

Article Title: ARCHIVE | Criteria | Governments | Sovereigns: Sovereign Credit Ratings: A Primer Data: (Editor's Note: This article has been superseded by "Sovereign Credit Ratings: A Primer," published on March 15, 2004.) Sovereign Credit Ratings Standard & Poor's sovereign credit ratings are an assessment of each government's ability and willingness to service its debt in full and on time. (A full list, "Sovereign Credit Ratings," is available on Standard & Poor's Web site at standardandpoors.com, select Ratings List, then Sovereigns.) A rating is a forward-looking estimate of default probability. Sovereign ratings are not "country ratings," an important and often misunderstood distinction. Sovereign ratings address the credit risk of national governments, but not the specific default risk of other issuers. Ratings assigned to entities in each country are, most frequently, the same as the sovereign's or lower, but may be higher. Foreign currency ratings may be higher whenever the entity has stronger credit characteristics than the sovereign and the risk of the imposition of debt-service-limiting foreign exchange controls is less than the risk of sovereign default. Among the examples of this case are where there is a monetary union with a higher-rated central bank or where the issuer has a significant percentage of assets and business offshore or a very supportive offshore parent. Similarly, an issue benefiting from specific structural enhancements can be rated above the sovereign. Defaults by rated sovereign issuers of bank and bond debt include those of the Republic of Argentina, the Dominican Republic (local currency only), the Republic of Indonesia (foreign currency only), the Islamic Republic of Pakistan (foreign currency only), the Russian Federation, and the Republic of Suriname (foreign currency only), although other rated sovereigns have defaulted in the years before they were rated. Default and transition studies (see "Sovereign Ratings 2001: The Best of Times, the Worst of Times," available on RatingsDirect, Standard & Poor's Web-based credit analysis system, and on Standard & Poor's Web site under Resource Center, Ratings Criteria, Sovereigns) indicate that, compared with corporate ratings, sovereign ratings show more stability at most rating levels. In all categories of 'A' or higher and, in most instances, in categories below 'A', the sovereign default record has been lower than the corporate default record. However, such comparisons are affected by the small sample size of sovereign defaults. Standard & Poor's expects sovereign rating stability and default probability to converge with corporate ratios over time as the number of sovereign observations increases, something one would expect given the same rating definitions. If, as we expect, defaults occur more frequently in the sovereign sector in the future, this will not be an unprecedented development. Defaults on sovereign foreign currency bonds occurred repeatedly, and on a substantial scale, throughout the 19th century and as recently as the 1940s. Sovereign bond default rates fell to low levels only in the decades after World War II (see chart 1), when cross-border sovereign bond issuance also was minimal. Defaults on bank loans, the main vehicle for financing governments in the 1970s and 1980s, peaked in the early 1990s and have since fallen fairly steadily. Chart 1 Past defaults reflect a variety of factors, including wars, revolutions, lax fiscal and monetary policies, and external economic shock. As we enter the new millennium, fiscal discipline, debt management, structural inefficiencies constraining productivity, and the contingent liabilities arising from weak banking systems are among the significant economic policy challenges facing many sovereigns. The associated credit risk, which may seem manageable for a time, can quickly mushroom—as events in a number of emerging market countries since 1997 have shown. Standard & Poor's believes an understanding of sovereign ratings—what they mean and the criteria behind them—is more relevant now than ever before. Behind the Ratings Standard & Poor's appraisal of each sovereign's overall creditworthiness is both quantitative and qualitative. The quantitative aspects of the analysis incorporate a number of measures of economic and financial performance and contingent liabilities, although judging the integrity of the data is a more qualitative matter. The analysis is also qualitative due to the importance of political and policy developments and because Standard & Poor's ratings indicate future debt service capacity. Standard & Poor's divides the analytical framework for sovereigns into 10 categories (see summary below). As part of the committee process that Standard & Poor's uses to assign credit ratings, each sovereign is ranked on a scale of one (the best) to six for each of the 10 analytical categories. There is no exact formula for combining the scores to determine ratings. The analytical variables are interrelated and the weights are not fixed, either across sovereigns or over time. Most categories incorporate both economic and political risk, the key determinants of credit risk. Economic risk addresses the government's ability to repay its obligations on time and is a

