

Yap, Josef T.

Working Paper

Managing Capital Flows to Developing Economies: Issues and Policies

PIDS Discussion Paper Series, No. 2000-41

Provided in Cooperation with:

Philippine Institute for Development Studies (PIDS), Philippines

Suggested Citation: Yap, Josef T. (2000) : Managing Capital Flows to Developing Economies: Issues and Policies, PIDS Discussion Paper Series, No. 2000-41, Philippine Institute for Development Studies (PIDS), Makati City

This Version is available at:

<https://hdl.handle.net/10419/127750>

Standard-Nutzungsbedingungen:

Die Dokumente auf EconStor dürfen zu eigenen wissenschaftlichen Zwecken und zum Privatgebrauch gespeichert und kopiert werden.

Sie dürfen die Dokumente nicht für öffentliche oder kommerzielle Zwecke vervielfältigen, öffentlich ausstellen, öffentlich zugänglich machen, vertreiben oder anderweitig nutzen.

Sofern die Verfasser die Dokumente unter Open-Content-Lizenzen (insbesondere CC-Lizenzen) zur Verfügung gestellt haben sollten, gelten abweichend von diesen Nutzungsbedingungen die in der dort genannten Lizenz gewährten Nutzungsrechte.

Terms of use:

Documents in EconStor may be saved and copied for your personal and scholarly purposes.

You are not to copy documents for public or commercial purposes, to exhibit the documents publicly, to make them publicly available on the internet, or to distribute or otherwise use the documents in public.

If the documents have been made available under an Open Content Licence (especially Creative Commons Licences), you may exercise further usage rights as specified in the indicated licence.

Managing Capital Flows to Developing Economies: Issues and Policies

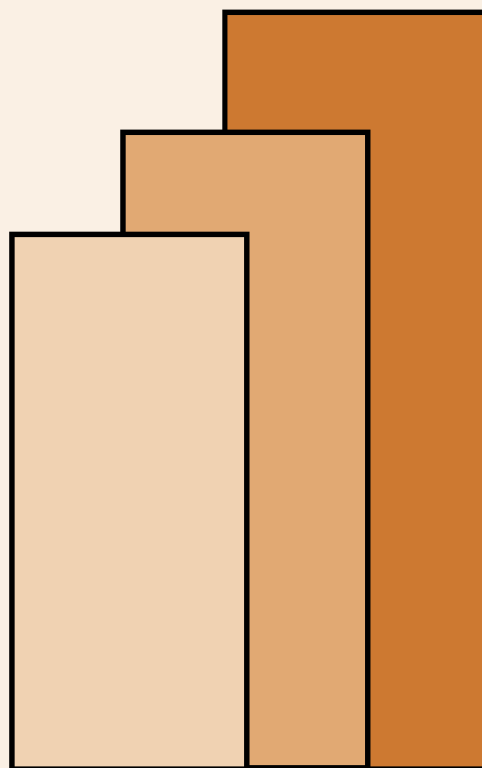
Josef T. Yap

DISCUSSION PAPER SERIES NO. 2000-41

The *PIDS Discussion Paper Series* constitutes studies that are preliminary and subject to further revisions. They are being circulated in a limited number of copies only for purposes of soliciting comments and suggestions for further refinements. The studies under the *Series* are unedited and unreviewed.

The views and opinions expressed are those of the author(s) and do not necessarily reflect those of the Institute.

Not for quotation without permission from the author(s) and the Institute.



November 2000

For comments, suggestions or further inquiries please contact:

The Research Information Staff, Philippine Institute for Development Studies
3rd Floor, NEDA sa Makati Building, 106 Amorsolo Street, Legaspi Village, Makati City, Philippines
Tel Nos: 8924059 and 8935705; Fax No: 8939589; E-mail: publications@pidsnet.pids.gov.ph
Or visit our website at <http://www.pids.gov.ph>

Abstract

The level of capital flows to developing countries had increased dramatically over the decade prior to the 1997 Asian financial crisis. In terms of composition, private capital flows dominated official flows beginning in 1992. The surge in private capital flows to emerging market economies was a reflection of the rapid expansion and integration of international capital markets that had been driven by economic policy and structural changes, and technological factors. Despite empirical evidence to the contrary, capital flows are generally considered to be beneficial to the process of economic development. Policies to manage capital flows must then be implemented in order to minimize their costs and prevent their disruptive effects. Policy options at the domestic level range from macroeconomic adjustments to microeconomic tools, which include capital controls. At the regional level, policy options for managing capital flows and economic crises include the proposed Asian Monetary Fund and the expanded ASEAN currency swap arrangement. At the international level, proposed grand schemes should give way to more incremental reforms, which revolve around modifying the role of multilateral organizations to make them more relevant (e.g. greater emphasis on the surveillance role of the IMF), improving macroeconomic policy coordination to enhance global economic stability, and increasing private-sector involvement in any debt-restructuring process.

Keywords: capital flows, capital controls, bail-in measures

Managing Capital Flows to Developing Economies: Issues and Policies

*Josef T. Yap*¹

Executive Summary

The level of capital flows to developing countries had increased dramatically over the decade prior to the 1997 Asian financial crisis. In terms of composition, private capital flows dominated official flows beginning in 1992. Meanwhile, private capital flows moved significantly away from loans and towards foreign direct investment (FDI) since the international debt crisis of the 1980s. Portfolio capital (equities and bonds) also experienced a sharp increase in the 1990s after being practically nonexistent in prior decades.

The surge in private capital flows to emerging market economies was a reflection of the rapid expansion and integration of international capital markets that had been driven by economic policy and structural changes, and technological factors. From the standpoint of developing economies, economic policy and structural changes can be categorized into two broad groups: those that are country-specific, or “pull” factors; and those that are external to the country and beyond its control, or “push” factors. Changes in international interest rates, recessions in industrialized countries and realignments among major currencies are examples of “push” factors. On the other hand, successful stabilization programs and capital account liberalization are the more prominent “pull” factors.

Despite empirical evidence to the contrary, capital flows are generally considered to be beneficial to the process of economic development. Policies to manage capital flows must then be implemented in order to minimize their costs and prevent their disruptive effects. Knowledge of the relative importance of “push” and “pull” factors would help in the design of policy responses to surges in capital flows.

