4

Complex Challenges in Developing-Country Debt

MUCH HAS CHANGED SINCE THE wave of financial crises that rocked emerging-market economies and disrupted global financial markets after 1994. Several favorable economic and policy developments over the past few years have renewed foreign investors' interest in developing countries.[1] Private capital flows to developing countries have shown a strong rebound in the past two years (chapter 1) on the strength of marked improvements in economic fundamentals and investors' search for higher yields than those available in developed-country markets. Emerging-market bond spreads have declined to near record lows, reflecting investors' assessments that the risk of a looming financial crisis is close to an all-time low.

But recent history provides a sobering reminder of how poor financial markets are at spotting brewing crises—and how costly such crises can be for the poor in developing countries. The prospects are good for the current favorable economic and financial conditions to continue in most developing countries (chapter 2). But rosy economic projections conceal vulnerabilities created by the stark external imbalances in the global economy and by the evolution of financing patterns, notably the rise of domestic debt in key middle-income countries. Many countries are better prepared for financial difficulties than they were in the 1990s, but others remain exposed. There is no room for complacency on the part of financial market participants and policymakers.

Looking ahead, there is a risk that global imbalances could unwind in a disorderly manner, resulting in abrupt movements in interest rates and exchange rates, possibly accompanied by a global slowdown and perhaps even protectionist trade measures (chapters 2 and 3). Such developments would almost surely affect investors' assessment of the risk of holding debt issued by developing countries. Emerging-market bond spreads could widen rapidly with a sudden swing in investor sentiment, debt-servicing burdens could rise, and disruptions in capital flows could accentuate stresses on vulnerable emerging markets.

But such pressures would not automatically lead to a replay of past crises. The drivers of debt accumulation since the mid-1990s are different from those of earlier decades, and this changed environment poses new and different risks. Several changes stand out.

First, many countries that were at the center of earlier crises have made significant progress in improving prudential and regulatory policies and structures, the weaknesses of which contributed to the crisis. Fiscal positions have been strengthened; corporate practices are more prudent; and the financial sector has moved to adopt international standards.

Second, the composition of financial flows has changed in a way that affects stability. Equity investments (foreign direct investment and portfolio equity flows), which are less volatile than bank lending, account for a growing share of capital inflows to emerging market economies. Bond and

short-term debt has grown in importance relative to bank lending, with important implications for the cost and availability of finance and the management of crises.

Third, the external debt burden of developing countries *as a group* has eased since the wave of financial and economic crises that began in the mid-1990s. But that easing has not been universal. Beyond the aggregates, one finds considerable country diversity. Severe difficulties persist in a few countries, and debt burdens have risen in more than half.

Fourth, the aggregate decline in external indebtedness has been partially offset by *a rise in domestic debt*. That shift brings some benefits, but excessive domestic borrowing can be just as harmful as excessive external debt.

Countries that have lowered their external debt have reduced their vulnerability to changes in the external financing environment and relieved pressure on their exchange rate. But the switch to domestic debt heightens other risks—notably the uncertainties of rolling over short-term debt (because maturities of domestic debt are generally shorter than those of external debt) and associated interest-rate risks.

Despite the growing sophistication of international capital markets and a steady growth in the capacity of central banks and monetary authorities in developing countries, significant weaknesses remain both in the international architecture that has evolved to regulate those markets (*Global Development Finance* 2004, chapter 2) and in the quality of data available on the fast-growing domestic debt markets in many emerging-market economies. Improving the monitoring and dissemination of information on public and private domestic debt flows should remain a priority for international institutions and national authorities.

The chapter proceeds as follows. After surveying significant changes in developing-country finance since the mid-1990s, we focus on current trends in external debt in the emerging-market economies. We then take a closer look at a particularly significant recent development in emerging economies—the rise of domestic debt markets. The interplay between external and domestic debt, and the special challenges of managing a mixed portfolio are the subjects of the last major part of the chapter.

The change since the 1990s

Since the mid-1990s, various developments have occurred that reflect the changing vulnerability of emerging-market economies to future crises:

- Overall external indebtedness has improved.
- The composition and character of external debt has changed.
- Domestic debt markets have grown rapidly in emerging-market economies, leading to new uncertainties about the scale of the overall debt burden in many countries.
- The policy environment has improved in many countries, notably the East Asian countries that were the focal point of the recent crises.
- A more accommodating and discerning international financial environment has evolved.
- Progress has been made on the international framework governing debt.

Reduced external indebtedness for many, and a larger role for non-debt-creating flows

Benchmarked against gross national income (GNI), developing countries' burden of external debt (public and private) declined from a peak of 45 percent of GNI in 1999 to an estimated 39 percent in 2003. The improvement was achieved despite an increase of almost $207 billion in the nominal value of total external debt, which rose over the last few years (after declining in 2000 and 2001), although at a much slower pace than during the 1980s and early 1990s.

Other indicators of the aggregate external debt burden of the developing world have improved significantly as well, although regions and country groups have been affected differently (table 4.1), as detailed in the next part of the chapter. Short-term debt as a percentage of total external debt is lower for both low- and middle-income countries in all regions except in Europe and Central Asia. This decline reflects reduced pressures on countries to maintain foreign exchange liquidity. The aggregate ratio of external debt to exports dropped sharply, from 135 percent in 1997 to 105 percent in 2003, while the debt servicing burden eased from 19 percent of exports to 17 percent.

Table 4.1 Selected indicators of the burden of external debt, 1997–2002/3

Percent

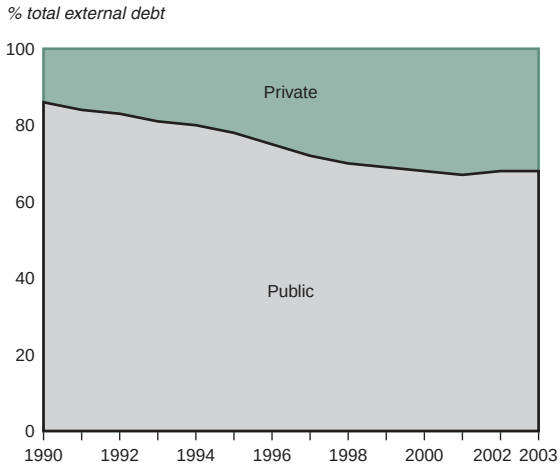
	All countries		Low-income		Middle-income		East Asia & Pacific		Latin America & Caribbean		Europe & Central Asia	
	1997	2003	1997	2003	1997	2003	1997	2003	1997	2003	1997	2003
Short-term debt/total debt	18.4	15.7	10.8	7.9	20.0	17.3	25.1	23.9	19.1	10.7	15.2	19.9
Total debt stock/exports	135.1	104.7	236.3	147.9	123.3	98.6	100.5	60.0	179.6	159.9	106.3	111.1
Total debt service/exports	18.8	17.2	17.7	12.0	18.9	17.8	12.1	10.5	35.1	30.7	12.2	19.8
Reserves/total debt stock	29.2	50.0	14.6	37.9	32.4	52.4	42.7	107.7	26.2	25.8	25.8	36.9
Reserves/imports (months)	4.4	6.5	3.5	6.8	4.5	6.4	5.3	8.3	4.8	5.0	3.0	4.8

Source: World Bank Debtor Reporting System.

Most notably, foreign exchange reserves of developing countries more than doubled, from $631 billion in 1997 (about 30 percent of their external debt stock) to $1.6 trillion in 2004 (60 percent of their debt stock), providing a valuable cushion against unanticipated external shocks (chapter 3). In line with these marked improvements in indicators of external debt, foreign capital flows from private sources recovered as well.

The share of foreign direct investment (FDI) and portfolio equity in the finance mix of many developing countries has grown in recent years. That trend enhances stability, because FDI investors generally emphasize long-term commitment and exhibit greater tolerance for near-term shocks. Equity flows accounted for 80 percent of total external financing during 1999–2003, compared with just 60 percent during 1993–98.

Figure 4.1 Composition of developing countries' external debt, 1990–2003



Sources: World Bank Debtor Reporting System and staff calculations.

The changing composition of external debt—more private borrowers

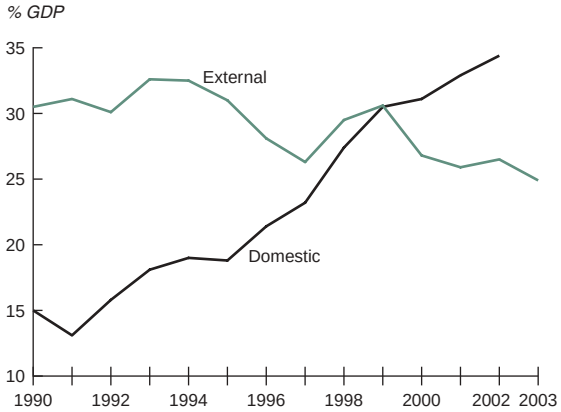
The ownership pattern of external debt has shifted. The share of public sector debt in total external debt declined from 82 percent during 1990–95 to 69 percent during 1996–2003 (figure 4.1).[2] Consequently, the ratio of external public debt to GDP declined from 31 percent to 27 percent over the same period. Deregulation in international capital markets and developing countries, expansion in the base of developing-country investors, and improved information and research—all facilitated access by corporate borrowers in developing countries to international capital markets.