function of both quantitative and qualitative factors. Political risk addresses the sovereign's willingness to repay debt. Willingness to pay is a qualitative issue that distinguishes sovereigns from most other types of issuers. Partly because creditors have only limited legal redress, a government can (and sometimes does) default selectively on its obligations, even when it possesses the financial capacity for timely debt service. In practice, of course, political and economic risk are related. A government that is unwilling to repay debt is usually pursuing economic policies that weaken its ability to do so. Willingness to pay, therefore, encompasses the range of economic and political factors influencing government policy. As the default frequency of sovereign local currency debt differs significantly from that of sovereign foreign currency debt, both are analyzed. While the same political, social, and economic factors affect the government's ability and willingness to honor local and foreign currency debt, they do so in varying degrees. A sovereign government's ability and willingness to service local currency debt is supported by its taxation powers and its ability to control the domestic financial system, which gives it potentially unlimited access to local currency resources. To service foreign currency debt, however, the sovereign must secure foreign exchange, usually by purchasing it in the currency markets. This can be a binding constraint, as reflected in the higher frequency of foreign than local currency debt default (see "Sovereign Defaults: Hiatus in 2000," available on RatingsDirect and on standardandpoors.com/ratings, select Resource Center, Ratings Criteria, Sovereigns). The primary focus of Standard & Poor's local currency credit analysis is on the government's economic strategy, especially its fiscal and monetary policies, as well as on its plans for privatization, other microeconomic reform, and additional factors likely to support or erode incentives for timely debt service. When assessing the default risk on foreign currency debt, Standard & Poor's places more weight on the impact of these same factors upon the balance of payments, external liquidity, and the magnitude and characteristics of the external debt burden. Local and Foreign Currency Rating Factors

Key economic and political risks that Standard & Poor's considers when rating sovereign debt include: How political institutions and trends in the country, including public security and geopolitical concerns, affect the predictability and sustainability of government policies over time; Economic structure and growth prospects; General government revenue flexibility and expenditure pressures, general government deficits and the size of the debt burden, and contingent liabilities posed by the financial system and public-sector enterprises; Monetary stability; and External liquidity and trends in public- and private-sector liabilities to nonresidents. The first four factors directly affect the ability and willingness of governments to ensure timely local currency debt service. Since fiscal and monetary policies ultimately influence the country's external balance sheet, they also affect the ability and willingness of governments to service foreign currency debt, which is also affected by the fifth factor above. Often, balance of payments constraints are among the most binding.

Sovereign Ratings Methodology Profile

Political Risk The first of the 10 analytical categories in the sovereign ratings methodology profile (see summary above) is political risk. The stability, predictability, and transparency of a country's political institutions are important considerations in analyzing the parameters for economic policymaking, including how quickly policy errors are identified and corrected. The degrees to which politics are adversarial and changes in government are frequent are examined, as well as any public security concerns. Relations with neighboring countries are studied with an eye toward potential security risk. National security is a concern when military threats place significant burdens on fiscal policy, reduce the flow of potential investment, and put the balance of payments under stress. A political risk ranking of "1" for most European Union (EU) sovereigns reflects the broad public backing for their open political frameworks, in which popular participation is high, the process of succession is clear, and the conduct of government is transparent and responsive to changing situations. At the weaker end of the scale, political institutions may have a short track record and/or be considerably less open and effective. The political decisionmaking processes may be highly concentrated, or a significant portion of the population may be marginalized. There may be internal divisions along racial or economic lines, some geopolitical risks, or public security concerns. Political and external shocks are more likely to disrupt economic policy than at higher rankings. For example, Indonesia's short track record with democracy, its problems with secessionist movements in Aceh and Irian Jaya, its strained relationship with its donor group over economic policy and military reform, and the divisions between the indigenous and Chinese populations result in a weak political risk ranking.

