reversible SDR allocation to other DEEs.

e. There should be a moratorium on debt servicing by low-income countries to official creditors, including the Bretton Woods Institutions, at no additional costs.

2. Crisis prevention: Multilateral policy surveillance

a. There is a need to significantly improve the effectiveness, evenhandedness and the quality of IMF surveillance over macroeconomic, financial and exchange rate policies. This is needed to secure greater multilateral discipline over policies in systemically important countries and bring greater coherence between trade and finance in this respect. Improvements are also needed to provide early warning for risks of macroeconomic and financial instability.

b. Meeting these objectives depends very much on addressing the governance-related shortcomings of the Fund. Current arrangements suffer from a conflict of interest whereby Executive Directors pass judgement on surveillance of policies of the countries they represent. A solution could be formal separation of surveillance from lending decisions, entrusting it to an independent body.

3. Crisis prevention: International reserves system

a. The current multiple-currency reserves system centred on the dollar is highly unstable. It is very costly for DEEs which are compelled to hold large amounts of reserves as self-insurance at the expense of growth and development. It should be replaced by a system not based on national currencies.

b. An SDR-based reserve system appears to be the most viable option. This calls for fundamental changes in current arrangements regarding the allocation and use of SDRs.

c. A way forward is to make the IMF an SDR-based institution by allowing it to allocate SDRs to itself to replace quotas, the GAB and NAB and to become the only source of funding. This would also improve the governance of the IMF by removing its dependence on major countries for funding. SDR allocations could be linked to growth in world trade in a countercyclical manner. Under such an arrangement non-conditional access limits should be redefined and widened significantly.

d. This could be supplemented with an arrangement to allow existing reserve currency holdings to be replaced with SDRs without causing disruptions in currency markets. This can be done through a substitution account at the IMF, extensively discussed in two previous episodes of significant dollar weaknesses in the early 1970s and 1980s.

e. However, care should be taken in following this course, particularly to ensure that the exchange rate risk does not fall on the IMF including its poor members, and that the SDR does not become a new instrument of speculation.

4. Crisis prevention: Regulation of international financial markets

a. The principle that could guide the approach of DEEs to regulation of financial institutions, markets and instruments could be to retain sufficient domestic policy autonomy while seeking to reduce their vulnerability to instability and crises through regulation and supervision of transnational players with border-crossing activities.

b. A supreme international body with fully-fledged regulatory and supervisory powers is neither realistic nor desirable. This is also true for replicating the WTO in the area of finance, with binding multilateral agreements on rules and standards to be applied by national governments and sanctions for non-compliance.

c. Such an arrangement could entail serious loss of autonomy and lead to one-size-fits-all. Moreover, there is the risk that the process designed to broaden the scope of global governance over finance may end up extending the global reach of financial markets, forcing DEEs into granting greater market access in financial services than would be appropriate.

d. In assessing various proposals for regulatory reform of global financial institutions and markets, DEEs should pay attention to what these proposals could offer in reducing their vulnerability by:

- Reducing procyclicality in international bank lending to DEEs;
- Reducing the bias against DEEs and procyclicality in ratings by international rating agencies;
- Improving the quality of assets in which DEEs invest their reserves and private savings;
- Improving the information on international portfolio investors in DEEs.

e. DEEs should also resist giving the IMF a greater role in financial surveillance and monitoring before undertaking a thorough examination of the reasons why its ROSC and FSAP activities have been highly ineffective and removing them through appropriate reforms.

5. Crisis intervention and resolution

a. In providing international liquidity the Fund should not impose structural conditions; nor should it insist on macroeconomic policy adjustments when payments imbalances are due to temporary external shocks beyond the control of the borrowing country.

b. IMF bailouts of international lenders and investors in countries facing rapid exit of capital undermine market discipline, encourage imprudent lending, shift the burden onto debtors and threaten the Fund's financial integrity. The IMF should not finance large and sustained capital outflows, but encourage involving private creditors and investors in the resolution of balance-of-payments and debt crises in emerging economies.

c. The rights of countries experiencing large and sustained capital outflows to exercise temporary debt standstills and exchange controls should be recognized; and they should be granted statutory protection in the form of a stay on litigation.

d. To the extent possible, restructuring of sovereign debt should be based on negotiations with private creditors and facilitated by inclusion of rollover and collective action clauses in debt contracts. But an international system of impartial arbitration is needed to settle sovereign debt disputes.

e. The task of undertaking sustainability analyses in official debt restructuring exercises should be taken from the IMF and given to an

independent body of experts. Consideration should be given to introducing arbitration for the restructuring of official debt of DEEs.

6. Further areas of reform of the IMF

a. Several of the above measures needed for reducing the likelihood of financial crises with global repercussions and ensuring better crisis intervention call for fundamental changes in the IMF. There are also additional reforms that need to be undertaken, particularly in its governance and mandate, in order to enhance its effectiveness and relevance.

b. There has been considerable debate on the shortcomings in the Fund's governance in several areas including the selection of its head, the distribution of voting rights, transparency and accountability, and no further remarks would be needed here. However, it should be emphasized that reforms in at least two areas discussed above may produce significantly greater improvement in the governance of the Fund than changes in areas emphasized in public debate:

- Ending the dependence of the IMF on its shareholders for funding through quotas and bilateral lending (GAB and NAB) by transforming it into an SDR-based institution.
- The separation of surveillance from programme lending and giving the task to authorities who are independent of their governments and who are not involved in lending decisions.

c. The Fund needs to focus on its main responsibility of safeguarding international monetary and financial stability. Consequently:

- It should stay out of development finance and policy and poverty alleviation. This is an unjustified diversion and an area that belongs to multilateral development banks. All facilities created for this purpose should be transferred to the World Bank as the Fund terminates its activities in development and long-term lending.
- It should also stay away from trade policies. Its attempts to promote unilateral trade liberalization in DEEs drawing on its resources undermine the bargaining power of these countries in multilateral trade negotiations. In this area its main task is to ensure a predictable global trading environment by helping secure stable payments positions and exchange rates.

Chapter 2

GLOBAL ECONOMIC PROSPECTS: THE RECESSION MAY BE OVER BUT WHERE NEXT?[32]

A. ISSUES AT STAKE

After a deep and widespread contraction in economic activity and significant loss of output and employment, policy makers, financial analysts and media pundits all appear to be heartened by the news coming from different parts of the world that the worst is over. The main concern now is how to maintain the pace of the recovery and recuperate most, if not all, output and employment losses incurred during the past two years. Over the medium term hopes are for the global economy to go back to the kind of rapid and broad-based expansion enjoyed from the early years of the decade until 2008 without, however, the accompanying financial fragilities and trade imbalances. This optimistic scenario depends, to a large extent, on a measured rebalancing of the US and Chinese economies – the largest deficit and surplus countries, respectively. In view of the central place occupied by the dollar in the international reserves system, it is recognized that international monetary stability crucially depends

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on the spending discipline of the US, in line with its income, allowing for a fundamental and sustained balance-of-payments adjustment. However, in order to maintain growth, the US should not simply cut domestic absorption but also shift to export-led growth. An orderly US adjustment would also require, *inter alia*, a shift by China from export-led to consumption-led growth and the realignment of the exchange rate of the yuan against the dollar. In this way, prospects for global stability are expected to improve without sacrificing growth.[33]

Even if such a rebalancing proceeds smoothly, most developing and emerging economies (DEEs) are facing an uncomfortable future: they are damned if the US adjusts and damned if it does not. On the one hand, "business as usual" would expose them to recurrent currency and financial instability. On the other hand, retrenchment and adjustment in the US could cause problems on several fronts. It is likely to lead to tightened global financial conditions with negative effects on several DEEs that have structural external deficits and are hence dependent on capital inflows to sustain acceptable growth. More importantly, there is no other country that could act as a global locomotive. China cannot replace the US even if it maintained GDP growth of some 10 per cent based on domestic consumption rather than exports; its GDP is about one-third that of the US, the share of households in GDP is much smaller, they save a much higher proportion of disposable income and the import content of household consumption is much lower than in the US.

Thus a return to global stability and sustained growth needs more than a rebalancing between the US and China. While there has been almost exclusive focus on the US-China relationship, a global restructuring of the pace and pattern of demand cannot exclude the two other major surplus countries, Japan and Germany. These countries have been relying on exports to a much greater extent than China, siphoning off global demand without adding much to global growth.

There is more, however, to global imbalances than macroeconomic geography. Income distribution has played an important part and should also be part of the solution. Market-driven globalization has systematically tilted the balance of economic power against labour and in favour of capital, as indicated

[33] This was broadly the plan promoted by the IMF in its multilateral consultations to reduce global imbalances on the eve of the crisis. Although the crisis has resulted in sizeable changes in external positions and savings patterns, it is recognized that imbalances are not simply a problem of the past and there is still a need to remove global imbalances; see Blanchard and Milesi-Ferretti (2009).

by the falling share of wage income almost everywhere. The outcome has been underconsumption in all major surplus countries, notably China, Germany and Japan. The threat of global deflation has been avoided thanks to consumption binges and property surges financed by growing debt and capital gains brought about by rapid credit expansion and asset inflation, notably in the US but also a number of other advanced economies (AEs) and DEEs, particularly in Europe. This process has, in its turn, produced growing trade imbalances, large shifts in net asset positions of countries and increased financial fragility, culminating in the most serious post-war economic crisis.

The world economy now faces a serious dilemma: financial consolidation and retrenchment in deficit countries would raise the spectre of economic stagnation and possibly deflation, while a return to financial bubbles and debt-driven expansions could mean that when the next crisis hits, the states will be in a much weaker financial position to respond effectively. But in either case, the adjustments exist only in appearance since, without restoring the balance between labour and capital, neither stability nor growth may be sustained for long.

There is thus a need for adjustment in the four major economies, the US, China, Japan and Germany, with the aim of removing imbalances while ensuring adequate global demand without a return to financial bubbles and debt-driven spending. The US needs to live within its means. China, Germany and Japan all need to boost domestic consumption by reversing the downward trend in the share of wages in GDP. In the last two countries this is needed in order to accelerate growth while in China it is needed to avoid a growth slowdown that may result from a deceleration of exports. Furthermore, China should not only accelerate domestic consumption but also increase its import content. All these need to be complemented with a reform of the global financial architecture so as to ease the payments constraints over deficit and indebted developing countries.

In the absence of policy shifts to effect such a rebalancing, the world economy in general and DEEs in particular may face more serious challenges in the coming years than they have seen during the recent global downturn. The outcome could be sluggish, uneven and erratic growth, continued and even deepened instability in currency and asset markets, the rise of protectionism and economic nationalism, escalation of conflicts in the international trading system and a backlash against globalization.

B. BUBBLES, EXPANSION AND IMBALANCES

The principal source of these difficulties is the US economy which has been driven by two back-to-back bubbles since the early 1990s. It entered the 1990s with a recession which had been deepened by a banking and real estate crisis (i.e., the so-called Savings and Loans crisis) in the previous decade. The response was a sharp reduction in interest rates which allowed debtors to refinance debt at substantially lower rates and banks to build up capital by arbitraging between the Fed and the Treasury – or riding the yield curve. This, together with advances in information technology, created the dot-com bubble in the second half of the 1990s, accompanied by a boom in the housing market (Baker 2008). The Fed refrained from applying the brakes even though its chairman recognized that financial markets were driven by "irrational exuberance" rather than economic fundamentals.

The housing bubble continued with even greater force after the bursting of the dot-com bubble in the early years of the 2000s, thanks to a series of mutually reinforcing factors. In the first place the Fed responded to the collapse in equity markets by bringing policy rates to historical lows for fear of asset deflation and recession. Second, the collapse of the stock market made investment in property even more attractive. Finally, new legislation introduced in the late 1990s allowed greater room for banks to expand high-risk, speculative lending through securitization. All these combined to produce a massive credit expansion for property investment as well as for consumption.

These bubbles played a major role in the fall of household savings and the rise of external deficits in the US. The dot-com bubble generated a strong wealth effect on private consumption while financial deregulation and low interest rates facilitated household access to credit.[34] Rapid growth in private consumption was sustained by capital gains from rising house prices in the 2000s as homeowners increasingly extracted equity to finance consumption. As a result, household savings, which was some 6 per cent of GDP in the early 1990s, started to fall rapidly and disappeared altogether on the eve of the 2008 crisis. This was mirrored by growing external deficits – the US current account was broadly balanced in the early 1990s, but it registered a deficit of over 6 per cent in 2007. This led to a massive accumulation of dollar liabilities abroad,

[34] On the impact of capital gains from the dot-com bubble on household consumption, see Maki and Palumbo (2001), and on the impact of low interest rates on household debt, see Debelle (2004).

undermining the stability of the dollar and even threatening its reserve-currency status.

The exchange rate and reserve policies of surplus countries, notably China and fuel exporters (FEs), facilitated the surge in consumer lending and spending in the US during the subprime bubble while also helping their own exports. They pegged their currencies to the dollar and were content to invest a very large proportion of their surpluses in US Treasuries and the debt of government-sponsored mortgage firms. Without such large inflows, credit expansion, the consumption spree and the property bubble could not have been sustained for long. The dollar and long-term interest rates would have come under strain and this would have made it difficult for the US to pursue lax monetary and regulatory policies and keep on spending beyond its means.

Monetary conditions in Japan and Europe also added to global liquidity expansion from the early years of the decade. Policy interest rates were kept almost at zero in Japan under conditions of deflation and even the otherwise conservative European Central Bank joined in and lowered interest rates considerably. After a brief downturn the world economy showed an exceptional performance until the outbreak of the crisis in 2008. Average global growth exceeded that of the 1990s by one-half while growth in DEEs was twice as fast as in the 1990s, exceeding even the rates achieved during the golden age. World trade in dollars increased by 2.5 times during the same period and DEEs as a whole started to run growing current account surpluses which exceeded $600 billion in 2007, of which two-thirds belonged to Asian DEEs and the rest to FEs. The search-for-yield in conditions of ample liquidity also redirected private capital flows to DEEs which rose from $50 billion in 2002 to exceed $600 billion. Twin surpluses on current and capital accounts allowed DEEs to accumulate large amounts of international reserves which increased fivefold to reach $5.3 trillion at the end of 2008.

C. CRISIS, RECESSION AND RECOVERY

This impressive global economic performance was followed by an equally impressive global economic downturn, second only to the Great Depression of the 1930s. While both the boom and bust originated in financial markets in AEs, and financial contagion has added to the global spread of the downturn,

the main channel of transmission of the crisis to DEEs has been through trade. Despite widespread expectations of decoupling, more successful exporters dependent directly or indirectly on US and European markets, including China, Mexico, Korea, Taiwan, Malaysia and Singapore, have been hit much harder than countries with a better balance between domestic and external sources of growth such as India, Indonesia and Brazil.

The financial impact of the crisis on DEEs, unlike financially fragile European economies, has generally been quite "benign". After the collapse of Lehman Brothers there was a period of rapid exit of capital from DEEs and sharp increases in risk premia on their sovereign debt, exerting heavy selling pressures on currencies and causing large drops in asset markets. However, with aggressive monetary easing in the US and sharp cuts in interest rates across the AEs generally, capital flows to DEEs soon recovered, driven to an important extent by dollar carry-trade (Roubini 2009). This, together with significant easing of monetary policy in several DEEs, including China and India, gave rise to bubbles in asset markets and put upward pressures on currencies and commodities. As in the early 2000s, policy responses to the bursting of a financial bubble thus gave rise to another one, but this time not in the US itself, but in the DEEs.[35]

The two economic powerhouses, the US and China, adopted the strongest policy response to the crisis. While the US fiscal package has focused on tax cuts and transfers amounting to some 5 per cent of GDP, China allocated around 15 per cent of GDP mainly to investment in infrastructure while spending a relatively small part on transfers to households. In both countries there has been aggressive easing of monetary policy. In the US this was designed mainly to bail out troubled financial institutions and allow banks once again to build up capital by riding the yield curve. Until now, there has been little bank lending to households and business. In China, by contrast, monetary easing led to a rapid expansion of credit which, together with government policies designed to revive real estate demand, has created a bubble in the property market.

[35] There were some declines in equity prices and rises in credit spreads at the beginning of 2010 as a result of unevenness of global economic recovery and increased concerns about sovereign credit risk in Europe (BIS 2010a). But generally the continued boom in capital flows sustained asset and credit bubbles in most DEEs throughout the year – see Chapter 4.

Recovery has started around the second half of 2009 with global growth in 2010 expected to be 4.8 per cent, to be followed, on many projections, by a slowdown in 2011 in both AEs and DEEs (IMF WEO, October 2010). However, the short-term outlook in the world economy depends very much on the strength of recovery in private spending and the timing and speed of exit from stimulus programmes.

Exit, in this context, can refer to two different things: ending or reversing reflationary measures. Central banks have ended interest cuts in all major developing and developed economies. In some DEEs, notably in China, policy rates have been raised in an effort to contain inflationary pressures. By contrast the US, EU and Japan have engaged in further quantitative easing in an effort, on the one hand, to bring down long-term rates and stimulate private spending and, on the other hand, to boost their export prospects by weakening their currencies or curbing appreciations and raising the spectre of currency wars and protectionism. On the fiscal side there are no signs of new stimulus packages; rather, with growing public deficits and debt, attention in AEs is increasingly focused on fiscal consolidation and retrenchment, notably in Europe.

Even without a monetary and fiscal policy reversal, the pace of recovery may not be sustained if stimulus programmes do not lead to sustained increases in private spending. The 1990s witnessed several failed fiscal pump-priming attempts in Japan in conditions of financial fragility. So far, fiscal and monetary stimuli have given rise to increases in private inventory and fixed investment, but as pointed out by IMF WEO (October 2010: p. xv) low consumer confidence and reduced household incomes and wealth are holding consumption down. When investment grows faster than consumption, a single country can still fully utilize the additional capacity by expanding in foreign markets. But this is not possible for the world economy as a whole. Thus, unless consumer spending recovers, it may not be possible to sustain the surge in private investment.

In the US consumers have been retrenching and deleveraging in response to a significant deterioration of their balance sheets resulting from some $12 trillion loss of asset values, with household savings moving rapidly into positive territory. Countervailing measures to increase consumer spending have been one-off transfers (cash for clunkers, food stamps, extended unemployment benefits, etc.) and tax cuts. With bleak job prospects and continued consumer retrenchment, the strength of recovery seems to hinge much more on exports than on consumption.

In China consumer spending held up during the sharp decline in growth, but it has not provided much impetus to offset the sharp decline in exports. On various estimates, between 80 and 90 per cent of Chinese growth in 2009 was due to investment, with the investment ratio climbing to 50 per cent.[36] Excess capacity may become pervasive if exports do not pick up as the fiscal stimulus fades away, since the share of consumption in GDP is not expected to register a significant increase in the immediate period ahead. Although exports are expected to record double-digit growth in 2010, projections for 2011-12 suggest a slowdown to single-digit figures (WB CQU, 2010). Accordingly, growth may remain below not only the rates attained during pre-crisis years, but also during 2008-09.

D. NO RETURN TO "BUSINESS AS USUAL" – NEED FOR US ADJUSTMENT

While it is generally agreed that a premature fiscal tightening in major AEs could tip the world economy back into recession, there are also concerns that a delayed exit from liquidity expansion might be highly damaging and could even lead to a deeper and more pervasive crisis. Near-zero interest rates and rapid liquidity expansion, if continued too long, would imply increased financial fragility in several DEEs which have been receiving large amounts of arbitrage capital and carry-trade flows in search of high returns, even though many of them have now resorted to controls over such inflows (see Chapter 4). For the US there are concerns that these, together with large fiscal deficits and growing public debt, could eventually give rise to considerable increases in long-term interest rates because of rising inflation expectations, thereby reducing growth.

Perhaps a more important threat to stability and growth concerns US external deficits and the dollar. Even if, as expected, consumers continue to deleverage and reduce debt by keeping spending below income growth, the US economy can start running higher external deficits along with growing budget deficits, which could both, on current trends, reach double-digit figures as a proportion of GDP by the end of the decade. These twin deficits could place considerable pressure on the dollar, particularly if surplus countries are no longer eager to finance them, and the US economy may end up facing an

[36] See Wolfe and Ziemba (2009) and Ho-Fung (2009).

external constraint for the first time in the post-war era, unable to maintain a position of benign neglect towards the dollar. If, on the other hand, surplus countries resume the policy of "official settlement" of US deficits by investing their surpluses into US Treasuries, we would be back to business as usual, with attendant consequences for global stability.

Short of another asset and credit bubble, US household spending over the next several years is expected to rise more slowly than disposable income, and the personal savings rates may reach 10 per cent, unprecedented in recent decades.[37] Eventually pressures from the bond market may force a swift fiscal adjustment in the US, particularly if combined with pressures on the dollar in the absence of strong support from surplus countries. The cost of decade-long bubbles and aggressive monetary and fiscal policy responses to crises triggered by the bursting of these bubbles could thus be below-potential growth in the US for several years to come. This would bring an external adjustment through import cuts. But it would also imply a significant slowdown in the economic locomotive that has been pulling many export-oriented DEEs.

Ideally, US fiscal adjustment should take place in the context of growth, as under the Clinton presidency, but without bubbles. With consumer retrenchment, this would depend very much on exports – that is, a shift from consumption-led to export-led growth. If successful, import cuts would then be avoided. But this would require faster expansion of domestic demand in surplus countries, including DEEs, and lesser reliance of other DEEs on the US market.

A shift to export-led growth is what the US administration is now aiming at. The main objective of the National Export Initiative (NEI) launched by President Obama in his State of the Union Address is to double exports in five years to support job creation.[38] This will require 15 per cent growth per annum – a significant acceleration from past performance. According to a research note by Goldman Sachs, over the past 25 years it took an average of 11 years for exports to double. However, there were also periods where the US achieved rapid export growth. This includes two episodes during the inflationary 1970s when exports doubled within 5 years as well as the late 1980s when it took 7 years to achieve a similar increase. Since 2000 US exports have

[37] On US consumer adjustment in the coming years, see Glick and Lansing (2009).

[38] For the information used in this section and more details, see US Department of Commerce (2010), Thomson Reuters (2010) and Yang (2010).

grown by some 11 per cent per annum in dollar terms – imports and hence the trade deficit have also grown roughly at the same rate. During 2006-08, export growth reached some 13 per cent per annum, almost double the rate of growth of imports. A target of 15 per cent growth per annum is very ambitious but not unreachable and would bring significant improvement in the US trade balance even if the past pace of imports is maintained.

The details of the NEI do not seem to have been fully worked out but certain features emerge from recent pronouncements. First, there will be considerable government support in the form of technical assistance for exporters, notably small firms and farmers, market research and credit provision. In a way the US appears to be shifting to a form of industrial policy for export promotion, after many years of opposing any such intervention – an initiative reminiscent of general export promotion policies pursued in Japan through JETRO (Japan Export Trade Promotion Organization) and in the Republic of Korea through KOTRA (Korean Trade Promotion Corporation).

Second, there is emphasis on greater market access abroad. In this respect, the plan calls for, on the one hand, strict enforcement of US trade laws against restrictive and unfair practices by its trading partners and, on the other hand, promotion of greater reciprocal market access through bilateral and multilateral agreements, including through concluding the Doha Round.

Third, agricultural exports are among the areas where considerable progress is envisaged. But these are not expected to be doubled over the next five years. Indeed, such a rapid growth of agricultural exports cannot be achieved without retaining large subsidies and prising open the markets of DEEs. Such an attempt would certainly face stern resistance from DEEs with weak agriculture and kill any chance of the Doha Round coming to a successful conclusion.

Finally, reference is made to enforcement of US trade laws against unfairly priced imports, which implies that sanctions can be sought against countries considered as manipulating their exchange rates to gain competitive advantage. This could be particularly problematic since such sanctions do not come under existing multilateral disciplines, either in the WTO or the IMF.

US fiscal and balance-of-payments adjustment and monetary tightening could also mean considerably tightened global financial conditions compared to the years before the outbreak of the crisis. It may bring significant increases in interest rates and exert strong adverse effects on international debtors and countries dependent on foreign capital flows. It is also likely to lead to an

unwinding of dollar carry-trades and associated outflows from DEEs, pushing the dollar up and exerting downward pressure on currencies in several deficit DEEs as well as on commodity prices which tend to move inversely with the exchange rate of the dollar.[39] This likelihood is further increased by the financial turmoil in the eurozone. Indeed, contrary to widely held expectations, the years ahead could well witness the demise of the euro, rather than the dollar, given that sovereign debt problems are more serious in the eurozone than in the US and that the region lacks effective institutional arrangements to address financial difficulties of member countries.

E. CHINA TOO NEEDS TO ADJUST, BUT IT CANNOT BE A GLOBAL LOCOMOTIVE[40]

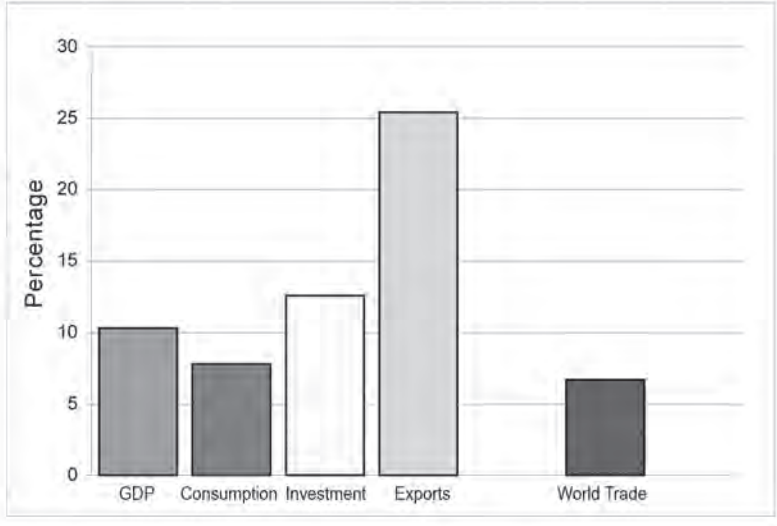
External adjustment in the US and slow growth in Europe will no doubt be problematic for China because of the important contribution that exports to these markets have made to its rapid growth. It is true that the average domestic value-added content of Chinese exports is not much more than half of their total value, with the rest accounted for by foreign value-added, mainly imported inputs from Japan and the DEEs linked to the Sino-centric East Asian production network. Still, in the years before the crisis, exports accounted for about one-third of Chinese GDP growth thanks to their phenomenal expansion of some 25 per cent per annum – that is, more than three times the world trade volume and domestic consumption and twice as rapid as domestic investment (Chart 2.1). The contribution of exports to growth goes up to 50 per cent if spillovers to domestic consumption and investment are taken into account.

China cannot keep its exports growing at similar rates and continue to increase rapidly its penetration in markets abroad at a time when growth in the US and Europe is below potential, unemployment remains high and sticky, and reduction in global imbalances is seen as the key to global stability. An aggressive export push could face stern resistance with attendant consequences for the stability of the international trading system. If, on the other hand, it cuts

[39] On the possible impact of dollar carry-trade on assets and currencies, see Pineda *et al.* (2010).

[40] This section draws on Chapter 3 which contains detailed discussion of export dependence of growth in China and DEEs in the Sino-centric East Asian production network and the sustainability of export-led growth.

Chart 2.1: China – real growth rates (2002-08)



Source: WB CQU (various issues).

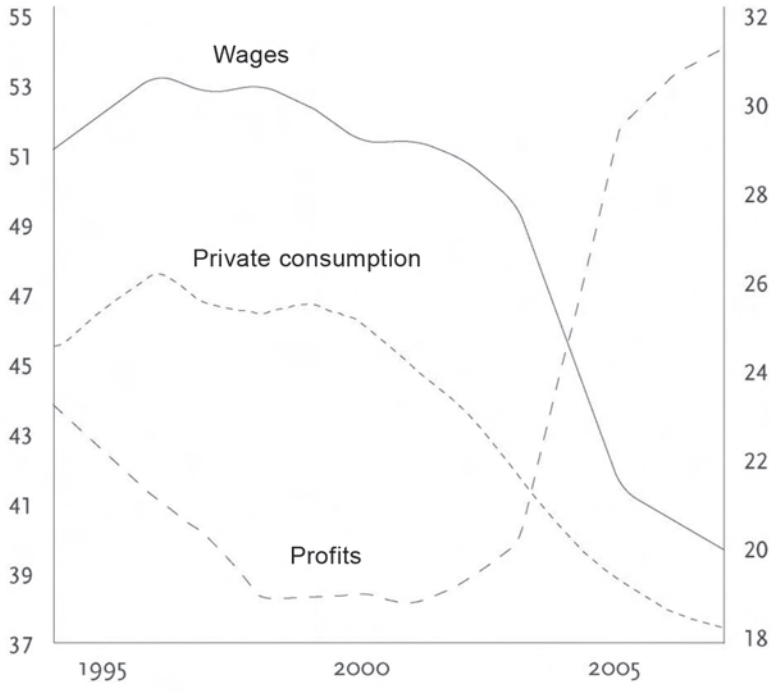
the rate of expansion of its exports to a more acceptable level, then, without a fundamental change in the pace and pattern of domestic demand, its growth may barely reach 7 per cent. Growth may drop a lot more if the credit-driven investment bubble bursts, exposing bad loans and giving rise to difficulties in overstretched banks and, eventually, a financial crisis.

If the aim is to maintain pre-crisis growth rates of 10 per cent or more, the solution is naturally to raise domestic consumption much faster than has been the case so far. Accelerating domestic investment to close the demand gap, as done during 2008-09, would simply aggravate the problem. Since the early years of the decade private consumption has been growing by 2.5 percentage points less than GDP and 5 percentage points less than investment (Chart 2.1). As a result, the share of consumption in GDP fell from 55 per cent in the late 1990s to some 36 per cent. This downward trend in the share of consumption in GDP would need to be reversed, with consumption growing faster than both income and investment.

Contrary to widely held beliefs, underconsumption in China is not the result of exceptionally large household savings. It is true that Chinese

Chart 2.2: Wages, profits and private consumption in China

(As a percentage of GDP)



Source: Ho-Fung (2009)
Profits right scale; wages and consumption left scale.

households have high precautionary savings in large part because of inadequate provision of social services such as health care, housing and education and poor pension benefits. Moreover, since the beginning of the decade the household savings rate has been rising for a number of reasons including income insecurity resulting from corporate restructuring and downsizing (Ma and Yi 2010). However, Chinese household savings as a proportion of GDP are not much greater than those in other DEEs at similar levels of development. Rather, underconsumption is due to a low share of household income and an extremely high share of corporate income in GDP. A very large proportion of household income in China consists of wages since government transfers and investment

incomes are very small.[41] The share of wages in GDP has been constantly falling since the mid-1990s, bringing down the share of household income from almost 70 per cent of GDP to less than 60 per cent. By contrast, profits have been rising rapidly and corporate savings have come to exceed by a large margin the rates seen during the earlier industrialization of Japan and the newly industrialized Asian economies.[42] The decline in the share of household income, rather than the increase in the household savings rate, is the main reason for the decline in the share of private consumption in GDP (Chart 2.2).[43]

In view of bleak export prospects, a return to trend growth in China crucially depends on a sizeable increase in the share of households in GDP. This calls, in the first place, for a significantly increased share of labour income in GDP through higher minimum wages and faster wage growth. Recently there have been large increases in minimum wages as part of the drive for a more equitable income distribution pattern. However, real wages still lag behind productivity growth; it has been reported that despite real wage gains, the share of labour costs in total manufacturing costs is still lower than it was in 2001 (Fan 2010). Second, there is also a need to moderate household precautionary savings through increased public spending on health care, housing and education and improving pension benefits. These income transfers and spending on social infrastructure can be financed by requiring state-owned enterprises to pay dividends to the government, dismantling tax incentives for corporate investment and higher taxes on profits.

A shift in income distribution from profits to wages can lead to some adjustment costs. Higher wages in manufacturing cannot easily be passed onto prices in view of severe international competition; they would have to be absorbed by lower profit margins. However, except in unskilled labour-intensive sectors such as clothing and some simple electronic assemblies, this may not have much impact on competitiveness because of large wage gaps with producers in more advanced economies. It is, for instance, estimated that a 25 per cent annual increase in wages over the past three to four years would have

[41] According to Aziz and Cui (2007) in 2005 investment income accounted for 3 per cent of households' disposable income while government transfers were no more than 0.5 per cent of GDP.

[42] For household and corporate savings in early industrializers, see UNCTAD TDR (1997: Table 44); and for comparison with some other Asian countries, see Prasad (2009) and Ma and Yi (2010).

[43] Aziz and Cui (2007: p.3) estimate that "the rise in household saving rate of 5 percentage points since the early 1990s can only explain 1 percentage of the 9 percentage points decline in the share of consumption that has occurred since then."

made only a small dent in China's competitiveness; it would bring Chinese hourly compensation to about 4 per cent of the level of the US and 15 per cent of that elsewhere in Asia outside Japan (Roach 2010).