But the declining public share is not universal—public sector indebtedness has *increased* in some countries, creating vulnerability related to their growing exposure to tradable external debt. Establishing access to private sources of cross-border finance often requires public participation to mitigate credit risks, especially in countries with low credit-risk ratings. In many countries bond financing is either a direct public sector liability or carries public sector guarantees. And governments often postpone direct dealings between the corporate sector and private international investors so as to maintain stability in the capital account. Both measures have had the effect of raising public sector indebtedness in some middle-income countries since the mid-1990s—among them Ecuador, Gabon, Lebanon, Romania, and Republica Bolivariana de Venezuela.

Growing reliance on domestic debt markets

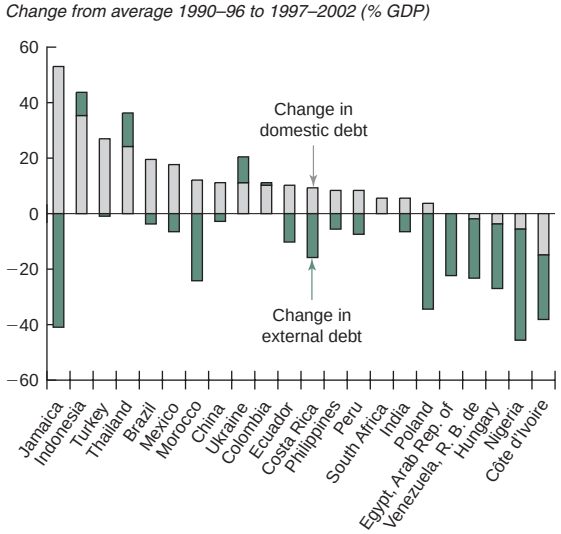
External debt reductions in emerging-market economies have been partly offset by growth in domestic public sector debt (figure 4.2). As a result,

Figure 4.2 Developing countries' total public sector debt, 1990–2003



Sources: World Bank 2004 for external debt data for countries reporting under World Bank Debtor Reporting System; IMF 2003 for domestic debt data.

Figure 4.3 Burden of public debt: external vs. domestic, 1990–2002



Sources: IMF; World Bank Debtor Reporting System.

in many countries, the overall burden of public sector debt remains high. In Costa Rica, Peru, the Philippines, and other countries, the decline in external indebtedness has been completely offset by the rise in domestic debt. In others, such as Indonesia, Thailand, and Ukraine, external and domestic debt have both risen since the mid-1990s (figure 4.3).[3]

The growing importance of domestic debt has been driven by several factors. Many developing countries have made a concerted effort to avoid exposure to currency risks and to assert greater control over public debt management. Both goals are supported by the recognition that the *perception of risk* in international capital markets has an important influence on capital flows and can affect financing prospects regardless of domestic conditions. (This was explored in chapter 3 of *Global Development Finance 2003*.) Liberalization of capital accounts in many countries has contributed to the growth of domestic debt by facilitating the deepening of domestic financial markets, a trend reinforced by the adoption of sound institutional and regulatory policies. But not all of the new money in domestic debt markets has come from within the country. With successful macroeconomic policies to manage inflation in some developing countries, liberalization has brought greater foreign investment in domestic debt markets in developing countries.

In 1993/94, on the eve of the Mexican peso crisis, the *external* public debt of developing countries averaged 33 percent of their GDP, while their *domestic* public debt averaged about 19 percent. By 2002/03, external public sector debt had declined to 26 percent of developing countries' GDP, but the domestic public debt burden had risen to 34 percent. Thus the total public sector debt burden of developing countries rose from 52 percent to 60 percent during this period. The implications of increased domestic debt are explored in greater detail later in the chapter.

An improved policy environment

Policies and performance in developing countries have helped bring about the observed improvement in indebtedness. Since the late 1990s, GNI in developing countries has grown three times faster than external debt. Many countries, especially those touched by recent crises, have adopted more market-oriented financial policies and increased their openness to international trade and investment. Fiscal policies have been more prudent, although concerns persist about the sustainability of public debt in several countries. Inflation has fallen, and many developing countries are showing strong growth in productivity. The spread of flexible exchange-rate systems has reduced the likelihood that an exchange-rate crisis will become a debt crisis and raised awareness of the risks inherent in currency mismatches. Since 1996, 19 developing countries have shifted to floating exchange-rate regimes.

In the Asian countries at the epicenter of the crisis in the late 1990s, initiatives to strengthen corporate and financial sectors have produced impressive gains. Considerable corporate restructuring has taken place, albeit at varying degrees (Kawai, Lieberman, and Mako 2000; Binamira and Haworth 2000). In four key countries (Indonesia, Malaysia, Philippines, Thailand), measures of profitability (income/sales ratios and return on assets) were up in almost all cases between 1998–2003, and measures of vulnerability to external pressures (interest/sales ratios, capital adequacy ratios) have strongly improved (table 4.2).

More broadly, stronger domestic environments and lowered susceptibility to shocks have impressed investors and raised credit ratings throughout the developing world (figure 4.4).

A more accommodating and discerning financing environment

Changes in the international financing environment have benefited emerging-market economies that have made improvements in their domestic macro policy. International capital markets today are more attuned to and more discriminating about development finance than in the past. This in turn imposes a degree of discipline on borrowing through greater transparency, a more substantial flow of information, increased market research, and finer distinctions in credit risk (World Bank 2004).

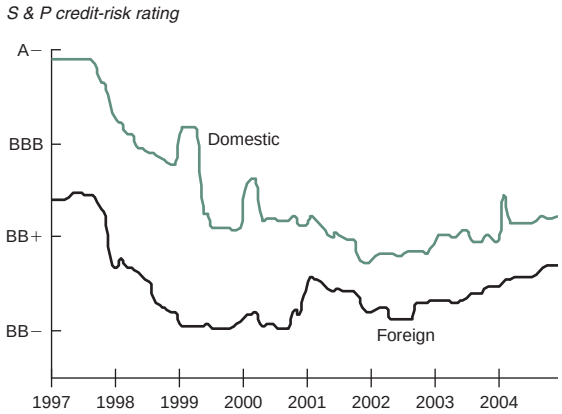
Table 4.2 Corporate and financial sector comparison for Asian crisis countries, 1998 and 2003

Percent

	Indonesia		Malaysia		Philippines		Thailand	
	1998	2003	1998	2003	1998	2003	1998	2003
Corporate sector								
Ordinary income to sales	−12.0	8.0	3.0	7.0	−0.5	4.0	7.5	11.0
Interest expense to sales	13.0	3.0	4.5	1.7	7.8	3.0	8.2	1.0
Financial sector								
Commercial banks' return on assets	0.6	2.7	1.8	1.6	0.4	1.2	−0.2	1.5
Capital adequacy ratio	2.3	22.0	11.0	13.0	15.2	17.5	11.0	11.2

Source: World Bank.

Figure 4.4 Credit quality of emerging markets, 1997–2004



Note: The credit quality calculations are based on weighted averages of long-term foreign and local-currency credit-risk ratings of countries rated by Standard and Poor's. The weights applied are the total outstanding foreign-currency debt as reported in World Bank (2004).
Sources: Standard and Poor's; World Bank staff calculations.

Overall, these developments have reduced the incidences of contagion and systemic risk in market-based emerging-market finance. Nearly 60 developing countries now carry formal credit-risk ratings, almost four times the number in the mid-1990s. And as international banks have aligned their assets and liabilities more consistently, local-currency bank lending to developing countries grew to 40 percent of all bank lending in 2003, compared with 15 percent in 1995. The switch from cross-border (or international) to local-currency lending by banks permits better risk management and thus greater stability. At the same time, the base of investors interested in the developing countries has changed—in particular, the share of speculative capital has declined relative to the mid-to-late-1990s, which helps dampen excessive and potentially crippling volatility in capital flows (World Bank 2003).

A strengthened international framework

The international financial architecture, which aims to prevent sovereign debt defaults and facilitate orderly debt restructuring, has been strengthened in significant ways (Frankel and Roubini 2003) though the work is by no means complete (Peterson, Goldstein, and Hills 2004). Collective action clauses (CACs) have been introduced in bond-financing transactions, and discussions over a code

of conduct continue. The Capital Adequacy Accord (Basel II) offers the potential to strengthen the banking sector and enhance the ability of banks to take on and sustain riskier lending, through measures to mitigate and manage risk. Joint efforts on statistics and monitoring supported by the World Bank, the Organisation for Economic Co-operation and Development (OECD), the International Monetary Fund (IMF), and the Bank for International Settlements (BIS) are improving the quality and quantity of information available for assessing risk and managing approaching crises.

Despite these improvements, additional progress is needed. While CACs have emerged as the main vehicle for facilitating debt restructuring, they apply only to bond debt and even there the impact is limited. CACs have not been universally adopted in new developing-country bond issues, and they are absent from most bond debt issued before 2002. Thus debt restructuring remains a laborious and time-consuming process. For example, resolution of Argentina's default on its public sector debt, worth $102.5 billion, took more than three years. The government and creditors differed over the degree of reduction in the nominal value of debt, the treatment of past-due interest, and the capacity of the government to pay.