Policy options at the domestic level range from macroeconomic adjustments to microeconomic tools. The most common response by developing economies was to sterilize any increase in money supply that resulted from the expansion in capital inflows through the issuance of domestic bonds. By keeping monetary expansion in check, inflation was put under control and the real exchange rate appreciation was limited. But sterilization entailed maintaining or widening the differential between domestic and international interest rates. Often this attracted further capital inflows, which partially or even fully offset the effects of sterilization. An interest rate differential was also a source

¹ Senior Research Fellow, Philippine Institute for Development Studies (PIDS). This paper was written while the author was a consultant for the Asian Development Bank RETA 5870: *Capacity Building for the ASEAN Surveillance Coordinating Unit and Technical Support for the ASEAN Surveillance Process*. The author would like to acknowledge the excellent research assistance provided by Ms. Roselle Dime. The usual disclaimer applies.

of “quasi-fiscal” deficits, since the central banks placed commercial paper in the domestic market at higher interest rates than those it obtained on its international reserves.

Since capital inflows inherently entail financial transactions they are also susceptible to market failures associated with information asymmetry and moral hazard. However, the effects of microeconomic distortions can be moderated by the appropriate pacing and sequencing of the liberalization process. The sequencing procedure, in this sense, has less to do with the order of current account and capital account liberalization but more with the necessity of implementing institutional reforms prior to easing restrictions on capital flows. Building a robust and efficient financial system capable of effectively intermediating international capital flows is a crucial precondition. Inter alia, it entails the adoption of international norms for regulatory standards, information disclosure and bankruptcy proceedings.

Because of the limitations of macroeconomic policy in dealing with the adverse effects of capital inflows and the relatively slow pace of institutional reform, other policy instruments must be employed to give economic managers more flexibility. In this context, some analysts have recommended the direct regulation of capital flows as a means of minimizing their costs. Three classes of measures are usually considered: a reserve-requirement or withholding tax on short-term capital inflows, prudential capital controls, and restrictions on capital outflows.

The empirical evidence on the benefits of capital controls is mixed. Capital controls impose costs on the domestic economy by restricting the quantity of foreign borrowing and raising its price. However, these costs are likely to be less than the costs of a full-fledged economic crisis. Nevertheless, capital controls cannot substitute for sound macroeconomic policy and a well-developed financial system. These should be the long-term goals of emerging market economies.

At the regional level, policy options for managing capital flows and economic crises include the proposed Asian Monetary Fund and the expanded ASEAN currency swap arrangement. These regional financial schemes could be complemented by a monitoring and surveillance system that would increase the chances of detecting an incipient economic crisis. One example is the Regional Monitoring Economic Unit (REMU) at the Asian Development Bank.

At the international level, there have been proposals for a world financial regulator, international institution that would serve as lender of last resort, an international bankruptcy court, an international financial crisis manager, an international federal deposit insurance corporation, and a world monetary authority that would oversee a global currency. At present, these grand schemes should give way to more incremental reforms, which revolve around modifying the role of multilateral organizations to make them more relevant (e.g. greater emphasis on the surveillance role of the IMF), improving macroeconomic policy coordination to enhance global economic stability, and increasing

private-sector involvement in any debt-restructuring process. The latter include so-called private sector bail-in measures that focus on collective action clauses in loan contracts.

=====

Introduction

The level of capital flows to developing countries had increased dramatically over the decade prior to the 1997 Asian financial crisis. Many economies in East Asia experienced rapid growth during this period. However, the 1997 crisis was precipitated by an abrupt and huge reversal of private capital flows to the Asian region. Moreover, recent empirical evidence has cast doubt on the positive impact of capital flows on economic growth. And even if capital flows are indeed beneficial—as theory predicts—economic managers still have to design appropriate policy responses in order to minimize their costs. Otherwise, the disadvantages associated with surges of capital flows will overwhelm any potential benefits. These issues have underscored the need to evaluate the role of capital flows in the development process.

The paper is organized as follows. A discussion on trends and determinants of capital flows provides a background for the analysis of their advantages and disadvantages. A brief presentation of empirical evidence will give an indication of the actual impact of capital flows. The discussion then shifts to appropriate policy responses to surges of capital flows at the national, regional and international levels. Policy options at the domestic level range from macroeconomic adjustments to microeconomic tools. Meanwhile, international initiatives to manage capital flows can be categorized into crisis prevention measures, on the one hand, and crisis management measures, on the other. The last section delves on prospects for capital flows to emerging markets in the Asia-Pacific region.

Recent Trends

Despite the surge in capital flows to developing countries, their ratio to GDP was about the same level in 1995 as during 1978-1981 (Bosworth and Collins, 1999). Moreover, these flows were heavily concentrated among several countries in Asia and Latin America. Five countries (China, Mexico, Korea, Thailand, and Brazil) accounted for nearly two-thirds of financial flows to developing countries in the 1990-95 period; the eighteen countries identified as emerging markets accounted for 90 percent of the total.² The share of Asian developing countries (ADCs) was 54 percent in 1996, more than any other developing subregion (Rana, 1998).

In terms of composition, private capital flows to developing countries dominated official flows beginning in 1992 (Table 1). Meanwhile, private capital flows moved

² Bosworth and Collins (1999), p. 148. The emerging market economies are Argentina, Brazil, Chile, Colombia, Ecuador, Mexico, Peru, Venezuela, China, India, Indonesia, Korea, Malaysia, the Philippines, Taiwan, Thailand, Morocco, and South Africa.

significantly away from loans and towards foreign direct investment (FDI) since the international debt crisis of the 1980s. The trend is quite distinct for ADCs as shown in Figure 1. Portfolio capital (equities and bonds) also experienced a sharp increase in the 1990s after being practically nonexistent in prior decades.

Capital flows to the ASEAN economies—sans Singapore and Brunei—and China followed a similar pattern. Table 2 shows that a steady increase in FDI propelled the share of private capital flows to the ASEAN economies. Portfolio equity investments experienced a sharp increase in 1993 with bond placements increasing substantially the next year. Meanwhile, bank and trade related flows rose sharply in 1995 and 1996. In the case of China, FDI was the single most dominant form of capital inflow.

After increasing every year between 1988 and 1996, total capital flows to the ASEAN economies fell in 1997 in the aftermath of the Asian financial crisis. This turned into a net outflow in 1998. As would be expected, private capital flows triggered the turnaround. Portfolio equity and bank and trade related flows were the first to react to the crisis. Subsequently, short-term outflows increased sharply (Table 3). The outflow of short-term capital started earlier and was more pronounced in Thailand. FDI flows were broadly stable during the crisis period.

Determinants of Capital Flows

The surge in capital flows to emerging market economies in the early 1990s was a reflection of the rapid expansion and integration of international capital markets that had been driven by economic policy and structural changes, and technological factors. The latter refer to revolutionary advances in handling of information and telecommunications and the emergence of increasingly sophisticated financial engineering. These factors have increased the speed and complexity of capital account transactions. Meanwhile, economic policy and structural changes from the standpoint of developing economies can be categorized into two broad groups: those that are country-specific, or “pull” factors; and those that are external to the country and beyond its control, or “push” factors.