A shift from export-led to consumption-led growth would also require industrial restructuring. An important part of Chinese exports are specific to foreign markets, with little domestic demand. Unlike in the mainstream (neo-classical) theory where "factors of production" can be shifted freely among different lines of production to produce different goods and services, in reality skills, capital equipment and organizational structures are often industry-specific and even product-specific. This means that adjustment in the production structure would depend primarily on reallocation of new investment and skills towards areas that need to expand to meet higher domestic consumption. In this process state guidance of investment could no doubt play an important role.[44]

However, a shift to consumption-led growth would not be of much help to other DEEs. This is because China is a major importer, but not a major market. Its imports from other DEEs are mostly in intermediate goods, including parts and components, used for exports of finished goods, mainly to the US and Europe, rather than for domestic consumption. Consequently, a shift from exports to domestic consumption could result in a significant slowdown of China's imports from DEEs, notably its manufactured imports from East Asia. This means that, at its current pattern of domestic spending, the Chinese market is not a good substitute for US and EU markets for DEEs. It cannot replace the US even if it maintained GDP growth of some 10 per cent based on domestic consumption rather than exports; its GDP is about one-third that of the US, the share of household income in GDP is much smaller, Chinese households save a much higher proportion of disposable income and the import content of Chinese household consumption is much lower than that in the US.[45] The reduction in US imports that could result from a $100 cut in domestic consumption would be three times the increase in Chinese imports that would be generated by an additional $100 worth of consumption. Allowing for differences in income and spending levels, it can be estimated that

[44] This is discussed in some detail for East Asia in Akyüz (2010c). These considerations apply also to Germany and Japan, though to a lesser extent because, as discussed below, in these countries domestic consumption needs to grow faster in order to accelerate growth not just to replace exports.

[45] For a detailed discussion of import contents of different components of demand in China, the US and the EU, see Chapter 3.

the total (direct plus indirect) imports for private consumption in the US are around 18 times that in China. For China to become a major market for other DEEs, it should increase not only household income and consumption, but also foreign content of consumption. But even then the benefits may not all go to DEEs since China is clearly among the top markets to be tapped by the US in the context of its NEI.

F. BRINGING IN THE BYSTANDERS: GERMANY AND JAPAN

In the debate on global stability and growth attention is often focused exclusively on US-China rebalancing, to the neglect of the role that could be played by two other major economies, Germany and Japan. These countries, like China, have been running large amounts of current account surplus which reached $250 billion in Germany and $210 billion in Japan before the onset of the crisis compared to $370 billion in China.

A major reason why inadequate attention is paid in global rebalancing to these two major AEs is that their bilateral trade surplus with the US is much smaller than that of China; on the eve of the crisis it was some $50 billion in Japan and $75 billion in Germany against $270 billion in China. However, the conventional measure of bilateral trade balance is highly misleading when countries' exports to each other have widely different foreign value-added contents. China's exports to the US contain a lot more foreign value-added than exports of the US to China. For instance, in conventional terms the trade surplus of China with the US was estimated to be some $172 billion in 2005, while in domestic value-added terms (that is, when foreign content of exports of both countries is excluded) this figure comes down to less than $40 billion (Lau *et al.* 2006). In the same year Japan's surplus with the US was around $85 billion. Since the foreign content of Japan's exports is much lower than the foreign content of US exports, in value-added terms Japan's bilateral surplus with the US turns out to be higher than the bilateral surplus of China with the US. German exports also have higher foreign contents than US exports, but not as much as Chinese exports. Therefore, even though China's bilateral surplus with the US in value-added terms is higher than the bilateral surplus of Germany with the US, the difference is not as high as that indicated by the conventional measure.

Table 2.1: Real GDP and demand

(Average annual percentage change) (2004-07)

	Real GDP	Domestic demand	Consumption	Exports	Contribution of exports to GDP growth (per cent)[c]
China[a]	11.3	9.6	8.2	24.1	34.1
Germany[b]	1.9	0.8	0.4	9.6	92.5
Japan[b]	2.3	1.5	1.3	9.8	49.9

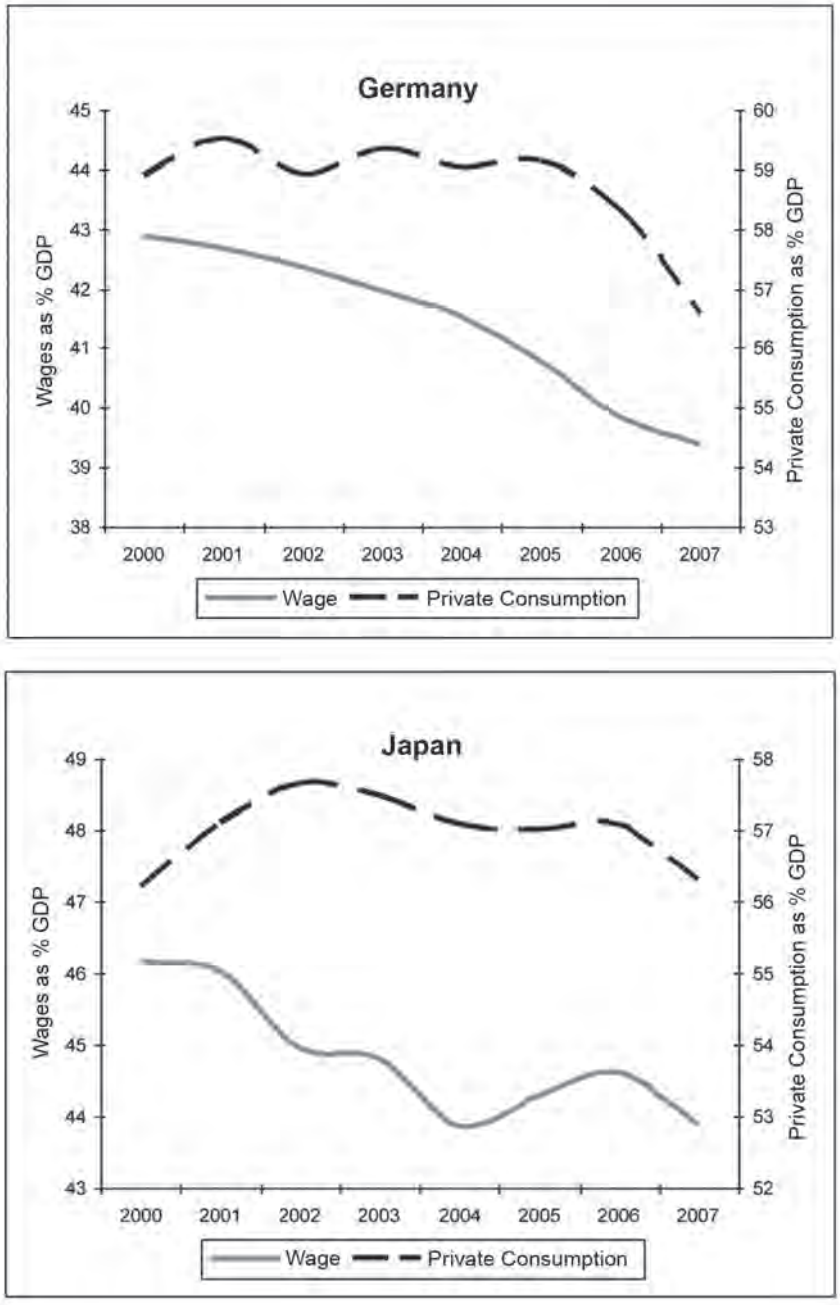
Source:
a: See Chapter 3.
b: IMF: WEO Database.
c: Estimates for China and Japan are based on the methodology described in Chapter 3, using import contents data from Johnson and Noguera (2009) for Japan. Estimates for Germany are from Kranendonk and Verbruggen (2008a).

More importantly, Japan and particularly Germany have been siphoning off global demand without adding much to global growth. During 2004-07, exports grew 12 times faster than domestic demand in Germany and 6.5 times in Japan while this figure was 2.5 for China (Table 2.1). As a result, in Germany GDP growth exceeded growth of domestic demand by a factor of 2.4. Consumption barely increased and its share in income fell while the share of exports rose. More significantly, despite the widespread hype about dependence of Chinese growth on exports, in both Germany and Japan, the contribution of exports to growth was much higher. In China about one-third of GDP growth was due to exports compared to one-half in Japan and some 90 per cent in Germany.[46]

This lack of dynamism in domestic demand in general and consumption in particular is due to stagnant or falling real wages and slow employment growth. In all major AEs wages have been sluggish since the mid-1990s, including the 2002-07 economic expansion, and the share of wages in income fell as real wages lagged behind productivity growth (Sommer 2009). In the US, despite the downward trend in the wage share, private consumption surged, sustained

[46] For the methodology used for estimating the contribution of different components of demand to growth, see Chapter 3.

Chart 2.3: Wages and private consumption in Germany and Japan



Source: OECD, *Economic Outlook* and IMF, *IFS database.*

by asset bubbles, credit expansion and household debt. This has not been the case in Japan and Germany. Consequently, in both countries, notably in Germany, as in China, the decline in the share of consumption largely followed the decline in the share of wages in GDP (Chart 2.3). Unlike China, however, falling shares of wages and consumption in GDP have not been associated with strong growth in real wages, consumption and GDP. Naturally the correlation between wages and private consumption in AEs is not as strong as that in China because of greater private holding of income-earning assets and easier access to credit. Still the resemblance between Chart 2.2 and Chart 2.3, particularly for Germany, is remarkable.

In Germany, there are several reasons for high unemployment, slow growth of jobs and stagnant wages. First, reflecting largely the German aversion to inflation, the European Central Bank has focused almost exclusively on price stability to the neglect of economic growth and conditions in the labour market. Second, the accession of several low-wage Central and Eastern European countries to the EU has led to significant outsourcing by German firms, which has not only intensified the pressure on the labour market in Germany but also served to restrain investment at home. Finally, orthodox labour market and welfare reforms have considerably weakened the bargaining power of workers, particularly at the lower end, without creating many jobs.[47]

Wage restraints in Germany have been part and parcel of an attempt to increase competitiveness of the economy by reducing production costs – a policy described as "competitive disinflation" whereby the competitiveness gap is closed through falling productivity-adjusted real wages and prices (Fitoussi 2006). Greater competitiveness has thus come at the expense of consumer demand. However, export acceleration has failed to compensate for the deceleration in domestic demand and GDP growth has remained sluggish.[48] More importantly, this has amounted to a beggar-thy-neighbour policy for several European economies locked in the euro but unable to restrain wages to the same extent, notably Italy and France. It has therefore threatened growth

[47] On "reforms" and labour market conditions in Germany, see Carlin and Soskice (2008) and Boltho and Carlin (2008).

[48] Domestic demand in Germany grew, on average, by 2 per cent per annum in the 1990s compared to 0.3 per cent in the present decade and GDP growth fell by one percentage point between the two decades.

and stability in the eurozone as a whole, leading to strong exchanges between Germany and France.[49]

In Japan, the gap between wage and productivity growth has been greater than in most other AEs so that the share of wages in GDP fell faster. As a result, the share of labour income converged to the G7 average, from considerably higher levels in previous decades. Increased competition from low-cost DEEs has led to outsourcing and exerted pressure on wages at home. Labour market deregulation from the mid-1990s onwards allowed greater space for employers to move away from the traditional practice of long-term employment where wages tend to rise with the tenure, towards lower-wage, temporary employees (Sommer 2009).

Like with China, an increased contribution of Japan and Germany to global demand calls for faster expansion of domestic consumption which, in turn, depends on faster growth of labour income than has been the case so far. Unlike with China, this is needed in Germany and Japan not so much to replace external sources of growth with domestic demand, but to raise the overall growth rate of the economy. Even with an unchanged rate of expansion of exports, a more rapid growth of domestic demand in these countries would naturally lead to a faster growth of imports and hence reduced trade surplus, thereby increasing their contribution to global growth.

G. EXCHANGE RATE ADJUSTMENTS

According to one prominent view, the Chinese yuan is significantly undervalued against the dollar because of currency "manipulation" by China, and this is a main reason for the trade imbalance between the two countries.[50] On this view, if China stops intervening in the foreign exchange market and allows its currency to float freely, it will rise against the dollar, reducing the US-China bilateral deficits. It is argued that the reluctance of China and other East Asian DEEs to allow their currencies to appreciate against the dollar and the consequent persistence of their trade surpluses vis-à-vis the US place an undue

[49] See *Financial Times*, "Lagarde Criticises Berlin Policy", 14 March 2010; and *Wall Street Journal*, "German Government Counters Lagarde's Export Critique", 15 March 2010.

[50] See, e.g., Wolf (2010). Now China is not seen to be alone in artificially holding its currency low to boost exports by interventions and capital controls – see Cline and Williamson (2010).

burden on countries with freely floating currencies. This is particularly true for the euro, given the large volume of trade between the US and Europe. While the correction of the trade imbalance between the US and Germany may require the dollar to be weak against the euro, the rigidity of East Asian currencies could result in overshooting of the euro against the dollar, with attendant consequences for international monetary stability.

There can be little doubt that correction of blatant currency misalignments is an important element in the adjustment of global trade imbalances. However, currency movements do not create additional demand for the global economy as a whole, but simply serve to redistribute demand impulses across countries. The result will simply be to alter relative growth rates, rather than raising the overall global growth. Simply stated, currency movements cannot address the problem of global underconsumption associated with sluggish wages.

An appreciation of the yuan against the dollar cannot be relied on to reduce China's trade surplus without undermining growth. With unchanged wages, a nominal appreciation would result in a real appreciation and no doubt make Chinese goods more expensive in the US and this itself could reduce its trade surplus. However, this would not solve the problem of underconsumption in China and automatically increase domestic demand so as to offset the decline in net exports. The outcome is likely to be a reduction in growth. A nominal appreciation can even aggravate the underconsumption problem if the burden is passed onto wages. By contrast, faster wage growth would reduce the trade surplus without reducing growth: it would result in a real appreciation of the yuan even with an unchanged nominal rate, thereby reducing net exports while at the same time providing a domestic offset by raising private consumption. Thus, currency adjustment should be seen only as a complement to faster growth of wages and consumption, rather than a magical wand that would simultaneously fix the problems of trade imbalances and underconsumption without impeding growth.

This is also true for the exchange rate of the dollar against the euro. Appreciation of the euro would not generate higher wages and faster growth of private consumption in Germany, but would hurt other eurozone countries. Indeed, it could simply give rise to further wage restraint through "competitive disinflation". By contrast, higher wage settlements in Germany would increase domestic consumption while producing a real appreciation of the euro for

Germany without causing a corresponding appreciation for other eurozone countries.

Nor is it clear how dollar depreciation against the yuan would address the root cause of the US problem of overconsumption. It is unlikely to produce a significantly faster growth of exports to China given that the import content of Chinese domestic consumption is small and Chinese imports for investment are closely tied to exports. On the other hand, even if it reduces China's exports to the US, this may be replaced not so much by domestic production as by imports from other DEEs as long as US consumers continue to live beyond their means.

The US has been constantly running current account deficits in the past four decades regardless of the strength of the dollar against the currencies of its principal trading partners, blaming Germany in the 1970s, Japan in the 1980s and now China. The yen has been on a rising trend against the dollar during this period, but this has effectively had no impact on the surplus of Japan with the US. Nominal exchange rate changes cannot bring solutions to imbalances resulting from large inter-country disparities in thrift and productivity. The US needs to restrain profligate and irresponsible lending and consumption and improve its export performance while surplus countries need to address underconsumption.[51]

H. REMOVING THE DEFLATIONARY BIAS IN THE INTERNATIONAL FINANCIAL ARCHITECTURE

While several AEs and DEEs with strong industrial and export potentials are looking for markets, a number of DEEs are unable to import goods and services as much as required to satisfy the basic needs of their population, reduce poverty and sustain acceptable growth because of foreign exchange shortages even though these are among multilaterally agreed development objectives, notably in the Millennium Development Goals (MDGs). These include not only small economies almost entirely dependent on commodity export earnings, but also large, populous countries with some degree of

[51] In a recent interview the IMF Chief Economist, Olivier Blanchard, has argued that the appreciation of the yuan is not a panacea for the US. According to an IMF model a 20 per cent appreciation in the yuan and the currencies of other East Asian DEEs would increase the US GDP by about 1 per cent, "not enough, by itself to sustain growth in the United States" (Xinhua 2010).

progress in industrial development. This coexistence of glut in more advanced economies and unsatisfied needs in poor countries is a reflection of the failure of the multilateral system, notably the international financial arrangements, in providing the necessary financing to the latter. Consequently, reform of these arrangements should be an important part of post-crisis global restructuring for greater stability and sustained and broad-based growth.

The coming years may see payments constraints in the developing world becoming tighter. During the pre-crisis global expansion many DEEs succeeded in raising growth while keeping their current accounts broadly in balance or running moderate deficits. This included not only several poor commodity exporters in Africa and elsewhere but also some large emerging economies such as Brazil and India. In a few emerging economies in Central and Eastern Europe and Africa receiving massive inflows of capital, growth was associated with sharp currency appreciations and large and growing deficits which these inflows more than covered.

Global economic conditions in the coming years may not allow a repeat of this experience. Returning to pre-crisis growth rates under conditions of a slowdown in exports would require faster growth of domestic demand which would, in turn, mean larger external deficits. A tightening of global financial conditions could make financing of these deficits difficult and onerous, thereby necessitating retrenchment in domestic absorption and cuts in growth.

The areas of reform needed are well known, widely discussed after almost every major financial crisis, only to be forgotten subsequently with economic recovery. First, there is a need for greatly increased, stable and predictable development financing for countries lacking adequate domestic resources for an acceptable growth rate in order to make a dent in poverty and close the income gap with richer countries. In this respect we should move away from current arrangements where provision of such financing depends on the whims of the donors who serve their own interest rather than those of the poorest countries and communities. Since poverty reduction has been declared a global public good in several UN summits and conferences in recent years, there is a strong rationale for establishing global sources of development finance. This could be achieved through agreements on international taxes, including currency and financial transactions taxes, environmental taxes and various other taxes such as those on arms trade, to be applied by all parties to

the agreement on the transactions and activities concerned and pooled in a UN development fund.[52]

The second major area of reform concerns provision of international liquidity at times of trade and financial shocks to enable countries to pursue countercyclical macroeconomic policies so as to minimize loss of output and employment. This should address the two major shortcomings in crisis lending by the IMF. First, the Fund has traditionally been much more willing to provide financing to keep countries current on their debt and maintain open capital accounts than to finance imports and support trade, employment and growth. Second, crisis lending is often associated with procyclical policy conditionalities which only serve to deepen the deflationary impact of shocks. The practice during the current crisis is not an exception in these respects. A new facility, the Flexible Credit Line, has been established for emerging economies deemed eligible on the basis of some pre-determined criteria in order to enable them to finance large and persistent capital outflows while poor countries have been kept on a short leash for trade and current account financing.[53]

The final important area of reform in this respect concerns sovereign debt to official creditors, both multilateral and bilateral. Despite repeated initiatives several poor countries continue to suffer from debt overhang, struggling to service unpayable debt, thereby diverting budgetary resources and foreign exchange away from development. The main problem here is that there are no impartial debt workout mechanisms and the assessment of debt sustainability is left to creditors, notably the IMF. Sustainability is often judged on the basis of how much debt and debt servicing a country can tolerate without paying adequate attention to its implications for development and poverty, and debt servicing is given primacy over all other economic and social objectives.

A consensus appeared to emerge among the major players in the early months of the current crisis on the need for reform of the international financial architecture in these and many other areas. A number of ad hoc initiatives have been launched and proposals put forward in various fora including the United Nations, the Group of 20 and the Bretton Woods Institutions. So far no definitive commitment has been made nor action taken to resolve any of these issues. The past record in this respect is not very encouraging. Despite wide agreement

[52] See Atkinson (2005) for a menu of new sources of development finance.

[53] For further discussion of these issues and various proposals for reform, see Chapter 1; and for IMF programmes in developing countries during the current crisis, see Weisbrot *et al.* (2009).

on systemic reform to bring more effective governance to international finance after a series of crises in emerging economies in the 1990s and proliferation of proposals for reform, the Financing for Development initiative launched at the UN Conference in Monterrey in March 2002 has yielded no significant outcome in this respect. It is particularly up to developing countries to ensure that this is not the fate of the ongoing process initiated in the UN in the June 2009 Conference on the World Financial and Economic Crisis and Its Impact on Development.

I. CONCLUSIONS

Globalization has tilted the balance between labour and capital against the former. Closer integration of China and India into the global economy and the collapse of the Soviet Union have doubled the global labour force and tripled the total number of workers producing for international markets (Akyüz 2006). This, together with increased international mobility of capital and labour-market deregulation, has significantly reduced the bargaining power of workers. In almost all industrial countries productivity-adjusted real wages have been falling, resulting in falling shares of labour income in GDP. In DEEs such as China, expansion of exports of manufactures has no doubt brought some benefits to labour, as it moved them from low-productivity rural employment to higher-productivity industries. But in these countries too, industrial wages have fallen well behind the productivity growth.

This means that the purchasing power of labour over the goods and services they are producing has been falling. The consequent threat of global underconsumption and deflation has so far been avoided thanks to surges in spending on consumption and property driven by asset and credit bubbles and increased household debt not only in the US, but also in a number of other AEs and DEEs, notably in Europe. This has also been associated with massive international capital flows and sharp changes in net asset positions of countries.

However, this process has generated not only large global imbalances but also financial fragility and instability, leading to the most serious post-war global crisis. We now face a major dilemma. On the one hand, a return to "business as usual" so as to restore growth based on debt-driven consumption and property booms will simply mean postponing the adjustments needed for

reducing trade imbalances and financial fragility, and this will inevitably result in a deeper global economic and financial crisis. On the other hand, financial consolidation and retrenchment by highly indebted consumers and deficit countries to reduce fragility could simply raise the spectre of underconsumption and global deflation. This trade-off between financial stability and growth exists, however, only in appearance because unless the underlying problem of underconsumption is addressed, neither financial stability nor growth may be sustained for long.

Thus, a post-crisis global economic restructuring is needed. This should include reforms in the sphere of finance so as to reduce the susceptibility of the world economy to recurrent crises and to remove the deflationary bias in the international financial architecture. But it should also seek to tackle global underconsumption by restoring the balance between labour and capital through high wage settlements and a return to full employment policies. Without determined action on these fronts, the medium-term prospects for stability and growth would remain muted.

Chapter 3

EXPORT DEPENDENCE, SUSTAINABILITY OF GROWTH AND ADJUSTMENT IN CHINA[54]

A. INTRODUCTION

A key issue raised by the global economic crisis is the degree of dependence of growth in East Asian[55] developing and emerging economies (DEEs) on exports, particularly to the US and the EU. Attention in this respect is often focused on China as the centre of the East Asian production network and number one exporter, both in the region and globally. Already at the onset of the crisis views differed widely as to whether growth in China would be decoupled from contraction of economic activity in advanced economies. Those who did not see exports playing a key role in China expected not only that growth in China would continue to surge ahead despite emerging difficulties in advanced economies, but that it could also prevent the world economy from falling into recession. For instance, it was argued that "as far as macro growth is concerned the [Chinese] economy is and has always been effectively 'decoupled', and

[54] First published as a South Centre research paper in April 2010. I am grateful to Michael Lim Mah-Hui, Martin Khor and Mehdi Shafaeddin for comments and suggestions and to Xuan Zhang for assistance with the data used in this chapter.

[55] For the purpose of this study East Asia is defined to include the newly industrialized economies (NIEs; Korea, Taiwan, Singapore and Hong Kong), China and members of the Association of Southeast Asian Nations (ASEAN) but to exclude Japan.

China has little to fear from a global demand slowdown" because the "idea that China is an export-led economy" is a myth (Anderson 2007a: p.1). A similar view was echoed in *The Economist* (2007), where it was argued that China's net exports accounted for approximately one-quarter of its growth in 2007 and that a US downturn was more likely to cause sniffles in China than a heavy cold. Even as the crisis deepened there was talk of reverse coupling, with the rest of the world, notably China, pulling the US forward and preventing it from falling into recession (Bergsten 2008).

The principal channel of transmission of the adverse impact of the crisis to Asian DEEs has been trade. As contraction started to take root in advanced economies, exports in Asia began to fall rapidly from the third quarter of 2008, with year-on-year (y-o-y) declines reaching double-digit figures across the region, after growing at similar rates in previous years. China escaped a collapse in growth thanks to a massive fiscal package and to aggressive easing of monetary policy. However, the sharp drop in exports has raised questions regarding whether China can return to rapid and sustained export-led growth as the world economy recovers from the crisis. Even before the outbreak of the global crisis there were doubts about the sustainability of China's growing penetration in the markets of advanced and developing economies. These concerns have increased considerably because of widespread expectations that global economic conditions in the coming years are likely to be significantly less favourable than in the boom years of 2002-07. It is generally agreed that a return to "business as usual" would be a recipe for increased instability and deeper global crises, posing a threat to international monetary, trade and payments systems. Avoiding such an outcome would call for, *inter alia*, reductions in global trade imbalances. The US would need to live within its means and shift from consumption-led to export-led growth while China would need to restrain its export push and rely increasingly on domestic consumption.[56] The realization that a return to "business as usual" might not be possible in fact underscores the search for a new growth model in East Asia, based on the expansion of domestic and regional markets.

This chapter addresses these issues. It starts with a simple analytical framework for the measurement of the contribution of exports and domestic demand to growth, accounting for their import contents. The empirical evidence reviewed in this chapter suggests that in recent years the average import content

[56] However, as argued in Chapter 2, a US-China rebalancing alone would not be sufficient to secure global stability and growth.

of Chinese exports has been between 40 and 50 per cent and in value-added terms the share of exports in GDP is in the order of 20 per cent. Despite the high import content of exports, however, one-third of growth of income in China in the years before the outbreak of the global crisis is estimated here to have been due to exports, which grew phenomenally, by some 25 per cent per annum. This figure goes up to 50 per cent if spillovers to domestic consumption and investment are accounted for. These figures are significantly higher than the estimates of some 15 per cent produced by conventional accounting based on net exports.

This high degree of dependence on growth of exports is the outcome of underconsumption. In China, the share of private consumption in GDP has been falling since the late 1990s, from over 50 per cent to approximately 36 per cent. By contrast, investment has been rising faster than GDP and its share has now reached close to 50 per cent as a result of the policy response to contraction of exports. When investment grows faster than consumption, rapid expansion is required in foreign markets so that production capacity can be fully utilized. However, if such an expansion is no longer feasible, consumption must grow faster than income and investment.

One reason for underconsumption is high precautionary savings by households because of inadequate public provision of basic needs, such as health care, education and housing. However, a more important reason is the low share of household income and a relatively high share of corporate profits in GDP. Much of household income consists of wages because government transfers and investment income are very small. The shares of wages and household income in GDP have been falling since the late 1990s and these are mirrored by the declining share of private consumption. By contrast, corporate profits and retentions as a proportion of GDP have been rising, contributing to national savings as much as and even more than household savings. Therefore, the disparity between consumption and investment and the consequent dependence on foreign markets is largely a reflection of the imbalance between wages and profits, and between household and corporate incomes. This needs to be rectified if rapid and sustained growth is to be attained based on the domestic market.

B. MEASUREMENT OF CONTRIBUTION OF EXPORTS TO ECONOMIC GROWTH

The conventional approach to the measurement of contribution of exports to economic growth relies on demand-side growth-accounting based on *ex post* national income identity. This involves decomposing income growth into its constituent parts, using observed growth rates of each component of aggregate demand and their shares in the total.[57] The starting point is the national income identity:

$$(1) \qquad Y = C + I + X - M$$

where C and I include both public and private consumption and investment, respectively. In *ex post* growth terms:

$$(2) \qquad g_y = g_c\,(C/Y) + g_i\,(I/Y) + g_x\,(X/Y) - g_m\,(M/Y)$$

The sum total of the last two items is defined as the contribution of net exports to GDP growth. Growth is considered to be driven by domestic demand if the contribution of consumption plus investment exceeds that of net exports. The latter can be positive even when there is a trade deficit provided that exports are growing fast enough relative to imports.

This framework cannot correctly distinguish between the contributions of domestic demand and exports to growth and help in assessing the vulnerability of an economy to export shocks because it fails to link imports to components of aggregate demand. It underestimates the contribution of exports and overestimates the contribution of domestic demand to growth because all imports are deducted from exports even though they are used, in part, for domestic consumption and investment. What the term $[g_x\,(X/Y) - g_m\,(M/Y)]$ can at most describe is the *ex post* contribution of *trade* to growth. On the other hand, the term $g_x(X/Y)$ overestimates the contribution of exports to growth because it neglects the import (foreign value-added) contents of exports. With correct accounting, income (value-added) generated by domestic demand would be lower by the import contents of consumption and investment, and

[57] For an application, see ADB (2005: Chap. 1).

income generated by exports would be lower by its own import content, not by the amount of total imports.

Let α, β and δ denote import intensities of consumption, investment and exports, respectively so that:

$$(3) \qquad M = \alpha C + \beta I + \delta X$$

where the terms on the right hand side of Equation 3 give imports that go directly and indirectly into consumption, investment and exports, respectively. In a special case where import intensities are all equal ($\alpha = \beta = \delta$), they will be given by m/(1+m), where m = M/Y.

The import content of consumption has two parts: imported final consumer goods and imported inputs into domestic production of consumables. Similarly, the import content of investment includes imported capital goods plus imported intermediate inputs into domestic investment. For exports, a distinction can be made between domestically produced exports and re-exports. The latter is defined as exports of imported goods after no (or virtually no) further domestic processing and, hence, emphasizes the role of the economy as a distributor or trader, rather than as a producer. However, the distinction is not always clear-cut and there are no generally accepted criteria for re-exports even though a number of countries report them as a different category of exports based on their own definitions.[58]

Using Equation 3 in Equation 1 will give, in growth terms:

$$(4) \qquad g_y = g_c\,(1-\alpha)\,(C/Y) + g_i\,(1-\beta)\,(I/Y) + g_x\,(1-\delta)\,(X/Y)$$

$(1-\delta)X$ gives exports measured in value-added terms (or value-added exports, VAX). It includes value-added generated in sectors producing exportables (i.e., direct value-added) and in sectors supplying inputs to exports (indirect value-added). Similarly, $(1-\alpha)C$ and $(1-\beta)I$ are total domestic value-added generated for consumption and investment, respectively.

Import intensities are susceptible to change over time along with changes in consumer preferences, technology and the structure of production. Over shorter periods, exchange rate fluctuations can lead to sizeable changes

[58] For a discussion of definition, identification and measurement of re-exports and empirical evidence, see Roos (2006) and Mellens *et al.* (2007).

in import intensities and hence the share of imports in GDP by altering the relative demand for foreign and domestically produced goods. However, when import intensities of different components of demand are different, changes in the composition of aggregate demand will alter total imports without any change in the level of income.

Although improving significantly over the traditional net-exports accounting, the decomposition in Equation 4 does not provide accurate information about the contribution of exports to growth because it ignores the impact of exports on domestic demand. To account for all such interdependencies, including the impact of domestic demand, notably investment, on exports, one would no doubt need a fully fledged macroeconomic model, allowing for lags in the interactions between domestic components of demand with imports and exports.[59] For the issue at hand here attention will only focus on the multiplier. A higher level of exports raises domestic consumption through its impact on income, setting the multiplier to work. In this process imports also rise depending on the import intensity of consumption, dampening the overall impact of export growth on income.

Let C = c Y where c is the average propensity to consume. Then the overall contribution of exports to GDP growth will be given by:

$$(5) \qquad g_{y/x} = g_x \left[(1 - \delta)\,(X/Y)\right] \psi \qquad \text{where} \qquad \Psi = 1/[1 - c\,(1 - \alpha)]$$

that is, the import-adjusted multiplier. Equation 5 incorporates both the direct impact of import-adjusted exports on income and its indirect impact through consumption.[60]

[59] For a discussion of the two-way relationship between investment and exports, or the investment-exports nexus, see Akyüz (2009).

[60] Agarwala (2009) is one of the few studies that account for the multiplier effect in estimating the contribution of exports to growth in India, assuming that import content of exports is at most equal to the average of imports in total expenditures. There is no readily available evidence for India to assess if this assumption is valid.

C. IMPORT CONTENT OF EXPORTS

1. Recent trends

The pursuit of export-led growth, trade liberalization and rapid spread of international production networks over the past two decades have resulted in significant increases in import contents of production and consumption almost everywhere, but most visibly in DEEs. In particular, the increased use of imported inputs for exports has become a key feature of what is known as vertical specialization whereby the production sequence of a good involves at least two countries and the good-in-process crosses at least two borders before reaching the final user (Hummels *et al.* 2001).

Greater participation of DEEs in international production networks in manufactures has generated not only a rapid growth in their exports, but also in imports as inputs into their production. Consequently, increased manufactured exports of DEEs have not always been matched by commensurate increases in domestic manufacturing value-added (UNCTAD TDR 2002, 2003). From the late 1980s onwards, total manufacturing exports increasingly exceeded total manufacturing value-added in several DEEs closely participating in international production networks, such as Hong Kong, Malaysia, Mexico and Singapore, but the opposite was true in G7 countries and some late industrializers such as Korea. In fact, some of these DEEs, including Hong Kong and Mexico, have seen their shares in world manufacturing exports rising while their shares in world manufacturing value-added have fallen.

Rapidly increasing re-exporting activities is another reason why exports account for an increasingly high share of GDP in many countries. Mellens *et al.* (2007) report, in a study of 10 economies, that re-exports have grown faster than domestically produced exports. Re-exports are the main reason why exports exceed GDP in several entrepot economies. They account for more than 50 per cent of total exports in Singapore and approximately 95 per cent of total exports in Hong Kong. However, re-exporting is not confined to small entrepot economies operating as regional or global distributors of certain products. According to Mellens *et al.* (2007), more than half of Dutch manufacturing exports consist of re-exports. The emergence of China is found to have contributed to the role of the Netherlands as the European distribution centre whereby two-thirds of Dutch imports from China are re-exported (Suyker 2007).