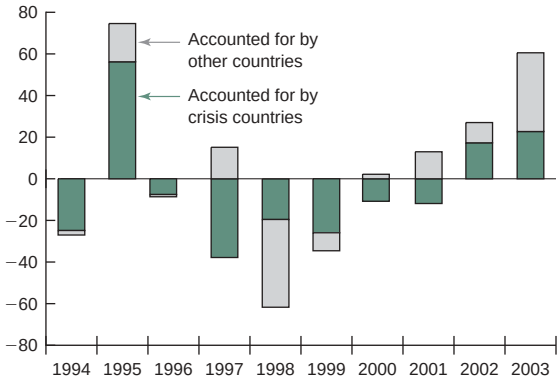
External debt trends in emerging markets

External debt burdens played a key role in precipitating the financial crises centered in emerging-market economies during the 1990s. As the current global growth cycle slows, and interest rates rise, it is worth considering how emerging-market economies' external debt burdens have evolved and how resilient their debt situation might be to changing external conditions.

Recent debt crises were concentrated in just a few countries, but the resulting tremors shaped the evolution of development finance—and continue to do so. In the mid-1990s, contagion from localized financial and economic pressures often led to broad market closures for developing countries. Even the level of official financing available to the developing world was affected, as financial rescue packages diverted resources from other countries. Since then, changes in net private debt flows for these countries have been the main drivers of private debt flows to all developing countries (figure 4.5).

Figure 4.5 Change in net private debt flows (long-term plus short-term) of crisis countries and others, 1994–2003

$ billions, year/year



Sources: World Bank Debtor Reporting System and staff calculations.

Nine countries that have absorbed the bulk of market-based financing since the 1990s—Argentina, Brazil, Indonesia, Malaysia, Mexico, Philippines, the Russian Federation, Thailand, and Turkey—were also at the center of the crises of the 1990s. These countries still have the potential to trigger systemic crises in market-sourced development finance, not only as bellwethers, but also because together they account for almost 70 percent of all developing-country debt tradable in the secondary market and half of all privately sourced debt (in 2002).

Aside from their status as market leaders, the countries that have developed and exploited their access to capital markets are a diverse group. Countries such as Argentina, Brazil, and República Bolivariana de Venezuela have long struggled with high debt burdens in one form or another. After borrowing extensively from international banks during the 1970s, their bank debt was restructured in the 1980s, giving rise to the phenomenon of Brady bonds. The emerging-market economies of East Asia, by contrast, obtained greater access to capital markets as they matured. Until the early 1990s, the external debt burden of East Asia as a whole (in relation to GNI) was half of that for Latin America. A third group comprises relatively modest borrowers. Some, mostly high risk, have long maintained limited access to syndicated or structured bank credit, while others (for example, Estonia, Guatemala, Jamaica, and Lithuania),

Box 4.1 Currency valuation effects have significant impacts

Cross-currency valuation effects arising from movements in the value of the dollar against other world currencies, as well as debt forgiveness or reduction, have affected the value of developing-country debt from year to year (table).[a] For example, in 2002, the magnitude of the exchange-rate valuation effect for all developing countries ($71 billion) was almost equal to the nominal change in their total debt stock ($76 billion).

With almost 40 percent of developing-country debt denominated in nondollar currencies, cross-currency valuation can be significant. Regional variations exist as well—in Latin America and the Caribbean, only 25 percent of external debt is denominated in currencies other than the dollar, while in Middle East and North Africa, nondollar currencies account for 55 percent of outstanding debt. Cross-currency valuation effects have been particularly prominent since the late 1990s.

These revaluation effects are one way in which developing countries are exposed to the international financing environment (chapter 3). At times, currency effects dwarf actual changes in net cross-border debt flows. In Argentina, Indonesia, and Morocco, for example, unfavorable currency valuations neutralized the decline in their total outstanding debt in 2002 (figure). In Argentina, repayments and debt restructuring led to a decline in outstanding debt of $5.4 billion in 2002, while cross-currency valuations raised the price of that debt by almost $7 billion. In Brazil, debt repayments amounted to $1.4 billion in 2002, but cross-currency valuations added $4.2 billion to the outstanding debt burden.

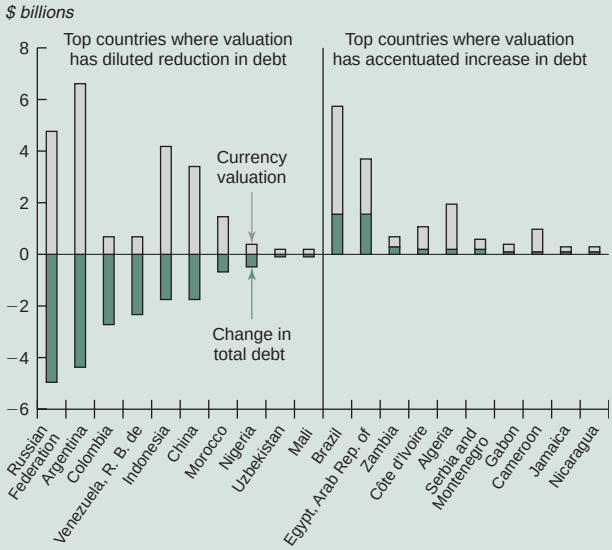
Composition of change in external debt in developing countries, 2000–3

$ billions	2000	2001	2002	2003
Change in total debt stock	−64	−22	76	219
Net flows on debt	−6	−4	7	62
Cross-currency valuation	−53	−41	71	87
Debt forgiveness or reduction	−26	−7	−7	−3
Net change in interest arrears	−7	3	1	11
Interest capitalized	14	1	4	1
Residual	14	26	0	61

a. Countries contract debt in various currencies. The debt data that countries report to the World Bank's Debtor Reporting System is expressed in the currencies in which the original debt was contracted or in currencies in which it is repayable. For purposes of standardization and aggregation, the DRS converts these amounts into dollar values. The exchange rates used are generally the par values or central rates specified by the International Monetary Fund or market rates when necessary. Exchange rates in effect at the end of any given year are used to convert the stock of debt outstanding for that year in various currencies into the nominal dollar value.

Source: World Bank Debtor Reporting System.

Magnitude of change in debt and currency valuations as of 2002



Sources: World Bank Debtor Reporting System and staff calculations.

have been able to penetrate the more discerning bond financing segment of the market.

Higher external debt in two-thirds of middle-income countries

The overall reduction in the external debt burden of middle-income countries since the crises of the 1990s masks diversity among individual countries. The aggregate reduction derives from reductions in a few countries—among them China, Mexico, and Thailand (table 4.3)—that together account for only about a third of outstanding developing-country debt. By contrast, in two-thirds of middle-income countries, the debt burden *increased* from 1997 to 2002, with the increase larger than 20 percentage points of GNI for more than one-quarter. Overall, for middle-income economies, the ratio of external debt to GNI remains at levels higher than

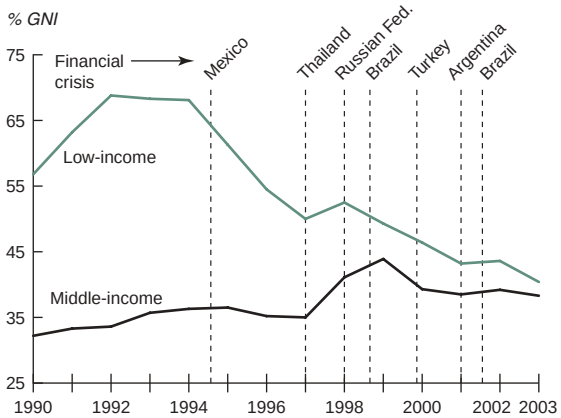
Table 4.3 External indebtedness of top 20 debtors, 1997 and 2003

Total external debt as percentage of GNI

	1997	2003
Brazil	25	50
China	17	14
Russian Federation	32	42
Argentina	45	136
Turkey	44	62
Mexico	38	23
Indonesia	65	68
India	23	19
Poland	27	46
Philippines	59	72
Thailand	75	37
Malaysia	50	50
Hungary	57	58
Chile	37	63
Pakistan	49	51
Czech Republic	42	40
Nigeria	84	70
Venezuela, R. B. de	41	42
Colombia	31	44
Egypt, Arab Rep. of	39	38

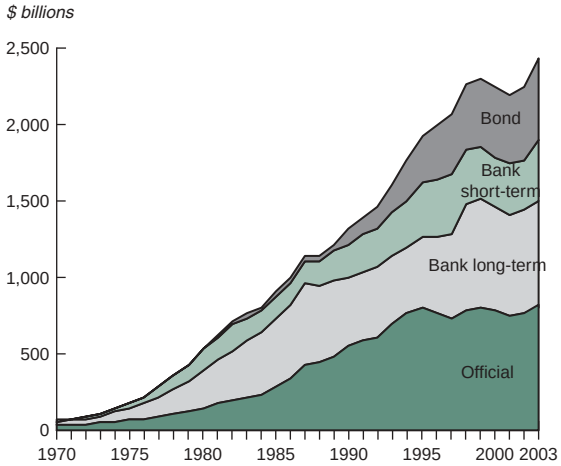
Note: Countries are ranked according to the nominal value of their total external debt stock as of 2003.
Source: World Bank Debtor Reporting System.