One set of “pull” factors were policies that improved the relations of heavily indebted countries with external creditors. A key element was the role of debt-equity swaps in increasing the expected rate of return on domestic investment projects, thereby encouraging foreign direct investment (Calvo, et al., 1994). Successful price stabilization programs that were accompanied by improved fiscal policy fundamentals and greater macroeconomic stability were also major pull factors. Lastly, institutional reforms such as the liberalization of the capital account played a significant role in attracting capital flows. Indeed, the right to repatriate dividends and capital may have been the most important factor in the surge of foreign equity flows to emerging market economies (Taylor and Sarno, 1997).

Among the prominent “push” factors were the decline in international interest rates and economic recessions in industrialized countries. These factors reduced profit

opportunities in world financial centers and drove international capital to emerging market economies. Another type of push factor was in the mode of contagion effects. Large shifts in capital flows to one or two large countries in a region may have generated externalities for the smaller neighboring countries (Calvo, et al., 1996).

In terms of actual policy adjustments, regulatory changes in the US and Europe made it easier for foreign firms to place their equity and bonds under more attractive conditions to investors. This facilitated the trend towards international portfolio diversification. Meanwhile, competition and rising labor costs in industrialized countries, along with falling transport and communications costs, induced firms to seek opportunities to increase efficiency and returns by producing abroad (Rana, 1998). The realignment of major currencies contributed to this process. The result has been a progressive globalization of production and the growth of FDI flows.

A crucial debate has been on the relative importance of “pull” and “push” factors in the evolution of capital flows. If “pull” factors were the primary determinants of capital flows into emerging market economies, this would support the optimistic view that the sustainability of these flows is to a large extent a function of domestic policies under the control of developing countries. On the other hand, if the surge in capital flows was mostly a result of “push” factors, particularly interest rate movements, this would support the view that the capital flows are highly volatile because they are subject to factors beyond the control of policy makers (Fernandez-Arias, 1996).

The empirical evidence has generally been mixed. Some analysts argue that the weight of the evidence favors the push view—that falling US interest rates have played a dominant role in driving capital flows to developing countries (Fernandez-Arias and Montiel, 1996). Other studies have shown that country specific factors—e.g. the domestic credit rating and black market exchange premium—have been as important in influencing capital flows, particularly portfolio flows (Taylor and Sarno, 1997). The primacy of “pull” factors, however, can be questioned on several counts. Although it is true that not all countries have been recipients of the new inflows, it is also true that flows have not been restricted to countries with well-established track records of macroeconomic and structural adjustment. Second, country creditworthiness depends not only on domestic factors but also on the international interest rate.³ Third, the significant role of contagion in the 1997 Asian financial crisis points to the relative strength of “push” factors.

Knowledge of the determinants of capital flows has profound implications in terms of appropriate policy responses. In this context, the overriding objective of economic managers is to maximize the benefits of capital flows and minimize their costs.

Advantages of Greater Capital Mobility

Greater capital mobility is generally viewed to be advantageous to the process of economic development. Capital flows to emerging market economies have eased the

³ The first two arguments were made by Fernandez-Arias and Montiel (1996).

domestic savings constraint, which in turn has increased investment, thereby boosting economic growth. To the extent that real returns to marginal investment are lower in capital-rich countries than those in capital-scarce countries, then the movement of capital from developed economies to emerging market economies improves the efficiency of world resource allocation (Devlin, Ffrench-Davis and Griffith-Jones, 1995).

Instead of raising the investment rate indirectly by providing more resources, capital flows may do so directly in the form of FDI. This type of inflow usually brings a range of dynamic benefits such as technology, improved management practices and greater access to international markets.

The availability of international capital also provides an economy the ability to smooth expenditures especially in the advent of adverse exogenous shocks. Meanwhile, an open capital account for both developed and emerging market economies allows for greater portfolio diversification and better management of risk on the part of investors. This is one of the more common arguments at the microeconomic level for capital account liberalization (Devlin et al., 1995).

Drawbacks of Greater Capital Mobility

The Asian financial crisis was a painful reminder of the risks associated with more open capital accounts. Foreign capital flows may cause imbalances that threaten macroeconomic stability. This situation becomes likely if the absorptive capacity of the economy falls below the level of the capital inflows. Such a disparity arises because of policy arbitrage, where capital flows are attracted by the sound fundamentals of an economy causing financial markets to allocate too much or too little capital to some recipients at a given moment (Guitian, 1998).

If an economy has a flexible exchange rate regime, capital inflows will lead to an appreciation of the nominal and real exchange rates. This will have an adverse impact on the competitiveness of exports and import-substituting industries and result in a deterioration of the current account balance. The resource allocation effects of a real exchange rate appreciation may also spawn asset price bubbles and rapid credit expansion that could jeopardize the stability of the financial system.

In a fixed-exchange rate regime, capital inflows lead to a real exchange rate appreciation via inflationary pressure brought about by the increase in money supply and domestic credit. However, a fixed-exchange rate regime is more vulnerable when there is a net capital outflow. Unless it has adequate foreign exchange reserves, the monetary authority would have to raise interest rates to protect the peg. The likely outcome would be an economic recession.

Many factors could also undermine the efficacy of the capital inflows. The host economy may experience a mere substitution of domestic savings by foreign savings, which would only facilitate a consumption boom. In order to avoid this situation, a relatively high saving rate must be attained in order to generate a trade surplus that will

be used to service the foreign debt incurred. But even if this saving rate is attained, an insufficient amount of investment may be channeled to the tradable goods sector (most likely because of the appreciation of the real exchange rate), which would reduce the convertibility of the surplus to foreign currency needed to service the foreign debt.⁴ Some analysts have argued that even if capital inflows are channeled completely to investment, the resulting improvement in the growth rate is only short-term in nature unless it is accompanied by a significant improvement in the economy's technology (Reisen, 1998).

Since capital account inflows inherently entail financial transactions, they are also susceptible to market imperfections associated with asymmetric information and moral hazard. These microeconomic distortions normally result in an inappropriate assessment of risk exposure and cause over-borrowing, making the financial system vulnerable to exogenous shocks. The problem becomes particularly acute when banks are the main intermediaries of capital flows. The situation is even more precarious in emerging markets where the risk-management practices of the private sector are underdeveloped, the capacity of regulators to supervise the financial sector are limited, and the financial markets are thin.

Another potential microeconomic distortion arises from the real sector where aspects such as imperfect competition, externalities or wage rigidity, may result in inappropriate private sector adjustment even if the financial sector is functioning well (Fernandez-Arias and Montiel, 1996). Such static distortions may lead to the choice of a wrong technology and access to foreign capital will magnify the problem (Calvo, et al. 1994). Meanwhile, in the event of a sudden capital outflow, these distortions would induce exchange rate overshooting, making the economic adjustment more difficult.