In DEEs recent increases in imports have been driven by more than just the growth of production facilities linked to global networks or re-exports. Rapid liberalization of trade and foreign investment over the past two decades has also resulted in increased import intensity of goods and services produced to supply domestic markets. In general, however, import intensity of exports tends to be much higher than that of domestic demand, not only because export sectors are increasingly linked to global production chains, but also because non-tradable services account for a large proportion of private consumption. For the same reason, the import intensity of investment also exceeds that of domestic consumption, particularly in countries with underdeveloped capital goods industries.

2. Empirical evidence

The estimation of import intensities requires allocation of imports to all expenditure categories on the basis of detailed input-output tables.[61] There are several studies on advanced economies, often drawing on the OECD input-output database. Statistics and other government offices in a few countries, including the Netherlands and, more recently, Canada, France and Denmark, have been using input-output tables to estimate the contributions of domestic demand and exports to growth based on adjustments for import contents.

Kranendonk and Verbruggen (2008a, 2008b) provide estimates for import intensities for a number of eurozone economies and the US, using the cumulated production structure matrices obtained by eliminating domestic intermediary demand in input-output tables. These estimates are carried out for four categories of effective demand: private consumption, government consumption, investment and exports. Their findings reveal several features worth noting. First, for the eurozone countries taken together and for most countries individually, the import intensity of exports is greater than the import intensities of all components of domestic demand. Second, exports still account, directly and indirectly, for less than half of total imports. Third, investment is more import-intensive than private consumption, but because the latter accounts for the largest share of domestic demand (some 60 per cent of GDP), approximately one-third of total imports go, directly and indirectly,

[61] It should be noted that estimated import intensities may not be reliable when the input-output data are not sufficiently detailed; see Hummels *et al.* (2001) and NRC (2006).

into private consumption.[62] Fourth, import intensity of public consumption is lower than the import intensities of other components of demand.

In these estimates, differences in the contribution to growth between the conventional accounting based on net exports and the import-adjusted method are striking. Using conventional accounting, the contribution of exports to growth in the sample of European countries was negative in 2005, whereas the import-adjusted method attributes almost one-third of GDP growth to exports in that year. Accordingly, the contributions of domestic consumption and investment to growth are much lower than those estimated by conventional accounting.

Estimates of import intensities of components of domestic demand based on input-output data are not available for DEEs. Much of the work for DEEs has concentrated on vertical specialization and the import contents of exports. One of the first studies in this area (Hummels *et al.* 2001) included a few DEEs, namely, Korea, Taiwan and Mexico, alongside 11 advanced economies, using the OECD input-output database and national input-output tables. For this sample of countries/economies, the average share of foreign value-added in exports was found to be approximately 21 per cent in 1990, rising to 23 per cent in 1995. Estimates were then extended to world trade as a whole under certain assumptions for the countries/economies lacking comparable input-output data: for East Asian DEEs (China, Hong Kong, Indonesia, Malaysia, Singapore and Thailand), the import content of exports (excluding transit shipment) was assumed to be 25 per cent in 1970 and 35 per cent in 1995. For the world economy as a whole, the foreign value-added content of exports, excluding transit shipments or re-exports, is estimated to have increased from 20 per cent in 1970 to approximately 30 per cent in 1995. For Korea and Taiwan, import intensities of exports for the mid-1990s were found to be approximately 30 and 40 per cent, respectively, with little increases from previous decades.

Similar estimates of domestic and foreign contents of exports are provided for a number of advanced and developing economies by Miroudot and Ragoussis (2009) and Johnson and Noguera (2009). The findings of the latter study for selected Asian economies are summarized in Table 3.1.[63] The figures

[62] Claus and Li (2003) also find, for a number of countries, that the import content of consumption is lower than that of both exports and investment.

[63] Johnson and Noguera (2009) provide estimates based on the same method as in Hummels *et al.* (2001) and a variant of that method which produces slightly different estimates. The numbers in Table 3.1 are the averages of the two.

exclude re-exports. It is notable that the domestic value-added contents of exports of Indonesia, Malaysia and Thailand are similar to or higher than those of economies at a higher level of industrialization – Korea and Taiwan. This is mainly due to a high share of commodities in the total exports of the former economies, which contain higher domestic value-added than manufactured exports.[64] In Chinese Mainland, the domestic value-added content of exports is also higher than that of Korea and Taiwan but, as discussed here, this is no longer the case when estimates are adjusted for export processing.

Table 3.1: Domestic content of Asian exports: 2001
(Per cent)

Japan	88	Taiwan	64
India	87	Malaysia	63
China	80 (66[a])	Thailand	60
Indonesia	79	Vietnam	56
Hong Kong	76	Philippines	42
Korea	65	Singapore	35

***Source*:** Johnson and Noguera (2009)

a. Adjusted for processing trade.

Estimates given in several studies for foreign and domestic contents of Chinese exports differ quite significantly according to the data and the method used. It is generally agreed that the vertical specialization framework developed by Hummels *et al.* (2001) is not appropriate for countries that engage actively in processing exports, such as China, Mexico and Vietnam. In such cases the assumption that intensity in the use of imported inputs is the same between non-processing and processing exports or between production for domestic sales and production for exports would result in an underestimation of import

[64] In a sample of 40 countries, the average import content of agricultural and mining exports in 2005 was less than 20 per cent compared to more than 30 per cent for most manufactured exports; see Miroudot and Ragoussis (2009). Johnson and Noguera (2009) also find that value-added to export ratios are substantially higher in agriculture, natural resource and service sectors than in manufacturing. See also Hummels *et al.* (2001: Table 6) for a similar conclusion for the earlier period.

contents of exports. Therefore, it is necessary to generate and use separate input-output tables for export processing sectors, rather than relying on the unified official input-output table.[65]

Table 3.2: Import intensity of Chinese exports
(Per cent)

Study	Year	Single IO[a]	Separate IO[b]
Chen *et al.* (2004)	1995	–	45.5
Koopman *et al.* (2008)	1997	17.6	47.7
Dean *et al.* (2008)	1997	17.9	47.7
Johnson and Noguera (2009)	2001	20.0	34.0
Ping (2005)	2002	21.0	–
Koopman *et al.* (2008)	2002	25.1	46.1
Dean *et al.* (2008)	2002	25.4	46.1
Chen *et al.* (2008)	2002	–	53.4
Miroudot and Ragoussis (2009)	2005	30.0	-
Koopman *et al.* (2008)	2006	26.3	49.3

a: Using single input-output table for domestically produced and processing exports.

b: Using separate input-output tables for domestically produced and processing exports.

Table 3.2 contains estimates for import contents of Chinese exports reached by various studies using single and/or separate input-output tables for non-processing and processing exports. The average import content of exports is much higher when separate input-output tables are used. Processing exports accounted for approximately 55-60 per cent of total Chinese exports in the first half of this decade (Feenstra and Hong 2007; Koopman *et al.* 2008). Their

[65] In China processing exports refer to a special category of goods produced by assembling and/or processing intermediate inputs that are exempted from tariffs because the final products are sold only in foreign markets. Chen *et al.* (2004) was the first study using separate input-output tables for non-processing and processing exports in China. For a contrast and comparison of the two methods and estimates based on them, see Koopman *et al.* (2008) and Dean *et al.* (2008).

import content is several times that of non-processing exports: in 2002 it was approximately 75 per cent against 11 per cent.[66] Import content is particularly high – over 80 per cent – in sectors processing high-end manufactures such as electronics compared to low-skill exports. Foreign firms are active in export processing and have particularly higher import content in their exports than do domestic firms. Wholly foreign-owned enterprises exhibit the lowest share of domestic value-added, followed by joint venture companies (Koopman *et al.* 2008).

On some accounts, domestic value-added contents of Chinese exports have been rising as a result of growing supply capabilities and technological upgrading. The rising trade surplus brought about by a slowdown in imports relative to exports after 2004 is often interpreted as a sign of a weakening of the link between exports and imports, and this is supported by some econometric evidence (Cui and Syed 2007). However, studies based on input-output data covering the period from the mid-1990s to 2006 do not generally show a declining trend in the foreign content of Chinese exports.[67] This might have changed in more recent years for two main reasons. First, the share of processing exports has continued to fall and was below 50 per cent of total exports in 2008 (Li and Fung 2009). This should bring a decline in the average import intensity of Chinese exports because non-processing exports have higher domestic value-added contents. Second, in processing exports, China appears to have been shifting from simple assembly of foreign parts and components towards operations with greater domestic inputs, thereby raising their domestic value-added contents (Cui 2007).

The estimates made for the first half of the 2000s show that the average foreign value-added content of Chinese exports was between 40 and 50 per cent. A very large proportion of foreign content of exports consisted of imported parts and components directly used in sectors producing exportables. This proportion was particularly high in export processing sectors while in non-processing exports the shares of direct and indirect import contents were similar. Close to two-thirds of domestic value-added contents of non-

[66] See Koopman *et al.* (2008: Table 4). Chen *et al.* (2008) estimate, for the same year, similar import content for processing exports but a higher figure (37 per cent) for non-processing exports.

[67] For changes between the mid-1990s and early 2000s, see Chen *et al.* (2008: pp.11-12). Preliminary estimates for 2006 by Koopman *et al.* (2008), however, show a steep decline in domestic value-added generated by processing exports, but little change in that generated by non-processing exports.

processing exports were generated in other sectors supplying inputs, whereas for processing exports direct and indirect value-added contents were broadly equal.

Chinese exports to the US are found to have greater import contents than its exports to the rest of the world in large part because a very high proportion of exports to the US – about 78 per cent in 2002 – are processing exports. In 2002 the foreign value-added content of exports to the US was around 63 per cent compared to less than 50 per cent for total Chinese exports.[68] By contrast US exports to China have very high domestic value-added content (around 87 per cent in the same year) and very low foreign value-added content (13 per cent). As a result, while in gross value terms the bilateral trade surplus of China with the US was estimated to be some $172 billion in 2005, in value-added terms this figure comes down to less than $40 billion. In other words, China's exports to the US contain large amounts of value-added generated elsewhere, including in its Asian trading partners and even the US itself (Lau *et al.* 2006).

A relatively important part of the domestic value-added generated by Chinese exports accrues to foreign firms. This is particularly the case for processing exports where foreign firms are dominant. It is estimated by Lau *et al.* (2006) that of the total domestic value-added generated by Chinese exports to the US in 2002, around two-thirds went to capital income, some 18 per cent to labour and 14 per cent to indirect taxes. Approximately 60 per cent of these exports were by foreign firms, including firms from the US. Even if it is assumed that such firms shared only in the direct capital income, it can be estimated that an additional 7 per cent of the value of total Chinese exports to the US went to foreign firms. As a result, income left in China was no more than one-third of total value of exports to the US.

D. TO WHAT EXTENT IS GROWTH IN CHINA EXPORT-LED?

1. Recent experience

The evidence examined above shows that Chinese exports have relatively high import contents. On average, domestic value-added generated by exports is not much more than half of their gross value and the rest is accounted for by foreign

[68] Lau *et al.* (2006). According to Dean *et al.* (2008), foreign import content of Chinese exports to the US was 55 per cent compared to the average foreign content of its total exports of 46 per cent.

value-added, mainly imported parts and components and other intermediate inputs.

Table 3.3: Growth of real GDP and its components in China
(Per cent)

	GDP	Consumption	Gross Capital Formation	Exports	Imports
2002	9.1	7.4	13.2	29.4	27.4
2003	10.0	6.6	17.2	26.8	24.9
2004	10.1	7.1	13.4	28.4	22.7
2005	10.4	7.3	9.0	24.3	11.4
2006	11.6	8.4	11.1	23.8	15.9
2007	14.2	10.8	14.2	20.0	14.2
2008	9.6	8.5	11.0	8.6	5.1
2009	9.1	8.5	19.8	−10.4	4.3

Source: WB CQU (various issues).

However, even in value-added terms, the share of Chinese exports in GDP (i.e. the VAX/GDP ratio) is very high, in the order of 18-22 per cent, of which 7-9 percentage points consist of direct value-added generated in sectors producing exportables. This is much higher than what would be expected for an economy of its size; it is higher than even the conventionally measured exports-to-GDP ratio in the US, Japan and Brazil. The main reason is the phenomenal growth of its exports since the beginning of the decade, at a rate of some 25 per cent per annum, more than three times the domestic consumption and twice the domestic investment, which took the exports-to-GDP ratio to 36 per cent before the outbreak of the global crisis in 2008 (Tables 3.3 and 3.4).

Table 3.4: Exports, imports and income in China
(Per cent)

	2002	2006	2007
X/GDP	22.4	36.5	36.0
VAX/GDP	12.1	18.5	18.3
Direct	4.5	7.0	7.0
Indirect	7.6	11.5	11.3
TB/GDP	3.0	8.2	9.3
M/GDP	20.3	29.8	28.3
M_x/M	50.7	60.2	62.1
IG/M	72.6	74.4	75.2

***Source*:** IMF IFS, UN Comtrade and Koopman *et al.* (2008)
VAX: Exports measured in value-added. TB: Trade balance.
M_x: Imports used for exports. IG: Imports of intermediate goods.

Table 3.4 uses the estimates given by Koopman *et al.* (2008) in calculating VAX/GDP ratios and direct and indirect value-added contents of exports as a proportion of GDP.[69] The increase in VAX/GDP between 2002 and 2007 reflects mainly the increased share of exports in GDP as conventionally measured rather than declines in their foreign value-added contents. The VAX/GDP ratio exceeds by a wide margin the ratio of trade surplus (TB) to GDP because not all imports are used for producing exportables. Some 60 per cent of total imports and over 80 per cent of intermediate goods imports are used, directly and indirectly, for exports and the rest for domestic consumption and investment.

According to some estimates the contribution of value-added exports to GDP in China is much smaller than the figures given in Table 3.4. Anderson (2007a) puts it at only 7.7 per cent – that is, less than half of the VAX/GDP

[69] In Table 3.4 estimates for foreign and domestic contents for 2006 are also used for calculating the VAX ratio for 2007.

ratio in Table 3.4. However, this estimate by Anderson (2007a) is reached by deducting from exports not only "the associated import content" in sectors producing exportables but also "input purchases from other sectors." It thus excludes the indirect domestic value-added contents of exports which, as noted, exceed direct domestic value-added by a large margin. Indeed, it comes very close to the share of direct value-added content of exports in GDP estimated on the basis of input-output tables. More importantly, it is below the ratio of trade surplus to GDP. Therefore, even if it is assumed that all imports are used for exports and none for domestic consumption and investment, the value-added generated would still be higher than 7.7 per cent of GDP.[70]

Table 3.5 compares the estimates for the contribution of exports to growth in China over 2004-09 made according to conventional accounting in Equation 2 based on net exports, with those based on the adjustment of exports and domestic demand for their import contents. The latter estimates take the import content of exports to be 50 per cent. This is on the high end of various estimates based on input-output data discussed above, particularly for the more recent years. Therefore, the figures in the last column of Table 3.5 should be interpreted as the minimum contributions of exports to growth. Even then they exceed the estimates based on net exports by a large margin for the years preceding the crisis. According to conventional estimates, from 2004 until 2008, net exports accounted for, on average, no more than 15 per cent of growth, while the average contribution of exports reached one-third when import contents of exports and domestic demand are both taken into account. Therefore, in China, the dependence of growth on exports has been quite significant despite a very high import content of exports.

The figures in Table 3.5 do not include the multiplier effect of exports on consumption and income. To account for this, it is necessary to estimate the import content of consumption (α in Equation 5). This is not directly available but on some reasonable assumptions it can be estimated to be less

[70] These considerations are also valid for the findings of another study, He and Zhang (2008), according to which the domestic value-added content of exports was 15 per cent in 2002. This would imply a VAX/GDP ratio of around 3 per cent. This is more or less equal to the trade-balance ratio in that year (see Table 3.4), implying that consumption and investment use little or no imports. The study uses the methodology developed by Koopman *et al*. (2008) for separation of imports for processing and non-processing exports and the data from the same 2002 input-output table, but does not explain why it reaches significantly different estimates.

than 8 per cent.[71] This implies that during 2004-07, over 60 per cent of total imports were used, directly and indirectly, for exports and under 15 per cent for domestic consumption. Even for a lower import content of exports, say δ=0.40, the import intensity of domestic consumption would not be much higher – around 10 per cent – and imports used for domestic consumption and investment together would barely reach 50 per cent of the total. These figures are quite low compared to those in advanced economies, particularly because the share of goods in consumption is higher and that of services is lower in China and goods have higher import intensity than services. They suggest that the Chinese economy remains pretty closed to imports except for exports and export-oriented investment.

Table 3.5: Contributions of domestic demand and exports to growth in China

(Percentage points)

		Conventional		Import-Adjusted	
	GDP	Domestic Demand	Net Exports	Domestic Demand	Exports
2004	10.1	9.6	0.5	6.3	3.8
2005	10.4	8.1	2.3	6.7	3.7
2006	11.6	9.8	1.8	7.5	4.1
2007	14.2	11.7	2.5	10.6	3.6
2008	9.6	8.8	0.8	8.0	1.6
2009	9.1	12.8	-3.7	11.0	-1.9

Source: Conventional accounting: for 2004-06 from ADB (2009) and for 2007-09 from WB CQU (November 2010).

[71] Once the import content of exports is known, the import intensity of domestic demand (η) can be obtained from $Y = D(1-\eta) + X(1-\delta)$ where D is aggregate domestic demand (C+I). For $\delta = 0.50$ it is around 11 per cent. We assume, on the basis of the estimates for several advanced economies discussed above, that the import intensity of consumption (α) is no more than half of that of investment (β). For $\delta = 0.50$, $\eta = 0.11$ and $\alpha = \beta/2$, the import intensity of consumption will come to less than 8 per cent.

With these values of import intensity of consumption, the import-adjusted multiplier (ψ in Equation 5)[72] is between 1.5 and 1.6, implying that around 50 per cent of GDP growth before the outbreak of the crisis was due to exports, including through their impact on consumption. However, there are reasons to expect a lower multiplier from incomes earned in export sectors than the average for the economy as a whole. As noted above, some two-thirds of value-added in export sectors accrue to gross profits and less than one-fifth goes to wages. The share of wages in income in export sectors is much lower and that of profits much higher than in the economy as a whole (see Chart 2.2). Since the propensity to consume from wages is significantly higher than the propensity to consume from profits and because profits in export sectors partly go to foreign firms, income earned in these sectors can be expected to generate proportionately less consumption than income earned in the rest of the economy. Consequently, the multiplier would be smaller. However, even if one were to apply half the average consumption ratio, the multiplier would still be approximately 1.2, implying that some 40 per cent of growth before the crisis was due to exports.

According to these estimates, in China, a 10-percent growth in exports would generate at least 2 per cent growth in GDP, including through its impact on domestic consumption. If account is taken of the impact on investment, this figure would be higher. An econometric study taking into consideration all spillovers to domestic demand, including the knock-on effect on investment, puts it at 2.5 per cent (Cui *et al.* 2009). A similar figure is suggested by income multipliers estimated by ESCAP (2010) on the basis of the Oxford Economic Forecasting model.[73] Thus, if spillovers from exports to both consumption and investment are accounted for, it would not be an exaggeration to conclude that approximately 50 per cent of Chinese growth during 2004-07 came from exports.

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[72] Here, the share of private consumption in GDP rather than total consumption is used in estimating the import-adjusted multiplier.

[73] The export multiplier shows that every $1 loss of exports in China would cut GDP by 66 cents. Using the average ratio of exports to GDP over 2004-07, this would imply that a 10 per cent growth in exports would generate about 2.3 per cent growth in GDP, including spillovers to domestic demand.

2. *Chinese vulnerability to a slowdown in exports*

These findings suggest that the Chinese economy is highly vulnerable to export shocks, as seen during the recent downturn in the world economy. The growth rate of Chinese exports and their contribution to GDP growth declined sharply in 2008 before becoming negative in 2009 (Table 3.5). There was a swing of some 6 percentage points in the contribution of exports to growth in 2009 from 2004-07, even without accounting for spillovers to domestic demand. This is only partly offset by faster growth of domestic demand. Despite a massive fiscal package of some $600 billion or 15 per cent of GDP and aggressive monetary easing and rapid credit expansion, GDP growth in 2009 is estimated to have remained some 2 percentage points below the 2004-07 average.

This heavy dependence on exports is the outcome of underconsumption. From the beginning of the decade until the global crisis in 2008, Chinese investment grew faster than consumption and the demand gap was filled by rapidly growing exports (Table 3.3). The share of private consumption in GDP fell from over 50 per cent in the 1990s to around 36 per cent on the eve of the crisis, whereas that of investment rose to 45 per cent (Chart 2.2).[74] The recent stimulus package has pushed up the investment rate further, close to 50 per cent of GDP, and aggravated the problem of excess capacity that had pervaded several sectors and increased the dependence of growth on exports. A very large proportion of the fiscal package has been allocated to investment in infrastructure, with less than 20 per cent assigned to social spending (Li 2009). Policies designed to revive real estate demand and an unprecedented growth in mortgage lending to households have created a bubble in the property market, with real estate investment growing by close to 40 per cent. Although private consumption levels were maintained thanks to several incentives, particularly for car purchases, this did not provide much impetus to offset the sharp decline in exports. The increase in investment is estimated to have contributed between 80 and 90 per cent of growth in 2009 (Ho-Fung 2009; Wolfe and Ziemba 2009).

As the impact of the stimulus package fades away, capacity utilization and growth will again depend on a rapid expansion of exports, because the share of consumption is not expected to register a significant increase in the immediate period ahead. Although Chinese exports started to recover rapidly

[74] On the evolution of investment and consumption, see WB CQU (various issues) and Aziz and Dunaway (2007).

at the end of 2009 and are expected to record double-digit growth for 2010, projections for 2011-2012 suggest a sharp slowdown to single-digit figures (WB CQU, November 2010). Accordingly, growth is expected to remain below not only the rates attained during pre-crisis years, but also during 2008-2009.

Can China go back to export-led growth over the medium term as the world economy recovers from the current crisis? In the past decade, China's exports rose twice as fast as world trade and its share in world merchandise trade doubled, overtaking the US and, more recently, Germany to become the world's number one exporter. A return to trend growth of some 10 per cent per annum based on exports would mean continued increases in its penetration of markets abroad and its share in world trade. If growth in advanced economies, which constitute the main markets of China, remains sluggish, as suggested by most medium-term forecasts, the required increase in China's share in world markets will be even greater.

A return to "business as usual", with the US continuing to consume beyond its means and absorbing Chinese exports by issuing growing amounts of dollar liabilities, is not a sustainable option – it is a recipe for deeper international monetary and financial instability. Rather, the US needs to live within its means and to shift from consumption-led to export-led growth, as it now appears to be determined to do (see Chapter 2). Under these conditions, an aggressive export push by China in the markets of advanced economies or other developing countries is likely to meet strong resistance, creating conflicts in the trading system.[75] Indeed, China has already encountered adverse reactions not only from the US and the EU, but also from some DEEs including India and Indonesia. If, however, it cuts the rate of expansion of its exports to a more acceptable level, say to 10 per cent, then, without a fundamental change in the pace and pattern of domestic demand, its growth might barely reach 7 per cent.[76] Growth might drop a lot more if the credit-driven investment

[75] In a scenario by Guo and N'Diaye (2009) to achieve a growth rate of 8.5 per cent per annum over 2011-20, Chinese real exports would need to grow by 14.5 per cent per annum, more than twice the projected growth in world trade volume, and its current account surplus would reach 15 per cent of GDP. Its share in world exports would rise to 15 per cent, requiring large gains in markets for steel, shipbuilding and machine tools. In the view of these authors the main impediment to such a growth path would be the difficulties in lowering prices to the extent needed for gaining market shares, rather than problems associated with growing trade imbalances.

[76] Even 10 per cent real export growth is well above the 6.4 per cent world trade volume growth assumed in the IMF Medium-Term Baseline Scenario – IMF WEO (October 2009).

bubble bursts, exposing bad loans and giving rise to difficulties in overstretched banks and, eventually, a financial crisis.[77]

3. *The way out*

A solution to this dilemma could be to lower the foreign content of exports so as to enhance their contribution to growth. This would require technological upgrading and substitution of high-technology imported parts and components with domestic production and a shift from processing to non-processing exports. Such a transformation has been taking place since the early years of the decade but there has been no significant decline in the average import content of exports, possibly because of increased vertical specialization in non-processing exports. Indeed, such a process would take a long time to have an effect on domestic contents of exports. Marginal declines in import contents cannot offset a sharp deceleration in the pace of exports so as to sustain rapid growth. Besides, such a process would imply continued growth of a Chinese trade surplus, thereby aggravating global imbalances.

If the aim is to maintain pre-crisis growth rates of 10 per cent or more, the solution is naturally to raise domestic consumption much faster than has been the case so far. The estimates above suggest that for every 10-percentage-point decline in export growth, private consumption would need to expand by at least an additional 5 percentage points to keep growth unchanged.[78] This means that if exports keep pace with income, consumption would need to grow faster than GDP and investment would need to grow slower than GDP. Thus, returning to a path of some 10 per cent growth would require reversing the downward trend in the share of private consumption and the upward trend in the share of investment in GDP.

The coexistence of a growing current account surplus with an exceptionally high rate of investment is a clear symptom of underconsumption. One reason for this is high precautionary savings by households because of inadequate public provision of some basic needs, including health care, housing

[77] Before the outbreak of the crisis the bursting of the asset (property and stock) bubbles was expected to reduce growth in China by around 2 percentage points; see Chancellor (2008).

[78] This is because consumption generates more domestic value-added than exports: its import content (α) is lower than the import content of exports (δ), and its share in GDP is about the same as the share of exports, as conventionally measured.

and education.[79] A more important reason is the low share of household income and a very high share of corporate profits and savings in GDP. In 2008, household income accounted for less than 60 per cent of GDP, down from two-thirds at the end of the 1990s (Ma and Yi 2010). As a result, despite a high propensity to save, household savings as a proportion of GDP are not much higher than those in other DEEs where household share in GDP is higher. They have varied around 22 per cent of GDP during 2005-2008, up from 20 per cent at the end of the 1990s. This is broadly the same as the ratio of household savings to GDP in Malaysia in the 1980s and in India since the middle of the decade. However, at more than 50 per cent of GDP, China's national savings rate exceeds India's by a large margin because of significantly higher corporate retentions: over 20 per cent of GDP compared to 10 per cent in India. Chinese corporate profits and savings are also much higher than those in late industrializers in Asia, including Japan, 15 per cent of GDP during the 1960s, and Taiwan and Korea, 12 and 8 per cent of GDP, respectively, in the first half of the 1980s.[80]

The disparity between consumption and investment and the consequent dependence on foreign markets is largely the outcome of the imbalance between wages and profits. Wages in China constitute a very large proportion of household income because government transfers and investment income, including dividends, are very small.[81] Despite registering impressive increases, wages have lagged behind productivity growth and their share in value-added has been declining.[82] Since the early years of the decade, labour productivity in manufacturing has grown by some 20 per cent per annum, while nominal wage increases have been under 15 per cent and real wage increases even lower.

[79] On official estimates, household savings as a proportion of disposable income were around 40 per cent in 2008, up from 30 per cent at the turn of the decade (Ma and Yi 2010), while some survey-based estimates for 2008 give a lower figure, around 28 per cent, compared to 32 per cent in India (Prasad 2009).

[80] For household and corporate savings in early industrializers, see Akyüz and Gore (1996) and UNCTAD TDR (1997). Estimates of corporate savings as a percentage of GDP differ widely. According to Ma and Yi (2010), they are lower than the share of household savings, whereas the opposite is the case in the estimates provided by Prasad (2009) and Anderson (2007b).

[81] According to Aziz and Cui (2007) in 2005 investment income accounted for 3 per cent of households' disposable income while government transfers were no more than 0.5 per cent of GDP.

[82] On recent behaviour of labour productivity, profits and wages and consumption, see Kim and Kuijs (2007), and WB CQU (August 2006 and February 2007).

Profits rose faster than sales and the share of labour cost in total gross output in mining, manufacturing and utilities fell from 11.5 per cent in 2002 to 7.1 per cent in 2006; for the economy as a whole, the share of wages in GDP fell to approximately 40 per cent after fluctuating between 50 and 55 per cent in the 1990s. High share of profits in value-added, non-payment of dividends to the government by state-owned enterprises and tax incentives are mentioned among the main reasons for rapid increases in corporate retentions and investment (Kuijs 2005; WB CQU August 2005; Aziz and Dunaway 2007; Yu 2007). The downward trend in the share of wages in GDP is the main reason for the declines in the shares of household incomes and private consumption in GDP (see Chart 2.2).

It is true that success in industrialization crucially depends on the pace of capital accumulation, which, in turn, depends very much on the volume of profits and the extent to which they are used for investment. High corporate retentions and a dynamic profit-investment nexus, rather than high household savings, have been the key distinguishing components of successful industrialization in East Asia (Akyüz and Gore 1996). China is not an exception in this respect. However, unlike China, most late industrializers, particularly Japan and Korea, did not rely on cheap labour and cheap currency. In these countries wages and private consumption grew in tandem with productivity and underpinned the expansion of productive capacity by providing a growing internal market. Private consumption as a proportion of GDP in the newly industrialized economies and Japan have constantly exceeded that of China since the mid-1980s and the gap has risen to 18 percentage points in the present decade.[83]

In view of bleak export prospects, a return to trend growth in China crucially depends on a sizeable increase in the share of household income in GDP and a corresponding decline in corporate profits, savings and investment. This calls for a higher share of wages in value-added and significantly greater government transfers to households, particularly in rural areas where incomes remain depressed. Greater public spending on social infrastructure in health, housing and education would not only improve social welfare but also serve to

[83] See Ho-Fung (2009) who argues that the urban-industry biased development model "is the source of China's prolonged 'limitless' supply of labour, and thus of the wage stagnation that has characterised its economic miracle" and that China's "export competitiveness has been built upon long-term wage stagnation."

reduce relatively high precautionary household savings. These expenditures and income transfers can be financed by dividend payments by state-owned enterprises, thereby simultaneously curbing excessive investment.

A shift from export-led to consumption-led growth would also require significant industrial restructuring. An important part of Chinese exports are specific to foreign markets, with little domestic demand. Unlike in the mainstream (neo-classical) theory of production where "factors of production" can be shifted freely among different lines of production to produce different goods and services, in reality, skills, capital equipment and organizational structures are often industry-specific and even product-specific. This means that adjustment in the production structure would depend primarily on reallocation of new investment and skills towards areas that need to expand to meet higher domestic consumption. In this process, state guidance of investment could no doubt play an important role.

Chapter 4

THE SUBPRIME BOOM-BUST CYCLE AND CAPITAL FLOWS TO DEVELOPING COUNTRIES[84]

A. INTRODUCTION

An unusual trait of the global financial crisis is that for developing and emerging economies (DEEs) the crisis does not appear to be about finance. Indeed, while many advanced economies (AEs) continue to encounter debt deflation, financial stringency and risks of sovereign and private insolvency, the financial problem for most DEEs is asset and credit bubbles and upward pressure on their currencies. Except for a brief interruption in late 2008 and early 2009, DEEs have continued to receive large inflows of capital in large part because major AEs have responded to the crisis caused by excessive liquidity and debt by creating still larger amounts of liquidity to bail out troubled financial institutions and to lift asset prices and lower interest rates in order to stimulate private spending and promote exports. This is yet to be translated into significant increases in credits to firms and consumers in AEs, but it has given rise to a search for yield

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in DEEs with considerable higher interest rates and better growth prospects. The combination of low interest rates and monetary expansion in AEs, rapid growth in DEEs, notably in China as the largest commodity importer in the world, and renewed speculation in commodity futures has also given rise to a new boom in commodity prices.

The surge in capital inflows has met with a proliferation of regulation and controls in DEEs. Such a widespread resort to control is unprecedented and would have, indeed, been unthinkable only a decade ago when several DEEs were relying on capital inflows of all kinds to bring inflation under control and/or to sustain growth.

What has changed? There can be little doubt that DEEs now enjoy much more comfortable balance-of-payments positions than a decade ago. However, even some countries with current account deficits are now unwilling to adopt a hands-off approach to capital inflows. This is because capital funded with cheap money in AEs is coming to DEEs not so much to create productive assets as to extract quick windfalls, buy into existing companies and take control over natural resources. Moreover, experience shows that such flows are reversible, particularly when they are driven by push factors emanating from macroeconomic policies and conditions in major AEs. Short-term benefits yielded by them can be more than offset by costs incurred as a result of financial turmoil and economic contraction that may be caused by their rapid exit. This is also the main reason why the IMF has had to recognize willy-nilly that capital controls are legitimate tools of policy (see Chapter 5).

Until recently, post-war history has witnessed three generalized boom-bust cycles in private capital flows to DEEs with severe setbacks to development. The first cycle started in the late 1970s and ended with a debt crisis in Latin America in the early 1980s. The second boom started in the early 1990s and was followed by a series of balance-of-payments and debt crises in East Asia, Latin America and elsewhere. The third cycle started in the early years of the new millennium and ended in the second half of 2008 with the subprime crisis. This was soon followed by a new boom, the fourth one in the post-war era, which started in the first half of 2009 and is still continuing with full force as of early 2011.

A common feature of these cycles is that they all started under conditions of rapid expansion of liquidity and low interest rates in major reserve-issuing countries, notably the US. However, the booms ended somewhat differently in different episodes. The first boom was brought to an end when monetary

policy in the US made a sharp turn and became highly contractionary, producing a hike in interest rates and a recession in the early 1980s. The second boom ended with a sudden shift in the willingness of international lenders to maintain exposure in East Asia. Deteriorations in external positions of recipient countries resulting from the impact of capital inflows themselves, loss of competitiveness due to external shocks and tightened global financial conditions all played a part in this rapid turnaround. The third bust came again as a result of external shocks, with the deepening of the subprime crisis, notably the collapse of Lehman Brothers, which led to extreme risk aversion and flight to safety.