Income and Economic Structure The second of the 10

sovereign criteria categories is economic structure. Due to its decentralized decisionmaking processes, a market economy, with legally enforceable property rights, is less prone to policy error and more respectful of the interests of creditors than one where the state dominates. Market reform in the transition economies of Central and Eastern Europe has brought the economic structure scores of the Republic of Slovenia, the Czech Republic, and the Republic of Hungary close to those of Western European sovereigns, whose market economies are well entrenched. Rankings in this category are highly correlated with per capita GDP (see chart 2), with a negative adjustment made for narrow economies, weak or less-developed financial systems, and wide income disparities. Weaker rankings also may reflect highly leveraged or undeveloped private sectors, structural impediments to growth, and large and somewhat inefficient public sectors. Chart 2 Economic Growth Prospects Standard & Poor's third analytical category for sovereign ratings is economic growth prospects. A government in a country with a growing standard of living and income distribution regarded as broadly equitable can support high public-debt levels and withstand unexpected economic and political shocks more readily than a government in a country with a poor or stagnant economy. Trend growth exceeding 4.5% per annum in the Republic of Estonia and a handful of other countries provides considerably more policy flexibility and a superior economic prospects ranking than Standard & Poor's ascribes to Japan, where economic growth prospects will remain depressed until the private sector restructures more vigorously. Chart 3 illustrates how growth prospects are generally highest in the lower half of the investment-grade category. At top rating levels, the advanced level of development usually precludes high trend rates of growth. In the speculative rating categories shown ('BB' and 'B'), growth is more likely to be erratic and suffer from structural impediments. Note, too, that chart 3 shows 2002, which is an economic recovery year in most countries, but one in which rates of growth can be a bit misleading because of the sharpness of the deterioration in growth in 2001. A five- or ten-year average normally would show higher rates of growth across all categories. Chart 3 Fiscal Flexibility The fourth category in Standard & Poor's sovereign ratings methodology profile is fiscal flexibility, as measured by an examination of general government revenue, expenditure, and balance performance. Fiscal trends, along with methods of deficit financing and their inflationary impact, are important indicators of sovereign credit quality. Scores in this category are a function not only of surpluses and deficits, but also of revenue and expenditure flexibility and the effectiveness of expenditure programs. General government is the aggregate of the national, regional, and local government sectors, including social security and excluding intergovernmental transactions. Noncommercial off-budget and quasi-fiscal activities are included to the extent possible, with significant omissions noted. Typically, the least-distortionary and most-growth-friendly tax system that also addresses equity concerns has a broad tax base and low tax rates. Sovereigns with strong scores in this category can fairly easily adjust tax bases and rates without serious constitutional, political, or administrative difficulties. Effective expenditure programs provide the public services demanded by the population and the infrastructure and education levels needed to underpin sustainable economic growth, all within the confines of tax and fee resources and affordable financing. Procurement and tendering procedures are transparent. Arrears are quantified and deficits can be reconciled to trends in debt. The Republic of Singapore receives a top score of "1" in the fiscal flexibility category, despite significant financing needs in its history, because astute investment in public infrastructure and an educated workforce have, over the past 40 years, transformed the country into a prosperous manufacturing- and service-based center. Lower scores are given where government money is not spent as effectively because of constitutional rigidities, political pressures, or corruption, and where revenue flexibility is constrained by already-high taxes or tax-collection difficulties. The environment is less conducive to sustainable economic growth and more suggestive of debt-servicing difficulties. The Republic of Turkey's sizable, albeit declining, deficits and limited revenue and expenditure flexibility give it a weak score in this category. As chart 4 illustrates, deficits tend to be highest in the speculative grade categories. At the lowest rating levels ('B' and below), the deficit may be somewhat lower, with the fiscal flexibility score affected more by quasi-fiscal activities, lack of transparency, and limited revenue and expenditure flexibility. Looking forward, pension obligations are a fiscal pressure of growing significance for countries in which the population is aging rapidly. Standard & Poor's believes that the sovereign credit ratings of some highly rated EU members could begin to come under downward pressure by the end of this decade if there is no further fiscal consolidation and

structural reform to counter the financial problems of ageing societies (see "Western Europe Past Its Prime—Sovereign Rating Perspectives in the Context of Ageing Populations," available on RatingsDirect and on standardandpoors.com, select Resource Center, Ratings Criteria, Sovereigns).

Chart 4 General Government Debt Burden The fifth sovereign criteria category is the general government debt burden. Typically, governments borrow to finance combinations of consumption and investment that increase general government debt. Analysis of public finance is complicated by the fact that the taxation and monetary powers unique to sovereigns can permit them to manage widely varying debt levels over time. A sovereign such as Canada (with a substantial debt burden but an unblemished track record of honoring debt obligations and a strong domestic capital market providing fairly low-cost financing) receives a better score in this category than some sovereigns in Latin America, which may have lower debt to GDP ratios but have higher and more variable debt-servicing burdens. The Government of Japan, the Kingdom of Belgium, and the Republic of Italy, all rated 'AA' and among the most indebted of the rated sovereigns, bring the 'AA' median for general government debt above what one might expect, as shown in chart 5; however, these countries have the wealth, level of development, and revenue-raising ability that allow their governments to support such high debt levels.