Figure 4.6 Total external debt of developing countries, 1990–2003



Sources: World Bank Debtor Reporting System and staff calculations.

Figure 4.7 Composition of outstanding external debt of developing countries, 1970–2003



Source: World Bank Debtor Reporting System.

those seen in the early 1990s (figure 4.6). The big increase in the debt-GNI ratio occurred in 1997–99, rising by nearly 8 percentage points (from 35 to 43 percent) with the combination of the Asian, Russian, and Brazilian crises.

Among the emerging-market economies in which external debt has risen, in some cases sharply, are Argentina, Brazil, Indonesia, Philippines, Poland, the Russian Federation, South Africa, and Turkey, several of which have had persistent debt problems. For this group, the ratio of external debt to GNI climbed on average by 21 percent between 1997 and 2002, while the ratio of debt to exports of goods and services also rose by 28 percentage points (to 181 percent in 2002).

In many cases, increased external debt has been accompanied by rising domestic debt, as we shall see.

New vulnerabilities created by market changes

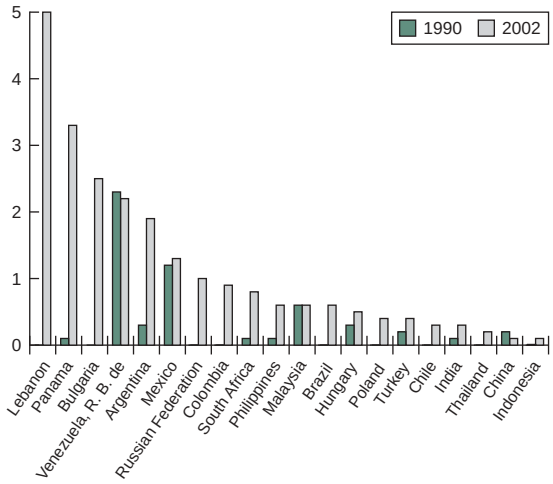
Developing-country debt crises became more market-driven in the 1990s. Bond debt and short-term bank credit, both of which are strongly affected by short-run developments in the external financing environment, now make up a much larger share of developing countries' external debt than at any point in the past three decades.[4] By the end of 2003, bond and short-term bank debts together accounted for 45 percent of the outstanding external debt of developing countries, compared with 29 percent in 1990, and an average of 24 percent during 1970–89 (figure 4.7, box 4.2). Particularly noteworthy has been the growth in bond debt, which mushroomed to 27 percent of the total outstanding debt in 2003, up from only 4 percent at the start of the 1990s. All of the countries that have faced debt pressures or crises since the 1990s vigorously substituted bond financing for bank credit during 1990–2002 (figure 4.8).

Box 4.2 The role of short-term bank credit in trade financing

Trade financing plays a crucial role in facilitating international trade for developing countries. For many developing countries lacking access to capital markets, short-term bank credit is the primary source of market-based finance for facilitating cross-border movement of goods. Availability of long-term credit for this set of countries is severely restrained due to their credit risk (or its perception) and their minuscule share of international trade. This can lead to a build-up of primarily short-term debt for a country, which may be necessary for mobilizing trade. Short-term trade financing via commercial banks has reached developing countries owing to the mitigation of risk for creditors under security arrangements provided by the traded goods. Such financing is even more widely spread than general bank lending, which unlike other forms of market-based debt financing is relatively more easily accessible by developing countries. As shown in *Global Development Finance* 2004, the share of trade financing in total bank lending commitments has been higher for non-investment grade and unrated developing countries than for investment grade rated countries. Thus, along with possible vulnerabilities, the merits of short-term bank lending should also be acknowledged.

Figure 4.8 Substitution of bond financing for bank credit, 1990–2002

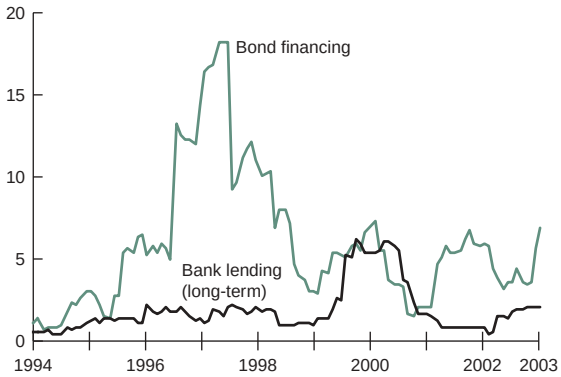
Ratio of bond financing to bank credit



Note: Refers to countries that account for 90 percent of the bond debt outstanding as of 2002.
Sources: World Bank Debtor Reporting System and staff calculations.

Figure 4.9 Volatility in acquisition of new debt, 1994–2003

12-month trailing variance in gross flows ($ billions)



Sources: Dealogic; World Bank staff calculations.

Bond financing is more susceptible to pricing conditions (for new debt) and to risk perceptions in international capital markets than is long-term bank lending, where information asymmetry can be at least partly dealt with through syndication with local banks (Esty and Megginson 2003; Nini 2004).[5] New bond financing levels have fluctuated widely since 1994, often declining sharply in response to localized market seizures or voluntary postponement of issues to avoid a turbulent market environment, and sometimes spiking with short-run market euphoria (figure 4.9).

Volatility in new bond financing was high during the mid to late-1990s, largely because investors and borrowers were highly concentrated. At the same time, unfamiliarity with the market on both sides made bond financing vulnerable to systemic risk and contagion. Volatility has subsided since 2000, with a widening of the investor base, finer distinctions among credit risks, increased prudence in borrowing and expanded efforts by both the public and private sector to promote a new financial architecture.

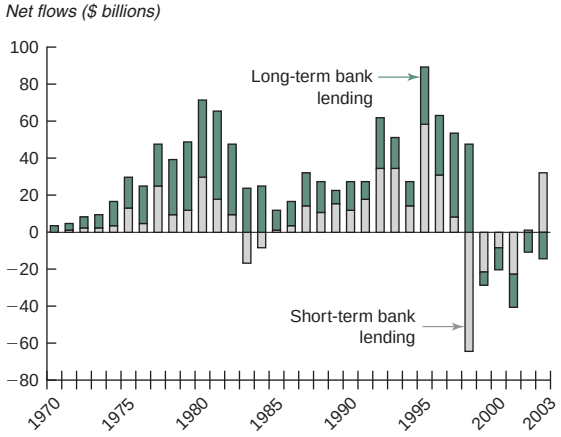
Short-term bank credit, the other segment of debt financing that can be highly sensitive to short-run market developments, has been motivated by the desire of international banks to limit

their medium-term exposure to developing countries (and by the growth in financing for international trade transactions). But such adjustments can accentuate a crisis. For example, banks may cut back on credit to a country facing tight credit conditions in other segments of the capital market to cover possible losses arising from that country's inability to service its overall debt. In fact, most fluctuations in bank lending to developing countries have been driven by sharp fluctuations in short-term lending (figure 4.10).

The increased external indebtedness of the private sector also has shaped the nature of financial crises in recent years. Although crises and episodes of contagion have been linked to countries' *overall* debt burdens and their sustainability, the level of private sector debt clearly matters. Investors perceive that sovereign and public sector debt are backed by a greater capacity to service obligations than is private debt. Thus, a larger private share in a country's external debt increases investors' *perceptions* of risk. This is true even if corporate sector vulnerability, as measured against private sector income and assets, shows improvement, as in East Asia, where most corporate debt-equity ratios have fallen in the period since the crisis.

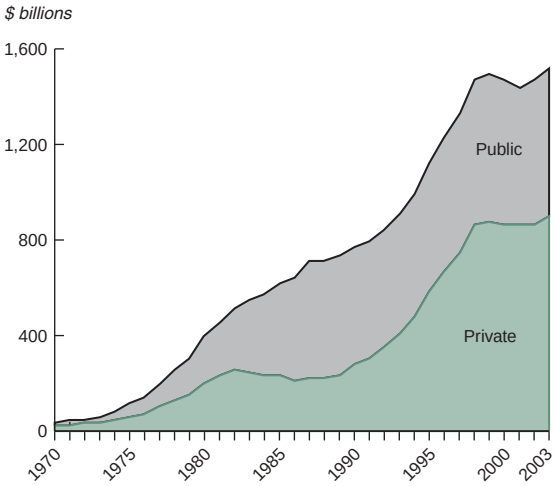
At the end of 2003, the private sector accounted for about 60 percent of all market-sourced debt outstanding, compared with 33 percent at the beginning of 1990 (figure 4.11). The current composition is similar to that of the 1970s, when the private sector accounted for about 57 percent of the total. The difference is that in the 1970s almost all market-sourced debt was in the form of bank loans, rather than bonds.

Figure 4.10 Bank credit to developing countries, 1970–2003



Source: World Bank Debtor Reporting System.

Figure 4.11 Composition of outstanding market-sourced debt in the developing world, 1970–2003



Source: World Bank Debtor Reporting System.