The current boom in capital inflows has been creating or adding to macroeconomic imbalances and financial fragility in several recipient countries in large part because they have been shy in applying brakes on them. Deficit DEEs such as Brazil, India, South Africa and Turkey are now experiencing currency appreciations even faster than surplus economies and relying on capital flows to finance growing current account deficits. On the other hand, many of those that have been successful in maintaining strong payments positions are facing domestic credit and asset bubbles. Both sets of countries are now exposed to the risk of instability to a greater extent than was seen during the subprime debacle.

When and how the current boom may end remains highly uncertain. It is almost impossible to predict the timing of stops and reversals and the events that can trigger them even when the conditions driving the surge in capital flows can be diagnosed to be unsustainable with a reasonable degree of confidence. There can be little doubt that the conditions that drive the current surge in capital flows, notably the historically low interest rates in AEs, cannot be sustained indefinitely even though they may continue in the near future. These flows can eventually come to a halt as a result of either the exit of the US from the policy of easy money, or an event that could lead to extreme risk aversion in financial markets and flight to safety, including a balance-of-payments or a financial crisis in a major emerging economy, or increased inflationary pressures from commodity markets.

The US is now under deflation-like conditions and the Fed is aiming at creating inflation in markets for goods and assets through aggressive monetary easing. But its policies are adding more to the boom in international commodity markets and asset prices and credit expansion in DEEs. If commodity prices continue to rise as a result of strong growth in China, low interest rates and

rapid expansion of liquidity in the US, growing speculation in commodity futures and political unrest in the Middle East and North Africa, the Fed may end up facing inflation, but not of the kind it wants. In such a case, the boom in capital flows and commodity markets may end in the same way as the first post-war boom ended in the early 1980s – that is, by a rapid tightening of monetary policy in the US even before the economy fully recovers from the subprime crisis.

According to another scenario, the boom in commodity prices and capital flows may be ended by a growth slowdown in China. As a result of the combined impact of a massive stimulus programme in infrastructure investment financed by cheap credits and rapidly increased capital inflows, the Chinese economy is now overheating, with prices rising rapidly in both product and asset markets. Monetary tightening designed to cool the economy could slow down growth considerably, particularly if it pricks the credit and investment bubbles in the property market and reduces the demand for commodities significantly. This, together with the oversupply built during the boom and the exit of large sums of money from commodity futures, could lead to a sharp downturn in commodity prices, thereby making investments in commodity-rich economies unviable and loans non-performing, and creating extreme risk aversion and flight to safety.

Regardless of how the current surge in capital flows may end, the most likely outcome is that it would coincide with a reversal of the upswing in commodity prices. The most vulnerable DEEs to such an outcome are those which have been enjoying the dual benefits of global liquidity expansion – that is, the boom in commodity prices and capital flows. Most of these are in Latin America and Africa, and some of them have been running growing current account deficits despite the commodity bonanza. Interestingly, the first country that fell into crisis in the early 1980s, Mexico, had also enjoyed the twin booms in the preceding period – the hike in oil prices and massive expansion in international bank lending.

This chapter examines the causes, nature and effects of the current boom in capital flows with a historical perspective, and possible consequences of its reversal. Discussions will focus on private capital flows to DEEs, including both the developing countries (DCs) as traditionally defined and the emerging economies of Central and Eastern Europe (CEE) and the Commonwealth of Independent States (CIS) which are now generally considered in the same class of investment risk as DCs. However, for historical comparison data will also be

presented for DCs alone.[85] A distinction will be made between capital inflows by non-residents and capital outflows by residents. *Capital inflows* refer to the acquisition of domestic assets by private non-residents while sales of assets are defined as negative inflows. *Capital outflows* refer to the acquisition of foreign assets by private residents, including foreign companies and individuals that have established residence in DEEs, and sales are defined as negative outflows. *Net private capital flows* is the difference between net capital inflows and net capital outflows.[86]

The first two cycles are briefly discussed in the following section. Section C examines private capital flows to DEEs in the new millennium, including the factors driving the pre-Lehman surge in inflows, their brief reversal and the reasons for their quick recovery. Section D shows that the factors that have given rise to swings in capital flows have also contributed significantly to gyrations in commodity prices since the early years of the 2000s. This is followed by an examination of the nature, composition and destination of recent capital flows in comparison with previous cycles and their implications for the exposure of DEEs to the risk of instability and crises. Section F examines the impact of capital flows on exchange rates, current accounts and asset markets of DEEs in recent years. Section G discusses the possible developments that can end the current boom and the exposure of different categories of DEEs to a sudden stop and reversal. After reviewing briefly the policy response of DEEs to the surge in capital flows, the chapter concludes that they need stronger, more comprehensive and permanent measures of control in order to contain the build-up of fragility and imbalances that could eventually cost them dearly if the boom ends with a bust.

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[85] Many of the emerging economies of CEE and the CIS did not exist as independent states before the 1990s. Here DEEs correspond to what the IMF WEO (October 2010) calls "Emerging and Developing Countries" plus the Newly Industrialized Economies (NIEs), Hong Kong (China), Korea, Singapore and Taiwan Province of China. Until October 2009 the IMF's *World Economic Outlook* included NIEs among "Emerging and Developing Countries", but they are now treated as advanced economies.

[86] This study uses data from both the IMF and the IIF (Institute of International Finance). These differ in country coverage, methodology and classification of capital flows. The IMF data include all DEEs as defined above whereas IIF data include the 30 most important emerging economies. In terms of coverage of items, IMF data are also more comprehensive. IMF data are organized around three categories: direct, portfolio and other investments. The IIF distinguishes between equity and debt for both inflows and outflows. For inflows a further distinction is made between portfolio and direct equity and between commercial bank lending and non-bank lending. Historical comparisons here rely on the IMF data whereas both data sets will be used for the more recent period.

B. PREVIOUS POST-WAR BOOM-BUST CYCLES

Until the second half of the 1970s private capital inflows to DCs consisted primarily of foreign direct investment (FDI) and the main recipients were Latin American countries.[87] They were either tariff-jumping investment aiming at access to heavily protected markets of DCs or investment for the exploitation of natural resources for export to AEs. Portfolio inflows and private borrowing from international financial markets were almost nonexistent and sovereign borrowing was limited. Total private inflows to DCs were not only small but also relatively stable.

This picture changed in the 1970s with the first post-war boom in capital inflows to DCs (Chart 4.1). Much of this was in international commercial lending. FDI inflows remained relatively small and there was hardly any portfolio investment. The lending was driven primarily by a rapid expansion of international liquidity associated with oil surpluses and growing US external deficits and facilitated by financial deregulation in AEs and rapid growth of Eurodollar markets. Excess liquidity was recycled in the form of syndicated bank credits at variable interest rates and much of these were denominated in dollars. Banks and non-bank private institutions and public agencies were the principal borrowers. Borrowing from private markets was found more attractive by DCs than loans from multilateral financial institutions because they did not come with policy conditionalities. Moreover, with booming commodity prices, real interest rates on these loans were often negative. Latin America was the main recipient – East Asian DCs were involved to a lesser extent with the notable exception of Korea. Foreign borrowing was encouraged by the Bretton Woods Institutions (BWIs) and the US for fear that oil price shocks could lead to a collapse of global demand and contraction of world output.

This boom ended when the Fed shifted to monetary tightening in order to bring inflation under control. Hikes in policy interest rates in the early 1980s immediately increased the burden of external debt of DCs as rates on outstanding loans were swiftly adjusted. At the same time commodity prices and export earnings faltered with the US recession triggered by contractionary monetary policy. The combination of increased debt burden and reduced capacity to service it resulted in arrears and a sharp cutback in bank lending, forcing many debtor countries to generate trade surpluses and make net

[87] For a further discussion of previous post-war cycles in capital flows to DEEs, see UNCTAD TDR (2003) on which this section draws.

transfers abroad through cuts in investment, imports and growth. The result was a debt crisis and a lost decade for many DCs, notably in Latin America.

The second boom came after almost 10 years of interruption of access of most countries in the developing world to international financial markets (Charts 4.1 and 4.2). Once again it was associated with rapid expansion of liquidity and large cuts in interest rates in the US and Japan. The US had entered the 1990s with a recession which had been deepened by a banking and real estate crisis (the so-called Savings and Loans crisis) in the previous decade. The response was a sharp reduction in interest rates which allowed domestic debtors to refinance debt at substantially lower rates and banks to build up capital by arbitraging between the Fed and the Treasury and riding the yield curve. Japan also engineered a massive liquidity expansion in response to a recession brought about by the collapse of stock and property market bubbles in the late 1980s. The surge in capital inflows was also greatly encouraged by the success of the Brady Plan for sovereign debt restructuring in Latin America and rapid liberalization in many DEEs. This time Latin America, East Asia and CEEs all received large amounts of foreign capital.

During this second post-war boom, net private capital flows to DEEs were determined mainly by inflows – there were effectively no outflows until the second half of the decade (Chart 4.3). A higher proportion of inflows were in direct investment, notably due to the acquisition of existing firms, and portfolio equity than in the first boom of the 1970s. These were often attracted by privatization programmes and prospects of quick capital gains in stock markets rapidly opened up to foreigners and sharply lifted by increased confidence resulting from neo-liberal policies, particularly in Latin America and CEE.

Despite a crisis in Mexico in 1994 brought about by an unexpected increase in the US interest rates and political uncertainty, the generalized boom in capital inflows continued, but shifted to East Asia. Net private capital flows peaked in 1995 before ending with the Thai crisis in July 1997 which spread to several countries in the region. They plummeted as a result of a cut-back in international bank lending and a sharp drop in portfolio inflows. The East Asian crisis was followed by a series of crises in several other emerging economies including Brazil and Russia in 1998, Turkey in 2000-01 and Argentina in 2001-02.

Chart 4.1.a: Real net private capital flows to DCs, 1971-2009
(Billions of dollars)

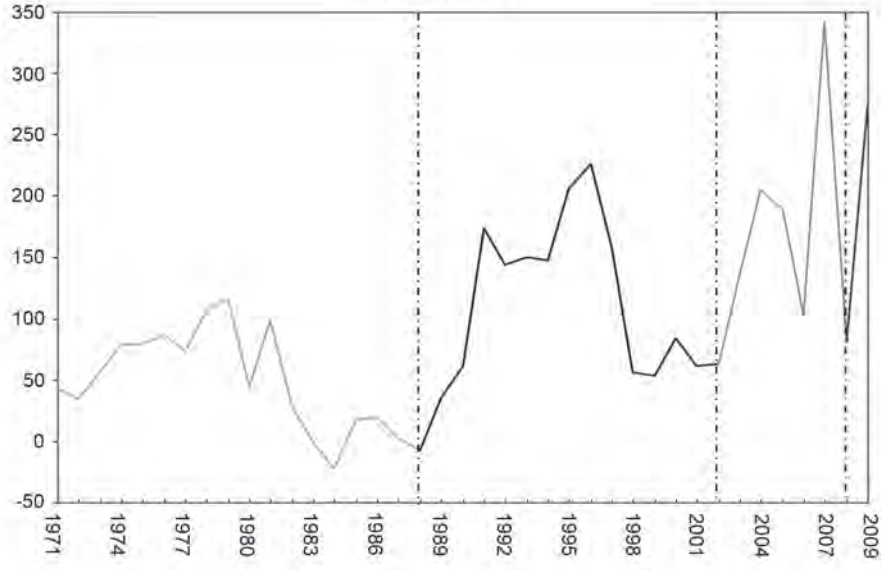


Chart 4.1.b: Net private capital flows to DCs, 1971-2009
(Per cent of GDP)

Source: IMF, *WEO,* 2010 database, *IFS*; UNCTAD, *Trade and Development Report 2003.*
Note: Real flows are nominal flows adjusted for changes in the United States GDP deflator.

While the nature, composition and destination of capital flows varied between these two post-war cycles, there were also important similarities. In both episodes booms were associated with a rapid expansion of liquidity and low nominal and real dollar interest rates. Again both booms ended under tightened financial conditions in the US, including higher interest rates and a stronger dollar. In the first cycle the US Treasury Bill rate more than tripled and the dollar started to appreciate rapidly in the early 1980s. In the second cycle US interest rates during 1997-98 were around 200 basis points higher than their levels at the beginning of the surge in capital inflows. Similarly, the nominal effective exchange rate of the dollar appreciated by more than 20 per cent between 1992-93 and 1997-98.

In both episodes, rapid shifts in market assessments of borrowers' risk-return profiles and loss of appetite for risk played a key role in the reversal of capital flows. Deteriorations in macroeconomic and external positions of recipient countries no doubt influenced the rapid turnarounds in the willingness of international lenders and investors to maintain exposure. In the first cycle, increased payments difficulties were largely the outcome of external shocks caused by a sudden shift in US monetary policy. In the second cycle reversals of capital flows were often associated with a deterioration of the external positions of the recipient countries, but in most cases this resulted mainly from the effects of capital flows themselves. And East Asian countries faced rapid outflows despite strong macroeconomic fundamentals and fiscal discipline.[88]

C. CAPITAL FLOWS IN THE 2000s

1. The third post-war boom

The third boom in private capital inflows started in the early years of the new millennium. Again it was triggered by exceptionally low interest rates and rapid expansion of liquidity in major AEs – factors that subsequently led to the most severe post-war global financial crisis and economic contraction. The US Fed

[88] In East Asia, deteriorations in current accounts were partly due to external factors affecting competitiveness and exports, such as the entry of low-cost producers and terms-of-trade losses. For the East Asian crisis, see UNCTAD TDR (1998) and for a comparative analysis of the East Asian, Russian and Brazilian crises, see UNCTAD TDR (1999).

responded to the bursting of the dot-com bubble and the sharp fall in equity markets by bringing policy rates to historical lows for fear of asset deflation and recession. The policy of easy money and low interest rates was also mirrored in several other AEs. Interest rates in Japan were brought down to almost zero as a result of efforts to break out of deflation. Even the otherwise conservative European Central Bank joined in and brought interest rates to unusually low levels.

The surge in private capital inflows was also helped by the willingness of surplus DEEs to invest in official reserves, mainly the US Treasuries. DEEs as a group started running growing current account surpluses thanks to the strong export performances of China and a few smaller East Asian economies and oil surpluses of fuel exporters (FEs). China has had twin surpluses in its current and capital accounts since the beginning of the decade, investing both of them fully into reserves, mostly in dollars.[89] About two-thirds of oil surpluses of FEs earned after 2002 went into reserve accumulation and the rest was used for FDI and portfolio investment, rather than being recycled through international banks as in the 1970s. Large acquisitions of US Treasuries by China and FEs helped to keep long-term rates relatively low even as the US Fed started to raise short-term rates.[90] Thus, while growing US external deficits were being financed "officially" there was plenty of highly leveraged private money searching for yield in DEEs. A mutually reinforcing process emerged between private flows to DEEs and official flows to the US – the former were translated into reserves in DEEs and constituted an important part of official flows to the US which, in turn, supported lower rates there and private flows to DEEs.

Both net inflows and net flows to DEEs peaked in 2007 before the outbreak of the subprime debacle (Table 4.1, Charts 4.2 and 4.3).[91] There was a moderate decline in net flows in 2006 compared to the previous year, due to a global sell-off in May-June, triggered by concerns over accelerating inflation and prospects of rising interest rates in AEs (Upper and Wooldridge 2006).

[89] Here capital account surplus is used in the conventional sense; that is, surplus on non-reserve financial account.

[90] Bernanke (2011) argues that not only *net* capital inflows from surplus DEEs but also *gross* capital inflows from Europe, leveraged by issuing sovereign debt and bank deposits, raised net demand for safe US assets and brought down long-term rates.

[91] Capital flows in Chart 4.3 also include official flows. These are included mainly among "other investment." Net official flows to DEEs were negative until 2009.

Chart 4.2.a: Real net private capital flows to DEEs, 1980-2009
(Billions of dollars)

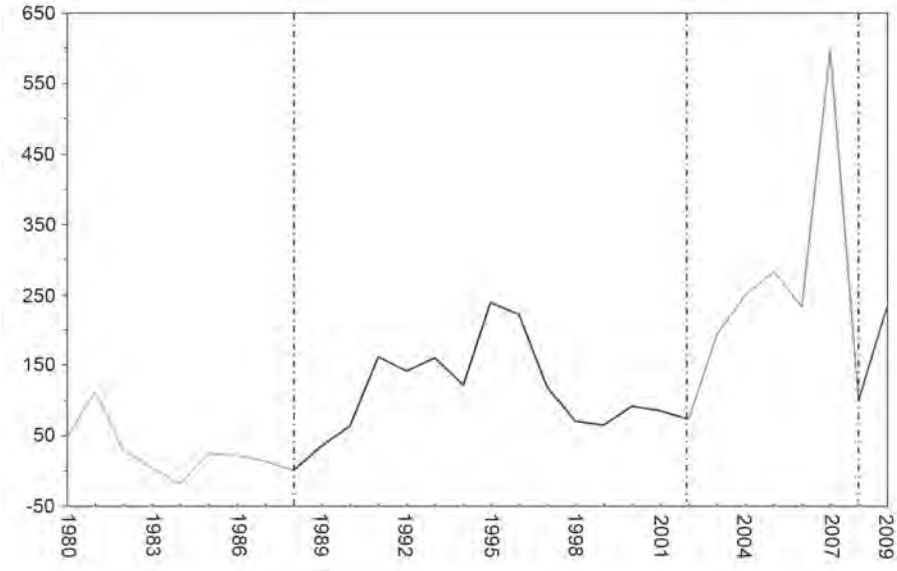
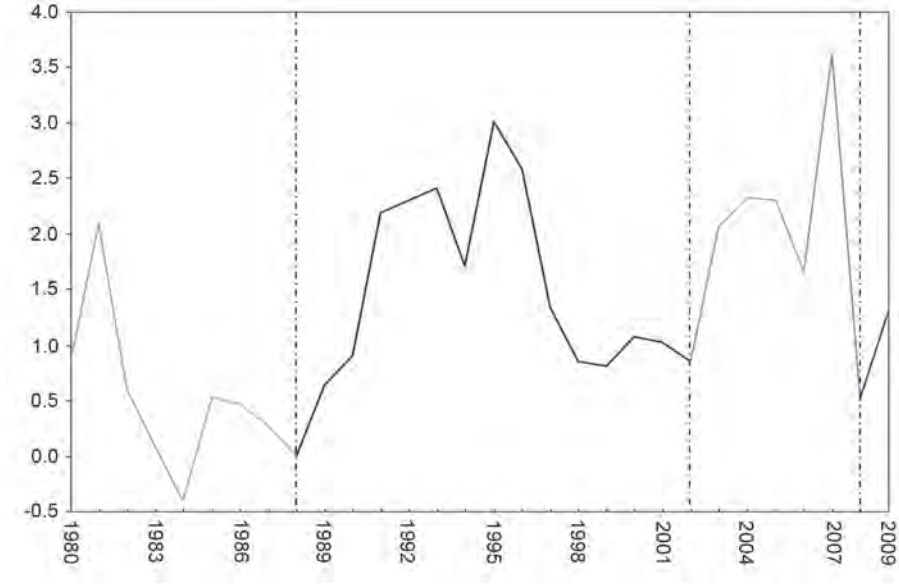


Chart 4.2.b: Net private capital flows to DEEs, 1980-2009
(Per cent of GDP)



Source: IMF, *WEO,* 2010 database.

Note: Real flows are nominal flows adjusted for changes in the United States GDP deflator.

For the first time after the 1997 crisis East Asian DEEs saw a synchronized withdrawal of residents and non-residents from stock markets, but the amounts involved were quite small. This was followed by a massive surge in net private inflows to all regions which continued in the early phases of the subprime debacle, until the collapse of Lehman Brothers in September 2008.

FDI in DEEs increased rapidly with the acceleration of growth in these countries, but an important part of the increase in inflows was in portfolio investment. Lending attracted by carry-trade profits due to large interest rate differentials with major AEs, notably the yen carry-trade, played an important part, of which highly leveraged hedge funds were among the main beneficiaries. Many unleveraged Japanese investors and funds and individuals ("Mrs Watanabe") also joined in the search for yield in conditions of near-zero interest rates and stagnant equity prices in that country. Such inflows into target countries such as Brazil and Turkey with much higher interest rates often led to appreciations of their currencies, thereby raising the return on arbitrage capital. Short-term money was also attracted by prospects of currency appreciations in countries such as China where interest rates were relatively low.[92] Favourable interest rate differentials and upward pressures on currencies made a major contribution to growth in private borrowing abroad, including by banks in several DEEs in order to fund domestic credit expansion.

[92] The Chinese yuan appreciated by some 12 per cent in the first half of 2008, providing a very attractive return for investors leveraged in dollars – see IIF (October 2008). According to SAFE (2011), net "hot money" flows seeking such quick profits amounted to $57 billion in 2007, rising to $76 billion in 2010.

Table 4.1: Private capital flows to emerging economies
(Billions of dollars)

	2003	2005	2007	2008	2009	2010
Net Private Inflows	**280**	**642**	**1285**	**594**	**602**	**908**
Equity	185	360	597	422	475	550
Direct Investment	137	289	500	509	322	350
Portfolio Investment	48	71	97	-86	153	199
Private Creditors	95	282	688	172	127	358
Commercial Banks	24	189	451	29	-15	164
Non-banks	71	93	237	143	142	194
Net Private Outflows	**-143**	**-497**	**-825**	**-772**	**-527**	**-500**
Equity Investment	-46	-89	-277	-229	-258	-270
Resident Lending/Other	-97	-407	-547	-544	-269	-230
Net Private Flows	**137**	**145**	**460**	**-178**	**75**	**408**

Source: IIF, October 2010 and January 2011.

The surge in capital inflows was accompanied by rapidly narrowing spreads on emerging-market debt. The average spread, which had reached 1400 basis points after the Russian crisis and fluctuated between 600 and 1000 basis points during the early years of the millennium, fell constantly from mid-2002 onwards, coming down to 200 basis points in the first half of 2007 before starting to edge up with the outbreak of the subprime crisis. As noted by the IMF GFSR (2004: p. 66), "liquidity and an increase in risk appetite [were] relatively more significant influences on spreads than fundamentals in the emerging market debt rally that began in late 2002." Indeed most DEEs enjoyed the increased risk appetite and shared in the boom in capital inflows irrespective of their underlying fundamentals. During 2002-07 the emerging economies of CEE received as much foreign private capital as Asian DEEs even

though their total income was one-fifth of the total income of Asia and their economic performance was not as impressive.

2. The Lehman collapse and contraction in capital flows

Private capital inflows to DEEs held up initially despite growing strains in credit and asset markets in the US and Europe triggered by the subprime debacle. However, with the collapse of a number of leading financial institutions in the US, notably Lehman Brothers, the boom came to a halt in the second half of 2008. Net portfolio equity and debt inflows and net commercial lending all collapsed, turning negative in the course of 2008-09 as non-residents pulled out of equity and bond markets and international banks cut lending. Total net private inflows were more than halved but resident outflows proved to be more resilient. Consequently, there was a massive drop in net flows from the peak reached in 2007 (Table 4.1, Charts 4.2 and 4.3).

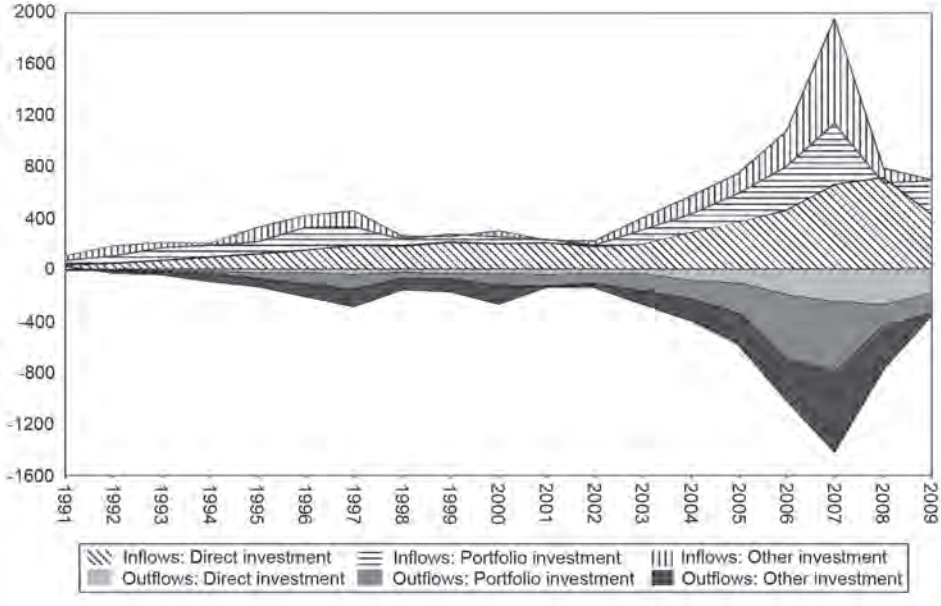
There were many reasons for this sudden stop and reversal. First, the rapidly growing volatility in financial markets led to extreme risk aversion on the part of international lenders and investors, increasing significantly the risk component of assets held. Before the outbreak of the crisis, premiums on credit default swaps (CDS) were exceptionally low, remaining below 200 basis points for most DEEs. They started to shoot up at the end of August 2008 with increases reaching, on average, almost 600 basis points for Latin America and CEE. Similarly the average EMBI Global Yield Spread rose from some 170 basis points at the end of 2006 to over 720 basis points at the end of 2008.[93] These resulted in a narrowing of the margin of return over risk on arbitrage money, thereby triggering a rapid reversal of carry-trade and flight to safety into US Treasuries.

Exit from DEEs was also encouraged by the introduction of extensive government guarantees on bank deposits and other liabilities in some AEs. Global deleveraging by highly indebted investors, tightened liquidity constraints and higher margin calls added momentum to the exit while falling commodity prices led to a rapid decline of investment in commodity-dependent economies. Foreign bank subsidiaries in some DEEs also funded their parent banks during the crisis in order to strengthen their liquidity and overall financial positions (BIS 2010c). Finally, as it became clear that DEEs would not be decoupled

[93] On emerging market spreads, see IMF GFSR (April 2009) and BIS (2009).

Chart 4.3: Capital flows to DEEs: Composition of net inflows and net outflows, 1991-2009[a]

(Billions of dollars)



Source: IMF, *GFSR* various issues, and *IFS*.

a: Includes official flows.

from the difficulties in AEs and growth prospects were subdued almost everywhere, there was not much appetite for equity investment.

Increased international financial instability and sharp declines in risk appetite also gave rise to an appreciation of the dollar vis-à-vis other major currencies, notably the euro, even though the US was at the centre of the crisis. The US Treasury Bills provided a safe haven and the reversal of carry-trade benefited the dollar. The surge in dollar funding costs and currency mismatches in the balance sheets generated by losses on dollar securities also added to the demand for dollar assets (McCauley and McGuire 2009).

3. *The current boom*

Both the strength of the dollar and the contraction in capital inflows to DEEs were short-lived. The dollar started to weaken during the first half of 2009. Simultaneously private capital inflows to DEEs started to recover, led by portfolio equity while FDI inflows remained weak. Asia, particularly China, has been receiving a larger share of inflows than other regions. According to IMF estimates, after falling from $1720 billion in 2007 to $820 billion in 2008 and $535 billion in 2009, inflows would reach $760 billion in 2011.[94] Current estimates put net inflows at 4 per cent of GDP of DEEs, compared to 6 per cent during the pre-Lehman boom (IMF GFSR January 2011). Again, according to the latest estimates by the IIF (January 2011), net private flows to the 30 most important emerging economies are now very close to the peak reached in 2007 (Table 4.1). Spreads on emerging-market sovereign debt have also declined sharply – in the first months of 2011 they were about one-third of the level reached after the collapse of Lehman Brothers in 2008.

As in previous episodes, a key factor in the current boom in capital flows is a sharp cut in interest rates and rapid expansion of liquidity in major AEs, notably the US. This was first done in a coordinated way, agreed in the April 2009 G20 summit in London as a countercyclical response to the crisis. In the US recovery started in summer 2009 but the strong growth of close to 4 per cent in the first quarter of 2010 was followed by deceleration to less than 2 per cent in the second quarter. The response of the Fed was to initiate another round of quantitative easing through purchases of long-term Treasuries and other securities. Although the declared objective was to stimulate private spending by lowering long-term rates and raising asset values, this move has also been widely seen as an effort to weaken the dollar and stimulate exports. It was followed by a similar plan in Japan to stem the ongoing upward pressure on the yen. Similarly, while major countries in the eurozone have started fiscal tightening to calm markets about sovereign debt difficulties, injection of large-scale liquidity has continued to support troubled governments.

However, rapid expansion of liquidity has not been translated into a significant increase in private lending and spending in the US because of problems on both the supply and demand sides of the credit market. As uncertainty about recovery and stability has continued unabated, banks have not been willing to

[94] IMF WEO (October 2010). These do not include inflows to NIEs.

lend to private sectors but simply cash in the differentials between short and long rates and look for profit opportunities abroad. Similarly, overburdened with debt, consumers have not been keen on borrowing and spending while, in the face of relatively stagnant consumer markets, firms have not had much incentive to continue investing and stockpiling which they had started earlier on. As a result, excess liquidity has spilled over globally in a search for yield in DEEs and this has put many of them on the defensive, in response to what is widely seen as a competitive devaluation by the US.

A key factor in the post-Lehman surge in capital inflows to DEEs is their significantly better growth performance and prospects than AEs. On the other hand, although policy interest rates in many major DEEs were initially brought down in response to fallouts from the crisis, the arbitrage gap has widened as they started to increase them in 2010 while rates in AEs have continued unchanged at very low levels. As a result, carry-trade has been re-established and key emerging economies with high interest rates such as India and Brazil have become the main targets (IIF October 2010). Low interest rates in the US, together with the ongoing weakness of the dollar, made the dollar the new funding currency for carry-trade operations, replacing traditional carry-trade currencies such as the yen and the Swiss franc (BIS 2010b).

Furthermore, because of unprecedented difficulties encountered by large financial institutions in the US and Europe and increased public deficits and debt, the crisis has given rise to a durable shift in the perception of risks against investment in AEs in comparison with DEEs. Perhaps for the first time in post-war history, the risk margin between AEs and DEEs has narrowed because of increased risks of default on liabilities issued by public and private sectors in the former countries. A natural outcome is that DEEs now carry greater weights in the equity and bond portfolios of investors in AEs.[95] The reduced risk margins, together with increased interest rate differentials, have widened the arbitrage opportunities compared to the pre-Lehman boom, making carry-trade type of borrowing and lending even more attractive.

[95] The weight of emerging market equities in the All Country World Index of the MSCI (Morgan Stanley Capital International) rose from less than 5 per cent in 2003 to 13 per cent in 2009 and this is expected to increase further in coming years – see IIF (January 2011) and IMF GFSR (October 2010).

4. *Financial and commodity cycles in the 2000s*

Like capital flows to DEEs, commodity markets have shown considerable swings in the 2000s according to shifts in market assessment of risks and return. This is largely because these markets have rapidly become more like financial markets, with several commodities being treated as a distinct asset class and attracting growing amounts of money in search of profits from price movements (Domanski and Heath 2007; IATP 2008). During 2003-10 assets allocated to commodity index trading strategies are estimated to have risen from $13 billion to $320 billion and the number of outstanding contracts in commodity futures and options from 13 million to 66 million (Masters 2008; World Bank 2011a; BIS 2010b).

In various reports the US Senate Permanent Subcommittee on Investigations has described the disruptions caused by growing activities of index traders in commodity markets, including oil, natural gas and wheat, and how they have altered the traditional relation between futures prices and supplies (USSPSI 2006, 2007 and 2009). Evidence also suggests that the growing financialization has reduced the traditional segmentation of commodity markets resulting from the diversity of factors affecting real supply and demand for different products. There has thus been an increased correlation among commodities, particularly those subject to index trading, and synchronization of boom-bust cycles in various commodity markets (Tang 2011; Nissanke 2011).

The post-2000 swings in commodity markets show strong correlation with those in capital flows to DEEs and the exchange rate of the dollar (Charts 4.4 and 4.5). The evolution of the market value of equity of commodity-related companies and mutual fund investments in commodities also looks strikingly similar to the boom-bust cycles in capital flows to DEEs – after rising constantly they both declined in late 2008, but recovered rapidly afterwards (Oliver Wyman 2011). This is also true for the number of derivatives traded globally on commodity exchanges – after increasing constantly they fell in the second half of 2008 but recovered rapidly afterwards.