Chart 5 Off-Budget and Contingent Liabilities Off-budget and contingent liabilities, the sixth sovereign criteria category, can be important rating considerations, with attention focused on the size and health of nonfinancial public sector enterprises (NFPEs) and the robustness of the financial sector. NFPEs pose a risk to the sovereign because they generally have been formed to further public policies and often suffer from weak profitability and low (or virtually nonexistent) equity bases, which leave them highly vulnerable to adverse economic circumstances. To varying degrees, NFPEs may collect revenue and make expenditures that further public policies outside of the budgetary process. If such quasi-fiscal activities are sizeable, the usefulness of general government statistics as an indicator of fiscal performance and position and the role of the government in the economy is diminished. Quasi-fiscal activities generate implicit contingent liabilities. The indebtedness of nonself-supporting NFPEs is a useful measure of the contingent liability, but account is also taken of profitable enterprises that price their products to further budgetary objectives, provide noncommercial services, and/or pay higher-than-commercial prices to suppliers. The financial sector is a contingent liability because problems can impair a sovereign's credit standing when they lead to official rescues of failing banks. The impetus to assist banks is strong when there is a systemic crisis, since banking system soundness is essential to macroeconomic stability, effective demand management, and sustained economic growth. The sovereign foreign and local currency ratings of the Republic of Korea were sharply downgraded in 1997-1998, in part because of the escalating costs of supporting their banking sectors. Standard & Poor's financial sector analysts regularly examine global financial-sector risk (see "Global Financial System Stress," available on RatingsDirect and on standardandpoors.com, select Resource Center, Criteria, Sovereigns), and their assessments of the potential for a systemic crisis are a crucial input in this category of sovereign analysis. Public-sector banks may weigh heavily in this category when they engage in various quasi-fiscal activities such as subsidized lending, bank rescue operations, or exchange-rate guarantees that are not provided for in the government's budget. Modest off-budget and contingent liabilities provide New Zealand with a "1" ranking in this category. Asset quality is generally sound, and creditworthy foreign banks own the financial system's largest institutions. In contrast, the government of the People's Republic of China's heavy involvement in troubled state-owned enterprises and poor lending standards in its banking sector justify a low ranking in this category.

Monetary Stability Monetary stability, the seventh risk category in the sovereign ratings methodology profile, is an important leading indicator of sovereign credit trends. Significant monetization of budget deficits often fuels price inflation, which can undermine popular support for a government; as a result, policymakers usually respond with containment measures. If they do not, and price increases accelerate, serious economic damage and an erosion of public trust in political institutions can result. These conditions are fertile ground for a sovereign default. Chart 6 shows higher levels of inflation at lower rating categories, although the discrepancies are much smaller than in the past because world inflation has dissipated. Nonetheless, in the 'B' and lower categories, inflation rates for some countries reach well into double digits. Chart 6

In evaluating monetary stability, Standard & Poor's considers: Price behavior in past economic cycles; The level, currency, and maturity structure of

the public-sector debt burden, together with the likely extent of future borrowing; Money and credit expansion; Institutional factors, such as the independence of the central bank; The compatibility of the exchange-rate regime with monetary policy goals; The range and efficiency of monetary policy tools. The top ranking of "1" is assigned to the European Central Bank and the U.S., among others. Low inflation is supported by independent central banks pursuing sustainable monetary and exchange-rate policies, and monetary flexibility is bolstered by transparent and well-developed capital markets. On the other hand, Turkey's central bank has not traditionally been independent, and, while this situation is changing, Turkey continues to be plagued by high inflation, resulting in a much weaker monetary stability score. In conjunction with enhancing monetary flexibility and the effectiveness of monetary tools, the depth and breadth of a country's capital markets can also act as an important discipline. The sovereign has fewer incentives to default on local currency obligations when they are held by a broad cross-section of domestic investors, rather than concentrated in the hands of local banks. For this reason, the establishment of mandatory, privately funded pension funds in a number of countries (such as the Republic of Chile) helps bolster the sovereign's credit standing by creating an influential new class of bondholders. The experience of many Organization for Economic Cooperation and Development (OECD) countries suggests that, even when public debt is high, creditworthiness can be sustained over long periods when policymakers are responsive to constituencies with vested interests in safeguarding the internal value of money and financial contracts.