The private sector accounts for a rising share of both bond and bank financing. As access to international bond markets widened in the 1990s, the private sector's share in outstanding bond debt almost tripled—from about 8 percent in the early 1990s to an average of 22 percent since the mid-1990s. In bank lending, the share of the private sector has followed a more cyclical pattern. After averaging 57 percent in the 1970s, that share fell drastically in the 1980s (to 40 percent), as banks retrenched credit during and following the bank debt crisis. Lending was concentrated in the public sector as the banks reengaged with developing countries in the early 1990s. Lending to the private sector did not pick up until the mid-1990s. For the period 1993–2003, the private sector accounted for 70 percent of total outstanding bank debt.

The rise of domestic debt markets

The aggregate external debt burden of developing countries, expressed as a share of GNI or exports, has fallen since the late 1990s. Meanwhile, their domestic debt burden rose—from 19 percent of developing-country GDP in 1993/94 to 34 percent in 2002/03. This rise in domestic debt has thus kept the total public sector debt burden of

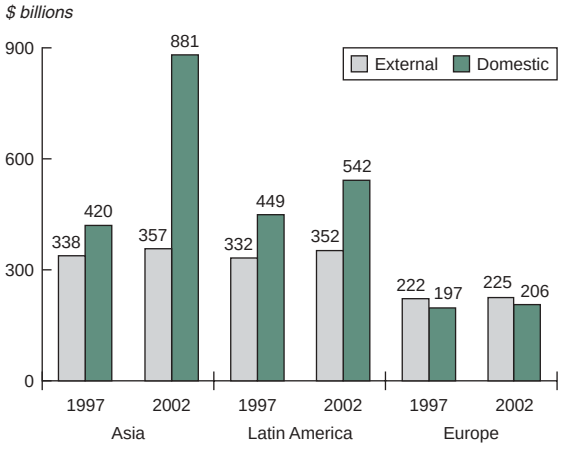
developing countries high, and in some cases has increased it.

The collection and official reporting of domestic debt statistics are subject to considerable lag. But estimates appearing in market sources suggest that the burden of domestic debt for developing countries as a whole continued to rise modestly in 2004. Most of the growth appears to be centered in Europe and Central Asia and in East Asia and the Pacific. In at least some countries, the capacity to service debt has increased with the debt burden.

Many governments, mostly in middle-income countries, have been able to finance their activities by drawing on growing domestic debt markets. The domestic finance pools have been fed by several years of record trade growth in the developing world, and, in many countries, by the liberalization of capital accounts and the adoption of sound macroeconomic, regulatory, and prudential policies that have stanched capital flight and attracted foreign investment in domestic debt markets in developing countries.

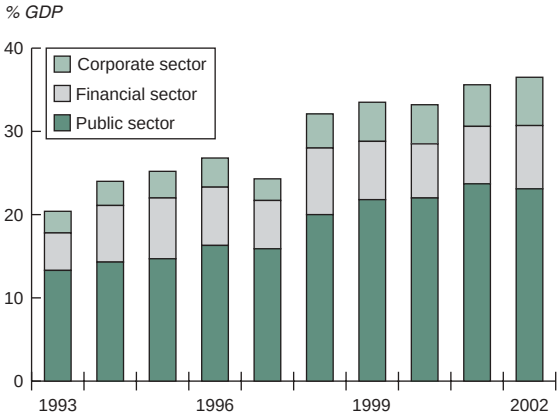
The effect has been a shift in the composition of public sector debt from external to domestic sources, particularly in the emerging-market economies. The magnitude of that shift has varied across regions (figure 4.12), depending on the significance of emerging-market economies in the region, national policies on the use of current account surpluses, and the state of development of national and regional debt markets.

Figure 4.12 Public debt stocks in emerging markets, 1997 and 2002



Note: Data are for 33 major developing countries that account for most developing country debt.
Sources: IMF; World Bank Debtor Reporting System.

Figure 4.13 Stock of outstanding domestic bonds, by sector, 1993–2002



Sources: Bank for International Settlements; IMF.

The stock of local bonds outstanding in developing countries almost doubled between 1993 and 2002—from 20 percent of GDP in 1993 to 37 percent in 2002 (figure 4.13). According to data from the Bank for International Settlements (BIS), the stock of domestic debt securities in 20 major developing countries continued to grow in 2003/04—at an average rate of 28 percent. Most of the growth reflects issues of securities by public sector borrowers, from an average of about 14 percent of GDP during 1993/94 to about 24 percent of GDP by 2001/02. During the same period, corporate bond issuance rose from about 3 percent to about 6 percent of GDP. The more measured growth in the corporate sector bond market partly reflects sequencing in market development.

The appearance and deepening of domestic bond markets in emerging-market economies has been among the most significant of the factors behind the growth in developing countries' domestic debt. Development of local bond markets reduces exposure to foreign currency–denominated debt and other pitfalls of the international financing environment (Jiang and McCauley 2004; Deutsche Bank 2003; Reserve Bank of Australia 2003). Local bond markets also offer governments an effective tool for conducting and managing domestic monetary policy (World Bank and IMF 2001) because issuing bonds can reduce the government's need to finance deficits by monetary means. A liquid bond market also can be used as a tool to target inflation, manage shocks, and help guide consumption and investment cycles. But the

Box 4.3 Foreign investment in developing countries' domestic debt markets

Where sound macroeconomic and financial policies are in place, foreign investment can catalyze the development of domestic debt markets, strengthening their key role in the national financial sector. Foreign investment can increase the depth, breadth, and liquidity of domestic markets, while enhancing their efficiency through the development of financial instruments, the diversification of portfolios, the encouragement of competition among local market intermediaries, and the promotion of international standards. In return, international investors can diversify their financing sources, increase yields, and establish strategic presence in local markets.

Strategic presence may become more important over time from the perspective of both borrowers and investors, as yield differentials between developing countries and industrial countries narrow. The differential shrank from about 7 percent in the mid-1990s to 4 percent by 2004. International liquidity played a role in reducing the gap, but better economic policies in developing countries, as reflected in improved domestic risk ratings, were important as well.

International financial institutions (IFIs), including the World Bank, have contributed to the development of domestic debt markets through their borrowing practices. IFI bonds denominated in developing-country currencies have helped decouple credit risk from currency risk, as these institutions command a solid presence in international bond markets. The decoupling imparts confidence to foreign investors, charting new territories of investment, while also providing creditworthy, liquid, and diverse investments to domestic investors.

The debt markets of developing countries are the new frontier for foreign investment. The trend started in the early 1990s with markets in the Czech Republic, Hungary, Poland, and the Slovak Republic. IFIs were the first foreign issuers of bonds in the Hungarian forint, whereas foreign corporations led with issues in other countries' currencies. In Asia, after the opening of markets in the Republic of Korea and the Philippines, the process stalled with the advent of the financial crisis of 1997/98. Since then IFIs have issued bonds in the Indian rupee market, and China, Malaysia, and Thailand have expressed interest in opening their markets to foreigners, especially IFIs. In Latin America, the growth of institutional funds, notably through the pension system, has encouraged the issuance of foreign bonds in domestic currencies. IFI bonds in Colombian pesos, Mexican pesos, and Peruvian soles have been eagerly subscribed to by local institutional investors.

Despite the growth in developing countries' domestic debt markets, and in international bonds denominated in developing country currencies, the share of foreign investors in domestic markets remains small and spotty. Nonetheless, given the improvements in settlement, clearing, and custodial services; regulatory frameworks; and investment climates, there is considerable potential for growth in that share.

Source: World Bank 2005.

benefits of domestic bond markets extend more broadly to the domestic financial system. Bond markets can complement structured financing and stimulate healthy competition, not just in terms of market intermediation, but in financial products as well. In addition, the infrastructure required to build and foster local bond markets, such as clearing and settlement systems and regulatory and legal frameworks, contribute to the overall soundness of the domestic financial system. Domestic debt markets also have become an increasingly attractive destination for foreign investors, with international financial institutions playing an important catalytic role (box 4.3).

Bond markets tend to bring increases in domestic public debt because, in their nascent stages, they almost always require support from public sector institutions. Short-term government securities trading at objective market-clearing prices become the foundation for larger and more diverse issues. Thus government debt provides the essential liquidity and pricing benchmark necessary for other forms of domestic bonds to take root.[6]

The switch to domestic debt—deliberate in Asia, less so elsewhere

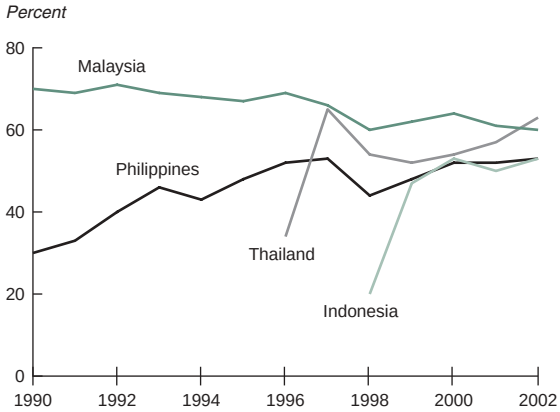
The switch from external to domestic debt in Asia was deliberate and pronounced following the market-enforced retrenchment of credit during the crisis of 1997/98. As of 2002, Asia accounted for half of all domestic debt in the developing world. The region's share continued to increase, marginally, in 2003/04, according to recent market estimates. The ratio of domestic to external debt for

the region increased from close to parity in 1997 to almost three to one by 2002, reflecting an annual growth in domestic debt of about 20 percent.

