Commercial Banks and the Creditworthiness of Less Developed Countries

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INTRODUCTION: THE SIGNIFICANCE AND PURPOSE OF PROPOSED STUDY

During the last few years, lending to the less developed countries (LDCs) has been one of the most serious issues facing the international capital markets because of the rapid increase in the volume of international capital flows to LDCs and the shift in the transfer mechanism from official sources to private commercial banks. The problem of financing LDCs is not new, but the focus of attention has shifted from LDCs' need for foreign credit and access to the international credit to one of the LDCs' ability to fulfill the obligations of existing and future external debts.

Until about 1970, LDCs with limited developmental capital or balance of payments deficits had to rely largely on foreign grants, IMF stand-by credit, suppliers credits, and development loans from official lending agencies of foreign governments as well as international financial institutions (see Table 1–1). Supplier and trade credit for financing exports from industrial countries was LDCs' major source of private loans until 1970, but much of that money was provided under the umbrella of foreign nations' official credit or insurance agencies.[1] This was supplemented by some direct bond placements in foreign capital markets. Borrowings of LDCs from foreign bond markets increased from $612 million for the decade 1956-65, to $380 million in 1970 alone. This funding was quite limited, however, compared to supplier credits of $2,297 million and relative to need for $11.1 billion represented by current account deficits in the same year.

During the 1970s the LDCs' access to commercial banks as well as international bond markets has increased steadily as shown in Table 1–2. Especially the worldwide recession and quadrupled oil prices of 1973–74 pushed LDCs' foreign exchange requirements (deficits on current account of balance of payments) far in excess of what they were likely to obtain from their traditional foreign official sources, despite the creation of a significant new official source of financing in the form of the IMF oil facility in 1974–75. While funds from foreign official sources to LDCs have increased consistently in absolute terms, they have been decreasing as a proportion of the total foreign exchange needs of LDCs. Thus LDCs must increasingly rely on commercial banks to meet the remaining financial needs.

Table 1–1

Total Flow of Funds (Disbursements) to LDCs (in U.S. $ million)

	1969	1970	1971	1972	1973	1974	1975
Total official	4838	5503	6040	6714	8845	10303	14611
Government	3711	4185	4421	4816	6333	6983	10199
International organizations	1127	1318	1619	1898	2512	3320	4412
Total private	4062	4733	5168	7409	10510	13357	17894
Suppliers	2083	2297	1919	2384	2415	3097	3670
Financial markets*	1955	2135	3243	5018	8091	10259	14197
Other private+	24	301	6	6	4	1	27
Total	8900	10236	11208	14123	19355	23660	32505

Note: Computations based on the public and publicly-guaranteed external debt disbursement of 84 countries.

*Loans from private banks and other private financial institutions plus publicly-issued and privately-placed bonds.

+ Debts resulting from nationalized properties, and unclassified debts.

Source: World Bank, *World Debt Tables*, EC-167/77.

According to World Bank statistics on the external debts of 84 developing countries'[2] (shown in Table 1-3), official sources accounted for $31.7 billion or 62.9 percent of total disbursed outstanding debt, compared with $18.7 billion from private sources in 1969. By 1975 this amount had changed to $71.3 billion or 49.7 percent, from official sources and $72.4 billion from private sources.

Table 1–2

Debt Outstanding (Disbursed) from Private Sources (in U.S. $ billion)

Year	Suppliers	Financial Markets		Other	Total
1969	6.7	5.8		0.7	13.3
1970	7.6	7.2	(28%)*	1.1	15.9
1971	8.4	9.3	(29%)	1.1	18.9
1972	9.2	12.6	(35%)	1.0	22.9
1973	10.0	18.3	(45%)	0.8	29.2
1974	11.4	25.6	(39%)	1.2	38.2
1975	12.1	36.5	(42%)	1.1	49.7

Note: Computations based on the public and publicly guaranteed external debt outstanding of 84 LDCs.

*( ): Annual growth rate.

Source: World Bank, *World Debt Tables*, EC-167/77.

Table 1–3

Debt (Disbursed) from Official and Private Sources of LDCs (in U.S. $ billion)

	Official Sources	Private Sources		Total Private	Percentage of Private Sources in Total Debt
		Official Guaranteed	Other* Private		
1969	31.7	13.3	5.4	18.7	37.1
1970	35.3	15.9	6.4	22.3	38.7
1971	41.0	18.9	8.3	27.2	39.9
1972	46.0	22.9	12.5	35.4	43.5
1973	53.5	29.2	16.2	45.4	45.9
1974	61.9	38.2	20.1	58.3	48.5
1975	71.3	49.7	22.7	72.4	50.3

*Estimations of World Bank. The private debts which are neither public nor publicly guaranteed.