Some Empirical Evidence

Despite the theoretical and intuitive arguments in favor of greater capital mobility, some studies have questioned the benefits of capital flows on empirical grounds. In one study, an indicator of capital account liberalization was included as an explanatory variable for economic growth (Rodrik, 1998). The conclusion reached was that the data provided no evidence that countries without capital controls have grown faster, invested more, or experienced lower inflation.

A more recent study used capital flows directly as an explanatory variable (Levine and Carkovic, 1999). The authors applied more sophisticated econometric techniques to account for simultaneity, country-specific effects and the inclusion of lagged dependent variables as regressors. The study found that the exogenous components of FDI flows and portfolio flows did not exert a positive influence on economic growth. The conclusion is consistent with microeconomic studies that generally suggest that FDI does

⁴ The conditions for the positive impact of net capital flows (channeled to investment, high saving rate, etc.) are contained in the framework called the debt cycle hypothesis (Devlin, et al, 1995; Reisen, 1996).

not boost economic growth primarily because of the absence of evidence of positive spillovers running from foreign-owned to domestic-owned firms.⁵

The study of Levine and Carkovic also looked at the effect of capital flows on productivity growth, which is an important determinant of the variation in long-term growth across economies. The data, too, did not show evidence of a link. However, a separate study by Levine (1999) presented evidence that the entry of foreign banks—a form of direct investment—enhanced the efficiency of the domestic financial system. Meanwhile, international portfolio equity flows were shown to have enhanced domestic stock market liquidity. Other studies have confirmed the positive effects of both financial system efficiency and stock market liquidity on productivity and economic growth. Hence, the study of Levine provided evidence of a transmission mechanism between foreign capital flows, on the one hand, and economic growth, on the other.

The study of Rodrik was criticized by Eichengreen (1998) as being biased. Variables that are negatively associated with growth but positively associated with the decision to open the capital account were inadvertently omitted. The study of Levine and Carkovic and the study of Levine indicate the evidence on the impact of capital flows is generally mixed. Finally, it is widely accepted by economic analysts that the spectacular growth of several East Asian economies (e.g. Singapore and China) was due in no small measure to FDI.

An analysis of the macroeconomic impact of capital flows can determine whether the aforementioned drawbacks have materialized. In one study, key economic variables for selected Asian and Latin American economies were monitored using data from 1988-1994 (Calvo, Leiderman and Reinhart, 1996). Some stylized facts were documented from these observations. First, a substantial portion of the surge in capital inflows was channeled to accumulation of foreign exchange reserves. Second, in most countries the capital inflows were associated with widening current account deficits. Third, there was a rise in consumption spending, which was usually driven by rising imports of durable goods. Fourth, in almost all countries examined, there was rapid growth in the money supply both in nominal and real terms. Fifth, the surge in portfolio flows was accompanied by sharp increases in stock and real estate prices. Lastly, the evidence on the real exchange rate presents a mixed picture. The data indicate that real exchange rate appreciation was more prevalent in Latin America than in Asia.

The stylized facts suggest that the disadvantages associated with capital flows (e.g. increased consumption and real exchange rate appreciation) are likely outcomes. Given the potential benefits of capital flows, it is thus imperative for policy makers to adopt measures that minimize their costs. Strategies for capital flow management can be developed at the domestic, regional and international levels. Policy options that exist in the domestic front can further be classified into macroeconomic and microeconomic responses.

⁵ Levine and Carkovic (1999) cite a number of studies that constitute the microeconomic evidence. One study is that of B. Aitken and A. Harrison (1999): “Do domestic firms benefit from foreign investment? Evidence from Venezuela.” *American Economic Review*, 89, 3 (June).

Macroeconomic Responses to Surges in Capital Flows

Monetary, fiscal and exchange rate policy adjustments are the first line of defense against the inherent disadvantages of capital flows. Economies that anchor their inflation policy on a fixed exchange rate and adopt a passive monetary policy usually apply nonsterilized intervention in the face of rapid capital inflows. The increase in money supply exerts downward pressure on interest rates, which would then slow down capital inflows. The drawback in this policy stance is that excess demand brought about by the rise in money supply may fuel inflationary pressure, which results in a real exchange rate appreciation. Moreover, interest rate premia will likely reflect anticipated problems with regard to macroeconomic balances and this will prevent domestic interest rates from converging to international levels.

At the other end of the spectrum, economic managers can opt for sterilized intervention where any increase in money supply that results from the expansion in capital inflows is sterilized by the issuance of domestic bonds usually by the monetary authority. Sterilization, if effective, prevents domestic real interest rates from falling and limits the expansion of aggregate demand. Lower inflation in turn slows the appreciation of the real exchange rate, thus preserving economic competitiveness.

But sterilization entails maintaining or widening the differential between domestic and international interest rates. Often this attracts further capital inflows and may partially or even fully offset the effects of sterilization. The interest rate differential is also a source of “quasi-fiscal” deficits, since the central bank is placing commercial paper in the domestic market at higher interest rates than those it obtains on its international reserves (Calvo, et al., 1994)

The problems associated with sterilized intervention highlights the constraints posed by the so-called “impossible trinity” wherein a fixed exchange rate regime is incompatible with full capital account convertibility and an independent monetary policy. Economic managers have to settle for two out of the three conditions. Hence, one alternative to avoid the undesirable effects of sterilized intervention is to adopt a floating exchange rate regime, which would then allow a more flexible monetary policy. To the extent that the equilibrium exchange rate appreciates as a result of capital inflows, this policy option has an advantage in that the real appreciation occurs all at once through the nominal exchange rate appreciation rather than gradually through inflation increases (Calvo, et al., 1994). It may also be argued that greater exchange rate uncertainty will discourage short-term speculative inflows.

The main disadvantage of a floating exchange regime is that capital inflows may induce a steep nominal and real exchange rate appreciation, which will have an adverse impact on competitiveness and resource allocation. Greater exchange rate volatility also has a negative effect on exports and investment.

Meanwhile, economic managers can also increase marginal reserve requirements to curb the capacity of banks to lend and reduce the need for sterilization. This policy option is especially relevant in economies where capital inflows have taken the form of substantial increases in local bank accounts. A drawback is that over time this policy may promote disintermediation, as new institutions are established in an attempt to bypass these regulations (Calvo, et al., 1994).