As the region's domestic debt stock soared, external debt fell by $25 billion, with net external debt flows reversing from an average inflow of $50 billion during 1995–97 annually to an outflow of $21 billion annually in 1998–2000. Since then outflows of external debt continued, arrested by modest net inflows in 2003. Since the 1997/98 crisis, the region has not only reduced its external debt, but also has accumulated substantial international reserves as a buffer against external shocks. Reserves in Asia nearly tripled to almost $760 billion in 2004 from $247 billion in 1998.

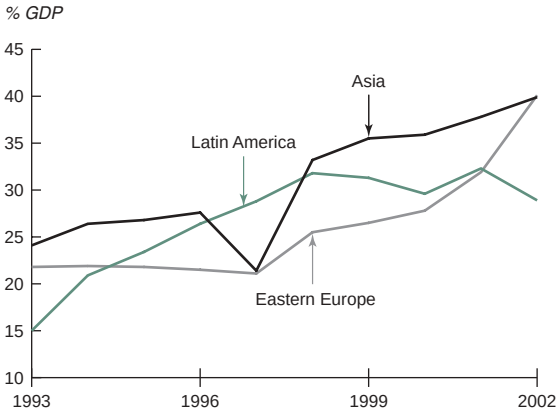
The buildup of domestic debt in crisis-affected countries began with the forced adjustment to the shocks of 1997/98 (including costly bailouts), but it has not slowed with the passing of the crisis, evolving instead into an explicit tool of debt management. Indonesia provides a good example of the managed rebalancing of public sector debt. Since the contagion-induced crisis in 1998, the country's domestic debt, almost nonexistent before the crisis, has averaged 42 percent of GDP, while the external portion of public sector debt has declined from 70 percent to 40 percent over the same period (figure 4.14). In Malaysia and the Philippines, the public sector relied on domestic debt throughout the 1990s; crisis-related costs associated with contingent liabilities and losses on assets due to exchange-rate movements, added to the burden. In Malaysia, such costs have even offset the benefits of a sizeable primary surplus. In India, domestic debt has been the primary source of financing for the government's deficit since the 1980s. The relatively high level of the domestic debt burden (about 75 percent of GDP) raises questions about its impact on the economy and domestic financial markets, as well as about its sustainability.

Figure 4.14 Share of domestic debt in total public debt in selected Asian countries, 1990–2003



Sources: IMF; World Bank Debtor Reporting System.

Figure 4.15 Stock of domestic bonds outstanding in emerging markets, by region, 1993–2002



Sources: BIS and IMF data as presented in World Bank/IMF/Brookings Institution 2003.

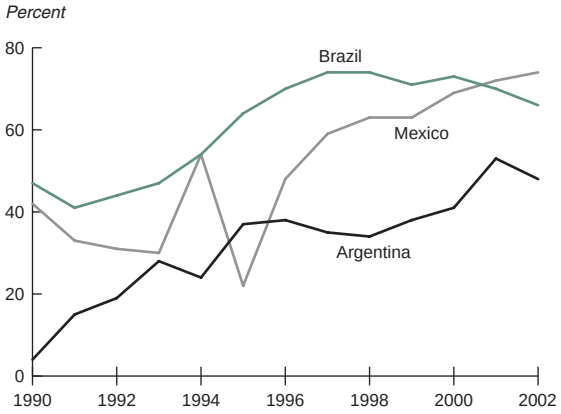
Asia also led developing-world regions in growth of outstanding domestic bonds (figure 4.15), in great part due to the fallout from the financial crisis of the late 1990s. Asia's stock of public sector bonds jumped from 7 percent of GDP in 1997 to 15 percent in 1999, reaching almost 19 percent by 2002 (IMF 2004). Meanwhile, corporate sector bonds jumped from 5 percent to 9 percent between 1997 and 1999, and then edged up further to 10 percent by 2002. Judging from trends in outstanding debt securities drawn from BIS data, bond stocks (public plus corporate) may have risen to 32 percent of GDP in 2003. In Asia, corporate sector bonds constitute a much a larger share of the domestic bond market than in other emerging-market regions, where local bond markets are still dominated by public sector securities. Since the Asian economic crisis, however, government bond issuance has grown significantly in a few countries, such as Malaysia and Thailand, where government issues have not only served as a vehicle for government financing, but also have developed into benchmarks for pricing corporate bonds.

In Latin America, where external debt financing has declined since 1999, the offsetting substitution of domestic debt has been less pronounced than in Asia—the ratio of domestic to external debt in the region rose only modestly from 1.35 in 1997 to 1.54 in 2002. Three-quarters of the region's domestic debt is concentrated in Brazil and Mexico. But the factors underlying the buildup in domestic debt differ in the two countries.

Mexico's reliance on domestic funding of government debt increased after the financial crisis of 1994, with the role of domestic debt growing steadily from 30 percent of total public debt in 1993 to 75 percent in 2002 (figure 4.16). During that period, stability-enhancing fiscal and monetary policies enabled the government to build credibility, reduce borrowing costs, and extend the maturity of its debt by almost ten times since 1995, to an average of 10 years. Low short-term interest rates, reflecting low inflationary measures, have enabled the government to continue relying on the domestic debt market. The stock of domestic government securities rose by some 10 percent in 2003/04.

The switch from external to domestic sources of debt in Brazil (and Argentina) has been less marked than in Mexico, and propelled more by economic and financial pressures than by deliberate strategy (Budina and Fiess 2004). Nevertheless, at 47 percent of GDP in 2002 (down from 61 percent in 2001), the domestic bond market in Brazil is among the largest in the region. Brazil's experience illustrates one of the pitfalls of reliance on domestic debt: The high costs of rolling over domestically sourced public debt continue to add to the debt burden of the Brazilian government, even as maturities have tripled to about three years since the rampant inflation of the late 1990s was tamed. Primary surpluses over the past few years, up to and including 2004, combined with reforms of pension systems, should add to the government's debt-servicing capacity. In Argentina the forced exchange of dollar assets into peso assets had the same effect.

Figure 4.16 Share of domestic debt in total public debt in selected Latin American countries, 1990–2003



Sources: IMF; World Bank Debtor Reporting System.

Poland and Turkey accounted for some 70 percent of total domestic debt in the Europe and Central Asia region in 2002. In the region as a whole, domestic debt grew at an annual average rate of just 5 percent from 1995 to 2002, but in Poland it jumped to 31 percent of GDP in 2002, after hovering around 21 percent during the mid- to late-1990s. It is estimated by market sources to have jumped to 35 percent in 2004, as the stock of domestic government securities rose to 24 billion between 2002 and 2004. High interest rates and loose fiscal policy, coupled with slow economic growth, have been the main reasons for debt accumulation. The rise in Turkey's domestic debt since 1999 was due to the combination of a high fiscal deficit (resulting in high domestic interest rates) and the costs of supporting the banking system during the exchange-rate and banking crisis of 2000/01. The burden of domestic debt declined noticeably in 2002/03, aided by primary surpluses and economic growth.

The other major debtor in the region is the Russian Federation. There, domestic debt fell substantially from 27 percent of GDP in 1998 to only 8 percent in 2002, as strong economic growth and currency appreciation helped reduce the public sector's financing demands. In countries preparing for entry into the European Union (Bulgaria, Croatia, and Hungary), EU accession policies have helped limit increases in domestic debt.

The development of local bond markets in Europe and Central Asia followed the establishment of the fundamentals required for a diverse and deep market and for the management of public sector debt. In Hungary, for example, efforts have focused on shifting from external to domestic sources of finance. As the country's external public sector debt declined from 54 percent of GDP in 1994/95 to 21 percent in 2002, the government's

issuance of local bonds increased from 27 percent of GDP to 46 percent. In the Czech Republic and Poland, the objective has been to finance government deficits and to reduce the rollover risk of debt. Trends in the Middle East and North Africa and Sub-Saharan Africa have varied.[7]

Domestic debt markets and the private sector: uncharted waters

The financial health of a country's corporate sector helps determine how an economy stands up to financial and economic pressures. During the Asian crisis, highly leveraged and nonperforming loans, contingent liabilities, and unhedged positions, accompanied by a cyclical deterioration in investment returns, worsened the crisis by adding to the liabilities of the public sector. (See World Bank 1998 for a detailed discussion.)

Although individual country cases differ and systematic data on private sector borrowing are lacking, high levels of domestic credit in the private sector have preceded many financial crises, as in Chile, Indonesia (Caprio and Klingebiel 1996), and Mexico. And a general linkage seems to exist between financial sector liberalization, credit booms, and banking crises (Demirguc-Kunt and Detragiache 1998). Often credit booms occur during buoyant economic times when domestic savings and private capital flows are strong. At such times, inflated asset values convey a false sense of corporate net worth (Gavin and Hausmann 1996). Abundant liquidity can encourage corporations to substitute high levels of debt for equity, leaving them—and governments—vulnerable to both domestic and external shocks. At the time of the Asian crisis, debt exceeded equity in the most-affected countries by two or three times.