Source: World Bank, *World Debt Tables*, EC-167/77 and *The External Debt of Developing Countries (Memorandum)*, 1977.

Euromarket Borrowings

The rapid growth of the Euromarkets in the last few years has provided LDCs with large and easily accessible sources of capital. From less than $1.5 billion in 1971, the total amount of LDC bank loans from the Euromarkets increased to over $17 billion in 1976. The Euromarkets have certain operating advantages over the competing credit markets, the national markets for foreign borrowers -- the absence of reserve requirements and no limitations on interest ceilings or quantitative credit restrictions, the advantage of low tax location, and the efficiency achieved in handling large volumes of credit enable Euromarkets to operate on small margins, which accounts for their rapid growth. This, in turn, has given LDCs the opportunity to borrow on relatively favorable terms.

Most of the borrowing from the Euromarkets has been via medium-term syndicated credits[3] with floating interest rates. The syndicate involves a large number of banks, often 20 or more, so that the average individual share per bank is relatively small. Since no one international bank is willing to provide the full amount of a large loan, this technique enables banks to pool their funds and to distribute risks. "The actuarial spread of risks has enabled banks to lend to borrowers they might otherwise have shunned, and the major beneficiaries of this syndicate mechanic have been LDCs."[4]

Contrary to the favorable development in the private capital market, the advantages of borrowing from the official lending institutions have diminished. As the funds from their member governments become limited, the World Bank and regional development banks have had to act more and more as financial intermediaries, lending funds to LDCs which were borrowed from the private capital markets. As a result, the terms and conditions at which they lend to LDCs approach more and more those stipulated by the private lenders. While the official lenders are still likely to offer longer maturity periods, and lower interest rates, the interest rate advantage has diminished for many creditworthy LDCs which now can borrow directly from the Euromarkets at relatively small premiums above the prevailing minimum lending rate.

Some countries prefer to borrow from commercial banks rather than meet the stricter conditions on monetary policies and economic performances that the lending agencies, especially IMF, mandate. For example, Euromarkets loans are advantageous in that

1. They can be obtained relatively quickly, with a minimum of red tape;
2. There are no requirements that the projects they finance be carried out on the basis of international competitive bidding;

3. The goods and services financed are not tied to any stipulated country of origin;
4. The loan need not be tied to a project nor need it cover only imports. It may be a simple balance-of-payments loan, or it may be used to restructure a country's external or even internal debt;
5. The credits may enable the borrower to switch indebtedness from currencies that are appreciating relative to its own to currencies that are expected to maintain their parity or even depreciate (if the borrower could anticipate the change in exchange rates correctly);
6. They enable the borrower to take advantage of possible declines in the cost of money, since the interest rate is variable.[5]

But borrowing from the Euromarkets also involves some risks, as a result of its commercial character and also of its technical features.[6] First, the bases for the interest rate, the three-month and six-month Eurorates, have been highly volatile depending on changing market conditions and uncertainties in the international capital market. These volatile rates not only increase the uncertainty to borrowers on the future interest rates, but also make it difficult for borrowers to evaluate the cost of the loan over its life. Second, since the average maturity of Eurocredits, from five to seven years, is shorter than that offered by official sources, the maturity may not be long enough for the developmental project financed by the Eurocredits to generate sufficient cash flow to amortize its cost. Third, there is no assurance of the continuity of Eurocurrency flows to LDCs. Should traditional borrowers in developed countries increase their demand for Eurocurrencies, the result might be not only higher interest rates but also a reallocation of credits favoring them at the expense of LDCs. These risks and uncertainty features are accepted as inevitable by LDCs who seek to achieve their economic goals without the delay of relying on foreign capital.

Assessing Creditworthiness

The shift in the transfer mechanism of the international capital flow from official sources to private commercial banks, in combination with ever-increasing borrowings of LDCs, has given rise to concerns about "the optimum amount of foreign borrowings," and "How to assess the creditworthiness of LDCs." Unlike the foreign official sources and international financial institutions providing "soft" loans, commercial banks as profit-maximizing entities are concerned more with the risks of lending. In addition, the widespread reports about the economic problems and consequent debt rescheduling of several LDCs which had

been major Euromarket borrowers, has intensified the need to establish an appropriate framework for risk analysis.