With rapid liquidity expansion and acceleration of growth in the global economy, both oil and non-oil commodity prices started to rise in 2003, gaining further momentum in 2006. The factors driving the boom included strong pace of activity in DEEs where commodity-intensity of growth is high, low

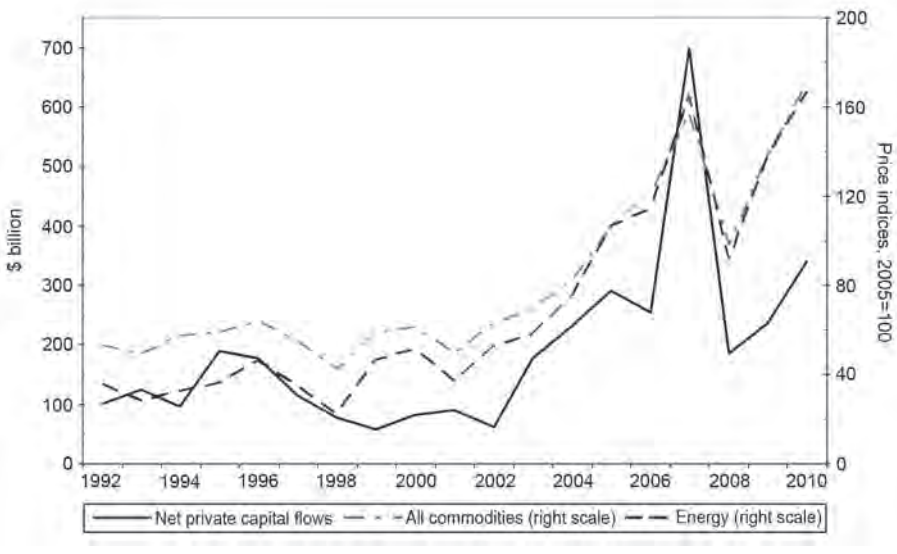
initial stocks, weak supply response and relatively weak dollar. In the case of food, diversion to bio-fuels, droughts, changing demand patterns in DEEs and high cost of fertilizers and transport due to high fuel prices played a role. The upward trend in prices also attracted index-based investments in commodity futures, creating bubble-like increases.[96]

Despite growing financial strains in the US during 2007 and much of 2008, index trading in commodity futures continued to increase during that period, contributing to the acceleration of commodity price increases. Prices reached a peak in July 2008 when investment in commodity futures reached an unprecedented $317 billion and the number of contracts in commodity derivatives 44 million and open positions rose rapidly (Masters and White 2009; BIS 2010b). However, they made a sharp downturn in August 2008, as investors pulled out large amounts of money from oil and non-oil futures, more or less at the same time as capital flows to DEEs were reversed and the dollar started to strengthen.

This boom-bust cycle in commodity prices in the middle of the subprime crisis was largely due to shifts in market sentiments. Initially, throughout 2007 and much of 2008, the subprime crisis was seen as a hiccup. It was not expected to generate a deep recession and a glut in commodity markets, particularly since DEEs were generally believed to decouple from the difficulties in mature markets. The downturn in economic activity was expected to be short, followed by a rapid and robust recovery. The IMF was quite optimistic, downplaying the difficulties (see Chapter 5). In fact it revised its growth projections upwards during early Summer 2008, expecting the global economy to grow by 3.9 per cent in 2009, AEs by 1.4 per cent and DEEs by 6.7 per cent, compared to what turned out to be -0.6 per cent, -3.2 per cent and 2.5 per cent, respectively (IMF WEO Update, July 2008). However, with the mounting financial difficulties in the US and the collapse of Lehman Brothers, sentiments turned sour. Almost simultaneously there was a rapid exit of capital from commodities and DEEs, and a flight to safety to the dollar. By the end of October 2008, food was 27 per cent and oil 45 per cent below their peaks.

[96] Examining the empirical evidence, Gilbert (2010) concludes that during 2006-08, index-based investment in commodity futures may have been responsible for a significant and bubble-like increase of energy and non-ferrous metals prices, although the estimated impact on agricultural prices is smaller.

Chart 4.4: Net private capital flows to DEEs and commodity prices, 1992-2010



Source: IMF, *WEO*, 2010 database.

Chart 4.5: Commodity prices and the dollar [a]

(Index numbers, 2005=100)

Source: BIS (nominal effective exchange rate; left scale) and IMF (commodity prices; right scale).

a: Nominal effective exchange rate.

The post-Lehman upturn in commodity prices also coincided with the recovery of capital flows to DEEs and the decline of the dollar. Non-oil commodity price index rose by some 25 per cent and oil by 28 per cent in 2010 and they are expected to increase further in 2011. Strong growth in DEEs, notably in China, has been a major factor. There have also been shortages in some commodities such as grains due to adverse weather conditions in several countries. At the beginning of 2011 food prices have reached historical highs. Political unrest in the Middle East and North Africa has also been pushing up oil prices further, including oil futures, due to concerns over supply disruptions.

Index trading has played an important part in the post-Lehman rise in commodity prices. After falling in late 2008 and early 2009, it started to gain momentum as commodity prices turned up in spring 2009 as a result of increased demand from DEEs in conditions of continued expansion of liquidity, historically low interest rates and limited investment opportunities in AEs. Investment in commodities reached $320 billion in mid-2010, a figure last seen during July-August 2008, when commodity prices peaked while the number of exchange traded options and futures rose to unprecedented levels (World Bank 2011a; BIS 2010b). Thus, very much like capital inflows to DEEs, the current boom in commodity prices is driven not only by fundamentals of real supply and demand but also by strong speculative elements.

The parallel movements in capital flows, commodity prices and the dollar are due not only to common influences regarding overall market assessment of risks and return and global liquidity conditions. They are also directly linked. A weaker dollar often leads to higher commodity prices because, *ceteris paribus*, it raises global demand by lowering non-dollar prices of commodities. On the other hand, changes in commodity prices have a strong influence on capital inflows to commodity-rich DEEs. As already noted, declines in commodity prices after summer 2008 triggered exit of capital from such economies. Similarly, the current boom is an important factor in the surge in capital flows to commodity-rich economies in Latin America, Africa and the CIS. This is not limited to oil and minerals. With increased interest in bio-fuels and hikes in food prices, acquisition of farmland in DEEs has become an attractive form of investment. In Africa alone, such deals made throughout 2009 are estimated to have reached 56 million hectares before the year ended (World Bank 2011b).

D. THE CHANGING NATURE OF CAPITAL FLOWS

In comparison with previous cycles, private capital flows to DEEs now manifest certain distinct features regarding their destination, size and composition. They are now more synchronized across countries than in the past. The amounts involved are much higher. They are no longer unidirectional, from AEs to DEEs – there are significant resident outflows from DEEs and capital flows among DEEs have been growing rapidly. Finally, the composition of inflows has shifted significantly towards domestic-currency instruments of recipient DEEs, including highly volatile portfolio equity investment – described as the "canary in the coalmine in emerging market capital flow cycles" (IIF October 2009: p.10) – and carry-trade style borrowing, lending and investment. All these have significant implications for the impact of fluctuations in capital flows on DEEs and the nature of their exposure to the risk of instability and crises.

First, both pre- and post-Lehman booms and the brief contraction during 2008-09 affected all major DEEs. By contrast, mainly the Latin American DCs were involved in the first boom-bust cycle starting in the late 1970s. In the second cycle the surge in capital flows was regionally concentrated, first in Latin America and then East Asia and CEE. The recent synchronization of expansion and contraction of capital flows across all major emerging economies is largely due to liberalization of international capital flows and increased financial investment opportunities in a wider range of DEEs.

Second, in previous booms all major recipient countries were running current account deficits and using net capital flows mainly to meet external shortfalls. By contrast, recently DEEs have been receiving large amounts of foreign capital even though as a group and for several countries individually they do not need them for external financing. The twin surpluses on the capital and the current accounts of DEEs, which together reached 8 per cent of their GDP in 2007, were fully recycled back to AEs as investment in international reserves, which recorded an increase of over $1.3 trillion in 2007.

Third, the amounts involved are now much larger. In real terms the peak reached in 2007 in net private capital flows was more than five times the peak reached in 1981 during the first cycle and 2.5 times the peak reached in 1995 during the second cycle. Now the swings in net private flows are also more pronounced. As a proportion of GDP, the drop in net private capital flows to DEEs was around 2.0 per cent during the first cycle and 2.5 per cent in the

second cycle compared to 3.6 per cent during the Lehman collapse. However, in the latter case the downturn was short-lived.

Fourth, recent years have also witnessed significantly increased two-way traffic in capital flows between AEs and DEEs (Chart 4.3). The resident outflows from DEEs, which barely existed two decades ago except in the form of illegal capital flight, have been growing rapidly and net inflows now exceed net flows by a growing margin. In the pre-Lehman boom, net inflows rose by around $1600 billion between the late 1990s and 2007 while net flows increased by only $600 billion and the difference was accounted for by outflows. The current boom is also seeing rapid increases in both net inflows and net outflows. In other words, an important part of net private inflows are now leaking abroad through net private acquisition of foreign assets by residents, rather than used for external financing or invested in reserves.

Two factors have played a key role in increased capital outflows from DEEs. First, foreign presence in DEEs has been growing rapidly through new investment and asset acquisition. The stock of inward FDI in DEEs increased more than nine-fold between 1990 and 2009 while the accumulated stock of capital inflows to DEEs rose from under 10 per cent of their GDP to around 45 per cent during the same period (UNCTAD WIR 2010; IIF January 2011). When foreign companies and individuals take residence in DEEs, their cross-border transactions are treated and recorded in much the same way as those of the nationals of these countries, even when they are special purpose entities and legal structures established simply for holding assets with little or no physical presence.[97] Since these are engaged in international transactions to a greater extent than the nationals of DEEs, their increased presence results in greater outflows of capital. On the other hand, since increased foreign presence is the outcome of growing capital inflows, there is an intricate link between capital inflows and outflows.

The second factor is liberalization of outward investment in DEEs. Many rapidly growing large DEEs have been encouraging national firms to expand their global outreach and become important players in world markets not only through exports but also through direct investment abroad. It is estimated that total FDI outflows from DEEs was close to $300 billion during 2008, or over 18 per cent of total global FDI, compared to the previous peak of

[97] In balance-of-payments statistics the residence of each institutional unit is defined as the economic territory with which it has the strongest connection. For the concept of residence, institutional units and economic territory, see IMF (2010a).

$99 billion in 2000 and some $4-5 billion in the mid-1980s (UNCTAD WIR, various years). Much of these came from China (some $110 billion, including Hong Kong and Taiwan Province), Russia ($55 billion) and Brazil, Korea and India (around $20 billion each). Investors from smaller economies such as Chile and Malaysia have also started to expand their activities globally. An important part of outward investment by large firms in DEEs is in cross-border acquisitions. The companies involved are often owned or controlled by the state, including sovereign wealth funds. Their investment is usually driven by strategic considerations rather than quick windfall profits (UNCTAD WIR 2010). Assets acquired abroad by China and Russia are financed from current account surpluses while in Brazil, India and Korea where the current account is balanced or in moderate deficits, outward investments are funded mainly by net private capital inflows – that is, they are leveraged.

Recent years have also seen a rapid increase in outward portfolio investment by the residents of DEEs. In some countries restrictions on this have been relaxed in an effort to ease the upward pressure on currencies during surges in capital flows. This, rather than control over inflows, was the response of several Asian countries, including China, India, Korea, Malaysia and Thailand, to the pre-Lehman surge in capital inflows (Akyüz 2010a). Before the outbreak of the subprime crisis, portfolio outflows from DEEs reached twice the level of FDI outflows, matching or exceeding portfolio inflows (Chart 4.3).[98]

Fifth, capital flows among DEEs have also been increasing significantly. There has been a certain amount of intra-regional carry-trade activity in Latin America and CEE where funds borrowed in low-interest currencies are invested in the same region in higher-interest currencies. However, a very large proportion of South-South capital flows have been in direct investment and much of these are intra-regional. On some estimates, in 2007 about 94 per cent of South-South FDI in Latin America was in the region and this figure was 77 per cent in South-East Asia and 55 per cent in East Asia (Giroud 2009; UNCTAD WIR 2006; and Rajan 2010). China has become a major investor in other DEEs, particularly in commodity sectors in an effort to provide a reliable supply of energy, minerals and other key commodities. A number of Indian transnational companies have also become active in other DEEs as part of their drive to place themselves on the world stage. Again companies in some NIEs (such as POSCO in Korea) are now investing in other DEEs. South Africa

[98] This is why net portfolio flows during the pre-Lehman boom were relatively weak, barely higher in 2007 than the peak reached during the previous boom of the 1990s – see IIF (October 2008).

has become an important investor in Sub-Saharan Africa, particularly southern Africa.

Sixth, the nature of net external liabilities of DEEs has also undergone a significant transformation. Until recent years external liabilities of DEEs were denominated largely in foreign currencies for two main reasons. First, with few exceptions, portfolio equity inflows were limited as stock markets were underdeveloped and/or closed to foreign investors. Second, DEEs were generally unable to borrow in their own currencies. Typically, they borrowed short-term in foreign currency and this exposed them to both exchange rate and interest rate risks, making them more susceptible to balance-of-payments and financial crises than major mature economies.[99]

The composition of external liabilities of DEEs has started to change in favour of domestic currencies in the past decade. First, with the opening of stock markets and generous incentives for FDI, a growing part of capital inflows has been in equity investment. Second, with stronger payment positions the need of DEEs for foreign-currency debt has diminished and the debt of DEEs to non-residents is increasingly denominated in domestic currencies. As a result, the share of direct plus portfolio investment in total inflows to DEEs has been rising; in the pre-Lehman boom these two accounted for about 70 per cent of total inflows compared to some 40 per cent during the 1990s.

International bond issues in domestic currencies by DEEs have been limited in recent years because public and private sectors in many developing countries still cannot issue such debt and others who are in a position to do so have little need for it. However, there has been a rapid increase in local-currency debt issues by government and corporate borrowers in emerging economies, from some $92 billion in 2003 to $437 billion in 2010, and a growing number of countries have allowed non-residents to acquire domestically issued public and/or corporate debt.[100] Although there are no comprehensive statistics on the extent to which such debt is held by non-residents, available evidence suggests that in recent years debt-related flows "have become increasingly dominated by local market instruments, with creditors eager to take both currency and

[99] For this so-called problem of original-sin, see Eichengreen and Hausmann (1999).

[100] It is reported that of this $437 billion, $172 billion was due to China, $101 billion to Korea and $36 billion to India – see Curran (2011). Of these countries the Chinese market is largely closed to foreigners but the Korean market is wide open – see Lee (2010). In India foreigners are given incentives to enter the corporate bond market.

interest rate risk."[101] This is also suggested by the rapid growth of carry-trades. Again, a growing proportion of operations of foreign banks in DEEs are now concentrated in local-currency lending, often funded externally (see Jara, Moreno and Tovar 2009 for Mexico). These banks have become major players in the domestic financial markets of most emerging economies. By the end of 2008, total lending by foreign banks and their affiliates in DEEs exceeded $1,500 billion in emerging Asia, $900 billion in emerging Europe and $800 billion in Latin America (BIS 2010c).

Finally, the growing importance of portfolio inflows has increased the presence of non-residents in the securities markets of DEEs. In some Latin American and European emerging economies, the share of non-residents in actively traded shares has come to exceed that of residents. Even many Asian economies with stricter conditions of access have seen rapid growth of foreign presence in their markets. At the end of 2007, the stock of portfolios held by the residents of AEs in Asian DEEs was about 25 per cent of the GDP of these economies (Balakrishnan *et al.* 2009). In Korea, non-resident holding of equities reached almost one-half of market capitalization (McCauley 2008). In China foreign share as a percentage of market capitalization increased from 2.5 per cent in 2001 to 23.2 per cent in 2006 and in India from 6.6 per cent to 10 per cent in the same period (BIS 2009). The share of non-residents in long-term local-currency-denominated bonds rose in Indonesia and Malaysia to reach 15-20 per cent in 2007 (World Bank 2009b).

The presence of investors from DEEs in the equity and bond markets of AEs has also been increasing as a result of rapid growth of portfolio outflows. The two-way traffic in private capital flows and increased presence of AEs and DEEs in each other's markets are likely to continue in the coming years. On the one hand, as noted, the shift in risk perceptions against mature markets has increased the weight of DEEs in the bond and equity portfolios of investors in

[101] IIF (October 2008: p. 6). For the reduced reliance on external financing in both public and private sectors and the shift towards domestic currency debt in Latin America, see Jara and Tovar (2008). By contrast, examining the surveys conducted by the US Treasury on bonds held by US investors, Hausmann and Panizza (2010) argue that investors in the US remain unwilling to take currency risk by increasing their exposure to domestic currency bonds traded in local markets. They, however, note that US investors' holding of bonds issued by the residents of DCs almost doubled between 2003 and 2007. This is likely to have increased further after 2008 when the dollar became more prominent in carry-trade.

AEs, and reallocation is likely to continue unless held back by financial instability and crises in some major DEEs. On the other hand, with continued inflows and upward pressure on their currencies, DEEs can be expected to continue to ease restrictions on outward investment in the near future, allowing their residents to diversify equity and bond portfolios globally.

E. CHANGING VULNERABILITIES TO BOOM-BUST CYCLES

These changes in the nature and composition of capital flows have important consequences for the sources of vulnerability of DEEs to boom-bust cycles. Exposure to the risk of instability and crises generally results from macroeconomic imbalances and financial fragility built up during the surge in capital inflows mainly in three areas. First, surges in capital flows can produce or support unsustainable exchange rates and current account deficits. This is quite independent of the composition of capital flows. A surge in FDI would have the same effect on the exchange rate, exports and imports as a surge in portfolio investment or external borrowing.[102] If such imbalances are allowed to develop, sudden stops and reversals would produce sharp declines in the currency and economic contraction unless there are adequate reserves or unlimited access to international liquidity.

Second, financial fragility arises because of extensive dollarization of liabilities, and currency and maturity mismatches in balance sheets. This would be the case when borrowing is in foreign currency and short-term. When capital flows dry up and the currency declines sharply, mismatches could result in increased debt servicing difficulties and defaults.

Finally, capital surges can produce credit and asset bubbles. Credit expansion can occur when banks borrow abroad to fund domestic lending, currency market interventions cannot be fully sterilized or inflows lower long-term interest rates. The link between capital flows and asset markets strengthens with greater presence of foreigners in domestic markets. Not only portfolio investments but also many types of capital inflows that are traditionally included in FDI, such as acquisition of existing firms and real estate investment, can

[102] Of course FDI can directly lead to an increase in capital goods imports. Over time it may lead to export expansion or import substitution if it is greenfield investment in traded sectors.

create asset bubbles.[103] Reversal of capital flows could then create credit crunch and asset deflation with severe macroeconomic consequences.

The growing denomination of external liabilities of DEEs in their own currencies changes the nature of the risks associated with borrowing from non-residents. It no doubt reduces currency mismatches in balance sheets, which played a key role in most past episodes of crises in DEEs, and transfers the currency and interest rate risks to international lenders and investors. However, it also enhances the impact of instability in capital flows on domestic securities markets and increases the risk of exposure to international contagion. The exposure is also amplified by growing international portfolio diversification by the residents of DEEs through investment abroad. Indeed, evidence suggests that stock prices in DEEs are now closely correlated with net private capital flows, more so in Asia than in Latin America, and the correlation between global and emerging-market equity returns has been rising in recent years with increased two-way traffic in capital flows between emerging and mature economies (IIF October 2007; BIS 2007).

In previous booms it was the debtors who were highly leveraged, taking both currency and interest rate risks by borrowing short-term in foreign currencies. Now international lenders and investors have become highly leveraged by borrowing in their own currencies and investing in local currency instruments of DEEs. Thus, tightened credit conditions in AEs can lead to a rapid withdrawal by highly leveraged investors from DEEs, causing asset and currency declines, as observed after the collapse of Lehman Brothers. Furthermore, with increased foreign presence, domestic bond markets may no longer be relied on as a "spare tyre" for private and public borrowers and provide an escape route at times of interruptions to access to external financing (Jara, Moreno and Tovar 2009).

Still, on the basis of past experience, many DEEs consider that exposure to instability and crises associated with borrowing in local currency is considerably less serious than exposure resulting from liability dollarization that proved fatal during the 1997 crisis. Mitigating currency and maturity mismatches in financing is indeed one of the main rationales of the Asian Bond Market Initiative introduced by ASEAN+3 governments in 2003. The same

[103] The distinction between direct and portfolio equity investment is quite arbitrary and because of the way FDI is defined and recorded, it is not possible to identify the extent to which FDI really consists of investment in productive assets rather than in equity or debt instruments. For a discussion, see UNCTAD TDR (1999) and for the definition and coverage of FDI, see IMF (2010a).

considerations also explain why several other countries such as Korea are so keen on broadening foreign participation in bond sales as a way of cutting crisis risk (Seo 2011).

F. THE IMPACT OF RECENT CAPITAL FLOWS ON DEEs

In previous boom-bust cycles, surges in capital flows generally created imbalances in all the three areas noted above and in almost all major recipient countries. Consequently, sudden stops and reversals simultaneously gave rise to sharp currency declines, widespread debt servicing difficulties and defaults, and credit crunches and asset deflations. By contrast the surge in recent years did not always create imbalances in all these areas or in all major DEEs because of changes in the nature and composition of capital flows and differences in policy response. As a result, the impact of the reversal of capital inflows on DEEs after the Lehman collapse was a lot more varied than in the past.[104]

Generalized boom-bust cycles in capital flows are almost fully mirrored by movements of exchange rates of DEEs: rapid appreciations during surges followed by sharp declines with sudden stops and reversals. As seen in Chart 4.6, this pattern was clearly visible during the mid-1990s. The 2000s also saw a similar boom-bust cycle in the currencies of major DEEs, except that appreciations during the pre-Lehman boom went much further than those in the 1990s and the downturn during 2008-09 was much shorter.

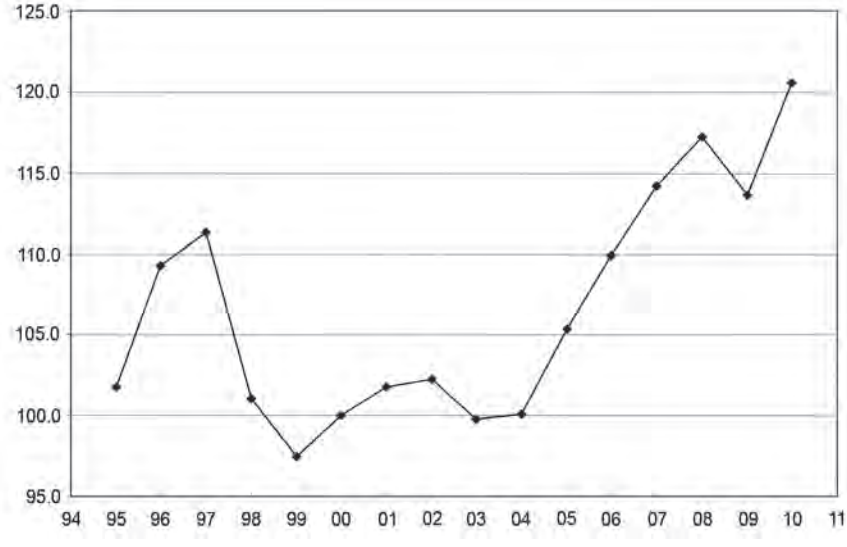
While all major emerging economies faced upward pressures on their currencies during the pre-Lehman boom, the extent of appreciations varied significantly depending on the policy response (Chart 4.7). Drawing on the lessons learned from the 1997 crisis, most East Asian countries avoided sharp appreciations, maintained strong current account positions and accumulated large stocks of international reserves as self-insurance. By contrast several emerging economies in Latin America and CEE saw sizeable appreciations, even though some of the Latin American countries intervened in foreign exchange markets and accumulated large stocks of reserves.[105] Every single emerging economy in CEE ran a current account deficit during 2002-07, with

[104] For a detailed account of the impact of the crisis on capital flows, financial intermediation and markets in major emerging economies and central bank response, see BIS (2010c).

[105] See Akyüz (2010b) for Asia and Jara, Moreno and Tovar (2009) for Latin America. See also UNCTAD TDR (2007), IIF (October 2007) and BIS (2007).

the average hovering around 6 per cent of GDP. This was also true for Turkey and South Africa; in the former country capital inflows added to deficits by leading to a sizeable appreciation. Brazil too experienced strong appreciations but managed to maintain its current account broadly in balance thanks to booming commodity prices.[106]

Chart 4.6: Emerging markets real effective exchange rate
(2005=100)



Source: IIF, October 2010.

Public borrowing in foreign currencies slowed almost everywhere, including in Latin America where governments traditionally relied on such financing, but there was a rapid growth in private borrowing in several DEEs. In Asia, private financial and non-financial corporations in India, Korea and the Philippines are known to have engaged in "carry-trade-style" short-term external borrowing, particularly through low-interest yen-linked loans.[107] In

[106] It is estimated, for Latin America as a whole, that terms-of-trade gains after 2002 improved the current account balance by some 4 per cent of GDP; see Jara and Tovar (2008).

[107] The corporate sector in India used significant foreign borrowings to fund expansion, including in foreign markets, while banks in Korea relied on global borrowing to fund credit-dependent household spending, pushing the loan-to-deposit ratio close to 120 per cent, the highest in the region – ESCAP (2010). For Korea, see also BIS (2009) and Lee (2010).

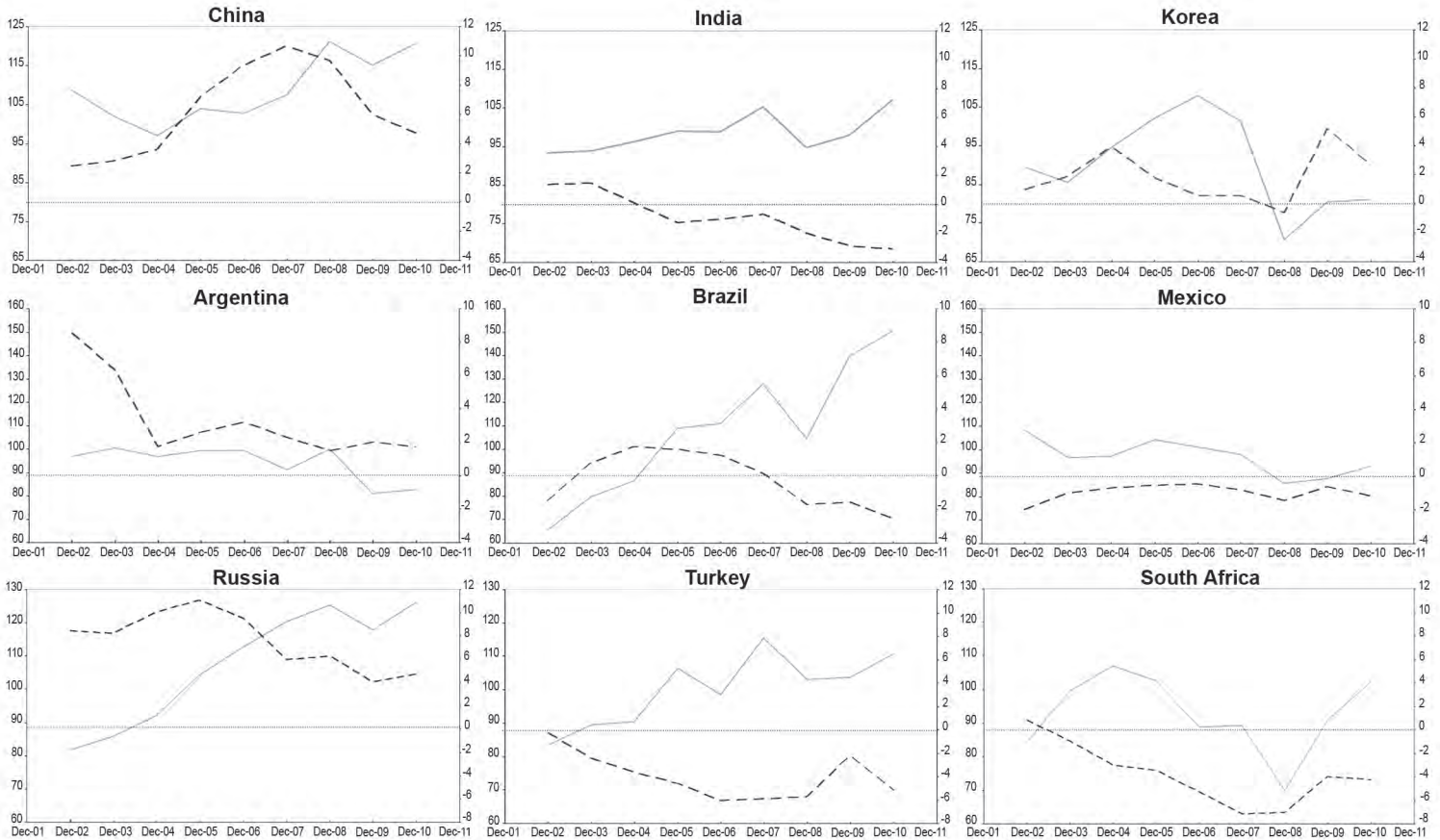
CEE, banks borrowed abroad in both short-term and long-term markets in order to fund domestic lending (IIF January 2009). In particular, foreign banks carried considerable currency mismatches in their balance sheets (BIS 2010c). In Latin America, the degree of currency and maturity mismatches in the corporate sector fell compared to the 1990s, but there was considerable off-balance-sheet foreign exchange exposure through derivative positions, notably in Mexico and Brazil (Jara, Moreno and Tovar 2009; BIS 2009).

During the pre-Lehman surge, domestic equity and bond markets in major DEEs also boomed (Charts 4.8 - 4.10). Rapid domestic credit expansion and low interest rates played an important role. As in mature economies, monetary policy was also highly expansionary and interest rates were low by historical standards. However, the surge in capital flows was part of the reason for the rapid expansion of liquidity since interventions in foreign exchange markets could not always be fully sterilized.

Equity prices in most emerging economies rose sharply between 2002 and 2007 in both dollar and local-currency terms. The increase was particularly strong in Brazil (by almost 10 times), China (6 times), India and Turkey (4.5 times). That such increases more likely reflected speculative bubbles than improvements in underlying fundamentals was cautioned by the IIF (March 2005: p. 4): "there is a risk that the pickup in flows into some emerging market assets has pushed valuations to levels that are not commensurate with underlying fundamentals." Some Asian countries, notably China and India, also experienced property bubbles because of cheap money, speculative purchases motivated by strong prices and increased foreign demand for commercial space (Akyüz 2010a).

With the global spread of the subprime crisis and flight to safety, there was a generalized downward pressure on the currencies of almost all DEEs (Kohler 2010). In the event, most saw declines, including those with strong payments and reserve positions. Among the major DEEs, India, Korea, Turkey and South Africa experienced heavy selling pressures and sharp declines. Brazil, Korea, Mexico and Singapore established or increased bilateral swaps with the US Fed, and some DEEs, including Mexico and Colombia, sought access to the newly established Flexible Credit Line at the IMF. Rapid exit of capital and falling exports entailed large reserve losses in India and Korea, while most countries facing strong trade shocks from the crisis welcomed the decline in their currencies and abstained from using their reserves to stabilize them. However, external adjustment proved highly deflationary in countries with large current

Chart 4.7: Real effective exchange rate (REER) and current account balances for selected DEEs, 2002-2010



Source: BIS, *real effective exchange rates database*, and IMF, *WEO*, 2010 database.

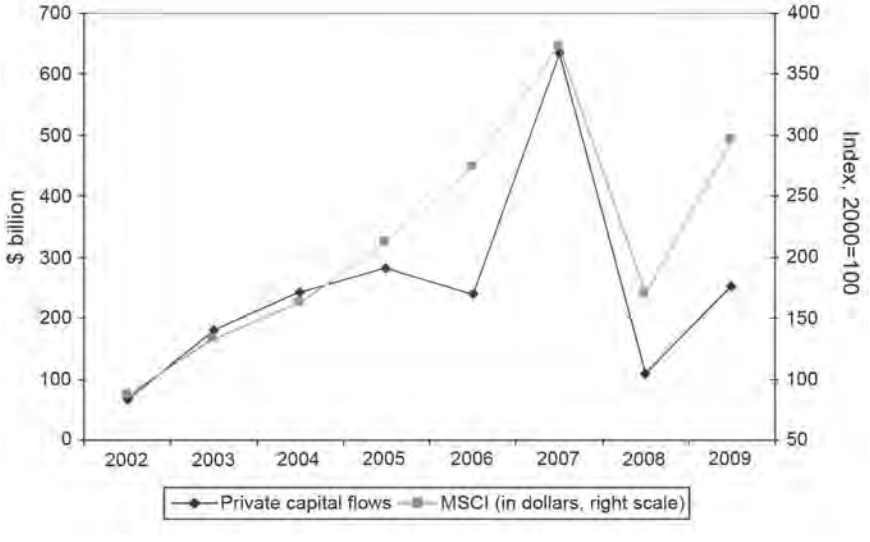
REER index (2005=100; left scale).

Current account balances as per cent of GDP (right scale).

account deficits. Even though many of these were less dependent on exports for growth and the trade shocks they received were less severe than in successful East Asian exporters, they experienced large drops in GDP, commensurate with losses incurred during the crises in the 1990s. Loss of growth could have been much greater should capital flows have failed to recover quickly in the course of 2009.

Equity markets of all major DEEs experienced heavy selling pressures after the Lehman collapse. Over 80 per cent of the gains enjoyed in equity markets during the earlier boom were lost in a matter of a few months. The property bubble in China came to an end with house prices falling in December 2008 for the first time for many years, forcing the government to take measures to revive the property market. In several other countries governments came to the rescue of the highly exposed private corporations having to repay maturing debt at a time when their access to international markets was curtailed. Central banks in Brazil, Mexico and Russia provided international liquidity from their reserves to keep them current on their payments to international creditors (IIF June 2009; BIS 2009). However, the impact of sharp currency declines on corporate solvency was generally small compared to the Asian crisis because of government support, limited exposure to currency risks and short duration of the decline in capital flows and currencies.

Chart 4.8: DEEs: Net private capital flows and equity market index



Source: IMF, *WEO,* 2010 database and MSCI.