External Liquidity The eighth risk category in the sovereign ratings methodology profile is external liquidity. Standard & Poor's balance of payments analysis focuses on the impact of economic policy upon the external sector, as well as the external sector's structural characteristics. In the short run, the ability of policymakers to manage financial pressures from abroad depends partly upon the structure of merchandise trade, services, income, and transfers. Yet, balance-of-payments pressures neither appear spontaneously nor reach large magnitudes for structural reasons alone. In most cases, they can be traced back to flawed economic policies. Standard & Poor's approach reflects the premise that the macroeconomic and microeconomic policies discussed earlier affect balance-of-payments behavior. For this reason, the size of a country's current account deficit, which reflects the excess of investment over savings, may not by itself be an important rating consideration. The tendency for some countries to run current account surpluses and others to run current account deficits is well documented. It is the product of many factors, not all of them negative, and not all related to government policies. Singapore ran very large current account deficits in the 1970s and 1980s, but they were readily financed because they were not the byproduct of fiscal mismanagement. However, Thailand's foreign exchange crisis in 1997 is a sharp reminder that large current account deficits can also be a symptom of serious underlying weaknesses—in this case, a financial sector whose asset quality had weakened dramatically after years of rapid domestic credit growth. And, as the United Mexican States' debt servicing crisis in 1995 illustrated, current account deficits are a concern when government policies result in a public-sector external debt structure that is vulnerable to sudden changes in investor sentiment. The primary quantitative measure in this criteria category is the gross external financing gap (the current account deficit plus principal due on medium- and long-term public- and private-sector debt plus the stock of debt with an original maturity of less than a year) as a percentage of official foreign exchange reserves, as shown in chart 7. The ratio tends to be below 100% for investment-grade sovereigns and above for speculative grade sovereigns. At the lowest rating levels, the ratio may be below that of high speculative-grade sovereigns because of lack of access to affordable commercial financing or because of the high percentage of concessional financing from official creditors. The degree to which 1) foreign direct investment, particularly greenfield, "finances" a portion of the gap, and 2) strong export growth may mitigate balance-of-payments pressures going forward, are also taken into consideration. Chart 7

Official foreign exchange reserves usually act as a financial buffer for the government during periods of balance-of-payments stress. Whether a given level of reserves is adequate or not is judged in relation not only to the gross financing gap, but also to the government's financial and exchange-rate policies and, consequently, the vulnerability of reserves to changes in trade and capital flows. Reserve management is also reviewed, with adjustment made for any reserves deposited with national banks, placed in questionable special-purpose vehicles, or sold forward in the exchange markets. The U.S. maintains very low reserves. It can do so because the U.S. dollar generally has floated against other

currencies since 1971. The dollar's unique status as the key currency financing global trade and investment also reduces the need for gold and foreign exchange. Most other high investment-grade sovereigns with floating currencies and little foreign currency debt also require relatively modest reserves. (This is the reason the top two rating categories are excluded from chart 7.) However, at lower rating levels international liquidity is more critical when, as is often the case, government debt is denominated in foreign currencies or significant amounts of local currency debt are held by cross-border investors. Public finance setbacks and other economic or political shocks, consequently, can impair financial market access. Most Latin American sovereigns fall into this category and generally maintain above-average reserves as a result.

Public- and Private-Sector External Debt Burdens The ninth and tenth sovereign criteria categories are the external debt burdens of the public and private sectors, respectively. Standard & Poor's examines each sovereign's external balance sheet, which shows residents' assets and liabilities vis-à-vis the rest of the world, alongside its analysis of balance-of-payments flows. The main focus is on trends in the public-sector external debt position, the magnitude of contingent liabilities of the government, and the adequacy of foreign exchange reserves to service both public- and (especially in a crisis) private-sector foreign currency debt. To complete the picture, Standard & Poor's calculates an international investment position. This is the broadest measure of a country's external financial position. It adds the value of private-sector debt and equity liabilities to public-sector external indebtedness denominated in local and foreign currencies. Public-sector external debt includes the direct and guaranteed debt of the central government, obligations of regional and local governments, and the nonguaranteed debt of other public-sector entities. Net public-sector external debt equals total public-sector external debt minus public-sector external financial assets, including official reserves. To measure the magnitude of the public-sector external debt burden, Standard & Poor's compares it to current account receipts (proceeds from exports of goods and services along with investment income and transfers received from nonresidents), as shown in chart 8. The presence in the 'A' category of a few sovereigns with public sectors in strong net external creditor positions (namely, the Republic of Botswana, Republic of Chile, the Czech Republic, the Government of Hong Kong, and the State of Kuwait) keep the 'A' debt burden below what one might otherwise expect. However, the ratings of these sovereigns are constrained by a combination of geopolitical risk, economic concentration, and other factors.