Each bank has its own criteria for assessing risk and the debt repayment capability of a country. But evaluation of credit and risk is normally conducted by the bank that leads the syndicate when the lending to an LDC is a syndicated credit. The participating banks are assumed to be responsible for their own judgments, based on the information provided by the lead bank, in deciding to participate in a syndicated credit. To prevent the possible disclaimers, the lead bank treats the preparation of placement memoranda as if they were prospectuses, obtaining "warranties from borrowers as to the accuracy of information and representation."[7] It also takes more care in disseminating information concerning the credit both at the time of its arrangement and throughout its duration. Therefore the ultimate responsibility for evaluating a borrower's creditworthiness lies on the shoulders of the lead bank, and this will impel the lead bank to develop a more reliable system of data gathering and evaluation of information.

At present most of the evaluations are based on the qualitative analysis of an index system which uses a number of common indicators, such as debt service ratio and the level of reserves to imports. There are few publicized attempts to devise a reliable statistical method of identifying creditworthiness by either practitioners or scholars.

The purpose of this study is to identify the determinants of a country's creditworthiness. It presents a normative conceptual framework for creditworthiness within which relevant data and forecast can be conveniently analyzed, and attempts to empirically validate that framework.

To enhance understanding about the causes of creditworthiness, it evaluates the distinctive features of those countries which have had access to the private capital markets. The ability of a country to borrow from private capital markets at reasonable terms has been the most important criterion for judging creditworthiness used by international financial institutions such as IBRD, whether or not continued lending to a country is justified.[8]

One reason for lack of a reliable statistical study is that some key elements in assessing creditworthiness, i.e., political stability, willingness to repay, general economic management, and external debt management, can be hardly quantified to fit into the statistical model. Thus instead of utilizing statistical methods, bankers rely on first-hand experience and qualitative analysis to develop the composite index techniques of credit rating which do not require the exact quantification of the variables under consideration.

A more important reason for insufficient statistical study is that no single creditor has experienced any *outright* default of repayment by the country borrowing since the 1930s. There have been more than 33

multilateral debt rescheduling cases since 1956, which have provided about $8.7 billion in debt relief, excluding a number of bilateral reschedulings among individual creditors and debtors and a small multilateral rescheduling for Cambodia (see Table 1-4). But there has not been a single write-off on creditors' books for economic (balance of payments) reasons. In part this had occurred because governments of LDCs "have been less inclined to renege on commercial debt repayments than they sometimes are to nationalize foreign investments or to stop the repatriation of dividends and private capital, after political coups or in times of economic duress."[9]

The lack of defaulting makes it impossible to develop a model based on objective historical data. The dependent variable (creditworthiness) in the statistical model cannot be obtained even on an *ex post* basis. Empirical tests based on actual reschedulings solve the problem of objectivity. They provide information on reschedulings resulting from short-term liquidity difficulties, and thus indirectly on the possibility of outright default. But they do not answer the question on the outright default or creditworthiness of countries. The approach based on rescheduling does not necessarily measure the creditworthiness of a country, because it deals only with the liquidity problem of the country. Such short-term difficulties indicate a cash-flow problem, but do not necessarily indicate the country's inability to create additional output which is sufficient to cover the cost for input and debt service.

Dependent Variable for Creditworthiness

In this study the loan amounts from the private capital markets, adjusted for differences in external financing demand between countries, will be the dependent variable for creditworthiness. The loan amounts will be divided by the needs for external financing of a country, i.e., loan amount divided by needs, so that the dependent variable will become ultimately the creditworthiness index of a country and will have a value ranging between one and zero. (The rationale and mechanics of developing the needs for external financing of a country will be mentioned in Chapter III.) The reason for using the loan amount is that commercial banks lending to LDCs are more likely to differentiate country exposure limits.[10] Brackenridge asserts that "one of the principal reasons for an international bank to evaluate the creditworthiness is to establish exposure limits for individual countries, because the bank wants to distribute the present and potential risk assets of the bank on a country-by-country basis."[11]

Table 1–4

Multilateral Debt Reschedulings (1956-1976)

Country	Year	Amount Rescheduled (U.S. $ million)	Country	Year	Amount Rescheduled (U.S. $ million)
Argentina	1956	500		1973	187
	1962	240		1974	194
	1965	76		1975	167
				1976	160
Brazil	1961	300			
	1964	200	Indonesia	1966	247
				1967	85
Chile	1965	96		1968	85
	1972	160		1970	2,100
	1974	367			
	1975	230	Pakistan	1972	234
				1973	103
Ghana	1966	170		1974	650
	1968	100			
	1970	25	Peru	1968	58
	1974	290		1969	70
India	1968	300	Turkey	1959	400
	1971	92		1965	220
	1972	153		1972	114
			Zaire	1976	350
			Total		8,723

Note: Debt reschedulings in the table represent multilateral consolidations of bilateral governmental loans and publicly guaranteed supplier credits. Credits with maturities under 180 days, all commercial bank credits and all loans from international financial institutions (World Bank, regional development banks) as well as debts between LDCs are excluded from this table.