With the recovery in capital flows from early 2009, the downward pressures on currencies were soon reversed and most of them have seen renewed appreciations (Charts 4.6-4.7). Several economies with relatively large and growing current account deficits, notably Brazil, India, Turkey and South Africa, have been appreciating faster than East Asian surplus countries – China, Korea, Malaysia, Thailand, the Philippines and Singapore.[108] Turkey and South Africa which had large and growing current account deficits during the pre-Lehman boom but saw these narrow significantly during the Lehman collapse are now witnessing widening deficits and strengthening currencies. This is also true for Brazil and India which had managed to maintain broadly balanced current account positions before the outbreak of the global crisis.

Equity markets recovered sharply from early 2009 and the MSCI index for emerging-market equities in local currency rose by about 60 per cent in 2009 and another 12 per cent in 2010. Increases were even faster in dollar terms because of currency appreciations – by 75 per cent and 16 per cent, respectively. However, there has been a softening of prices in the early months of 2011 as a result of increased concerns over inflation and the impact of consequent monetary tightening on growth in several major DEEs.

The combination of the surge in capital flows and rapid credit expansion resulting from a massive stimulus package adopted in response to fallouts from the subprime crisis has been overheating the Chinese economy, creating inflation in both property and product markets and posing the risk of a hard landing. There is a massive increase of foreign investment in property, with the share of FDI going into real estate rising from 10 per cent in 2006 to 23 per cent in 2010 (SAFE 2011). GDP growth was above 10 per cent in 2010, consumer prices were up by almost 5 per cent year on year in January 2011, producer inflation by 6.6 per cent and property prices by 10 per cent, forcing the government to take measures to tame commodity and housing prices and to cool the economy (Xinhuanet 2011). Interest rates were raised three times after October 2010 and reserve requirements twice during the first two months of 2011. Fears of accelerating inflation and slowing growth appear to have moderated portfolio equity inflows in recent months and equity prices are now some 30 per cent below the peak in 2007 (Cowie 2011).

[108] While appreciations in surplus Asian countries, notably China, could be seen as a welcome development for the reduction of global imbalances, it is not clear whether currency movements alone could overcome the problem of underconsumption in China and overconsumption in the US. For a discussion, see Akyüz (2011).

In Brazil domestic credit expansion and debt accumulation have become extremely rapid and this has given rise to suggestions that the country may be heading for its own subprime crisis (Marshall 2011). The central bank tightened monetary policy and raised interest rates in January 2011 in order to bring inflation closer to its target. The Indian Reserve Bank has also taken a similar action. All these can be expected to slow portfolio equity investment and dampen price increases while enhancing carry-trade opportunities.

G. WHAT IS NEXT?

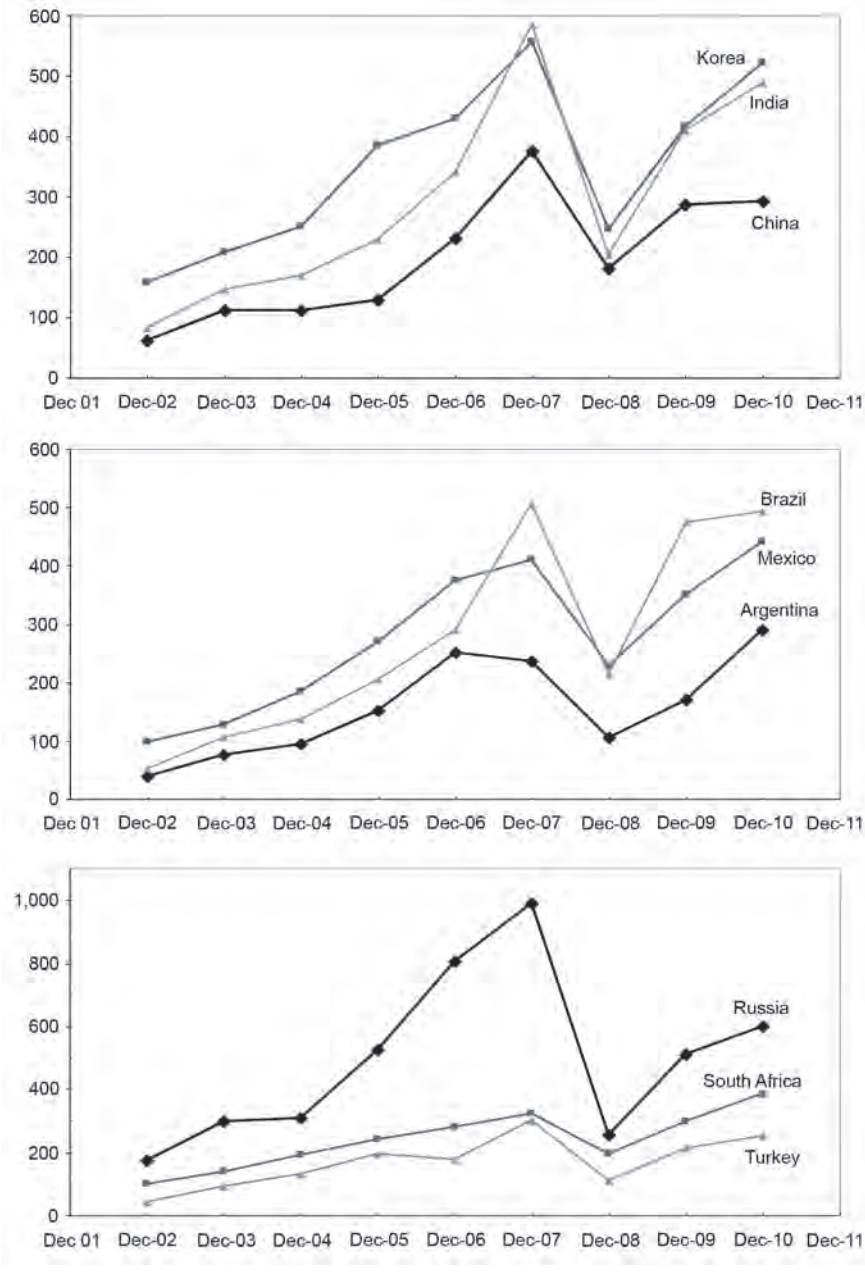
The build-up of macroeconomic imbalances and financial fragility in several DEEs that started with the subprime bubble but was interrupted by the Lehman collapse has continued with greater force in the past two years. To what extent these would go so far as creating serious exposure to the risk of instability and crises depends very much on how long the current boom in capital flows will last and how they are managed by the recipient countries. Experience shows that it is almost impossible to predict the timing of stops and reversals and the events that can trigger them even when the conditions that drive the surge in capital flows can be diagnosed to be unsustainable with a reasonable degree of confidence.

Current projections by both the IMF and IIF are for further increases in capital flows to DEEs during 2011-12. The factors which now favour DEEs in the eyes of international investors and lenders, including higher interest rates, reduced risk margins and faster growth, are likely to continue in the near future. Although the demand for external borrowing remains subdued in many DEEs, FDI inflows may not return to the levels attained during the pre-Lehman boom and recent tightening of monetary policy in several major DEEs in response to rising inflation may moderate portfolio equity investment, these are not expected to result in sharp declines in overall capital flows to DEEs.

A steady return to "normalcy" in the US and Europe in growth and employment and financial market conditions, and the accompanying monetary and fiscal tightening could draw funds gradually back to them without a sharp break in capital flows to DEEs. The US economy is now under deflation-like conditions and in order to sustain recovery and accelerate growth, the Fed wants to encourage inflation in both product and asset markets through

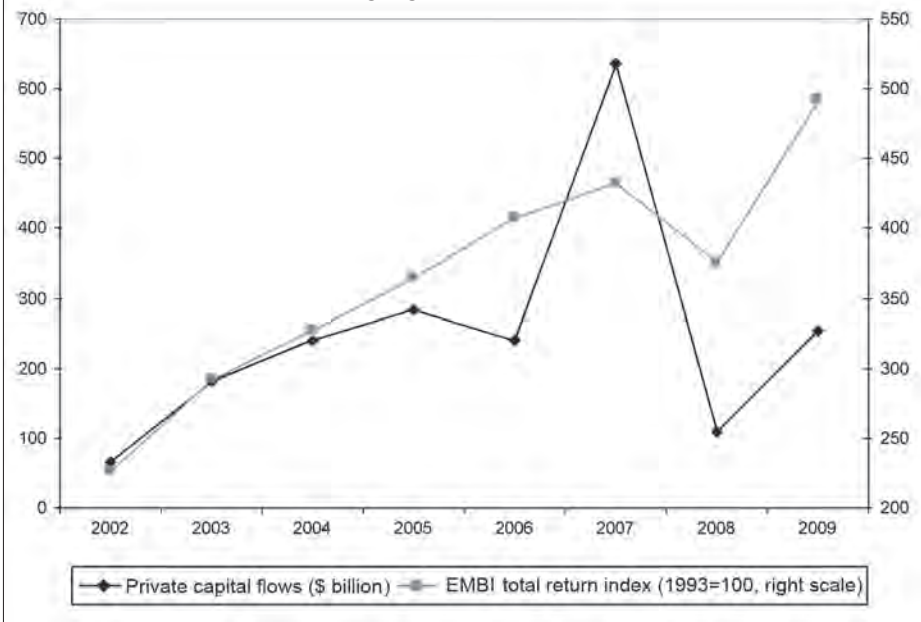
Chart 4.9: MSCI equity market index for selected DEEs

(In dollars, 2000=100)



Source: MSCI

Chart 4.10: DEEs: Net private capital flows and emerging market bond index



Source: World Bank, *Global Economic Monitor.*

aggressive monetary easing (Bernanke 2010). However, so far this has not been happening to a significant degree. Rather, US monetary expansion is adding to the boom in international commodity markets and credit and asset bubbles in major DEEs which are already facing overheating.

If continued policy of easy money in the US, strong growth in DEEs, expansion of index-based trading and investment in commodity futures and political unrest in the Middle East and North Africa sustain the boom in commodity markets, the Fed could eventually face inflation, but not of the kind it wants. The boom in capital flows to DEEs could then end in much the same way as the first post-war boom ended in the early 1980s – that is, with an abrupt shift of the US Fed to a contractionary monetary policy even before the economy fully recovers from the subprime crisis. A mitigating factor is that today a wage-price spiral is much less likely to emerge than in the 1970s because of significantly changed conditions in labour markets and reduced bargaining power of labour. Nevertheless, the bond market can still force the

Fed to tighten even in the absence of strong wage response to higher oil and non-oil commodity prices in anticipation of rising inflation.

Another possible scenario is that the surge in capital flows can be brought to an end by a crisis in a major emerging economy, even without a US exit from expansionary monetary policy. This can happen as a result of a balance-of-payments crisis. An abrupt change in the willingness of international creditors and lenders to maintain exposure to a major emerging economy with an appreciating currency and mounting current account deficits could trigger a reversal of capital flows, leading to contagion across other DEEs, as in the East Asian crisis. It can also happen as a result of a domestic banking and debt crisis brought about by an unsustainable process of credit expansion and debt accumulation, as under the subprime crisis. The likelihood of such a scenario is greater the longer the duration of the boom in capital inflows to DEEs.

Developments in China could no doubt have a strong impact on global financial conditions and capital flows to DEEs. If Chinese growth continues with full force, commodity prices are likely to remain strong, creating destabilizing impulses both for itself and the US. It could thus precipitate monetary tightening in the US. If, on the other hand, China cuts its growth considerably to counter such impulses, it can bring about a rapid turnaround in commodity prices and capital flows to DEEs, notably to commodity-rich countries.

A scenario along these lines is recently presented by Oliver Wyman (2011). According to this, the continued boom in commodity prices could eventually cause rampant inflation in China. This could lead to a real appreciation of its currency, as long advocated by the US, but would also slow its growth by triggering tighter monetary policy. A sizeable slowdown of growth in China would reduce demand for commodities, both for real use and as hedges against inflation. This, together with the global oversupply built during the boom, would bring down commodity prices, and the downturn would be aggravated by an exit of large sums of money from commodity futures. This would make investment in commodity-rich countries unviable and loans non-performing. All these could lead to a generalized increase in risk aversion, flight to safety and a reversal of capital flows to DEEs.

As noted, the government in China has already taken measures along these lines to control inflation. However, it is not clear if these would lead to the kind of downturn in Chinese growth, global commodity markets and capital flows envisaged in the scenario above. It is quite unlikely that the government

would be willing to cool the economy considerably, given its commitment to strong growth.

All in all, the most likely outcome would be the coincidence of the end of the current boom in capital flows and a reversal of the upswing in commodity prices even though it is difficult to predict the dynamic that would bring it about. In terms of vulnerability and exposure to such an eventuality, it is possible to distinguish among three types of DEEs. The most vulnerable are those which have been enjoying the twin benefits of global liquidity expansion – that is, the boom in commodity prices and capital flows. Most of these are located in Latin America and Africa, and some of them, e.g., Brazil and South Africa, have been running growing current account deficits despite the commodity bonanza. These countries could thus be hit twice, as in the early 1980s, by falling capital flows and commodity prices. The South-East Asian countries which have also been enjoying the boom in commodity prices are less vulnerable because many of them have been running current account surpluses, preventing sharp appreciations and accumulating large stocks of reserves.

Exporters of manufactures and services which have been experiencing relatively rapid appreciations and running current account deficits, such as India and Turkey, can benefit from a downturn in commodity prices, notably in oil, as they did during the Lehman collapse, but they could still be hit by a reversal of capital flows. They could encounter sharp currency and asset declines and insolvency in private firms due to their exposure to interest rate and exchange rate risks.

Perhaps the least vulnerable countries are those exporters of manufactures with large current account surpluses and international reserves. This is the situation in China and a few smaller East Asian economies. For such countries a slowdown in capital flows and softening of commodity prices brought about by exogenous factors could be benign, with favourable impact on their balance of payments and currencies. No doubt in these countries too rapid a withdrawal of capital and reduced risk appetite could trigger an asset-market correction and bring down growth, particularly if they last for a prolonged period.

H. MANAGING CAPITAL INFLOWS

1. Currency market interventions

The build-up of external imbalances and financial fragility in several major emerging economies during the current surge in capital flows, including currency appreciations, widening current account deficits, and credit and asset bubbles, suggests that efforts to control and manage the surge have not always been very successful. A common response has been intervention in currency markets. This has been widely practised in East Asia where various shades of managed floating have been followed after the 1997 crisis and in a few major emerging economies elsewhere. By contrast, in Latin America, with some exceptions (e.g. Argentina), interventions have been much less widespread as most countries have adopted inflation targeting, leaving the currency largely to markets. Since central bank purchases of foreign exchange imply expansion of the monetary base, interventions are often accompanied by efforts to sterilize their effects on domestic credit conditions by issuing interest-bearing government (or central bank) papers, creating fiscal surpluses and raising reserve and liquidity requirements in the banking system.

Currency market interventions in DEEs are relatively successful in stabilizing nominal exchange rates and preventing large appreciations.[109] The consequent accumulation of reserves also provides self-insurance against sudden stops and reversals in capital flows. However, they cannot deal with the adverse consequences of a surge in capital flows in other areas. First, full sterilization is often difficult to achieve and credit expansion cannot always be prevented. This could lead to price increases in both product and asset markets, thereby appreciating the real exchange rate. Second, interventions and reserve accumulation do not prevent currency and maturity mismatches in private balance sheets, but can only provide public insurance for private risks. Furthermore, they are costly both to the government and the nation as a whole because income earned on international reserves is typically much lower than the cost of foreign capital and the interest on government debt.[110] Sterilization by issuing government paper can also raise this cost by pushing up interest

[109] For a discussion of the issues reviewed in this paragraph and the Asian experience, see Akyüz (2009 and 2010a) and for Latin America, see Jara and Tovar (2008).

[110] The annual cost of holding capital inflows in reserves was estimated to be around $100 billion for DEEs as a whole in 2007; see Akyüz (2008b).

rates when inflows are largely in equity investment. In any case, accumulating reserves from unsustainable capital inflows has little economic rationale – in effect, this would mean that the foreign money entering the economy is not used for any productive purpose but kept in low-yielding foreign assets as an insurance against its exit!

2. Liberalizing outflows

Another response to a surge in capital inflows is to ease restrictions on outward investment by residents. As noted, this was done in several Asian countries during the pre-Lehman boom and it has again been introduced by some countries with the renewed surge resulting from quantitative easing in AEs. Capital account opening for residents as a response to a surge in inflows is clearly an alternative to sterilized intervention and has the advantage of avoiding carry costs for reserves. Direct investment abroad can also bring greater benefits than international reserves. However, it would also imply maturity mismatch for the economy as a whole since long-term foreign assets would be purchased with short-term foreign money.

Moreover, like interventions, such a policy effectively does nothing to prevent currency and maturity mismatches in private balance sheets or vulnerability to shocks associated with a greater presence of foreigners in domestic asset markets. More importantly, liberalization of outward investment introduced as a countercyclical measure may not be easily rolled back when conditions change. Unlike official reserves, private assets abroad do not provide self-insurance for the economy against payments and currency instability. Money going out in good times is not necessarily repatriated when needed. Rather, outflows may continue with full force and even increase further when inflows decline sharply, as seen in some countries after the Lehman collapse.[111]

3. Capital controls

Given the limits of interventions and liberalization of outward investment in dealing with some of the most damaging effects of surges in inflows, capital controls remain a viable alternative. In principle they can be applied either by source countries on outflows or by recipient countries on inflows or by

[111] In emerging economies of the CIS net private inflows fell by $120 billion between 2007 and 2008 while net private outflows rose by $100 billion; see IMF WEO (October 2010).

both. While much of the recent debate has focused on controls over inflows in recipient countries, there have also been suggestions that the US should control speculative outflows to its own benefit (Griffith-Jones and Gallagher 2011).

The US indeed applied interest equalization tax in the 1960s to deter capital flight, but the conditions then were quite different. At the time gold-convertibility of the dollar at a fixed rate meant that outflows would deplete US gold reserves without bringing the benefits of a weaker dollar. This is certainly not the case today when outflows from the US effectively put upward pressure on the currencies of its main trading partners, implying competitive devaluation of the US dollar. On the other hand, it is not clear if control over outflows would lead to faster credit expansion and private spending in the US since, as noted, there are problems on the demand as well as the supply side of the credit market. More importantly, carry-trade brings considerable benefits to US financial institutions, helping them consolidate their balance sheets seriously damaged by the subprime debacle.

The US Fed has argued on several occasions that capital inflows to the US made a major contribution to the subprime bubble, even if they did not cause it (Greenspan 2009; Bernanke 2009, 2011). Now monetary policy in and capital flows from the US are producing destabilizing impulses for the world economy. As noted, the US is unlikely to escape unscathed from a possible consequent turmoil. It is thus in the interest of the US to reconsider the potential costs and benefits of its policy. In any case, the matter needs to be addressed at the multilateral level, as part of the reform of the international financial architecture so that destabilizing capital flows are handled at their sources as well as at their destinations.

A myth was promoted after the East Asian crisis that free capital movements should not cause concern if accompanied by effective prudential regulations. After the subprime crisis it is now evident that conventional regulations cannot secure the stability of the banking system, leave alone the stability of capital flows. Still, since a relatively important part of international capital flows are intermediated by domestic financial institutions, prudential regulations appropriately extended to transactions involving foreign assets and liabilities can no doubt play an important role in containing destabilizing impulses of surges in capital inflows by addressing three fundamental sources of fragility: maturity mismatches, currency mismatches and exchange-rate-related credit risks (Akyüz 2008b).

However, these would not be sufficient to secure stability since an even higher proportion of capital flows goes outside the banking system. Almost 70 per cent of total cumulative inflows to DEEs during 2002-07 were in direct and portfolio investment. Thus, measures designed to control the entry of non-residents to equity and bond markets and external borrowing by non-bank companies would also be needed.

It is often contended that after recurrent crises in the 1990s, many DEEs have taken steps to strengthen prudential measures in order to reduce the risks associated with foreign exchange positions of banks and this is seen as a main reason for their resilience to financial shocks from the subprime crisis (see, e.g., ESCAP 2009 for Asia). However, it is not clear if strengthened prudential regulations, rather than improved macroeconomic conditions, stronger current account positions, large stocks of international reserves and short duration of the downturn, played a more prominent role in containing the financial impact of the subprime shocks on DEEs.

Capital controls recently introduced by DEEs generally consist of market-friendly taxes on selected inward investment rather than direct and comprehensive restrictions.[112] These are now conveniently called macroprudential, with the growing acceptance of the concept in the mainstream.[113] FDI, among others, has often been excluded even though a surge in direct investment could have the same effect on the currency as other types of inflows. Besides, many inflows classified as FDI do not create new productive assets and are not distinguishable from portfolio investment. There are ways of slowing FDI without closing the doors to foreign investors in productive assets – e.g., through licensing procedures.

Measures recently adopted include taxes on fixed income and portfolio equity flows (Brazil), on foreigners' government bond purchases and banks' foreign exchange borrowing (Korea), or on interest income and capital gains

[112] For a summary, see World Bank (2011a) and IIF (January 2011). For the Asian experience, see Nomura (2010). Some countries already had measures of control in place before the recent surge in capital flows. India, for instance, had ceilings on foreign investment on sovereign and corporate debt and a withholding tax (Subbarao 2010). However, these have not been enough to stem the upward pressure on its currency since mid-2009.

[113] Talley (2011). Strictly speaking macroprudential policy refers to regulations applied to banks with a view to preventing practices that may threaten the stability of the financial system and the economy as a whole, as opposed to microprudential policy designed to secure the financial health of individual institutions. For the origin and the current use of the concept, see Clement (2010) and Galati and Moessner (2011).

earned by foreigners (Thailand and Korea). These taxes are quite low compared to profit opportunities presented by interest rate differentials and capital gains from currency appreciations and hikes in equity prices. When the interest rate differential and growth in equity prices are in double-digit figures and the currency is constantly appreciating against the dollar, a 4 per cent tax on portfolio investment or a 20 per cent tax on capital gains and interest incomes would not make much of a dent in arbitrage profits and windfalls.[114] It should not thus come as a surprise that the Brazilian entry tax is found to have had only a small impact on interest rate arbitrage and to be ineffective in checking not only the overall volume of capital flows but also inflows into bonds.[115] It is often such half-hearted attempts that lend support to the orthodox contention that capital controls do not work.

Experience shows that when policies falter in managing capital flows, there is no limit to the damage that international finance can inflict on an economy. This is now recognized even by some of the keen advocates of financial globalization as a key lesson drawn from the subprime debacle:

> *Looking back on the crisis, the United States, like some emerging-market nations during the 1990s, has learned that the interaction of strong capital inflows and weaknesses in the domestic financial system can produce unintended and devastating results. The appropriate response is … to improve private sector financial practices and strengthen financial regulation, including macroprudential oversight. The ultimate objective should be to be able to manage even very large flows of domestic and international financial capital in ways that are both productive and conducive to financial stability* (Bernanke 2011: p. 24).

Likewise, the IMF also appears to be breaking away from the orthodox single-minded opposition to restrictions over capital flows, recognizing that for both macroeconomic and prudential reasons there may be circumstances in which capital controls are a legitimate policy response to surges in capital

[114] Indeed, the return on emerging-market fixed-income securities in 2010 is reported to have ranged between 12 per cent and 13 per cent – see Curran (2011).

[115] IMF GFSR (October 2010). Brazilian controls excluded not only FDI but also dollar borrowing by Brazilian banks and firms.

inflows. However, while it is recognized that "controls seem to be quite effective in countries that maintain extensive systems of restrictions on most categories of flows", those with "largely open capital accounts" are not advised to go in that direction but use restrictions as a last resort and on a temporary basis (Ostry *et al.* 2010: p. 5).

It is not, however, clear if the kind of approach advocated by the Fed and the IMF would protect DEEs against the risks posed by unstable capital flows. In all likelihood macroprudential regulations, as usually defined, would not be sufficient to contain the fragilities that capital flows can create in all the three areas discussed above. Unlike the US, DEEs cannot adopt a policy of benign neglect of the exchange rate consequences of capital flows and they need to apply restrictions outside the banking system in order to limit financial imbalances and fragility. Moreover, controls over both inflows and outflows should be part of the arsenal of public policy, used as and when necessary and in areas and doses needed, rather than introduced as ad hoc, temporary measures. The instruments are well known and many of them were widely used in AEs during the 1960s and 1970s (Swoboda 1976).

I. CONCLUSIONS

At a time when the worst seems to be over, DEEs are receiving strong destabilizing impulses from AEs, notably the US, through capital flows triggered by their self-centred responses to the crisis. Bubbles are forming in credit, equity and property markets, currencies are appreciating and deficits are widening in several major emerging economies. To contain the damage that could be inflicted by such unwanted capital flows, DEEs need to take much more determined action and introduce a comprehensive and effective system of controls.

Collectively DEEs have been running a current account surplus and they do not need capital from AEs for external financing. In fact they have been recycling their twin surpluses to AEs in the form of investment in reserve currencies. However, a number of DEEs have been running structural deficits and are dependent on capital inflows to finance imports, investment and growth. There is thus a need to establish, both at the regional and global level, reliable and stable mechanisms for South-South recycling from surplus to deficit countries without going through Wall Street or the City.

Finally, current difficulties created by unstable capital flows and commodity prices show once again that the international monetary and financial system needs urgent reforms. Ways and means should be found to prevent major reserve-issuing countries from pursuing beggar-thy-neighbour policies and creating destabilizing impulses for the others. The international reserves system should be reformed so that global monetary and financial stability is not left to the whims of self-seeking policies of a single country enjoying an "exorbitant privilege". The question of regulation of commodity speculation should also be placed squarely on the table in order to put a stop to gambling with the livelihood of the poorest segments of the world population and promote food and energy security.

Chapter 5

WHY THE IMF AND THE INTERNATIONAL MONETARY SYSTEM NEED MORE THAN COSMETIC REFORM[116]

A. INTRODUCTION

On its website, the International Monetary Fund (IMF) defines its main purpose as the provision of "the global public good of financial stability". As spelled out in its Articles of Agreement, this requires a stable system of exchange rates, sustainable current account balances and orderly currency and balance-of-payments adjustments. To achieve this, the Fund undertakes economic and financial surveillance at the national and global levels, provides policy advice to its members, and lends to those facing external payment difficulties in order to facilitate adjustment.

The record of the IMF in delivering this global public good leaves much to be desired. The period since the breakdown of the Bretton Woods arrangements has seen repeated gyrations in the exchange rates of major currencies, persistent and growing trade imbalances, and recurrent balance-of-payments, debt and financial crises, many of which have reverberated across the global economy. The IMF has been unable to cope with misguided macroeconomic, exchange rate and financial policies in countries with a disproportionately large influence on global monetary and financial conditions

[116] First published as a South Centre research paper in November 2010. I am grateful to Richard Kozul-Wright for comments and suggestions.

as well as autonomous destabilizing impulses generated by financial markets and international capital flows unleashed by rapid and widespread liberalization.

One reason for this poor performance is that the Fund has no teeth vis-à-vis its non-borrowing members. It has little leverage not only over policies in reserve-issuing countries, but also in others enjoying surges in capital flows, including developing and emerging economies (DEEs), since these countries rarely need the Fund during these boom times when the seeds of instability are sown. While the Fund exercises firm direction and surveillance over the policies of those members borrowing from it, obligations are superfluous and non-binding for non-borrowing members and the Fund has no power of enforcement. For non-borrowing countries, the IMF is a "voluntary institution."[117]

But, more importantly, the IMF has generally been unable to identify build-up of financial fragilities, predict instability and crises and issue early warnings in large part because of its blind faith in markets. In the subprime turmoil it has missed the biggest crisis of its lifetime. It has persistently failed to warn DEEs against destabilizing capital flows, and unsustainable exchange rates, payments and debt positions. Since the mid-1990s several countries working under IMF programmes and drawing on its resources have experienced severe instability and crises and in some important cases, such as Russia and Argentina, sovereign default could not be avoided. The IMF's debt sustainability analyses and recommendations have left many poor countries in disarray when they fell back into debt distress after being told that their external debt had reached a sustainable position and they no longer needed debt relief from official creditors.

The more the IMF has failed to prevent instability and crises, the more it has become involved in crisis management and lending. Indeed, with the increased frequency of systemic financial shocks, crisis intervention and lending has become the primary activity of the Fund so much so that at times of calm when drawing on the IMF ceased, as was the case during the great global bubble of 2003-08, its own financial viability came into question. After every major financial crisis the IMF has sought a new role and this has almost always been construed in terms of expansion of its emergency lending instruments and capacity. The current crisis is no exception – it has given rise to new facilities for crisis lending and the tripling of IMF resources.

[117] As remarked by the IMF representative during a UN Working Group Panel on 26 May 2010 on the reform of the financial architecture.

IMF emergency lending is said to play two main roles. On the one hand, it provides breathing space to countries facing severe liquidity problems and payments crises, allowing them more time to adjust and helping restore confidence. On the other hand, for countries with "strong and sound policies and fundamentals", rapid access to adequate and upfront financing is expected to play a preventive role, particularly under threats of spillovers and contagion from financial instability originating elsewhere in the global system. Moreover, quasi-automatic access to adequate IMF financing is expected to diminish the need for self-insurance in international reserves and the associated costs and trade imbalances.

However, Fund lending has rarely prevented economic downturn in countries facing payments instability and crises. Such lending is often associated with procyclical policy conditionality which serves to deepen the impact of the financial crises on jobs and income. This is still the case with the IMF programmes in Europe despite the flexibility claimed. But more importantly, emergency lending could create more problems than it solves. When the scale is large, it can endanger the financial integrity of the IMF. It is not always easy to determine if a crisis is one of liquidity rather than insolvency. Argentina and Russia ended up in default while receiving IMF support on grounds that they were facing liquidity crises, and there is no guarantee that Greece will now be able to avoid default. Since the IMF does not enjoy *de jure* preferred creditor status, when the scale of operations is large, it can get badly hurt in the event of a messy default and asset grab race by creditors.

Since the IMF crisis lending is effectively designed to keep countries current on debt payments to international creditors and to maintain an open capital account, it often leads to an unequal burden-sharing between creditors and debtors. Commercial debt gets replaced by debt to the IMF which is often more difficult to renegotiate. Private debt gets dumped on the public sector – sovereign debt invariably rises after financial crises resulting from excessive build-up of debt by the private sector. All these create moral hazard and prevent the operation of market discipline, because they allow investors and creditors to escape without bearing the full consequences of the risks they have assumed.

Because of the problems posed by bailout operations, the primary task of the Fund should be crisis prevention rather than crisis lending. This calls for a significant improvement in the quality of the Fund's financial and economic surveillance. It also calls for a reform of its members' obligations so as to bring about a reasonable degree of multilateral discipline over macroeconomic,

exchange rate and financial policies, particularly in its major members. The rationale for multilateral discipline is much stronger in money and finance than in any other area of global economic interdependence, including trade, since adverse external spillovers from monetary and financial policies in systemically important countries tend to be much more damaging.

But even with radical reforms in these areas, financial crises with global ramifications will continue to occur. Emergency lending is not, however, the only and even the best way of dealing with them. Orderly debt workout procedures based on widely recognized principles of insolvency designed to secure the involvement of private lenders and investors in crisis resolution are more equitable both between debtors and creditors and between private and official lenders, and more effective from the point of view of their impact on the behaviour of lenders and investors and, hence, on financial stability. It is quite astounding that the international community has been unwilling to put in place such mechanisms despite rapidly growing international debtor-creditor relationships, still continuing to address sovereign debt crises in an ad hoc manner.

This chapter takes up these issues in the reform of the IMF and the international monetary system. Although some specific proposals are discussed, the objective is not to provide blueprints, but to draw attention to main shortcomings of international monetary and financial arrangements in delivering "the global public good of financial stability." The chapter starts with a brief examination of the record of the IMF in early warning and crisis prevention and makes an assessment of whether its recent attempts at soul-searching in financial market analysis and policy advice constitute a break from market fundamentalism and the so-called Washington Consensus.

This is followed by a discussion of the main difficulties encountered in securing effective and even-handed surveillance and multilateral discipline over macroeconomic, exchange rate and financial policies of IMF members and possible modifications to existing modalities and obligations. Possible benefits of independent surveillance are assessed and the scope for binding obligations regarding exchange rates and balance-of-payments adjustment is examined. It is argued that not only should IMF members retain the right to exercise control over capital flows, but the Fund should encourage them to do so as and when needed, through its lending programmes and Article IV consultations.

Section D looks at the problems resulting from the international reserves system based on the dollar and discusses possible alternatives, notably the role that could be played by the Special Drawing Right (SDR). It is argued that a move away from the dollar-based reserves system towards the SDR could help reduce global imbalances and improve international monetary stability by providing a certain degree of policy discipline on the US. It would also help DEEs, *inter alia*, by reducing the need for self-insurance and the associated costs.

Section E follows with a discussion of crisis intervention by the IMF, its objectives and impact on financial stability. It is argued that if instability and crises cannot be prevented, it would be better to respond to them by combining mandatory mechanisms to involve private creditors and investors in crisis resolution with emergency lending designed to maintain a high level of income and employment than by large-scale lending to bail them out. This is one of the most important ingredients of the reforms needed to strengthen the capacity of the IMF in crisis prevention. Otherwise, the IMF may increasingly become a quasi-international lender-of-last-resort without the requisite capacity and power of oversight and this will likely do more harm than good.