Chart 8 Private-sector external debt burdens are measured as follows. Financial institutions' net external debt equals their borrowings from nonresidents (including nonresident deposits in resident banks) minus financial institutions' deposits with and lending to nonresidents. Net external debt of the nonfinancial private sector equals their borrowings from nonresidents minus nonfinancial private-sector deposits with and lending to nonresidents. Private-sector debt is examined because it can pressure reserves and, in some cases, ultimately become a liability of the state. External debt also is evaluated in terms of its maturity profile, currency composition, and sensitivity to changing interest rates. Along with new borrowings, these factors influence the size of future interest and amortization payments. Debt service, including interest and principal payments on both short- and long-term debt, is compared with projected current account receipts. Debt contracted on concessional bilateral terms, to some extent, can offset a high public-sector external debt burden. Senegal, for instance, has high public-sector external debt, around 195% of exports in 2002, but favorable terms on restructured foreign currency debt mean that debt service (excluding short-term debt) is moderate at 13% of current account receipts. Funding from the International Monetary Fund (IMF) and other multilateral official sources is a related factor to consider. However, the availability of official resources is limited in relation to the funds deployed by banks and cross-border investors. Reserve levels and the strength of current account receipts, consequently, deserve particular scrutiny during periods of global financial volatility.

Local and Foreign Currency Rating Distinctions Any divergence between a sovereign's local and foreign currency ratings reflects the distinctive credit risks of each type of debt. For example, stable, predictable political institutions, fiscal and monetary policies resulting in relatively low inflation, and prosperous and diverse economies are characteristics of sovereign issuers of 'AAA' rated local currency debt. The manageable public-sector external debt burdens of these issuers, in turn, result in foreign currency debt ratings at the upper end of the investment-grade spectrum. Canada ('AAA' local currency and 'AA+' foreign currency) is a good example of a government shouldering a moderate public-sector external debt

burden of 47% of current account receipts in 2002, but where fiscal flexibility is substantial and the political commitment to low or moderate rates of inflation is well entrenched. Differences between local and foreign currency debt ratings may widen to some degree with sovereigns that are further down the ratings scale. These sovereigns, typically, fall into one of two categories: 1) Those with long records of timely service on both local and foreign currency debt. Inflationary pressures are moderate and public finances are relatively sound, but foreign currency indebtedness may be relatively high or is likely to become so over time. 2) Those that also have unblemished local currency debt servicing track records, but histories of foreign currency default. The local and foreign currency debt ratings assigned to them balance often substantial improvements in inflation and public finances with the risks inherent to still-heavy foreign currency debt burdens. At the lower end of the rating scale, such rating differences sometimes narrow. A number of sovereigns in this category have emerged from local or foreign currency debt default within the last decade, and still carry the risk of policy reversals that can result in renewed default. Other sovereigns in this category may not have defaulted, but face high inflation and other forms of social and political stress that carry a material risk of local currency default after payment of foreign currency debt can no longer be assured. Ratings of EU states in the European Monetary Union (EMU) present a special case. Sovereigns in EMU have ceded monetary and exchange-rate responsibilities to the European Central Bank. As a result, Standard & Poor's rates each government's euro-denominated and foreign-currency debt the same. Economic and fiscal factors are the dominant criteria for differentiating credit quality of sovereigns inside EMU (see "Local and Foreign Currency Ratings Converge for EMU Issuers," on RatingsDirect). Local currency ratings for the Principality of Liechtenstein, the Cook Islands, and the Republics of Panama, El Salvador, and Ecuador are the same as their respective foreign currency ratings because these countries use the currencies of the EMU, New Zealand, and the U.S. (for the latter three). A number of factors must be examined when considering whether distinctions between local and foreign currency ratings are appropriate. Governments less frequently default on local currency debt because the ability to tax and control over the domestic banking system give them access to some finance, even when foreign currency debt is in default. Sovereigns must also have the political will and influence to use these powers. Russia defaulted on its ruble debt in August 1998, in part, because a substantial portion was held by nonresidents seeking to reduce their holdings of both government debt and rubles. In such cases, the flexibility needed to meet local currency obligations is more limited, and Standard & Poor's usually rates local currency debt the same as, or only slightly higher than, foreign currency debt. The same considerations constrain the rating of dollar-indexed local currency debt, which usually is (at most) one notch higher than the foreign currency rating. The cost of servicing such debt is similar to the cost of servicing foreign currency debt. In cases in which the primary rating constraint is geopolitical risk, there also may be little or no distinction between foreign and local currency ratings because the special powers of a sovereign in its ability to tax and control over the monetary and financial systems may count for little in the event of geopolitical stress. Hong Kong's foreign and local currency ratings are both constrained by China risk and are only one notch apart. Sovereign Rating Changes Until the 1990s, rated sovereigns formed an exclusive club of the world's most creditworthy governments. In 1980, Standard & Poor's rated just a dozen sovereign issuers—all at the 'AAA' level. Rating downgrades were relatively rare over the remainder of that decade and, when they occurred, usually were of modest dimensions. Today, the sovereign sector is far more heterogeneous. The 90 plus sovereigns Standard & Poor's monitors carry ratings between 'AAA' and 'SD' (selective default). Given this range of credit quality, rating changes occur more frequently. Because sovereign ratings measure future debt service capacity, rating committees consider reasonable "worst-case" scenarios over a five-year time horizon to gain a better understanding of future downside risks. The government's medium-term financial program, when available, is scrutinized alongside independent forecasts. Standard & Poor's then examines the interaction between public-sector finances, external debt, and other variables, such as real export growth, asset quality trends affecting the local banking system, and changes in overseas interest rates. Standard & Poor's attempts to incorporate in its ratings risks arising over economic, political, commodity, and interest rate cycles. Rating changes occur whenever new information significantly alters Standard & Poor's view of likely future developments. This usually results from the policy response or the degree of latitude in a given area being different from what was