Economic managers may also adopt other complementary measures to minimize the costs of sterilization (Devlin, et al., 1995). One, increase the demand for foreign exchange through incentives for the outflow of capital during periods of surplus. This may be achieved by allowing pre-payment of external debt and relaxing the rules for foreign investment by nationals. Two, foster mechanisms that encourage productivity increases that will neutralize the effects of a real exchange rate appreciation. And three, impose fiscal discipline, which will reduce the need for tight monetary policy to rein in aggregate demand. To the extent that the bulk of government spending is channeled to the nontradeable sector, tighter fiscal conditions will reduce the appreciation of the real exchange rate. Greater fiscal discipline in response to capital flows is one reason why the appreciation of the real exchange rate was less in Asia than in Latin America (Calvo, et al, 1994 and 1996).

Financial Development as a Response

The effects of microeconomic distortions can be moderated by the appropriate pacing and sequencing of the liberalization process. The sequencing procedure, in this sense, has less to do with the order of current account and capital account liberalization but more with the necessity of implementing institutional reforms prior to easing restrictions on capital flows. Domestic financial intermediaries that lack competence are likely to misallocate capital.

Building a robust and efficient financial system capable of effectively intermediating international capital flows is a crucial precondition. Inter alia, it entails the adoption of international norms for regulatory standards, information disclosure and bankruptcy proceedings. The supervisory capacity of the monetary authority must also be strengthened in order to ensure that banks meet capital requirements, make adequate provision for bad loans, and subscribe to limitations on connected lending. International standards in prudential risk management must also be adopted. Aside from credit and liquidity risk, the private sector must also consider the foreign exchange risk in capital account transactions. Lastly, the domestic capital market—the corporate bond market in particular—must be deepened. This would improve domestic resource mobilization, minimize maturity mismatch, and enhance the ability of the economy to absorb greater capital flows.

The Case for Capital Controls

Given the limitations of macroeconomic policy in dealing with the problems of greater capital mobility and the long-term nature of financial development, some analysts have recommended the direct regulation of capital flows as a means of minimizing their costs. Increased volatility of capital flows brought about by the bias towards short-term transactions—a bias inherent in an environment of domestic financial liberalization and capital account convertibility—has made this proposition more relevant. In the context of modern financial engineering, derivatives and other offsetting transactions can even transform apparently longer-term liabilities to short-term liabilities (World Bank, 2000).

The increased volatility in capital flows has perked up the analysis of the phenomenon of self-fulfilling expectations and the possibility of multiple equilibria with only one set of economic fundamentals. Some theoretical models have suggested that capital controls will be unambiguously welfare improving under such conditions (Dooley, 1996). The existence of negative externalities in financial transactions—wherein the failure of a single bank or corporation may have disastrous contagious effects—also warrants the consideration of direct controls on capital flows.

The debate then focuses on the benefits and costs of capital controls and whether there is any empirical evidence to support their effectiveness in influencing the level and composition of capital flows, i.e. towards longer-term flows such as foreign direct investment.⁶ Three classes of measures are considered: reserve-requirement on short-term capital inflows, prudential capital controls, and restrictions on capital outflows.⁷

Reserve requirements on short-term capital inflows similar to those imposed by Chile in 1991 would place a portion of the externally acquired funds in non-interest bearing reserves for a fixed period. Such a requirement effectively acts as a tax, because the central bank rather than the borrower receives the interest on the funds held in reserve. The tax shifts a country's external liabilities toward maturities and reduces its vulnerability to sudden shifts in investor sentiment. However, to be fully effective, implementation requires comprehensive coverage of all inflows.

A similar proposal is to impose a cross-border capital tax that would subject all private financial flows to a withholding tax at the point and time of their entry into the country (Zee, 2000). The amount withheld on such inflows that is unrelated to capital movements would be credited against domestic tax liabilities, and excess credits would in principle be refundable. This system is more advantageous than the Chilean system of reserve requirements since the latter necessitates the identification of types of capital flows liable for the reserve requirement. In practical terms, this targeted coverage has been fraught with problems, as borrowers and officials looked to find, or close, loopholes in the system. The withholding tax largely sidesteps enforcement issues, because it covers all financial inflows and places the burden of proof on those who file for credits and refunds.

⁶ The greater share of FDI in capital flows to Asia, especially foreign investment in the export sector, is another reason why the real exchange rate appreciated less in this region as compared to Latin America.

⁷ The subsequent discussion is drawn heavily from the World Bank's Global Development Finance 2000.

Prudential controls on capital inflows take the form of limits to the amount and allocation of foreign borrowing. The rationale for prudential controls on capital flows arises when excessive international borrowing by a few banks or corporations has negative spillover effects on others within the economy. These limits take the form of capital adequacy standards, provisioning for bad loans, limits on lending to a single borrower or to particular sectors, and deposit rate ceilings.

Restrictions on capital outflows are difficult to implement and have generally proven ineffective. They may be appropriate, however, in a liquidity crisis when an economy has sound fundamentals but is adversely affected by contagion. The precise causes of a crisis, however, may not be evident while it is ongoing and opportunistic imposition of controls risks deterring long-term capital flows.

The following are some of the main conclusions based on empirical studies:

- Capital controls impose costs on the domestic economy by restricting the quantity of foreign borrowing and raising its price. The costs, however, are likely to be less than the costs of a full-fledged economic crisis.
- A distinction should be made between controls on capital inflows and controls on capital outflows. As mentioned earlier the right to repatriate dividends and capital—a form of relaxing capital controls on outflows—may have been the most important factor in the surge of foreign equity flows to emerging market economies. However, in the steady state, “push” factors govern the behavior of capital flows. In this situation, controls on capital inflows may be more relevant.
- In the case of Chile, the volume of capital flows declined immediately after the imposition of the capital controls on inflows (and during times when the reserve requirement was increased) but in the medium- to long-term the impact has been minimal (World Bank, 2000).
- Largely because the volume of inflows was unaffected in the medium-term, capital controls in Chile did not have a significant impact on the real exchange rate and only a very small effect on interest rates (Edwards, 1999).
- Inflow controls did seem to affect the composition of flows by extending their maturity structure. However, because of the minimal impact on the volume of capital flows, the share of short-term debt by residual maturity remains relatively high in Chile (Edwards, 1999).
- Controls on capital outflows should only be a short-term measure, particularly if the objective is to allow economic managers some leverage in implementing expansionary monetary or fiscal policies. In the longer term the controls can easily be circumvented.

- Capital controls cannot substitute for sound macroeconomic policy and a well-developed financial system. These should be the long-term goals of emerging market economies (Eichengreen, 1998; Edwards, 1999).