The chapter concludes that the international monetary system needs to be restructured with the primary objective of ***preventing*** instability and crises, including through greater involvement of private lenders and investors in crisis resolution. A genuine reform along these lines will require considerable reflection and debate in the international community. It also presupposes recognition of the problems. However, some of the most important issues such as enforceable exchange rate and adjustment obligations, the international reserves system and orderly sovereign debt workout mechanisms are not squarely on the agenda of the G20 and the IMF. Developing countries have a particular stake in this endeavour given their vulnerability to shocks and limited capacity to respond. If major countries do not support establishment of an orderly and equitable international monetary and financial system, DEEs should find ways and means of protecting themselves and looking after their interests through regional mechanisms.

B. THE IMF'S FAILURES IN FINANCIAL ANALYSIS AND EARLY WARNING

A key task of the Fund in securing stability is to keep track of economic and financial developments at the national, regional and global levels in order to identify the build-up of potentially damaging macroeconomic imbalances such as excess savings or investment, chronic fiscal and balance-of-payments disequilibria or strong inflationary or deflationary pressures, and financial fragilities including excessive liquidity creation and credit expansion, debt accumulation and asset bubbles, and provide early warning and policy advice to governments for corrective action. In this endeavour the Fund naturally relies on a theoretical framework for identifying macroeconomic and financial imbalances, their interactions, proximate causes and possible consequences and the policies needed to address them.

This is an inherently difficult undertaking given the state of art of macroeconomics (White 2009). Predicting the timing of a crisis is an almost impossible task. There are also serious difficulties in correctly identifying whether asset price increases or credit expansions represent a speculative bubble rather than improved fundamentals or if a surge in capital flows is sustainable. However, as noted by two BIS economists, "identifying **in a timely way** the development of financial imbalances with potential unwelcome implications for output and inflation, while very hard, is not impossible" (Borio and Lowe 2004: p.18).

The failure of the IMF in identifying potentially damaging imbalances and issuing early warnings has its origin not so much in the inherent shortcomings of economic theory or imperfect knowledge and information as in its faith in free markets. The Fund has traditionally adopted a crude neoclassical-cum-monetarist framework premised on efficient markets and rational expectations almost to the total neglect of accumulated knowledge and insight provided by alternative thinking, believing that disequilibria and imbalances generated by freely functioning markets are self-correcting without entailing severe social and economic costs. Despite mounting evidence from crises in emerging and mature markets alike, the Fund has maintained an obsession with budget deficits and inflation, ignoring that asset price inflation driven by speculative lending and investment could pose even greater threats to stability and growth.

After recurrent crises in DEEs during the 1990s, the Fund intensified the surveillance of financial markets and capital flows, but this has not been effective in preventing further crises, including in countries working under IMF programmes such as Russia, Argentina and Turkey, in large part because of its failure to diagnose and act on the root causes of the problem. The Fund has generally been highly optimistic about the sustainability of capital inflows to emerging market economies. While it should have been obvious that preventing unsustainable surges in capital inflows, rapid deterioration of net external asset positions, sharp currency appreciations and mounting trade deficits was essential for avoiding future problems, the Fund remained averse to any form of control over such flows, including market-friendly measures such as unremunerated reserve requirements, recommending, instead, monetary and fiscal tightening and greater exchange rate flexibility, which, in the view of its Independent Evaluation Office, proved to be highly ineffective (IMF/IEO 2005: p. 60).

The Fund has also been lukewarm against interventions in foreign exchange markets that many DEEs have used during the surge in capital inflows after 2003 in order to avoid currency appreciations and current account deficits, arguing that they were ineffective (see, e.g., IMF WEO October 2007: pp. 122-24). It has favoured, instead, fiscal contraction as a remedy despite growing evidence from the BIS and elsewhere that currency market interventions have generally been quite successful in emerging economies, particularly where the banking sector is closely scrutinized (Akyüz 2009). Its insistence on the ineffectiveness of interventions in conditions of sustained capital inflows is particularly inconsistent with its pronouncement that the Chinese yuan is undervalued – a country which has been heavily and successfully intervening in order to sterilize the impact of its growing current account surpluses and net private capital inflows on the yuan/dollar rate.[118]

The IMF's debt sustainability assessments have been as equally problematic as its external sustainability analyses. For emerging economies they often yield highly optimistic debt projections while its sensitivity tests have been ineffective in providing early warning signals (Akyüz 2007). These are not simply harmless academic exercises for prediction. The errors in debt sustainability analyses are often carried over both to the policy advice that the IMF provides in the context of Article IV consultations or conditionalities, and to official debt relief initiatives, thereby affecting the outcome.

[118] For the most recent pronouncement of undervaluation of the yuan, see IMF (2010g).

Much the same holds for the analyses of debt of Heavily Indebted Poor Countries where sustainability is relatively easier to assess because the terms and conditions of their official debt do not vary much with market conditions. Several poor countries have seen their debt ratios rise significantly above the IMF-determined sustainability thresholds after reaching completion points and receiving debt relief at the rate deemed necessary to make their debt sustainable (Kitabire and Kabanda 2007).

In the subprime debacle the Fund missed the biggest crisis of its lifetime. In the run-up to the crisis it failed to identify the nature and extent of a potentially destabilizing speculative build-up and to provide adequate early warning. According to the Fund report on 2006 Article IV Consultations with the United States: "Mortgage securitization had helped channel foreign savings into the U.S. housing market while allowing mortgage originators greater flexibility to diversify credit exposure and *reduce systemic risk*" (IMF 2006: pp. 7-8; italics added). The Fund staff were preoccupied with reducing fiscal and external deficits and maintaining control over inflation as the main policy challenges facing the United States economy, while reassuring that the "U.S. financial sector has proven exceptionally resilient in recent years" (IMF 2005: p.31; and 2006: p. 23). Even a month before the beginning of the credit crunch, they argued that "the most likely scenario is a soft landing as growth recovers and inflation falls, although both are subject to risks" (IMF 2007a: p. 26).

Even as the depth and the extent of the problem became increasingly obvious to many independent observers, the Fund's *Global Financial Stability Report* downplayed the difficulties faced: "The weakness has been contained in certain portions of the subprime market … and is not likely to pose a serious systemic threat. Stress tests conducted by investment banks show that, even under scenarios of nationwide house price declines that are historically unprecedented, most investors with exposure to subprime mortgages through securitized structures will not face losses" (IMF GFSR April 2007: p. 7). This misjudgement of prevailing conditions in financial markets continued throughout the year even as banks started reporting large losses: "Although the dislocations, especially to short-term funding markets, have been large and in some cases unexpected … systemically important financial institutions began this episode with more than adequate capital to absorb the likely level of credit losses" (IMF GFSR October 2007: p.10).[119]

[119] For a discussion of the IMF's failure to correctly identify the nature of financial imbalances leading to the subprime crisis and its inadequate appreciation of contagion, see Rakshit (2009).

More recently there has been some soul-searching at the Fund, in an attempt to understand why it failed to warn of the most severe post-war financial turmoil. It issued two papers in 2009 focusing on the initial lessons of the crisis (IMF 2009b and 2009c), followed by two authored working papers, "Rethinking Macroeconomic Policy" (Blanchard *et al.* 2010) and "Capital Inflows: The Role of Controls" (Ostry *et al.* 2010), discussing the IMF's positions on macroeconomic, foreign exchange and financial policies.

The IMF now recognizes that "*surveillance of global economic developments and policies* did not give sufficiently pointed warnings about the risks building up in the international financial system. … Fund surveillance echoed the conventional view that advanced countries with relatively low and stable inflation together with highly profitable and well capitalized banking sectors could withstand the unwinding of any froth in housing and capital markets." While some other institutions and independent commentators were strongly warning of downside risks from the mid-2000s, by the time the "Fund defied conventional wisdom by offering a prescient warning … it was too late" (IMF 2009c: pp. 2, 5). Systemic risks were underestimated because of its focus on inflation targeting to the neglect of asset bubbles, the assumption that the possible adverse effects of a reversal of asset bubbles on the real economy could be counteracted by lower interest rates, and the failure to adequately account for financial sector feedbacks and spillovers (IMF 2009b). Thus, the Fund now advises central banks to abandon the single target (inflation)-single tool (the policy rate) approach to monetary policy, to tolerate higher rates of inflation and to adopt a broader macroprudential view, taking into account asset price movements, credit booms, leverage and the build-up of systemic risks (IMF 2009b and Blanchard *et al.* 2010).

On capital control too the IMF appears to be breaking away from the orthodox single-minded opposition to restrictions, arguing that for "both macroeconomic and prudential reasons … there may be circumstances in which capital controls are a legitimate component of the policy response to surges in capital inflows" (Ostry *et al.* 2010: p. 15). These controls are now considered among the toolkit of policy measures for dealing with adverse macroeconomic and financial consequences of surges in capital inflows, comprising fiscal, monetary and exchange rate policies and prudential regulations. Currency market interventions are also included in this toolkit and viewed in a much more positive light. It is conceded that not only price stability but also exchange

rate stability should be part of the objective function of central banks in small open economies (Blanchard *et al.* 2010: p.13).

However, the Fund's thinking on capital controls is still ambivalent. Restrictions over inflows are seen as justified only if a number of conditions are met – that is, if the economy is operating near potential, reserves are adequate, the currency is not undervalued and the flows are likely to be transitory. Economic benefits of free international mobility of capital are reaffirmed, and controls are considered as exceptions, only a temporary countercyclical response to surges in inflows in countries that already have largely open capital accounts. While it is recognized that "controls seem to be quite effective in countries that maintain extensive systems of restrictions on most categories of flows", those with "largely open capital accounts" are not advised to go in that direction but use such controls as a last resort (Ostry *et al.* 2010: p. 5).

The policies advocated by the IMF as alternatives to capital controls and the conditions under which capital controls are said to be useful are contentious.[120] Operation of the economy below capacity does not justify a hands-off approach to capital inflows. Short-term inflows at such times may bring income gains, but experience suggests that such gains tend to be more than offset by contractions that could result from a possible reversal. Again, because of the large carry costs involved, allowing short-term arbitrage capital flows to enter the economy and using them to accumulate (borrowed) reserves as self-insurance against their exit is not necessarily a better option than restricting their entry. Lowering interest rates may not be an effective alternative to capital controls since interest rate differentials are not the only reason for short-term inflows. When they are attracted by quick windfalls from bubbles in asset markets, lower rates could simply add fuel to the fire. Finally, there is always uncertainty if and to what extent a currency is appropriately aligned with the underlying fundamentals. Thus, DEEs with large and persistent current account deficits are well advised to approach capital inflows with extreme caution and focus on building a sound payments position rather than financing them with foreign capital.

The unorthodox messages contained in these IMF discharges, notably the call for greater tolerance for inflation, attention to asset and credit bubbles, and use of controls over capital inflows as legitimate tools of policy, are carefully worded and qualified with several caveats. As such, the turnaround in IMF

[120] See the description in Ostry *et al.* (2010: Figure 1). For discussion of many of the issues taken up in this paragraph, see Akyüz (2008b).

pronouncements on these matters appears to be triggered not so much by thoughtful reflection of its staff as by the need to respond to growing challenges to its technical and intellectual competence and integrity. Therefore, the jury is still out on whether the lessons learned from this crisis will move the IMF away from the Washington Consensus and produce a fundamental improvement in the quality of the IMF's economic and financial monitoring and policy advice to its members.

C. IMF SURVEILLANCE AND MEMBERS' OBLIGATIONS

1. The Bretton Woods system

Policies almost always play an important part in financial instability and crises. Misguided deregulation of financial markets and liberalization of the capital account and unsustainable macroeconomic and exchange rate policies are often the proximate causes of financial crises and currency and balance-of-payments instability. This is true for both DEEs and advanced economies (AEs). However, global repercussions of financial crises and currency instability in systemically important countries, notably those enjoying reserve-currency status, are much more profound and widespread than those in DEEs. Adverse external spillovers constitute the rationale for multilateral disciplines on national policy making, the more so the greater the degree of global economic integration.

The architects of the Bretton Woods system recognized that multilateral discipline over national policies would call for enforceable obligations. A gold-exchange standard was established for the dollar, which in effect restricted the ability of the US, as the country enjoying the reserve-currency status, to run deficits without limit. Other countries were required to maintain their exchange rates within a narrow range of multilaterally negotiated par values. They were allowed to change them only on authorization from the Fund. An unauthorized change in par values would have enabled the Fund to withhold the member's access to its resources and even to force the member to withdraw (Dam 1982: pp. 90-93). A scarce currency clause (Article VII) was introduced to secure symmetry in adjustment between surplus and deficit countries. Thus, the currencies of surplus countries could be declared scarce, thereby allowing others to use discriminatory trade, exchange and capital measures against them.

However, none of these obligations were strictly enforced under the Bretton Woods system (Bird and Willett 2007). IMF oversight of exchange rate adjustments was effectively abandoned in 1949 when Britain undertook a unilateral devaluation in order to gain competitive advantage and write down its wartime debt without facing punishment. The US ignored the limits set by the gold-exchange standard on its deficits and flooded the world economy with dollars, which eventually made it impossible to maintain gold convertibility. The scarce currency clause was never used. True, it had been introduced by the British as a protection against a possible dollar shortage, and in the event it was not needed because of rapid expansion of US deficits and dollar supply. However, it was still not invoked for Germany and Japan whose persistent surpluses made an important contribution to the collapse of the exchange rate arrangements.

The par value arrangements collapsed with the unilateral suspension by the US of gold convertibility in 1971 – the first and the most significant post-war default of international obligations by any country without facing a penalty. Floating was adopted without any credible commitment to exchange rate stability. Indeed the new "obligations regarding exchange arrangements" established with the Second Amendment of the Articles in 1978 amounted to no more than the recognition that the stability of the international monetary system depended on the extent to which domestic policies sustained orderly underlying conditions. As pointed out by Triffin (1976: pp. 47-48), the obligations were "so general and obvious as to appear rather superfluous" and the system "essentially proposed to legalize … the widespread and illegal repudiation of Bretton Woods commitments, without putting any other binding commitments in their place."

2. Bilateral and multilateral surveillance

With the abrogation of the par value system the IMF surveillance gained critical importance. At the same time as members were allowed the right to choose their own exchange rate arrangements, the Fund was charged with exercising firm surveillance over members' exchange rate policies. Over time the scope of bilateral surveillance has expanded into a number of other areas. In the 1980s it was recognized that "to be effective surveillance over exchange rates must concern itself with the assessment of all the policies that affect trade, capital movements, external adjustment, and the effective functioning of the

international monetary system."[121] After a series of crises in emerging economies it was agreed in April 1998 that the Fund should intensify its surveillance of financial sector issues and capital flows, giving particular attention to policy interdependence and risks of contagion, and ensure that it is fully aware of market views and perspectives.[122] Various codes and standards have been established for macroeconomic policy, institutional and market structure, and financial regulation and supervision have become important components of the surveillance process. The 2007 Surveillance Decision delineated the full scope of surveillance, including all areas of policy that impinge directly and indirectly on external stability (IMF 2009e).

As recognized by the IMF (2010d: p. 5), unlike bilateral surveillance – the so-called Article IV consultations – the meaning and scope of multilateral surveillance are not well articulated. The Fund was charged by the Second Amendment to "oversee the international monetary system in order to ensure its effective operation" but no "substantive obligations of the members are identified" and "the Fund has never spelled out what its systemic oversight … entails by way of process, substance, and data – either for itself or for its members" (IMF 2010b: p. 4). And "in contrast to bilateral surveillance, there is no comprehensive Executive Board Decision providing guidance for this half sentence reference to multilateral surveillance" (IMF 2010h: p. 5).

The focus of multilateral surveillance should, in principle, be the global spillovers and systemic interactions of national policies. In discharging this function, the Fund should be able to request its members to make policy adjustments when their policies lead to global imbalances or produce external destabilizing spillovers transmitted through balance-of-payments or other channels. However, from a legal point of view there are no obligations of Fund members to undertake policy actions to enhance systemic stability unless they are also necessary for their own stability. In other words, each member is required to promote systemic stability only by promoting its own domestic stability and "for the Fund to have a power to require changes in members' domestic policies when these negatively affect the system as a whole but not their own domestic stability, a change in the Articles of Agreement would be required" (IMF 2010d: p. 16).

[121] Group of Ten (1985: para 40). For further discussion, see Akyüz and Dell (1987).

[122] IMF Interim Committee Communiqué of 16 April 1998; Washington, D.C.

This effectively implies there are no legal grounds for the Fund to request surplus countries – such as Germany, Japan and China – to make policy adjustments. Similarly, financial shocks transmitted to other countries cannot come under the Fund's bilateral surveillance if they do not endanger the domestic and external stability of the country taking the policy action. Thus, a hike in US interest rates or a rapid expansion of liquidity would be quite legitimate if it is compatible with the domestic and external stability of the US even if these wreak havoc in other countries.

The contrast with the international trading system is striking. Obligations in the trading system generally restrict beggar-my-neighbour policies that could inflict damage on other countries, regardless of their domestic consequences. This is not the case with IMF obligations despite the wide recognition that adverse international spillovers from monetary and financial policies in systemically important economies tend to be much more damaging than those from trade policies. Even the obligation to "avoid manipulating exchange rates" has no practical value in view of the freedom granted to members to choose whatever exchange regimes they wished.

In practice the IMF has paid little attention to international spillovers from policies in systemically important countries even as it encouraged the DEEs to rapidly integrate into the international financial system, increasing their susceptibility to external shocks. Nor has it been effective in bringing about coordinated policy adjustments in major deficit and surplus countries. During 2006-07 it initiated a process of "multilateral consultations" with systemically important countries to address global imbalances, but this did not produce the policy coordination needed. The G20 launched a Mutual Assessment Process in 2009 to secure economic policy collaboration and to complement Fund surveillance. The first report based on policy scenarios by the IMF was discussed in the Toronto Summit in June 2010, and a general agreement was reached on the need for AEs to communicate growth-friendly fiscal consolidation plans, for surplus countries to focus more on domestic sources of growth and for deficit AEs to take action for boosting national savings. It is now also agreed that IMF reports and Article IV consultations would address global spillovers from national policies of the US, EU, China, Japan and the UK, the issuers of five major currencies. However, no mechanism has been proposed to secure that policy action would be taken to mitigate adverse global spillovers.

While the IMF members have the same obligations to maintain orderly macroeconomic and balance-of-payments conditions and stable exchange rates, the Fund's policy oversight is confined primarily to its poorest members who need to draw on its resources because of their lack of access to private finance and, occasionally, to emerging economies experiencing interruptions in their access to international financial markets. For its borrowers the policy advice given by the IMF in Article IV consultations often provides the framework for the conditionality to be attached to any future Fund programme (IMF/GIE 1999: p. 20). But its surveillance of the policies of the most important players in the global system has no real meaning.

3. *Reform of IMF surveillance and members' obligations*

a. Independent surveillance

A key question is, therefore, how to improve the quality, effectiveness and evenhandedness of IMF surveillance. The London Summit of the G20 (2009c: para 12) expressed its support for "candid, even-handed, and independent IMF surveillance", but without specific recommendations as to how to achieve these. Subsequently the International Monetary and Financial Committee (IMFC) reaffirmed the emphasis on "candor, evenhandedness, and independence" and the need "to enhance the effectiveness of surveillance" (IMF 2009d: para 11). However these undertakings have little credibility since the IMFC is known to have come up with similar pronouncements in almost every other meeting, particularly those held after episodes of instability in international currency and financial markets.[123]

There can be little doubt that problems regarding the quality, effectiveness and evenhandedness of IMF surveillance cannot be resolved without addressing its governance-related shortcomings. On one view, considerable progress can be made by overhauling and downsizing the Board to make it more representative and effective, and giving greater independence

[123] For instance, in September 2000 the Committee emphasized "enhancing Fund surveillance, and promoting stability and transparency in the financial sector"; in April 2002 it encouraged the Fund "to press ahead with the range of recent initiatives designed to enhance the effectiveness of surveillance and crisis prevention, including the Financial Sector Assessment Program"; in October 2004 it allocated four paragraphs on "making surveillance more effective and strengthening crisis prevention"; and in April 2006 it proposed a "new framework for IMF surveillance" which included, *inter alia*, making the staff "accountable for the quality of surveillance".

to Executive Directors vis-à-vis their capitals and to the IMF secretariat vis-à-vis its governing bodies.[124]

This view has been taken further by a senior British Treasury official who proposed a formal separation of surveillance from decisions about programme lending (Balls 2003). It is argued that the current structure of the IMF treats programme design as an extension of surveillance, but the lack of a clear distinction between lending and surveillance activities creates the wrong incentives and diminishes the effectiveness of surveillance. Moreover, there is currently no formal regular mechanism for assessing whether the Fund is providing objective, rigorous and consistent standards of surveillance across all member countries. While responsible for ensuring the effectiveness of the Fund's activities, Executive Directors also have responsibilities to their authorities. This creates a conflict of interest where Executive Directors tend to collude in surveillance in defence of the countries they represent, turning peer pressure into peer protection. Surveillance should thus rest with authorities who are independent of their governments and who are not involved in lending decisions. This would also have the advantage of protecting the Board and IMF management from being dragged into decisions which – on the basis of objective evidence – they would not want to take or publicly justify.[125]

Such a step could indeed help improve the quality of surveillance. Publication of independent surveillance reports and a wider debate over policy could help prevent build-up of fragilities and vulnerabilities by providing signals to market participants and creating public pressure on governments in need of corrective action. However, in the absence of binding commitments, it would still be difficult to encourage major non-borrowing governments to heed the policy advice emerging from the surveillance process. Credible commitments and enforceable obligations regarding exchange rates and international adjustment appear indispensable for a reasonable degree of international monetary and financial stability.

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[124] For a discussion of these issues see Cottarelli (2005); van Houtven (2004); and Kelkar *et al.* (2005). Some of these elements of governance reform have also been emphasized, to varying degrees, by three former Managing Directors of the Fund, De Larosière, Camdessus and Köhler, in IMF (2004).

[125] Stern (2009) makes a similar proposal for an institution run by politically independent technocrats, as an unbiased risk assessor to provide early warning about systemically important economies.

b. Exchange rate obligations

While a return to the par value system of Bretton Woods is not feasible, there are ways and means of establishing more flexible but stable international regimes. One such proposal is target zones for the three major reserve currencies, namely the dollar, the euro and the yen, advocated during the 1980s and 1990s by several people, including former chairman of the Federal Reserve Board, Paul Volcker.[126] While there are differences among specific proposals for target zones, including the width of the bands, adjustment and intervention rules and policy assignments, they generally envisage an agreement among the G3 on a set of exchange rate ranges compatible with sustainable external payment positions. The agreed target zones should be wide enough to accommodate moderately divergent policies and adjusted as warranted by changes in underlying fundamentals. Targets would be defended by individual or joint interventions and monetary policy actions as and when necessary.

While there would be technical difficulties in estimating exchange rate bands compatible with sustained external positions, such judgments are often expressed by the IMF regarding exchange rates of members drawing on its resources as well as during bilateral consultations as called for by the 2007 Decision (IMF 2009e). The main difficulty is whether a reasonable degree of exchange rate stability could be reached under a regime of free capital movements while retaining policy autonomy for achieving objectives such as price stability, rapid growth and high employment. By virtue of the so-called impossible trinity, it is widely agreed that even if major governments commit themselves to maintaining relative stable exchange rates within multilaterally agreed bands and are prepared to undertake joint interventions to prevent instability and misalignments, they may be overwhelmed by the size and speed of international capital movements.[127] Retaining policy autonomy may require the bands to be too wide to secure meaningful exchange rate stability while too narrow bands may not stand market pressures if the degree of policy coordination needed is

[126] For various target zones proposals, see Williamson (1985, 1998), Williamson and Miller (1987), Volcker (1995) and McKinnon (1997). For an assessment and comparison, see Clarida (1999).

[127] According to the impossible trinity, it is not possible to pursue simultaneously an independent monetary policy, control the exchange rate, and maintain an open capital account. All three are *potentially* feasible, but only two of them could be chosen as *actual* policy. For a discussion that this trilemma is not absolute, see Akyüz (2009).

not forthcoming, as seen during 1992-93 in the European Monetary System.[128] Therefore, any multilateral commitments for exchange rates may need to be accompanied by control over short-term arbitrage capital flows in order to broaden the space for policy to address domestic policy objectives while attaining exchange rate stability.[129] This would be quite in line with Article VI which specifically recognizes that members may exercise such controls as are necessary to regulate international capital movements and that regulation of capital flows is an important element of the international monetary system (IMF 2010c: p.14).

Since swings in major currencies have often been an important source of instability for DEEs, a credible and effective regime of target zones would certainly be beneficial to them. However, the benefits of increased stability of these currencies may come at the cost of increased instability of interest rates and this could create difficulties for DEEs in managing capital flows, debt and exchange rates of their own currencies (Reinhart and Reinhart 2002). Interest rate fluctuations needed to maintain exchange rates within target zones can be significantly reduced by controls over short-term flows, thereby widening the policy space in the AEs concerned and helping create a stable environment for DEEs.

The target zones proposals, as originally formulated in the 1980s and 1990s, were confined primarily to the G3 currencies, leaving other countries free to pursue their own exchange rate regimes as they felt fit. This was based on an implicit assumption that other countries taken individually, or as a group if they acted collectively, were sufficiently small not to disrupt the fundamental equilibrium exchange rates among the three reserve currencies. Since then, however, China has emerged as a major player, the number one exporter and the largest surplus economy. Moreover, because of the central role that China plays in the East Asian production network, its exchange rate policies exert a wider influence. For this reason, any multilateral discipline with respect to exchange rates cannot exclude China.

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[128] On the degree of coordination needed and the consequent loss of policy autonomy under target zones, see Akyüz and Dell (1987) and Clarida (1999).

[129] In order to counter arbitrage flows interest equalization taxes were used in the US in the early 1960s and negative interest rates on foreign deposits were used in Switzerland in the early 1970s; see Swoboda (1976). The more recent equivalent of such measures is the unremunerated reserve requirement.

c. Removing the asymmetry in adjustment

The second area where effective multilateral discipline is needed concerns adjustment by surplus and deficit countries. Under the current arrangements surplus countries as well as reserve-issuer deficit countries, notably the US, do not face any pressure for adjustment and there are no enforceable multilateral obligations in this area. An agreement on target zones among major economies would not by itself resolve the issue of who should adjust in the event of large current account imbalances. Moreover, asymmetry in adjustment is also a central concern to other countries, notably the DEEs.

One way of inducing surplus countries to adjust is by activating the scarce currency clause and authorizing the others to apply restrictive trade and capital account measures. However, this would run against not only insurmountable political opposition but also serious practical difficulties regarding the nature and extent of the sanctions each and every country would be entitled to apply. A softer alternative is provided by Keynes' International Clearing Union proposal. According to this scheme the countries running large deficits would pay interest on their drawings (overdrafts) on the Clearing Union while at the same time undertaking adjustment, including currency devaluations. Similarly, large surplus countries would be subject to a charge on their balances in the Clearing Union and required to appreciate their currencies. This latter feature of Keynes' proposal can be adapted to current conditions in that countries running persistent surpluses in excess of a certain threshold in terms of GDP could be required to pay taxes into a fund.[130]

In setting such thresholds for surplus countries attention should be paid to a number of factors since causes and effects of surpluses can differ considerably.[131] The details would thus require considerable attention, but perhaps the most important objective that should govern such an arrangement is to discourage surpluses that constitute a major source of deflation and instability for the world economy.

In the October 2010 meeting of the G20 Finance Ministers the US Treasury Secretary made a proposal along these lines, to limit the G20 countries' surpluses and deficits to 4 per cent of their GDPs. This is a clear recognition

[130] This proposal is revisited by Eichengreen (2009) who suggests that such a tax can be paid to the IMF.

[131] This is pointed out by the IMF Managing Director in relation to the US proposal discussed below – see IMF (2010i).

that current global imbalances cannot be resolved simply by activating the scarce currency clause and compelling the three largest surplus economies, China, Germany and Japan, to adjust while leaving the US off the hook. An orderly international adjustment would no doubt require Germany and Japan to grow faster by expanding domestic demand and China to substitute domestic consumption for exports (see Chapter 2). However, current global trade imbalances result as much from the behaviour of the largest deficit economy, the US, which has been exploiting its "exorbitant privilege" as the issuer of the dominant reserve currency. As long as the US continues to live beyond its means, the rest of the world as a whole would need to run a trade surplus, and policy adjustments outside the US would simply determine the distribution of that surplus among countries.

The US proposal envisages no mechanisms for encouraging or compelling countries to undertake necessary adjustments to comply with the limits, but only voluntary cooperation. Even if it is agreed by all the parties concerned, without an enforcement mechanism its chances of producing tangible results would be slim. For surplus countries a tax-based scarce currency clause may provide a market-friendly incentive for adjustment. However, since the dominant reserve issuer, the US, does not face any significant pressure for adjustment, restricting its deficits would depend very much on removing its exorbitant privilege by reforming the international reserves system. In other words, a central objective of the reform of the reserves system would be to facilitate international adjustment.

d. Capital account obligations and surveillance

The Articles do not give an explicit mandate to the IMF on capital account policies of its members. In the 1990s there were attempts to extend the mandate of the Fund to capital account transactions by establishing obligations for members to liberalize capital movements subject to some safeguards. Now that controls over inflows are recognized by the IMF as a legitimate component of policy response to capital surges, an issue raised is the role that the IMF could play in the regulation of capital flows.

The IMF (2010c: p.15) argues for a broad mandate: "Given the fact that the Fund is charged with providing financing to address crises that may be caused by premature liberalization, it may be particularly appropriate for the Fund to play a central role in determining when liberalization supports –

or undermines – stability of members and the overall system." One way of ensuring this is by giving the IMF the power to authorize both liberalization and controls. However, this carries significant risks given the IMF's continued inclination towards open capital account regimes noted above. Other ways and means should be found for the Fund to promote controls over destabilizing capital surges in the context of Article IV consultations as a way of preventing exchange rate and balance-of-payments instability, rather than giving it a broad mandate that could restrict the ability of DEEs to exercise control.

The Articles of the IMF not only recognize the right of members to regulate international capital flows but also authorize the Fund to request them to exercise control. The 1977 surveillance decision mentions, among the developments that might indicate the need for discussion with a member, behaviour of the exchange rate that appears to be unrelated to underlying economic and financial conditions including factors affecting competitiveness and long-term capital movements. The 1995 amendment explicitly refers to "unsustainable flows of private capital" as an event triggering such discussion.

These require that surveillance should include sustainability of a country's external balance sheet and hence effective management of external liabilities. As discussed in Section E, restrictions over capital outflows should become legitimate tools of policy at times of crises as part of orderly debt workout mechanisms. In the same vein, guidelines for IMF surveillance should specify circumstances in which the Fund should actually request the imposition or strengthening of controls over inflows.

For countries operating under Fund programmes, conditionality should include control over destabilizing capital surges. In the past the Fund not only refrained from doing this, but in fact supported exchange-based stabilization programmes relying on short-term capital inflows. The key issue is, however, how to increase the leverage of the Fund on capital account policies in non-programme countries relying on destabilizing surges in capital flows and reduce the likelihood of costly crises and bailouts. While many countries are now approaching such surges with greater caution, there are several which still continue to rely on them, allowing sharp appreciations and mounting trade imbalances. One option would be to restrict future access to IMF resources under Exceptional Access Policy for countries not heeding the advice for control over surges during Article IV consultations. This could also help slow down the surge in capital inflows and discourage moral hazard associated with bailout operations.

D. THE INTERNATIONAL RESERVES SYSTEM

1. Instability and imbalances

An international reserves system based on a national currency as a means of international settlement and a reserve asset faces serious dilemmas irrespective of exchange rate arrangements and the regime for international capital movements accompanying such a system. Triffin (1960) pointed to a paradox in the Bretton Woods system which could bring its viability into question: that is, it would be impossible to rely on the dollar for the provision of international liquidity and at the same time fix its value in terms of gold when the global economy and demand for liquidity are expanding rapidly. In such a system the net holding of dollar assets by the rest of the world would depend on the US running current account deficits. If the US stopped running deficits, the shortage of international liquidity would stifle growth and make it difficult for other countries to maintain parity. If, on the other hand, the US runs growing deficits and supplies adequate international liquidity to the rest of the world, the accumulation of liabilities could eventually undermine the confidence in the dollar, making it difficult to maintain its value vis-à-vis gold.

In a world of free international capital mobility, net dollar holdings by the rest of the world no longer depend on US current account deficits. The rest of the world can increase its net holding of dollar assets as long as the US is willing to increase its holding of foreign-currency assets through investment abroad. In such a case the accumulation of dollar liabilities will be matched by increases in US holding of foreign assets. There would be no deterioration of the net asset position of the US or increases in the global stock of dollar liabilities relative to other currencies. However, for the rest of the world to acquire safe US Treasuries, the US government would need to run budget deficits or should be willing to acquire foreign assets in exchange for Treasury bills and bonds. Otherwise, reserves would have to be kept in risky securities of US corporations, exposing reserve holders to default.

The Triffin paradox, as it was originally formulated, disappeared with the move to floating exchange rates and free capital movements, but the problem of instability did not. This is because the US deficits are no longer constrained by the obligation to maintain gold convertibility, and floating cannot restrict its ability and temptation to live beyond its means as long as demand for reserves

by the rest of the world continues to expand, particularly as a result of faster growth in lesser-developed economies.

Dollar domination has continued after the move to floating exchange rates, rapid growth of international financial markets and capital flows. The share of the dollar in non-gold official reserves has remained far above the share of the US in the global economy, falling only from 70 per cent at the time of the suspension of gold convertibility to some 65 per cent at present. The rise of Germany and Japan as industrial powers did not challenge the dominance of the dollar. As explained by the IMF historian Boughton (2001: p. 937), Germany and Japan "were reluctant to see their currencies 'internationalized' and used as reserves … Moreover, the prospect of a system of multiple reserve currencies was widely viewed, both inside and outside the Fund, as a potentially destabilizing development that was to be avoided if possible."