In addition to overborrowing, derivative-type transactions by financial corporations can create contingent liabilities. The direct and indirect hazards of such exposures were clear in Thailand during the crisis of 1997/98, when the foreign currency exposure of corporations accelerated the decline of the Thai currency (IMF 1998).

Balancing external and domestically financed debt

The shift in the balance of external and domestic debt has transformed rather than eliminated the risks and challenges posed by debt. The advent of domestic debt brings into play an array of issues—management capacity, economic policy, financial infrastructure, regulation, and technical coordination—that previously had been in the background. External and domestic financing practices influence each other, and both are affected by the overall policy environment of individual countries. To understand those influences, one must consider:

- The policy environment
- The regulatory environment
- The interplay between the external and domestic debt
- The role of credit assessment
- The role of information.

The policy environment

Sound and credible economic, fiscal, and monetary policies are at the heart of debt sustainability and creditworthiness, whether debt is contracted in international or domestic markets. In their absence, efforts to mobilize domestic finance are unlikely to bear fruit. The public sector's fiscal position must rest on efficient revenue collection and well-aligned spending plans that factor in contingent liabilities. In addition to raising revenue, of course, tax policy can and should encourage the development of the domestic debt market.

The confidence of domestic and foreign investors alike is enhanced when monetary policy is pursued independently of public financing constraints. In particular, inflationary pressures (and expectations) should be carefully managed, as they can affect (through their effect on interest rates) the cost of borrowing to finance domestic debt—and thereby on the credibility and sustainability of the domestic borrowing program. Pressures on the exchange rate also have to be managed effectively, through economic policies that maintain the overall balance between the external and domestic sectors. For example, deterioration in a country's external position can affect credit-risk perceptions.

Once the basic foundation for the domestic debt market has been laid, other issues come into play—chief among them coordinating debt management with monetary policy, managing the implications of debt servicing on the budget, and controlling contingent liabilities (Currie, Dethier, and Togo 2003). Debt-management objectives must be chosen with an eye to cost effectiveness, sustainability, and resistance to shocks.

In the early stages of domestic debt market development, a significant portion of the debt carries a relatively shorter maturity than does external debt. Sound policies enable a government to build credibility, which helps it lengthen the borrowing tenure and minimize the frequency of risky and time-consuming rollovers of domestic debt.

The regulatory environment

A strong institutional framework is needed to manage the nation's financial infrastructure. Smooth operation of debt markets, in particular, depends on settlement, trading, and custodial services. More generally, the framework should foster transparency and availability of information to enable market participants to make fair and efficient decisions and to minimize systemic risk in the domestic financial environment. The institutional setup should include cross-checks between the agencies that deal with domestic debt. Interactions between the government and investors to match investment needs with borrowing objectives are an integral part of a public sector funding strategy.

Another challenge is to establish an effective regulatory and legal environment that underpins, as well as fosters, the smooth operation of the overall financial infrastructure. Laws and regulations should aim to balance functionality, safeguards, and practicality, while encouraging adequate mobilization of capital and the development of local debt markets. The authority, scope, and statutes of public borrowing need to be clearly defined and enforced through the legal framework (Prasad et al. 2004).

Good regulatory regimes instill confidence in investors; bad regimes shatter confidence, especially among domestic investors, who are less likely than external investors to have a widely diversified portfolio. Lack of diversity in domestic investment portfolios (along with restrictions on international diversification) may accentuate, or prolong, a distorted debt financing environment.

Governments should try to enlarge and diversify the investor base to ensure liquidity, and to spread the financing burden over different segments of the economy. An added dimension concerns foreign investments in domestic debt markets, which, despite the perils, also play an important role in enhancing the breadth, depth, and efficiency of domestic debt markets. Domestic exchange-rate and capital account policies are not only important in attracting foreign capital, but also in maintaining the stability of such flows.

Among the technical issues to be addressed in developing a domestic debt market are the methods and financial instruments used in public sector borrowing, the optimal sequence of development of various segments of local bond markets, coordination between primary and secondary markets for debt, adherence to market-clearing interest rates in financing budget gaps, and acceptable trading practices.

A major concern associated with high levels of public debt is the tendency of that debt to exert upward pressure on domestic interest rates and crowd out private investment. The boost to liquidity provided by the supply of government securities, however, may exert a countervailing effect.

The interplay between external and domestic debt

The tilt in the composition of debt from external to domestic sources has several advantages for borrowers, as long as fiscal and economic policies remain prudent. Reduced reliance on external debt, primarily debt denominated in foreign currency, lowers vulnerability to seizures in market-based financing and exchange-rate shocks, which can exacerbate debt and its servicing burden. The movement out of external debt has improved risk perceptions in the minds of external investors and credit raters, which must gauge the ability of countries to service external liabilities. Thus lower external debt improves the terms on which foreign-source capital may be obtained and reduces the overall vulnerability of developing countries to shocks from the external financing environment.

But risks accompany the benefits of greater reliance on domestic debt. High public sector debt burdens in individual countries have at times led to crises. Increased reliance on domestic debt raises debt rollover risks (because it is generally shorter in maturity than external debt), as well as interest-rate risks. Both may be affected by a variety of macroeconomic and debt management policies. For that reason, sustainability and management of debt and fiscal balances must remain at the forefront of national policy dialogue.

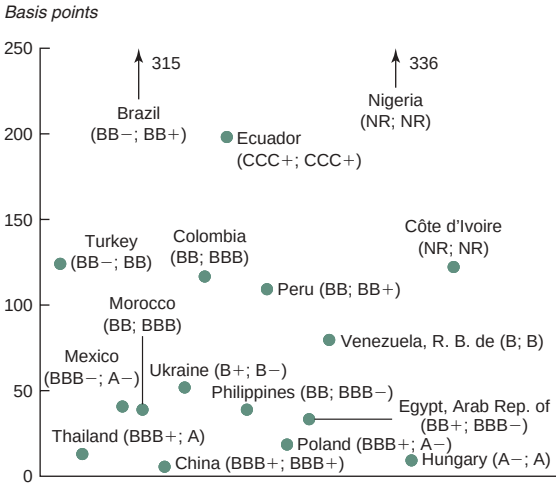
The external and domestic financing environments respond to many of the same influences. With significant capital account liberalization in

many countries, shocks from the external environment can easily spill over to domestic credit markets. Similarly, a loss of confidence in a country's policies among international investors, who may have direct exposure to credit risk in domestic debt markets, will raise pressure on domestic interest rates and affect the maturity structure of domestic debt.

In managing the overall shift in sources of finance, countries need to be aware of the possible deterioration in credit supply conditions. Of particular note is the pricing of debt, which reflects—among other things—the capital markets' perception of the probability of default (Merrick 2004; Ferrucci et al. 2004; Kamin 1999; and Min et al. 2003). Most pricing indicators, including the commonly used benchmark secondary-market spread, reflect not only country fundamentals but also the broader supply and demand for capital in financial markets. From 2002 onward, investor sentiment toward emerging markets has improved considerably, as reflected in historically low secondary market spreads or benchmark risk premiums. Because those spreads relate primarily to the probability of default on external debt, the buildup of reserves (as discussed in chapter 3) and the decline in external debt burdens have supported the improvement in sentiment. Spreads have declined universally across almost all countries where external indebtedness has declined, even as domestic public sector indebtedness has risen substantially for many countries. The betterment of external and domestic credit-risk ratings both reflects and supports that improvement in spreads.

The pricing of *new* debt remains of utmost importance. Swift and abrupt changes in the *external* environment can undermine investor confidence and exert pressure on *domestic* credit conditions and interest rates. Continued tight pricing of new external debt during times of market rally, such as 2003 and 2004, can increase pressures for adjustment of risk premiums, particularly for less creditworthy borrowers (figure 4.17). Thus, countries with lower creditworthiness may be more susceptible to market exuberance and closures and therefore subject to greater volatility in capital flows.

Figure 4.17 Distribution of volatility in risk premium for selected developing countries



Note: Higher volatility, primarily for low creditworthy countries, indicates greater vulnerability to market movements. Ratings are from Standard and Poor's. First rating = external debt; second = domestic debt. Volatility is calculated for periods March and September 2002 and February and May 2004, when spreads adjusted upwards.
Sources: J.P. Morgan Chase; Standard and Poor's; World Bank staff calculations.

Credit assessment

The probability of defaulting on a debt is indicated by long-term credit ratings, which reflect the rating agencies' assessments of a country's overall policies as well as its vulnerability to shocks (box 4.4). The distinction between external versus domestic debt is important, as a government's ability to service the two kinds of obligations varies vastly, especially in emerging-market economies. Servicing foreign-currency obligations requires liquid foreign-currency assets that have to be contracted or earned at international exchange rates. Servicing local-currency debt is directly associated with a government's power to tax, as well as its control over domestic financial systems and policies. Thus, the constraints for servicing foreign currency debt are more restrictive than those for servicing local currency debt.