Eichengreen (1999) gives a pragmatic assessment of proposals to liberalize the capital account. In his book on the reform of the international financial architecture, he states:

“...There is no contradiction between using taxes and tax-like instruments to manage capital flows and the desideratum of capital-account convertibility. Convertibility means shunning prohibitions and quantitative restrictions that prevent market participants from undertaking certain transactions at any price but is compatible with taxes that better align private and social cost.”

Strategies at the Regional Level

Policy options at the regional level have naturally focused on cooperation among East Asian economies. Soon after the crisis, Japan proposed the establishment of the Asian Monetary Fund and offered to commit half of the recommended \$100 billion in reserves. The AMF was envisaged to perform the function of a lender of last resort in the East Asian region. A lack of institutional and intellectual infrastructure hindered the progress of the proposal. Moreover, the US and the IMF opposed the proposal, arguing that the IMF could in principle perform all the functions of the AMF. There was also concern that the existence of the AMF would weaken the ability of the IMF to impose conditionalities.

A more feasible option is the proposal to expand the existing ASEAN currency swap arrangement. In a standard set-up, a currency swap arrangement creates a mechanism by which countries with strong foreign-exchange reserves can provide short-term, hard currency loans to others whose currencies are under pressure or are experiencing balance of payment problems. Under the so-called Chiang Mai initiative, the existing ASEAN swap arrangement would be enlarged to include the other members of ASEAN. In addition, a network of bilateral swap and repurchase agreements will be concluded among ASEAN, Japan, China and South Korea.

Many critical issues have to be settled before the expanded swap arrangement can be operationalized. First, the size of the arrangement has to be specified. Initial figures range from \$20-40 billion. However, the recent Asian financial crisis involved a net reversal of capital flows from the region of about \$100 billion. An amount of this magnitude makes it necessary to reconsider the original proposed amount. Second, there has been no agreement on acceptable zones of currency fluctuation. In the absence of such an agreement, a currency swap arrangement may degenerate into an open-ended commitment to maintain the value of a specific currency that is under speculative attack. Third, it has to be decided whether borrowing would need to be collateralized with, for

example, US Treasury securities. Finally, it has to be determined whether the arrangements would be administered by central banks or whether a central secretariat would be involved.

To complement any regional financial arrangement, economic monitoring and surveillance can be conducted to increase the chances of detecting incipient economic crises. The Asian Development Bank established the Regional Economic Monitoring Unit (REMU) for this purpose. REMU's responsibilities extend beyond the traditional role of monitoring macroeconomic fundamentals. It also analyzes relevant structural and institutional policies and tracks down the social dimensions of the Asian financial crisis.

Strategies at the International Level: Crisis Prevention

By adopting better financial and corporate standards, emerging market economies can minimize the disruptions created by capital inflows. A major step would be subscribing to minimum acceptable international standards in bank supervision and regulation, accounting and auditing practices, and solvency codes. While this suggestion falls under the area of improvements in domestic policy, any individual economy must be able to send a credible signal to the market that international standards are being enforced.

One suggestion has been for the creation of a *world financial regulator*, run by investment professionals from the private sector that would oversee both banks and non-bank financial intermediaries (Rogoff, 1999). It would be empowered to harmonize minimum capital requirements, establish uniform accounting and disclosure standards, and monitor the performance of the financial institutions and markets of its members. The world financial regulator would also determine whether a particular economy has complied with the standards. The major problem with this proposal is that in the absence of greater global political integration, the international regulator would lack enforcement clout. Harmonization of standards would also reduce international government competition in attracting capital flows. The literature on international macroeconomic policy coordination shows that such competition can be healthy for promoting investment and productivity (Rogoff, 1999).

Instead of establishing a new institution to formulate and enforce minimum standards, existing multilateral organizations can collaborate with private-sector bodies with expertise in this area and with international committees of national regulators (Eichengreen, 1999). The International Accounting Standards Committee (IASC) and the International Organization of Supreme Audit Institutions (INTOSAI) are examples of the former while the International Organization of Securities Commissions (IOSCO) and the Basle Committee on Banking Supervision are examples of the latter. The IMF would be in the best position to coordinate this collaborative effort.

To do so, however, the IMF must take ownership of the minimum-accepted standards by bestowing official status to the standards and incorporating them in

conditionality agreements. The IMF would also be responsible for monitoring compliance and disseminating information on that compliance to markets. The drawback of this proposal is that the only a fraction of IMF member countries are subject to a program at any point in time. This creates an argument for having national regulators key capital requirements for foreign lending to whether the IMF rates the borrowing country as in compliance with the relevant international financial standards.

Even with sound regulatory, accounting and auditing standards, an economy may still be subject to a crisis because of contagion due to investor panic that results in a run on country debt. An analogy can be made with domestic bank runs. A solution for preventing the latter is letting government guarantee bank deposits—that is, serve as lender of last resort. This lends confidence to economic agents that a crisis in one bank would not result in other banks becoming illiquid.

Carrying this analogy further would lead to the proposal for an *international institution that would serve as lender of last resort* (Rogoff, 1999). Some analysts have argued that such an institution would merely be a formalization of an implicit function being performed by the G7. A similar proposal is for the IMF to offer a new emergency line of credit, for which countries would have to qualify by meeting certain macroeconomic and regulatory standards.

The main disadvantage of this proposal is that available resources are not enough to make the proposed institution effective in countering a broad-based attack on developing country debt. And even if the resources were available, the presence of such an institution would increase the chances of a bailout, which would encourage more risk-taking by banks in industrialized countries, and cause domestic economic managers to be more lax in their oversight functions. Even the IMF's credibility in forswearing bailouts is suspect (Obstfeld, 1998).

Strategies at the International Level: Crisis Management

In past banking and currency crises, the standard response was either to use precious resources to bail-out the debtor country and private investors or to allow a devastating default. The first alternative reduces the incentives for meaningful reform in the country that is embroiled in the crisis and at the same time encourages greater risk-taking by international creditors, which sets the stage for future crises. The second alternative cuts-off the debtor-country from the international capital market, leading to a massive economic dislocation. There is definitely a need for a more orderly way of restructuring problem debts.

One proposal is for the establishment of an *international bankruptcy court*, with powers similar to a domestic bankruptcy court (Rogoff, 1999). The basic idea is to give a debtor country some breathing room in the event of a default, and to prevent a grab race among creditors that would force the debtor country to liquidate or abandon potentially

high-yielding investment projects. Similar to the idea of a world financial regulator, the major problem of this proposal is lack of enforcement clout in debtor countries.

A more practical set of proposals concerns greater private sector involvement in any debt-restructuring process. In the long-run, this would raise the cost of international lending to both creditors and debtors—especially those that are highly vulnerable to a liquidity crisis— and increase the burden of the private sector in the resolution of a crisis. However, these factors would diminish the moral hazard problem associated with international lending. In addition, greater private sector involvement would decrease the financial assistance required from multilateral institutions and would also reduce the uncertainties surrounding the debt-restructuring process.