Source: Robert N. Bee, "Lessons from Debt Reschedulings in the Past," *Euromoney*, April 1977, pp. 33-36.

The recent survey[12] of Association of Reserve City Bankers in March 1977 showed that almost all the member banks utilized formal country exposure reporting procedures, and the majority of responding banks prepared country exposure reports monthly. Only 12 banks (14 percent) with foreign exposure did not prepare country exposure reports on a regular basis. The international assets of these banks were less than 5 percent of their total assets.

Commercial banks could discriminate among LDC borrowers by charging them different interest rates. But because of the rationing process to maximize return subject to a risk constraint, discrimination by interest in the commercial lendings to LDCs is not significant nor consistent enough to identify.[13]

An LDC seeking to borrow without an external commercial borrowings history often can borrow on better terms. A recent case is India which has received bank loans of $50 million over seven years at 1 percent over London interbank offered rates (LIBOR). India has rescheduled its payments to foreign creditors more frequently than any other country during the last ten years. As the loan amount increases, borrowers pay slightly higher interest. Beyond a certain point, a country cannot borrow due to the exposure limit. As a *Euromoney* editorial in October 1977 points out: "From a country borrower's point of view, general economic performance is no longer very important. Nor is its political coloring or government."

This process of rationing makes the country exposure limit, not the interest rate, an important criterion in selecting the loan portfolio in commercial banks. The actual interest rate behavior shows that the difference in the interest spreads between LDCs and developed countries becomes smaller. In addition, the range of spreads among LDCs are so narrow that they can hardly be differentiated. For example, the spreads to LDCs on publicly announced Eurocurrency credits during 1976 ranged only between 1.125 percent and 2.125 percent over LIBOR. Figure 1.1 shows the relationship of interest rates to LDC loans and exposure limits to LDCs.

I. Kapur also explains the rationing of Euromarkets as follows.

> (a) If they could, lenders would discriminate among borrowers through interest and noninterest elements in the price of loans, (b) under market conditions where perfect discrimination is not possible, for institutional or other reasonings, while the interest and noninterest price of loans will reflect some of the differences in creditworthiness among borrowers, the allocation of loans will be based on a system of quantity rationing.[14]

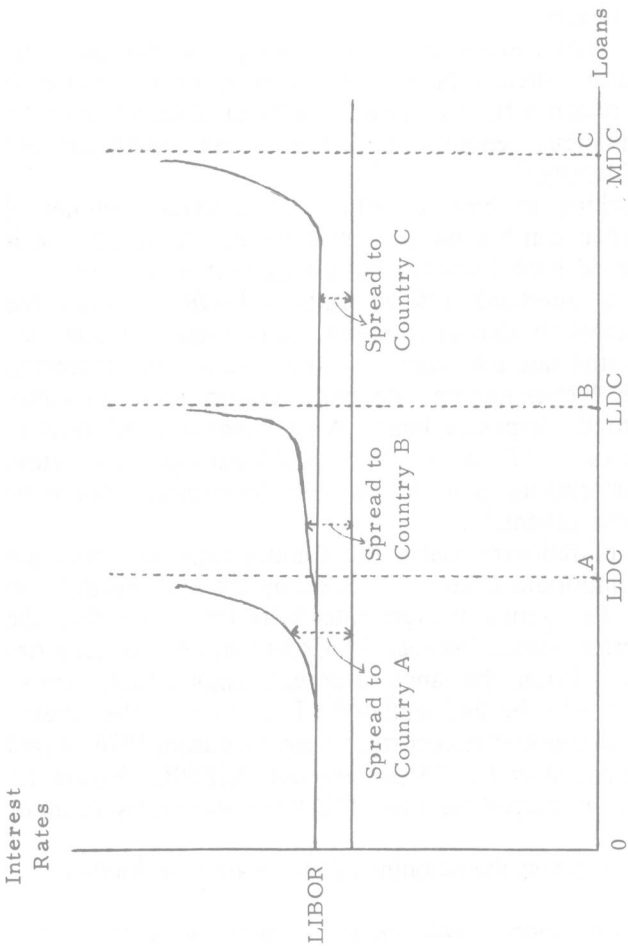

Figure 1-1. Exposure Limits and Interest Rates to LDC Loans.