expected. For sovereigns, one of the lessons of recent years is that a strong policy response that identifies and addresses sources of instability is key. Whether the problem is a weak banking sector, excessively leveraged corporates, inflexible exchange-rate regimes, or high fiscal imbalances, a strong policy response is crucial for strengthening the economic environment and sovereign creditworthiness. Sovereign Ratings and Corporate Credit Risk Sovereign credit risk is a consideration in assessing the credit standings of private-sector entities, but sovereign ratings do not cap private-sector ratings. Sovereign risk comes into play in analyzing private-sector creditworthiness because the unique, wide-ranging powers and resources of each national government affect the financial and operating environments of entities under its jurisdiction. Past experience has shown that defaults by otherwise-creditworthy borrowers can stem directly from the imposition of exchange controls that impede debt service, often, though not always, linked to a sovereign default. This has occurred most recently in Argentina. In the case of foreign currency debt, the sovereign has first claim on available foreign exchange and controls the ability of residents to obtain funds to repay creditors. As a result, absent a monetary union with a higher-rated central bank or special considerations insulating the issuer or issue (such as a supportive foreign parent, substantial offshore business, or structural features), the credit rating of an international borrower most often is at, or below, the rating of the sovereign in the country of domicile. In some cases, Standard & Poor's may decide that the risk of sovereign interference is less than the risk of sovereign default and rate a private-sector entity higher than the sovereign even without the special features noted above, but such instances have been rare. Moreover, as the international community considers various sovereign bankruptcy plans that may include the imposition of foreign exchange controls, the scope for assigning higher sovereign interference ratings (lower sovereign interference risk) is likely to remain limited. In contrast, sovereigns are not very likely to interfere directly in the service of private-sector debt when access to foreign exchange is not involved. As a result, the potential for rating a private-sector entity higher than a sovereign on a local currency basis is much greater. Private-sector local currency ratings speak to the willingness and ability of the entity to service its debt (both foreign- and local-currency denominated) in full and on time, absent foreign exchange controls. However, indirect sovereign risk continues to be an important consideration because when a sovereign is in distress or default, economic and business conditions are apt to be quite hostile for all entities. The economy likely will be contracting, the currency depreciating, taxes increasing, public services deteriorating, inflation escalating, and interest rates soaring. In the most difficult situations, bank deposits will be frozen. Thus, only corporations with exceptional operational and financial flexibility that diminish these risks are likely to be rated higher than the sovereign.