The most direct approach is to require private creditors to roll over their maturing claims, which effectively suspends payments and compels private creditors to negotiate. This approach, however, would not only raise the cost of future loans but also aggravate a crisis if creditors attempt to exit pre-emptively at the slightest hint of trouble in order to avoid any prospect of a negotiated settlement involving losses. Furthermore, a forced burden-sharing scheme may sharply reduce future private capital flows.

Measures to “bail-in” the private sector must therefore be developed in order to ensure their voluntary participation in any debt restructuring process (Eichengreen, 1999). The measures—which take the form of contractual changes and focus on collective action clauses—would also allow governments to declare a moratorium on debt payments without fear of repercussion on its international credit standing. The measures should be instituted during normal periods in order to give the private sector time to anticipate the effects of a crisis.

One measure is to adopt majority action when altering payment terms of contracts. This would prevent isolated creditors from resorting to lawsuits and other means of obstructing settlements that improve the welfare of the debtor and the majority of creditors. Another measure is to include collective-representation clauses, which allows an indenture trustee to represent and coordinate the creditors involved. Meanwhile, a payment-sharing scheme among creditors can also be incorporated in the contract. This would also discourage individual action that is damaging to the collective interest of the group.

A final change in the international architecture to bail in the private sector would be to create a standing committee of creditors. The main objective would be to provide better communication between lenders and borrowers, thereby reducing the information asymmetries that encourage the two sides to engage in a protracted war of attrition (Eichengreen, 1999). Creating the standing committee would also jump-start the negotiations between the debtor and creditors.

A disadvantage of these “bail-in” measures is that they could increase the costs and/or reduce the supply of foreign financing available to a country. These measures may also send a wrong signal to the market, thereby making countries reluctant to adopt

them. A solution to these problems is to require that all loan contracts adopt the bail-in measures.

Prospects for Capital Flows

After contracting sharply in 1998, capital flows to emerging markets in Asia are estimated to have increased in 1999 (Table 4). Further consolidation is forecast in 2000. The recovery of private capital flows has underpinned the resurgence of total flows but the performance across the various categories is mixed. FDI has been relatively stable while portfolio investment has experienced a strong rebound. However, commercial bank lending has been a source of net outflows since 1997 and this trend is predicted to continue in 2000. The upturn in capital flows to Asia coincides with the economic recovery in the region.

Prospects for private capital flows are brighter in the longer term. With appropriate reforms in the international financial architecture, financial integration should progress at a smoother pace. Technological innovations will continue to reduce transaction costs and make distant markets more accessible to small as well as large investors. In the East Asian region, economic fundamentals are still basically sound and on-going reforms will provide significant opportunities for investors. Moreover, capital will be sourced increasingly from the more progressive developing countries in the region and thus dependence from industrialized countries will be reduced. Finally, the aging populations of the more developed countries should lead to an increase in savings that would be available for investments in Asian emerging markets.

References

- Bosworth, B. and S. Collins (1999): "Capital Flows to Developing Economies: Implications for Saving and Investment." *Brookings Papers on Economic Activity* 1.
- Calvo, G. A., L. Leiderman and C. M. Reinhart (1996): "Inflows of Capital to Developing Countries in the 1990s: Causes and Effects" *Journal of Economic Perspectives* 10 (2).
- Calvo, G. A., L. Leiderman and C. M. Reinhart (1994): "The Capital Inflows Problem: Concepts and Issues" *Contemporary Economic Policy* XII, July.
- Devlin, R., R. Ffrench-Davis and S. Griffith Jones (1995): "Surges in Capital Flows and Development: An Overview of Policy Issues" in R. Ffrench-Davis and S. Griffith-Jones (eds.) *Coping with Capital Surges: The Return of Finance to Latin America*. Ottawa: International Development Research Centre.

- Dooley, M. P. (1996): "A Survey of Literature on Controls over International Capital Transactions" *IMF Staff Papers*, 43, 4, December.
- Eichengreen, B. (1998): "Capital Controls: Capital Idea or Capital Folly?" Manuscript. (<http://www.stern.nyu.edu/~nroubini/asia/AsiaHomepage.html>)
- Eichengreen, B. (1999): *Toward a New International Financial Architecture: A Practical Post-Asia Agenda*. Washington DC: Institute for International Economics.
- Edwards, S. (1999): "How Effective are Capital Controls?" National Bureau of Economic Research Working Paper 7413 (<http://www.nber.org/papers/w7413>).
- Fernandez-Arias, E. (1996): "The New Wave of Capital Inflows: Push or Pull?" *Journal of Development Economics* 48 (March).
- Fernandez-Arias, E. and P. Montiel (1996): "The Surge in Capital Inflows to Developing Countries: An Analytical Overview" *World Bank Economic Review* 10 (March).
- Guitian, M. (1998): "The Challenge of Managing Global Capital Flows" *IMF Finance and Development* 35, 2, June.
- Levine, R. (1999): "Foreign Bank Entry and Capital Control Liberalization: Effects on Growth and Stability" Manuscript (October).
- Levine, R. and M. Carkovic (1999): "Do Foreign Investment and Portfolio Inflows Accelerate Economic Growth?" Manuscript (December).
- Obstfeld, M. (1998): "The Global Capital Market: Benefactor or Menace?" *Journal of Economic Perspectives* 12, 4 (Fall).
- Rana P. B. (1998): "Surges and Volatility of Private Capital Flows to Asian Developing Countries: Implications for Multilateral Development Banks." Asian Development Bank Occasional Papers Number 19.
- Reisen, H. (1998): "Net capital inflows: How much to accept, how much to resist?" in R. Glick (ed.) *Managing Capital Flows and Exchange Rates: Perspectives from the Pacific Basin*. Cambridge University Press.
- _____ (1996): "Managing Volatile Capital Inflows: The Experience of the 1990s" *Asian Development Review* 14 (1).
- Rodrik, D. (1998): "Who Needs Capital-Account Convertibility?" in *Should the IMF Pursue Capital-Account Convertibility? Essays in International Finance No. 207*, International Finance Section, Princeton University (May).

- Rogoff, K. (1999): “International Institutions for Reducing Global Financial Instability” *Journal of Economic Perspectives* 13, 4, Fall.
- Taylor, M. P. and L. Sarno (1997): “Capital Flows to Developing Countries: Long and Short-Term Determinants” *World Bank Economic Review* 11 (3).
- World Bank (2000): *Global Development Finance 2000*
(<http://www.worldbank.org/prospects/gdf2000/gdfov-en.htm>).
- Zee, H. H. (2000): “Retarding Short-term Capital Flows Through Withholding Tax” IMF Working Paper 00/40 (<http://www.imf.org/external/pubs/ft/wp/2000/wp0040.pdf>).