The stance of institutional investors can greatly affect the availability and cost of capital for developing countries. In compliance with risk-management practices, such investors may be mandated to invest within (or no lower than) a specified class of credit risk, so that improved sovereign credit ratings translate directly into wider access to capital on better terms and thus greater ease in servicing debt. Credit-risk ratings may be employed in portfolio allocation and risk assessment models. They may also be used by banks to satisfy the Basel

Box 4.4 Assessing the risk of external versus domestic debt

Major credit-rating agencies assign risk ratings to governments' foreign (external) debt and their local-currency-denominated (domestic) debt. The factors considered by rating agencies in assigning risk ratings are political risk, income and economic structure of the economy, economic growth prospects, fiscal flexibility, general government debt burden, monetary flexibility, external liquidity, and public versus private sector external debt burden. Although all of the factors are relevant in assessing the probability of default, their relevance varies depending on whether the obligation is in local or foreign currency.

Assessing the probability of default on local-currency debt requires greater emphasis on a government's fiscal and monetary policies, likelihood of revenue generation from the privatization of state-owned enterprises, and other microeconomic reforms that affect a country's ability to service debt. Credit ratings for foreign-currency debt consider similar factors, while also taking into account the structure of the country's foreign obligations, its foreign exchange reserves, and its balance of payments.

regulations on capital adequacy and risk management, both domestically and internationally, thus affecting countries' and firms' ability to obtain financing from banks adhering to those regulations.

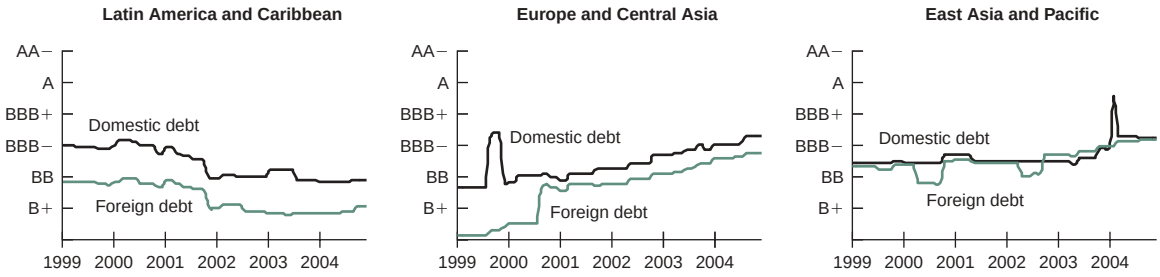
In recent years, credit ratings have improved markedly for many developing countries. Trends in average credit quality vary across regions (figure 4.18). East Asia scores the highest ratings among emerging-market regions and shows the least difference between the probabilities of default on external versus domestic debt. Credit ratings for Eastern European countries have improved continuously since 2001, with 60 percent of the rated countries in the region receiving upgrades. Ratings on domestic debt have remained about one notch higher than on foreign debt. On average, the region maintained a primary fiscal surplus of about 0.9 percent of GDP between 2001 and 2004. Average credit-risk ratings for Latin America, for both foreign and domestic debt, are the lowest among the emerging-market regions. Moreover, foreign debt in the region carries a much higher probability of default than does domestic debt. For example, foreign debt risk ratings for Brazil, Colombia, and Mexico are three notches below domestic debt ratings, even though all three countries were projected to run primary fiscal surpluses in 2004.

Notwithstanding the improvement in aggregate credit quality, various risks remain—among them vulnerability to external conditions that may deteriorate rapidly, leading to a downward spiral of confidence and credit cost, as seen in the late 1990s. Qualitative considerations, such as political uncertainty, may also influence the risk associated with a country's debt and affect the terms for rolling over that debt.

The role of information

Both external and domestic indebtedness require diligent monitoring. In the wake of crises connected

Figure 4.18 Average credit quality, by region, 1999–2004



Source: Standard and Poor's.

with external indebtedness, progress has been made to enhance the reliability, timeliness, and accessibility of information. Gaps remain, however, particularly in the supply of information on domestic debt markets and private sector borrowing, both of which were important in the East Asian crisis of 1997/98. In the absence of full information, public borrowers should acquire new liabilities and manage old ones with a high degree of prudence, while remaining alert for impending changes in financing environments.

Information on domestic debt is much less plentiful and consistent than is information on external debt. For that reason, domestic debt is not well handled by the risk-assessment models used to price new debt. To ensure that accumulations of domestic debt are visible (if they are not, savvy investors will assume the worst), policymakers in the emerging-market economies should enhance their national framework for collecting and reporting statistics on domestic debt.

No room for complacency, despite improvements

The development of domestic debt markets provides important benefits, laying a solid foundation for future growth and offering public borrowers a measure of protection against changes in the external environment. But the perils associated with debt cannot be avoided merely by switching from one type of debt to another. Excessive debt will soon curb growth, regardless of its source. Because a debt crisis driven by excessive domestic borrowing can be just as devastating as one created through excessive external debt, developing countries need to pursue fiscal policies that align liabilities and revenues against the backdrop of structural revenue reforms. They should persevere with policies and reforms that promote economic growth under sustainable levels of debt—domestic and external.

Notes

1. Developing countries are still split into two broad categories by their access to international capital markets and thus by the nature of their debt. The first category is the emerging-market economies—primarily middle-income countries with access to international capital markets. The second is other countries—primarily low-income—that have limited or no access to market-based international finance. This chapter is chiefly concerned with the first group.

2. The World Bank's Debtor Reporting System (DRS) is one of the most comprehensive databases on the external debt of 135 developing countries. The figures on external public sector debt offered in this chapter are drawn directly from the DRS data. The public-private composition of short-term debt is not known, because it is not reported to the DRS by member countries. Principal and interest arrears on official debt, a component of short-term debt, are treated as public sector debt in this chapter. Most of the rest of short-term debt is treated as private sector debt, based on information gathered from market data sources.

3. Estimating developing countries' public sector debt remains a challenging task, and estimates can differ from source to source. Among the major issues are lack of data (many countries have begun only recently to produce comprehensive measures of public debt), data coverage (especially with regard to contingent liabilities), and definitional questions that can vary vastly from country to country.

The International Monetary Fund's *World Economic Outlook* for 2003 estimates the 2002 public sector debt of emerging-market economies at around 70 percent of GDP, an average figure that differs from the one presented here. Several factors may account for the disparity:

- *Country coverage*. This can be a source of major difference. Economies such as those of the Republic of Korea and Taiwan (China), generally regarded as "emerging markets," may form part of dataset used in the IMF report, but they are not classified as "developing countries" by the World Bank. The analysis presented in WEO is based on two sets of data. The first (1990–2002) comprises just 34 countries; the second (1970–2002), 79 countries. It is important to maintain consistency while comparing data across sources.
- *Data sources*. The smaller of the WEO datasets is based on information from IMF staff reports and country economists. The larger dataset is a combination of World Bank data, IMF government finance statistics, and the OECD's analytical database.
- *Definitional issues*. The smaller WEO dataset is based on gross figures, while the World Bank data are for net debt outstanding.
- *Combination of external and domestic public debt*. Because the World Bank's Debtor Reporting System does not collect statistics on domestic debt, the figures on total public sector debt (external plus domestic) presented in this report are derived from several sources: World Bank data (DRS), IMF data, and market sources.

4. The growth in bond debt started with the transformation of distressed bank debt into bonds following the collapse of the bank credit boom of the 1970s, which had been driven by the "recycling" of foreign exchange earned by oil-producing countries following cartel-driven price increases. A simultaneous increase in real interest rates in industrial countries (also driven by high oil prices) and the decline in commodity prices in the 1980s made international bank debt unsustainable for many developing

countries. The defaulted bank debt was converted into Brady bonds, named for U.S. Treasury Secretary Nicholas Brady, beginning in the late 1980s. A beneficial side effect of that innovation was to provide a foundation for modern bond financing in developing countries.

Short-term credit grew during the early 1990s, as bond financing was still developing roots and banks were beginning to reengage with the developing countries following the debt restructuring of the late 1980s. Another boost to short-term lending came in 1995, following the successful resolution of the Mexican peso crisis.

5. Long-term bank credit can be more resilient than bonds during periods of stress for several reasons. Banks possess informational advantages on their borrowers that can be used not only to differentiate credit risk during a period of contagion, but also to exercise greater control over borrowers. And bank debt is easier to restructure than bond financing, for which default may be the only option. Also, banks can spread out risk over a syndicate of lenders and keep credit lines open even in suboptimal circumstances, especially when other segments of capital markets are experiencing stress.

6. Also important for bond-market development is the adoption of flexible exchange rates, which encourage governments to borrow in domestic markets to avoid the possibility of debt increases stemming from depreciation of the currency and may also reduce investors' fear of sharp depreciation of their real asset values (Claessens, Klingebiel, and Schmukler 2003).

7. In the Middle East and North Africa domestic debt rose from 18 percent of GDP in 1995 to 47 percent in 2002. To a great extent the rise is due to Lebanon, whose overall public sector debt, both domestic and external, has increased sharply since the early 1990s to finance the government's spending on infrastructure and other public sector facilities. In comparison, increases in domestic indebtedness have been much less notable in Egypt and Morocco. In Sub-Saharan Africa, domestic debt fell to 27 percent of the region's GDP from 37 percent in 1995, a movement ascribable largely to lower borrowing in South Africa.

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