After the demise of the par values the US has continued to run its policies in pursuit of domestic objectives of growth and price stability, to the benign neglect of the external value of the dollar. As a result, its current account has been highly unstable, and the dollar has gone through several gyrations vis-à-vis other reserve currencies. These have produced considerable swings in international capital flows and instability in the exchange rates and balance of payments of DEEs.

With the Second Amendment the IMF was given the responsibility of conducting surveillance over its members' policies on reserve assets (Article VIII). While each member was required to collaborate with the Fund to ensure that its reserve policies are "consistent with the objectives of promoting better international surveillance of international liquidity and making the special drawing right the principal reserve asset in the international monetary system", this provision is devoid of any content with respect to the scope of obligations of IMF members (IMF 2010c).

2. Reserve costs

After the collapse of the par value system, the need for reserves was expected to ease as countries gained access to international financial markets and became more willing to respond to external shocks by adjustments in exchange rates. However, greater access to international finance and capital account liberalization in DEEs have produced exactly the opposite result by giving rise to accumulation of large stocks of external liabilities and growing presence

of foreigners in domestic securities markets, thereby making them highly vulnerable to sudden stops and reversals of capital flows. This has necessitated self-insurance, particularly after the 1997 Asian crisis when it became clear that the only collective insurance available, namely IMF lending, was highly unreliable and orderly debt workout mechanisms that could prevent meltdown were unlikely to develop.

While traditionally reserves covering three months of imports were considered adequate for addressing the liquidity problems arising from time lags between payments for imports and receipts from exports, it has become common wisdom that in order to avoid a liquidity crisis, international reserves in DEEs should at least meet their short-term external liabilities.[132] At the end of 2009 total international reserves of DEEs reached some $5.5 trillion, exceeding 12 months of imports. About half of these are earned from current account surpluses, mainly by China and fuel exporters, and the rest came from capital inflows – that is, they are borrowed reserves.[133] In a few countries such as China, current account surpluses and reserve accumulation have been associated with rapid growth. But in a large number of DEEs additional reserves were built from capital inflows as governments intervened to prevent currency appreciations and weakening of payments positions. Similarly, many commodity exporters have put aside part of the growing export proceeds and restricted domestic spending and growth for fear that, in the absence of self-insurance, an eventual downturn in commodity prices could lead to virulent crises.

These reserves are invested in low-yielding assets, mainly the US Treasury bills and bonds. On the basis of average historical spreads between the borrowing rate and return earned on reserves, the annual carry cost of borrowed reserves alone to DEEs can be estimated to be in the order of some $130 billion. This constitutes a net transfer of resources to reserve issuers, notably the US, and exceeds total official development assistance to developing countries.[134] The cost borne by DEEs would be greater if allowance is made for

[132] This is known as the Guidotti-Greenspan rule. ESCAP (2010: p. 20) argues that a "more precise yardstick of vulnerability encompasses the measurement of overall gross external liabilities of a country that are most clearly reversible and measurable. The components of such an approach are short-term debt, the stock of portfolio inflows and the magnitude of imports over three months."

[133] "Borrowed" in the sense that they accompany increased claims by non-residents in one form or another, including direct and portfolio equity investment, which entail outward income transfers.

[134] The method used here to estimate reserve costs differs from that in the literature in that a distinction is made here between borrowed and earned reserves. Polak and Clark (2006) also refer to borrowed reserves in their estimation of the cost to poorest developing countries.

foregone growth by putting export surpluses into US Treasuries rather than investment and imports.

3. Reducing reserve needs

There are several ways of reducing reserve needs of DEEs and hence costs in resource transfer to reserve issuers and foregone growth. First, measures that reduce the volatility of capital flows would also help diminish the need for self-insurance. They include effective surveillance over monetary and financial policies of systemically important countries which exert a significant influence on the size and direction of international capital flows. They also include regulation of capital flows, particularly control over short-term surges; as noted, it may be better to stop them entering the economy than to cover them with costly reserves. There is no multilateral obligation preventing countries from using such controls. As discussed, the Fund should also encourage them to control surges through conditionality and Article IV consultations.

Second, orderly debt workout mechanisms including internationally sanctioned temporary debt standstills and exchange controls would reduce the need for international liquidity at times of sudden stops and exits.

Third, pooling of reserves at the regional level could reduce total reserves held by the participating countries while providing adequate collective insurance. A recent example is the Chiang Mai Initiative with a reserve pool of $120 billion for meeting the temporary liquidity needs of the ASEAN+3 countries.

Finally, more reliable and adequate official financing at times of instability will reduce the need for self-insurance. However, as discussed in the next section, such lending should aim primarily at financing current account transactions rather than capital outflows and debt payments to international private creditors – the latter should be tackled mainly by mechanisms designed to involve the private sector in crisis resolution. In any case, as recognized by the staff of the IMF (Mateos y Lago *et al.* 2009), even if the IMF's lending capacity is significantly increased and tailored to instability in global economic conditions, the Fund is unlikely to elicit greater confidence among DEEs and persuade them to give up self-insurance unless its governance structure becomes significantly more dependable.

4. *Moving away from the dollar towards the SDR*

The solution to many of the problems associated with a reserves system dominated by a national currency should be sought primarily on the supply side. Going back to the gold standard is not an attractive and politically feasible option. Nor is a single global currency replacing all national currencies or the currencies of "rich democracies" (Cooper 2006).

That leaves two alternatives. The first one is to end the dominance of the dollar by promoting some other national currencies as perfectly substitutable reserve currencies. This has been happening to a limited extent with the euro and the Chinese yuan may soon emerge as a serious competitor to the dollar. However, while policies can promote the internationalization of a currency, the emergence of a currency as a perfectly substitutable reserve asset depends on a host of conditions that cannot be readily changed by policy, including deep and liquid financial and foreign exchange markets, macroeconomic stability and large share of the country in question in international trade.

Besides, it is not clear if a multi-currency system would be more stable than a reserves system dominated by a single national currency. On one view, it could promote better stability by imposing policy discipline over the dominant reserve issuer. On another, it could result in greater instability by allowing central banks to shift the composition of their portfolios to optimize expected return. In any case a multiple reserve currency system would not eliminate the problems of deflationary bias and resource transfers from DEEs.

The second alternative is to establish a global reserve currency to exist side by side with national currencies. This could be arranged in several different ways, as elucidated by United Nations (2009). One option is to introduce a new global reserve currency, like Keynes' bancor, exchangeable with national currencies at fixed rates, issued by a global central bank to provide countries liquidity for international payments clearance as well as overdraft facilities.[135] However, building on existing mechanisms and institutions and a gradual move

[135] For a recent discussion of this proposal in relation to the current crisis, see Monbiot (2008). Ironically this proposal is now revisited for addressing the problems associated with the dollar-based reserve system and the United States indebtedness while at Bretton Woods it was opposed by the very same country because it was the biggest creditor at the time and Keynes was proposing taxing current account surpluses. In contrast, in a recent speech on reform of the international monetary system, proposing adoption of the SDR as a global reserve currency, the central bank governor of China, the country with the largest surplus, referred to Keynes' bancor proposal as "farsighted"; see Zhou (2009).

towards the SDR (or expanded SDR) appears to be a more practical solution to several, if not all, problems of the dollar-based system.

SDRs no doubt present a more stable alternative to dollar holdings for DEEs by allowing diversification even though their expanded role in the system may not reduce instability among reserve currencies much more than what could be achieved by moving to a multi-currency solution. Moreover, unlike dollar reserves, holding SDRs does not entail costs; cost is incurred only when they are used. Under present arrangements SDRs are allocated to members in proportion to their quotas. Members obtain or use SDRs through voluntary exchanges or by the Fund designating members with strong external positions to purchase SDRs from those wishing to use SDRs allocated to them. When members' holdings rise above or fall below their allocation, they earn or pay interest respectively, with the interest rate being determined as the weighted average of interest rates in money markets in the currencies constituting the SDR.

The cost advantage of SDRs has given rise to calls for regular distribution to poor countries to ease the burden of holding reserves. Indeed, a former Director of Research of the IMF, Jacques Polak, argued that the only principle that should now guide the allocation of SDRs should be "the benefits of permitting low-income countries to acquire and hold reserves at a much lower interest rate than they would have to pay in the market and a reduced dependence of the system on borrowed reserves that are liable to be recalled when they are most needed" (Polak and Clark 2006: p. 553).

Regular substantial allocations of SDRs are certainly the most straightforward way to raise their share in reserve assets and help address the inequities in the current system. Allocations should be on a predetermined basis, linked to growth in world income and/or trade. It could also be adjusted countercyclically, accelerated at times of global slowdown. Using current quotas as the basis of allocation among countries would not raise the share of SDRs in reserve assets since a large portion would go to countries that do not need and use them. Given their external vulnerability, developing countries have much greater need and demand for reserves and this should be taken into consideration in reaching a formula for the allocation of SDRs among countries. On some proposals, all allocations could be given to developing countries (United Nations 2009: p. 116).

Another way forward is to make the IMF an SDR-based organization; that is, to have SDRs replace quotas and the GAB and NAB as the single source of funding for the IMF. The Fund could be permitted to issue SDRs to itself on a regular basis, to be used in lending operations. Again, this could be linked to growth in world income and/or trade. Several issues of detail would still need to be worked out, but once an agreement is reached to replace traditional sources of funding with SDRs, the IMF could in fact be translated into a technocratic institution of the kind advocated by Keynes during the Bretton Woods negotiations. Its funding would no longer be subjected to arduous and politically charged negotiations dominated by major industrial countries. Nor would it need to borrow from some of its members in order to lend to others. Such an arrangement could thus bring a considerable improvement to the governance of the IMF, allowing it to stay at equal distance to all its members and help to perform policy surveillance evenhandedly and effectively.

It is also possible to supplement these with a mechanism to remove the dollar overhang by allowing countries to replace their existing stocks of dollar reserves with SDRs without causing disruption in currency markets. This is the proposal made by the Governor of the People's Bank of China whereby the IMF would "set up an open-ended SDR-denominated fund based on the market practice, allowing subscription and redemption in the existing reserve currencies by various investors as desired" (Zhou 2009).

This proposal corresponds to what came to be known as the substitution account, extensively discussed in the IMF in two previous episodes of considerable dollar weaknesses, but abandoned for several reasons; first, in the early 1970s in the Committee of 20 in an effort to replace the Bretton Woods system with something more viable and then in the late 1970s and early 1980s as the dollar weakened considerably.[136] Under such an arrangement the IMF would issue interest-bearing certificates denominated in the SDR against dollar reserves handed over by central banks at the market exchange rate, and invest these reserves in interest-bearing US Treasury bonds. The operation would not affect the total volume of international reserves but its composition. Countries can use these certificates to settle international payments or acquire reserve currencies. The substitution would result in a withdrawal of a large stock of dollar reserves from the market and put them into IMF coffers. This would not only help diversify reserve holdings, but could reduce the risk of monetary

[136] For an account of these deliberations, see Boughton (2001: pp. 936-43). See also Bergsten (2009).

turmoil that could result from occasional unloading of dollar reserves by central banks.[137]

Several issues of importance to DEEs would need to be sorted out.[138] First and foremost, there is the question of who will bear the exchange rate risk. A change in the dollar/SDR exchange rate would create losses and gains for the IMF since, by definition, a substitution account would mean a currency mismatch between assets and liabilities. A sustained decline in the dollar against other currencies that make up the SDR will imply losses. The exposure of the Fund can be considerable if the account is open-ended, rather than restricted in size. There is no guarantee that interest differentials between the dollar and SDR would provide cover for such losses.[139]

In previous discussions of this proposal, the IMF gold was proposed to be used for cover. But this would mean pushing the losses onto all members of the Fund, rich and poor alike. If, on the other hand, the exchange rate risk were to be borne by holders of the SDRs, the operation would be meaningless – there would be no incentive for holders of dollar reserves to subscribe to the account. An alternative would be for the US to bear the risk – that is, to supply more interest-bearing dollar assets to cover exchange losses if the dollar falls against the other currencies. A more equitable solution would be to share the risk between the US and the central banks subscribing to the substitution account.

It is often argued that SDRs cannot become a principal reserve asset without significant expansion of their private use. An increased holding of SDRs as reserve assets would not be possible unless central banks can use them in currency interventions and diversification of their portfolios, and this calls for a deep and liquid market whereby banks and non-bank financial firms, as well as governments, issue and hold SDR-based instruments. This is necessary for the substitution account to be attractive to central banks, not only for replacing reserves held in dollars but also in other currencies.[140]

SDRs can provide a more stable store of value in so far as they help impose spending discipline on reserve-currency issuers and restrict the deficits

[137] Kenen (2005) suggests that a widespread unloading of dollar reserves into euro could be absorbed by establishing a similar substitution account at the European Central Bank.

[138] These are discussed in Boughton (2001, 2007) and Bergsten (2007a, 2007b).

[139] The IMF could invest dollar reserves into long-term Treasury bonds which normally carry higher interest rates. But this would not necessarily cover the exchange rate losses.

[140] This requires a market maker; see Eichengreen (2009).

they can run. They would allow expansion of international liquidity without requiring the US to run ever-growing deficits. They would also reduce the cost of reserve holdings by DEEs. However, a shift from the dollar towards the SDR cannot address the deflationary bias in the global economy because of absence of effective arrangements for adjustment in surplus countries. Indeed the deflationary bias may be aggravated because the US can no longer act as a locomotive and run growing deficits. Consequently, any initiative to move away from the dollar as the dominant reserve currency should be accompanied by arrangements to ensure adjustment in surplus countries.

E. CRISIS INTERVENTION AND LENDING

1. Expansion and proliferation of crisis lending instruments

The Fund is authorized by its Articles to lend from its General Resources Account (GRA) to its members facing balance-of-payments deficits and/or insufficient reserves so as to enable them to make necessary adjustments to resolve their payments difficulties. Except for reserve tranche purchases, such lending is subject to conditionality to ensure that the funds are used to resolve, rather than postpone, the payments difficulties and to protect the financial integrity of the IMF. Originally access to the Fund was restricted to current account financing. The Fund was prohibited from lending to meet sustained outflow of capital and empowered to compel a member to exercise capital controls as a condition for access to its resources.

With increased payments instability and recurrent capital account crises in emerging economies resulting from their rapid integration into global financial markets, the distinction between current and capital account financing has been lost and the Fund has increasingly become a lender to countries experiencing rapid and sustained outflows of capital and difficulties in debt servicing to private creditors. This role of crisis lending effectively started with the outbreak of the debt crisis in the 1980s when many developing countries borrowed heavily from multilateral sources to finance debt servicing to private creditors (Sachs 1998). The more the IMF has failed in crisis prevention, the more it has become involved in crisis management and lending. Indeed after almost every major financial crisis the IMF has sought a new role and this has

almost always been construed in terms of expansion of its lending to countries facing difficulties in external debt servicing and maintaining an open capital account. Efforts to expand crisis lending have not been matched by meaningful reforms to improve the quality and effectiveness of IMF surveillance and to introduce enforceable obligations in order to reduce the likelihood of crises with global repercussions.

In the wake of the Mexican crisis the Managing Director of the IMF suggested to the Copenhagen Social Summit in March 1995 that an effective response to financial crises such as the Mexican one depended on "convincing our members to maintain, at the IMF level, the appropriate level of resources to be able to stem similar crises if they were to occur", adding that this should lead to a decision in favour of "further work on the role the SDR could play in putting in place a last resort financial safety net for the world" (*IMF Survey*, 20 March 1995).

A new lending device, the Supplemental Reserve Facility (SRF), was created in response to the deepening of the East Asian crisis in December 1997 in order to provide financing above normal access limits to countries experiencing "exceptional short-term BOP (capital account) need resulting from a sudden and disruptive loss of market confidence."[141] This was followed in Spring 1999 by the Contingency Credit Line (CCL) designed to provide a precautionary line of defence in the form of short-term financing which would be available to meet future balance-of-payments problems arising from contagion. Simultaneously the Chief Economist of the IMF (Fischer 1999) suggested turning the Fund into an international lender of last resort, ready to provide liquidity to countries with sound policies so as to protect them against contagion and financial panic. The Exceptional Access Policy (EAP) adopted in 2002-03 allowed lending above limits to countries experiencing exceptional balance-of-payments pressure on the capital account.

The CCL was discontinued in November 2003 because countries had avoided recourse to it owing to fears that it would give the wrong signal and impair their access to financial markets. Again an alternative facility proposed in 2006, the Reserve Augmentation Line, based on prequalification and automatic access, was never activated because of concern over the prequalification process and adequacy of the Fund's resources. However, the current crisis has given the Fund reasons and opportunity for expanding its lending instruments and capacity. With the deepening and global spread of the crisis it introduced in

[141] For a summary of various Fund GRA facilities, see IMF (2009a and 2010f).

October 2008 the Short-Term Liquidity Facility (SLF) for countries with "short-lived and self-correcting BOP needs arising from external market developments despite strong fundamentals", with access based on *ex ante* qualification with a cap of 500 per cent of the quota. This was subsequently replaced in March 2009 by the Flexible Credit Line (FCL) "for countries with strong fundamentals, policies and track records of policy implementation" to be assessed by the IMF according to several predetermined criteria. Unlike the SLF it can be used on a precautionary basis without any hard cap. The High-Access Precautionary Stand-By Arrangements (HAPAs) introduced for members who could not meet the FCL's high qualification requirements have recently been replaced by a new Precautionary Credit Line (PCL) stipulating less demanding criteria for access.

All these initiatives have been supported by a decision of the G20 to triple the resources of the IMF to $750 billion through expansion of borrowing from its major members, and to raise them further to $1 trillion under a reformed quota system. The IMF is currently working with the government of Korea on a proposal for a global financial safety net including swap lines fashioned after those made available by the Federal Reserve to several emerging economies in the recent turmoil as well as multicountry lending under the FCL, to be discussed in the G20 summit in Seoul in November 2010.

2. *Pros and cons of crisis lending*

According to the Fund, its lending plays a key role in both crisis resolution and prevention. In a country facing a serious shortage of international liquidity and capital account crisis because of rapid capital outflows and interruption of its access to international financial markets, the availability of the Fund's resources would mitigate the burden of adjustment both by giving the country more time to adjust and by helping restore confidence (IMF 2009a: p.12). However, such lending is often accompanied by procyclical conditionality, leading to significant losses of jobs and income. Despite claims to the contrary, this still appears to be the case in current IMF programmes in several European countries. In many of these cases such as Greece, the funding provided by the IMF is serving to bail out creditor banks in more affluent European countries such as Germany, Switzerland and France, while fiscal tightening, austerity measures and other procyclical policies accompanying IMF lending are increasing the risks to their economic recovery (Weisbrot and Montecino 2010).

The IMF is now shifting emphasis from lending for "crisis resolution" towards lending for "crisis prevention" by offering precautionary credit lines under the FCL and PCL to qualified countries to protect them against speculative runs due to adverse spillovers from a crisis in a systemically important country. Although this role is described as crisis prevention, such lending is found necessary because of the failure of the IMF to forewarn and prevent systemic crises – such as the one triggered by the subprime debacle – in the first place. The *ex ante* conditionality provided by the prequalification criteria is expected to encourage countries to pursue sound policies, thereby reducing the likelihood of such a run. The automaticity of access to adequate IMF financing is also expected to mitigate the need for self-insurance through large stock of reserves and hence reduce the associated costs and imbalances. Indeed, the recent proposal to bolster international financial safety nets appears to contain a provision to cap countries' foreign exchange reserves in return for their access to IMF-anchored currency swaps (Narendranath and Venu 2010).

Such an expansion of crisis lending also creates a number of difficulties. First of all, it leads to a further fragmentation of IMF membership by creating different categories in terms of their eligibility of access to the GRA. Although differentiation is practised in the access of countries to different facilities introduced over time to address specific problems, such as the Compensatory Financing Facility established to offset export shortfalls and the Extended Fund Facility for structural payments imbalances, and the Fund is given discretion in determining the size of access, the ongoing reform of lending instruments and practices would imply that the IMF could become an institution primarily for a small number of more prosperous emerging economies.

Second, in differentiating among different classes of members in terms of their eligibility to access to precautionary lending, the Fund would effectively be acting as a credit rating agency. However, the past record of the IMF in anticipating crises, issuing early warnings and distinguishing between solvency and liquidity problems is not very encouraging, and definitely not better than that of private rating agencies. This would have implications for its financial integrity since, unlike these agencies, the IMF would be putting its money where its mouth is. The claim that it enjoys a preferred creditor status (IMF 2009a) has no legal basis. It is true that in Paris Club debt restructuring exercises official bilateral creditors have been willing to exempt the Fund from the restructuring process. However, this status has not always been accepted by private creditors. Thus, the "IMF could be party in any insolvency court

or insolvency proceeding by arbitration. No right to preference of any kind exists" (Raffer 2009: p .7). On the other hand, the suggestion that the IMF could protect its financial integrity at least in part by lending against collateral (IMF 2010b: p. 9 and 2010c: pp. 19-20) has little practical value.

Third, since risks assumed by the IMF would not be identical even among the countries within the same category, it would need to differentiate charges to price them properly. However, this is not permitted under Article V, which requires that the rate of charge arising from the Fund's holdings of members' currencies must be "uniform for all members" (IMF 2010c: p. 18).

Fourth, in order to reduce risks and protect its financial integrity, the IMF would need to constantly monitor the fulfilment of conditions for access to ensure that the pressures on the capital account of a qualifying country have resulted from a sudden loss of confidence amongst investors triggered largely by external factors rather than macroeconomic and financial mismanagement. In these respects difficulties are likely to emerge in relations between the Fund and the member concerned since such an assessment would involve considerable discretion on the part of the IMF. It would also open the door to political influence by its major shareholders, particularly when the level of access is not fixed. On the other hand, Maastricht-like prequalification criteria could create more problems than they resolve.

Fifth, precautionary credit lines can also aggravate the procyclical behaviour of financial markets. Countries that meet the prequalification criteria could experience surges in capital inflows which could lead to currency appreciations and current account imbalances and thus undermine the conditions that allowed eligibility to such lending in the first place. By contrast, others could come under more intense pressures from a systemic crisis simply because they are not eligible to precautionary credit lines.

Finally, crisis lending by the IMF often leads to an unequal burden-sharing between creditors and debtors. When funds are used to pay off debt to private creditors, sovereign commercial debt gets replaced by debt to the IMF which is often more difficult to renegotiate. Moreover, private debt gets dumped on the public sector – sovereign debt invariably rises after financial crises resulting from excessive build-up of debt by the private sector. All these create moral hazard and prevent operation of market discipline, because they allow investors and creditors to escape without bearing the full consequences of the risks they have undertaken.

In discussing the pros and cons of crisis lending, the IMF (2009a: p. 15) recognizes that official financing could end up financing larger private outflows and this could lead to creditor moral hazard. However, its attention is predominantly focused on the debtor moral hazard. In the assessment of "risks with crisis prevention instruments" no mention is made of creditor moral hazard, but concern is expressed that "members may be tempted to use excessively large precautionary arrangements to overinsure against risks thus leading to moral hazard." However, this is also underplayed on grounds that earning the privilege of rapid and upfront access to Fund resources would provide adequate incentives for sound policies and the EAP would provide a safeguard by enabling the Fund to carefully scrutinize access request and compliance with eligibility criteria (IMF 2009a: p. 33). More generally, the recent lending reforms are said to embed a number of safeguards to contain debtor moral hazard, notably by tailoring instruments to countries' fundamentals and policy track records (IMF 2010f: p. 14).

3. Involving the private sector in crisis resolution

Many of these problems associated with IMF lending at times of large and persistent capital outflows were recognized during the recurrent crises in emerging economies in the 1990s and early 2000s, and wide agreement emerged for involving the private sector in crisis resolution – that is, continued or increased exposure of international creditors to a debtor country facing serious difficulties in meeting its external financial obligations as well as arrangements that alter the terms and conditions of such exposure, including maturity rollovers and debt write-offs. A proposal pioneered by the United Nations Conference on Trade and Development (UNCTAD) was to draw on certain principles of national bankruptcy laws, notably those of the US insolvency code, for preventing liquidity problems from erupting into full-blown financial and economic crises and bringing an orderly resolution to sovereign debt when default is inevitable.[142]

[142] UNCTAD was the first international organization calling for orderly workout procedures during the debt crisis in the 1980s, drawing on Chapter 11 of the US bankruptcy code, noting that the absence of a clear and impartial framework for resolving international debt problems trapped many developing countries in situations where they suffered the stigma of being judged *de facto* bankrupt without the protection and relief which come from *de jure* insolvency (UNCTAD TDR 1986: annex to Chapter IV). The proposal was revisited after the East Asian crisis (UNCTAD TDR 1998). For the application of Chapter 9 of the US insolvency law dealing with debt of public agencies, see Raffer (1990). For the debate around mandatory debt workout mechanisms, see Akyüz (2002 and 2005) and Kaiser (2010).

Briefly, the application of these principles to international debt would involve, first, temporary standstills on payment of both sovereign and private external debt. The standstill decision needs to be sanctioned by an international authority to provide automatic stay on creditor litigation. This should be accompanied by exchange controls in order to stop the money fleeing the country in other ways. Standstills and restrictions need to be introduced to stop large and persistent outflows irrespective of whether payments difficulties reflect liquidity gaps or solvency problems that could eventually lead to default – something that is not always easy to identify *ex ante*.

Second, there could still be a need for the provision of external financing to the country imposing debt standstill and exchange restrictions. This could be secured by means of the so-called debtor-in-possession financing which automatically grants seniority status to new debt contracted after the imposition of the standstill. The task should primarily be assumed by the IMF by lending into arrears to private creditors. This would give *de jure* preferred creditor status to the IMF for its crisis lending. While it has to be recognized that money is fungible and in practice it is not always possible to identify the need catered for by a particular loan, it is important to ensure that IMF lending to counter volatility in private capital flows should aim primarily at maintaining imports and the level of economic activity rather than guaranteeing debt repayment to private creditors and maintaining capital account convertibility. This implies that there should be strict limits to IMF lending during capital account crises.

The third stage would be debt restructuring. In liquidity crises, standstills may need to be accompanied by extension of maturities of existing obligations and in most cases this can be negotiated between the debtor and creditors. The introduction of automatic rollover and collective action clauses (CACs) in debt contracts would facilitate voluntary settlements. However, in the case of insolvency when debt can no longer be paid according to original terms and conditions and default is inevitable, there would be need for impartial arbitration.

It is true that standstills and exchange restrictions could create difficulties for international lenders and investors which are often located in AEs, particularly when the amounts involved are large. Such systemic problems should be dealt with by national lenders-of-last-resort by providing support directly to their banks and other creditors in distress, rather than by IMF lending to debtor countries to keep them current on their debt payments. Many of the incentives proposed by the IMF (2009a: p.17) to secure voluntary

involvement of private creditors in crisis resolution, including forbearance by creditor country regulators for capital inadequacy and injection of capital into troubled lenders, could be used to mitigate the impact of standstills and exchange controls on creditors in AEs.

During the earlier bouts of instability and crises in emerging economies the IMF (1999 and 2000b) recognized the need for "involving the private sector in forestalling and resolving financial crises", but insisted on voluntary mechanisms. However, as these proved ineffective and some AEs started to oppose bailouts, the IMF Board agreed that "in extreme circumstances, if it is not possible to reach agreement on a voluntary standstill, members may find it necessary, as a last resort, to impose one unilaterally", and that since "there could be a risk that this action would trigger capital outflows … a member would need to consider whether it might be necessary to resort to the introduction of more comprehensive exchange or capital controls" (IMF 2000a). The Board was also willing to give support by "signalling the Fund's acceptance of a standstill imposed by a member … through a decision … to lend into arrears to private creditors." The Fund secretariat went even further and proposed a formal sovereign debt restructuring mechanism (SDRM) to "allow a country to come to the Fund and request a temporary standstill on the repayment of its debts, during which time it would negotiate a rescheduling with its creditors, given the Fund's consent to that line of attack", and to impose exchange controls (Krueger 2001: p. 7).

However, the SDRM proposal did not fundamentally address the problems associated with IMF bailouts. It was designed for countries facing insolvency while those experiencing liquidity problems were to continue to rely on IMF lending. The provision for statutory protection to debtors in the form of a stay on litigation was subsequently dropped. Even the diluted version of the proposal could not elicit adequate political support and had to be withdrawn, and the attention has shifted to contractual and voluntary mechanisms, notably CACs in sovereign bond contracts.[143]

While expanding its lending instruments and capacity, the Fund is once again opposing mandatory mechanisms to involve the private sector in crisis resolution and advocating, instead, voluntary mechanisms. Given the limited scope for voluntary involvement of private creditors in crisis resolution and the rapidly growing scale of bailout operations, this could not only overstretch the Fund's resources, but also endanger its financial integrity. This should

[143] For an account see United Nations (2005: Chap. V) and Herman and Spiegel (2007).

be a matter of concern for a number of emerging economies which are now becoming creditors to the IMF.

Voluntary and mandatory mechanisms are not mutually exclusive. There can be little doubt that countries would use mandatory mechanisms with considerable discretion and only as a last resort, preferring, instead, voluntary agreements with private creditors. And the Fund should lend to ensure that temporary liquidity gaps do not develop into full-blown crises. However, it should not finance large and persistent outflows of capital and should insist on private sector involvement in one way or another for continuing to provide support during a capital account crisis.

Sovereign debt workout mechanisms are on the agenda in the EU because of growing concern for insolvency of some member states and increased public discontent with bailout operations. In July 2010 the German finance minister proposed to equip the EU with a sovereign insolvency framework for orderly restructuring of unsustainable public debt in member countries and shifting at least part of the burden to private creditors. There are also suggestions for the creation of a European Monetary Fund "capable of managing an orderly default and debt restructuring of a government within the EMU" and making "the no bail-out [provision of the Maastricht Treaty] credible again" (Gros and Mayer 2010: p. 2). Whether these will produce effective arrangements needed to deal with the kind of difficulties associated with bailouts remains to be seen. However, they certainly reflect a recognition that current modalities of intervention in capital account crises call for a fundamental rethinking.

F. CONCLUSIONS

The current turmoil in the world economy has demonstrated once again that the international arrangements lack mechanisms to prevent financial crises with global repercussions. Not only are effective rules and regulations absent to bring inherently unstable international financial market and capital flows under control, but there is no multilateral discipline over misguided monetary, financial and exchange rate policies in systemically important countries despite their disproportionately large adverse international spillovers. Both national and international policy makers are preoccupied with resolving crises by opening the faucets and spigots to support those who are at the origin of the problems, rather than introducing institutional arrangements to reduce the

likelihood of their recurrence. Through such interventions, they are creating more problems than they are solving, and indeed sowing the seeds for future difficulties. For the first time in the post-war era, widespread economic difficulties are seriously threatening to disrupt whatever order the international economic system may have, by giving rise to beggar-my-neighbour policies in major economies, largely because of absence of multilateral disciplines over exchange rate policies and orderly and equitable adjustment to global trade imbalances without scarifying growth.

The international monetary and financial arrangements need a major overhaul. The primary objective should be to deliver "the global public good of financial stability." The missing components should now be evident after persistent instability and recurrent crises in emerging and mature economies:

- There is a need to establish credible and effective surveillance over national monetary and financial policies with global repercussions. This very much depends on introducing enforceable commitments and obligations regarding exchange rates of major currencies and adjustment to imbalances by both deficit and surplus countries.

- The world economy should move away from the current reserves system centred on the US dollar. This is essential not only for reducing global trade imbalances and securing greater international monetary stability, but also for the scarce resources of poorer countries to be used for investment and growth, rather than being transferred to the reserve issuer enjoying the exorbitant privilege of being able to live beyond its means without encountering serious costs.

- There should be a serious rethinking of the approach to international capital flows. The international community should firmly establish that controls over capital flows are legitimate tools of policy and they should be used not only by DEEs but also by AEs to secure macroeconomic and financial stability.

- Crisis intervention and lending should not undermine market discipline and distort the balance between debtors and creditors. Private creditors and investors should be involved in the resolution of payments crises

through both voluntary and mandatory mechanisms. With mounting sovereign debt with international dimensions in several emerging and mature economies, it is no longer possible to deny or ignore the need for impartial sovereign insolvency procedures.

Although some specific proposals are discussed above to address these problems, the objective of this chapter is not to provide blueprints, but to draw attention to main shortcomings in international monetary and financial arrangements. Genuine reform in these areas no doubt requires considerable reflection and debate in the international community in search of viable and effective solutions. This presupposes recognition of problems and shortcomings in the first place. However, the agendas of the G20 and the IMF still miss some of the most important issues that need urgent attention.

Developing countries have a particular stake in this endeavour given their vulnerability to adverse spillovers from AEs and limited capacity to respond. If major countries do not support the establishment of an orderly and equitable international monetary and financial system, DEEs should find ways and means of protecting themselves and looking after their interests through regional cooperation. These include arrangements regarding regional currencies and exchange rate mechanisms, intra-regional provision of international liquidity, policy surveillance and regulation of financial markets and capital flows. There can be little doubt that in many of these areas regional arrangements are generally inferior to those that could be established at the global level. But they definitely are better than a "non-system" pulled and pushed around by major economic powers.

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FINANCIAL CRISIS AND GLOBAL IMBALANCES examines – from a standpoint of promoting stability and growth in developing countries – key policy lessons to be drawn from the devastating global economic crisis of 2008-09.

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