Table 1
Net Long-Term Flows to Developing Countries
(billion \$)

	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999 ^a
Total	98.5	123.9	153.8	219.2	220.4	257.2	313.1	343.9	318.3	290.7
Official flows	55.9	62.3	54	53.4	45.9	53.9	31	39.9	50.6	52
Private flows	42.6	61.6	99.8	165.8	174.5	203.3	282.1	304	267.7	238.7
International capital markets	18.5	26.3	52.3	99.8	85.7	98.3	151.3	133.7	96.8	46.7
Debt flows	15.7	18.7	38.2	48.8	50.5	62.2	102.1	103.5	81.2	19.1
Bank lending	3.2	5	16.4	3.5	8.8	30.4	37.5	51.6	44.6	-11.4
Bond financing	1.2	10.9	11.1	36.6	38.2	30.8	62.4	48.9	39.7	25
Other	11.3	2.8	10.7	8.7	3.5	1	2.2	3	-3.1	5.5
Equity flows	2.8	7.6	14.1	51	35.2	36.1	49.2	30.2	15.6	27.6
Foreign Direct Investment	24.1	35.3	47.5	66	88.8	105	130.8	170.3	170.9	192

^a Preliminary

Source: Table 2.1 Global Development Finance 2000, World Bank

Table 2
Capital Flows to ASEAN and China
(billion \$)

	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998
Southeast Asia /a											
Net Private Capital Flows /b	3	10.62	15.64	20.98	22.70	24.38	26.18	48.35	68.11	34.09	-16.10
Net FDI	3.35	4.7	6.43	8.08	9.37	10.26	9.65	14.09	18.50	15.23	14.71
Net Portfolio Equity	0.49	2.07	1.05	0.05	0.84	10.80	6.17	11.46	9.80	-0.52	3.64
Net Portfolio Bond	-0.78	-0.39	0.12	0.57	-0.49	2.62	6.88	7.57	1.04	9.98	-0.94
Bank and Trade Related	-0.06	4.24	8.04	12.28	12.98	0.70	3.48	15.23	38.77	3.87	-1.34
Net Flow of Short-term Debt /c	-	-	-	-	-	-	-	-	-	5.53	-32.17
Net Official Capital Flows /b	3.96	4.9	4.93	5.49	5.58	4.88	4.14	2.78	2.61	8.02	6.38
Net Total Capital Flows /b	6.96	15.52	20.57	26.47	28.28	29.26	30.32	51.13	70.72	42.11	-9.72
China, People's Rep of											
Net Private Capital Flows	9.2	5.3	10.52	8.97	24.29	41.09	46.58	49.19	55.04	66.89	40.99
Net FDI	3.19	3.39	3.49	4.37	11.16	27.52	33.79	35.85	42.30	44.24	45.60
Net Portfolio Equity	0	0	0	0.65	1.19	3.82	3.91	2.81	2.90	8.46	1.27
Net Portfolio Bond	0.77	0.42	-0.05	0.02	0.00	2.24	2.88	0.32	0.82	3.33	1.59
Bank and Trade Related	5.24	1.49	7.08	3.93	11.94	7.51	6.00	10.21	9.02	4.81	-3.94
Net Flow of Short-term Debt /c	-	-	-	-	-	-	-	-	-	6.06	-3.53
Net Official Capital Flows	1.66	2.52	1.98	2.29	2.67	4.89	3.45	7.53	1.81	4.54	2.55
Net Total Capital Flows	10.86	7.82	12.5	11.26	26.96	45.98	50.03	56.72	56.85	71.43	43.55

/a Includes Cambodia, Indonesia, Lao, Malaysia, Myanmar, Philippines, Thailand and Vietnam

/b Only Net Total Capital Flows are strictly comparable. The data from GDF after 1996 do not distinguish between private and official short term flows. See note c.

/c Short term flows are distributed to other categories in earlier years. Arguably, a large proportion of short-term flows are private in nature and are not classified as FDI.

Source: Rana, P. *Surges and Volatility of Private Capital Flows to Asian Developing Countries: Implication for Multilateral Development Banks*, ADB 1998
Global Development Finance 2000 CD-ROM, World Bank

Table 3
Net Short-Term Flows to ASEAN and China
(million \$)

	1990	1991	1992	1993	1994	1995	1996	1997	1998
Cambodia	15	-1	0	0	-2	-18	1	13	5
Indonesia	3160	3180	3742	-70	1470	6509	6264	635	-9750
Lao	1	2	-2	1	10	-1	0	-4	-6
Malaysia	-367	168	1565	3312	-762	1085	3794	3871	-6283
Myanmar	15	18	-35	-4	13	20	-27	29	94
Philippines	425	452	429	-221	681	-437	-2690	3825	-4609
Thailand	2210	4170	2235	7907	6545	11916	-3482	-2777	-11313
Vietnam	-4	-74	444	-16	-150	317	242	-62	-303
Total ASEAN	5455	7915	8378	10909	7805	19391	4102	5530	-32165
PRC	2410	1463	2985	1531	2187	4842	3082	6057	-3532

Source: Global Development Finance 2000 CD-ROM, World Bank

Table 4
Asia/Pacific External Financing
(billion \$)

	1996	1997	1998	1999e	2000f
Current Account Balance	-52	-2.9	94.7	69.5	47.5
External Financing, net	182.7	108.7	32.6	42.8	68.7
Private flows, net	176.3	66.8	4.2	40.2	59.3
Equity Investment, net	62.6	57.8	60.3	72.8	77.4
Direct Investment, net	45.4	51.9	55.2	54	53.6
Portfolio Investment, net	17.2	5.9	5.1	18.8	23.8
Private Creditors, net	113.7	9	-56.1	-32.6	-18.1
Commercial Banks, net	80.1	-14.5	-59.6	-31.8	-17.6
Non-banks, net	33.6	23.5	3.5	-0.8	-0.5
Official Flows, net	6.4	41.9	28.4	2.6	9.4
IFIs	0.3	24.7	22.7	-3.6	4.9
Bilateral Creditors	6.1	17.2	5.7	6.2	4.5
Resident Lending/Other, net(1)	-76.1	-96.8	-76.3	-58.7	-67
Reserves (- =increase)	-54.6	-9	-51	-53.6	-49.2

e=estimate, f =forecast

(1) Including net lending, monetary gold and errors and omissions

Source: *Capital Flows to Emerging Market Economies April 13 2000*. Institute for International Finance